Planning for Social Change Towards Sustainability?

Investigating Local Government Strategic Sustainability Planning in Canada

by

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Author's Declaration

I hereby declare that I am the sole author of this thesis. This is a true copy of the thesis, including any required final revisions, as accepted by my examiners.

I understand that my thesis may be made electronically available to the public.

Abstract

This dissertation investigated the condition of local government strategic sustainability planning (SSP) in Canada as well as the contextual underpinnings of prevailing practices. It asked big questions about where we are going, how we are getting there, and what planning for social change towards sustainability should mean and entail. But one body of scholarship, alone, does not address these queries and scholars have tended to use meagre evaluative frameworks to analyse municipal government SSP initiatives. In response to these research gaps, this study developed an analytical framework that integrates ideas from five pertinent fields of study: sustainability assessment, social-ecological resilience theory, collaborative planning, the New Institutionalism, and lessons learned from experience in municipal SSP. When combined, concepts from these areas of inquiry illuminate the core concerns of SSP in any context. Notions from institutional theory help to explain why practice is the way it is.

From this theoretical standpoint the research examined the community-scoping frameworks that practitioners have applied in the plan formulation phase of municipal SSP. Community scoping is a type of participatory analysis that aims to better understand baseline local conditions and provide the foundation for sustainability goals. Because community scoping requires practitioners to make choices with respect to contents and processes, it provides an opening for scholars to investigate the range of sustainability (including resilience), social change and effective practice concerns that community-scoping frameworks have tended to cover. Because community scoping requires public participation, it offers an opportunity for scholars to scrutinize the processes that have been used. Finally, because the community-scoping step must unfold within the context of a particular place, it presents a window for scholars to explore the institutional, built and ecological factors that have influenced practice.

This study involved two key stages. The first stage included a Canada-wide search for local government SSP undertakings, the selection of sixty-five municipal SSP initiatives, basic qualitative data collection, and an in-depth analysis of applied community-scoping frameworks. The in-depth examination concentrated on the content and process components of the frameworks as well as the community-specific concerns that were elicited from the public. During this stage, the initially generic and integrated evaluative framework was specified for the local government context and teased apart in order to examine the content and process elements of community scoping separately. Building on the findings of this research, the second, case study stage employed concepts from institutional theory to explain the contextual underpinnings of practice. Three cases were selected, the City of Prince George SSP undertaking in British Columbia, the Town of Cochrane SSP initiative in Alberta, and the Town of Huntsville SSP effort in Ontario. Key informant interviews probed into why certain choices were made in the design of the community-scoping step.

The findings of the first research stage showed that communities have committed to the concept of sustainability as an overarching idea. The predominant interpretation of the notion, however, conformed to the prevailing capitalist model of economic growth and development. None of the initiatives used sustainability criteria to structure the community-scoping step. Rather, practitioners preferred to use open-ended questions and sustainability pillars or urban planning categories. The findings revealed that open-ended questions were more effective with respect to

covering a diverse range of community-specific matters; however, they tended to miss important sustainability (including resilience), social change and practical enactment concerns. The overall lack of attention that was given to place-specific inter- and intragenerational equity issues, among others, evidenced the limitations of the open-ended, pillared approach. Indeed, the findings exposed a general uncertainty with respect to how to do integrative planning. Additionally, the community-scoping frameworks were generally not clearly underpinned by an intention to shift community systems towards sustainability, and strong collaborative processes undergirded by an intention to facilitate learning and paradigm change were not the norm.

The major strength of the interdisciplinary evaluative framework was that it was able to expose prevalent and atypical approaches to thinking and practice with respect to the different components of community scoping. For example, the analysis of community-specific concerns that were elicited from the public revealed a dominant vision and a minority vision for community development. The former projected a business-as-usual community development trajectory, supported by an efficiency-based model of resource maintenance and a mitigative approach to the social-ecological impacts of development. It almost completely ignored the distributive dimensions of socioeconomic systems. In contrast, the minority vision expressed a concern for the distributive dimension of socioeconomic systems; it questioned the power of corporations and our dependence on global markets and fossil fuels; it acknowledged critical thresholds and alternative states of equilibrium; and it emphasized the notions of living locally, zero waste, slowing the pace of growth, and limiting growth.

On the whole, the findings of the first research stage depicted a mechanistic approach to public sector SSP. The case studies, interviews and concepts from the New Institutionalism suggested that prevailing practices may be underpinned by an actor's sense of what is right and good for the local context as well as his or her socioeconomic interests in adhering to some well-established norms in local government SSP. Uncertainty, collective understandings, legislative frameworks, relationships of power, and taken-for-granted interpretations of the roles that municipal governments, citizens, and practitioners should play in SSP may also underpin predominant approaches. While these institutional factors contributed to the durability of prevalent practices, the Town of Huntsville case demonstrated how practitioners could acknowledge the need for change, raise the bar on practice, and introduce new planning norms.

The research enriches our understanding of the conceptual basis for theory building about planning for social change towards sustainability. It also contributes to each body of research that comprised the evaluative framework. With respect to practical contributions, this study begins to portray the condition of municipal SSP in Canada relative to a representative set of generic and local-government specific SSP considerations. Opportunities for improvement were underscored, especially with respect to how and when social change and practical implementation concerns should be addressed. This study clearly evidenced the need for planning and community-scoping frameworks that cut to the heart of the institutional underpinnings of prevailing (insufficient) approaches to practice. These contributions raise further questions about how the interdisciplinary analytical framework should be applied in other SSP contexts; the planning realities that might discourage and/or encourage the approach to community scoping that I proposed in this thesis; and whether this approach would lead to greater progress towards sustainability over the long term.

Acknowledgements

Dedication

This thesis is dedicated to future scholars curious about the history of municipal sustainability planning in Canada, and to everyone whose heart carries a nagging desire for a fairer, healthier and happier planet.

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Chapter One: Introduction

1.1 Purpose

This thesis investigates the condition of local government strategic sustainability planning (SSP) in Canada as well as the contextual factors that have shaped prevailing practices. The scholarly research questions, which I provide in Section 1.6, are underpinned by an aspiration to better understand the core concerns of this kind of planning, the extent to which we have been attending to these concerns in local government SSP and what predominate approaches tell us about our ourselves and our planning paradigms.

1.2 Why Take Stock of Local Government Strategic Sustainability Planning?

One does not have to wade deeply into the academic literature or popular non-fiction to find scholarly and down-to-earth accounts of the complex social-ecological problems facing humanity today. Statistical diagrams are readily available from international organizations depicting increasing gaps between the rich and poor (e.g., OECD, 2011). Popular social media offers "YouTube" and other accounts of the simmering Occupy movement with its familiar chant, "We. Are. The 99%!" (Occupy Together, 2014). News stories proliferate in the press about one or another island country whose fate hinges on the effects of climate change (e.g., Harvey, 2014; Nunn et al., 2014), or the social and ecological injustices that have accompanied rapid urbanization (e.g., He et al., 2014), factory farming (e.g., Pluhar, 2010), deep-sea drilling (Fisher et al., 2014), and mineral mining (e.g., Stuckler et al., 2013), among other modern industrial endeavours.

Clearly, a concerted effort towards positive societal change is needed. Local governments may be best positioned to orchestrate the required adjustments because they are closest to the people and they are tasked with public interest responsibilities that bear on global-scale social-ecological problems (Evans et al., 2006). Over the past half-century, thousands of local governments have embarked on SSP initiatives (see ICLEI, 2012). During this period, scholars and practitioners have created many local government SSP frameworks (e.g., ICLEI & IDRC, 1996; Hallsmith et al., 2005; Ling et al., 2007; The Natural Step, 2009) and studies have been undertaken to scrutinize the offerings (e.g., Seymoar, 2004; Kennedy et al., 2007; Connelly et al., 2008; Savelson and Buckle, 2010). The recent academic and practitioner research has concentrated primarily on effective implementation practice (e.g., Lafferty, 2001; Doppelt, 2003; Myers & Kent, 2008; Runnalls, 2008; Leung, 2009; Barrutia et al., 2013; van Buuren et al., 2014). This focus has been appropriate, given the challenges associated with pursuing sustainability aspirations and our limited understanding of how to facilitate social change in well-established complex systems (Connor and Dovers, 2004; Brown, 2005; Adams and Jeanrenaud, 2008; Walker et al., 2009; Nayak et al., 2014). But these studies have tended to rest on a tacit assumption that all sustainability planning is good sustainability planning.

Scholars and practitioners who have examined local government SSP initiatives have begun to reveal some strengths and weaknesses with respect to how the social, economic and ecological

dimensions of sustainability have been addressed. For example, Pearsall and Pearce (2010) evaluated the character of a range of sustainability plans of US cities, focusing on how notions of justice were institutionalized in formal frameworks for public policy. Similarly, Warner (2002) investigated how various sustainability initiatives in large US cities addressed the notion of environmental justice. Portney (2002) undertook a comparative analysis of twenty-four US cities, asking why some cities take sustainability more seriously than others. Portney's evaluative framework was based on a range of variables indicating whether each city engages in specific sustainability programmes, policies or activities. Parkinson and Roseland (2002) analysed the sustainability initiatives of 52 municipalities from across Canada, using six criteria: measurable progress, stakeholder involvement, innovation, replicability, long-term viability and part of a larger vision. Berky and Conroy (2000) looked at medium-sized municipalities in the US, considering how their sustainability plans used the concept of sustainability.

But these studies have generally ignored critical content and process components of the planning frameworks that practitioners have been using in the plan formulation stage. Scholars do not have a good understanding of the extent to which these planning frameworks have been attending to social change towards sustainability concerns in the early stages of planning, as well as why particular approaches prevail. Significant questions, therefore, remain about where we are going and how we are getting there.

Furthermore, scholars and practitioners lack the analytical tools required to undertake critical examinations that integrate concern for the constituent elements of SSP. I explain these constituent components in section 1.5. Needed are evaluative frameworks that scholars can use to examine SSP undertakings in light of the knowledge that we have gained about the basic (content and process) concerns of strategic planning for social change towards sustainability as well as the place-specific circumstances that have influenced practice. Concentrating on these matters would complement the research that has focused on sustainability-ness and implementation problems in that it would shed light on the constraints (financial, political, administrative, etc.) that bear on practitioners' choices as well as the links between applied planning frameworks, interpretations of sustainability and implementation issues. Most importantly, it would generate valuable insights about how local government SSP should be refined in order to make greater progress towards sustainability.

In section 1.3 below I provide the definition of local government SSP that I adopt in this study.

1.3 What is Local Government Strategic Sustainability Planning?

The definition of local government SSP that I adopt is based partly on the strategic planning scholarship in the fields of business management, public administration and urban planning (Goodstein et al., 1993; Mintzberg & Lampel, 1999; Arts et al., 2005; Bina, 2005; Bryson & Alston, 2005; Poister & Streib, 2005; Healey, 2006; Stead & Stead, 2008); and partly on sustainability theory and sustainability-based decision-making (Dryzek, 1987; ICLEI, 1996; Meadowcroft, 1997; Lafferty, 2001; Eckersley, 2004; Gibson et al., 2005; Connelly et al., 2008).

Local government SSP is here defined as a participatory process of conscious social choice that

situates the notions of sustainability, public participation and institutional change at the center of decision making. It makes big-picture decisions about the long-term development trajectory of an organization and/or community, and in so doing it seeks to deliver lasting, multiple mutually reinforcing benefits to community well being. It does this by creating a sustainability-based vision for the future and setting out an integrated set of sustainability goals to achieve it. These high-level goals guide lower- and same-level strategic planning as well as operational or tactical planning.

This study distinguishes between local government SSP initiatives that set out goals for the day-to-day operations of municipal organizations and local government SSP initiatives that set out corporate-level goals for all department-level policies, plans, programs, and projects. This thesis concentrates on the latter form of local government SSP because the scope of these undertakings includes the complex community systems over which municipal governments have some control.

1.4 Specific Focus on Community Scoping

For the purposes of this study, I examine one of the first steps in the plan formulation stage of municipal government SSP – 'community scoping'. The term community scoping refers to a type of analysis undertaken in local government SSP (see ICLEI & IDRC, 1996; Hallsmith et al., 2005; The Natural Step, 2009) and strategic planning more generally (see Stead & Stead, 2008). It is akin to the baseline study step in environmental assessment in that it seeks to understand current circumstances. Here, it is defined as a type of participatory analysis that aims to better understand the baseline conditions in an organization and/or community (ICLEI & IDRC, 1996; Lindberg, 2011). These conditions may relate to sustainability issues and assets as well as societal change and practical implementation matters. It is a critical step in the plan formulation stage of local government SSP because it provides the basis for the creation of sustainability goals.

Over the years, scholars and practitioners have developed different frameworks for community scoping in local government SSP. One framework that has been extensively used is The Natural Step's (2009) 'sustainability impacts analysis', which uses four principles to examine an organization's contributions to unsustainability. Regardless of the differences among the various frameworks, all of them have content and process components. The content component relates to the sustainability concerns that a framework addresses. For example, The Natural Step's four principles pertain mainly to physical environmental issues (see Kennedy et al., 2007). The process component relates to when the community-scoping step occurs, the methods used to include the public and how the information gathered from the public influences the plan. When deciding what type of information should be gathered and how, municipal SSP practitioners reveal what they expect to be relevant to sustainability planning at the local level and, by extension, what they understand to be the core substantive and procedural requirements of progress towards sustainability.

In this study, I examine how practitioners have been undertaking community scoping in terms of the frameworks that have been used and the results of the community-scoping step. Because community scoping requires practitioners to make choices with respect to contents and processes,

it provides an opening for scholars to investigate the range of sustainability (including resilience), social change and effective implementation practice concerns that community-scoping frameworks have tended to cover or neglect. The information elicited from members of the public illuminates the range of context-specific cares that have been important to them and, by extension, how they have been interpreting the concept of sustainability and the purposes of community scoping, among other things. Because community scoping requires public participation, it offers an opportunity for scholars to scrutinize the processes that have been used. The quality of these processes reflects prevailing attitudes towards the public and shared opinions about the appropriate role that municipal governments, practitioners and the public should play in local government SSP. Finally, because the community-scoping step reflects practitioners' choices and must unfold within the context of a particular place, it provides a valuable window for scholars to explore the institutional, built and ecological factors that have influenced practice or, more simply put, why practice *is* the way it *is*.

This description of my specific focus alludes to some constituent components of SSP that inform my interdisciplinary research approach. Section 1.5 below elaborates on this approach.

1.5 Core Components and Interdisciplinary Approach

If we unpack the notion of SSP, at least four interrelated constituent components become evident: sustainability (including social-ecological resilience), collaboration, institutional change, and effective practice concerns. In the sub-sections that follow, I explain these elements in turn.

1.5.1 Sustainability (Including Social-Ecological Resilience)

The first component of SSP – sustainability – relates to what the concept should mean and entail. Over the years, myriad interpretations have emerged out of many different cultural settings and this diversity has given rise to confusion over the meaning of sustainability. The positive side of this ambiguity is that it has allowed for context-specific definitions to emerge. But some scholars have stressed the problematic side, asserting that it has provided the intellectual basis for 'greenwashing' and other deceptive pubic relations facades, among other criticisms (see Robinson, 2004). Whether positive or problematic, the fog surrounding the meaning of sustainability has muddled the task of envisioning what it should imply. This study helps to clarify the core sustainability concerns pertinent to SSP. Additionally, by investigating the sustainability cares that have been covered in local government SSP initiatives, scholars can generate an informed foundation on which to surmise about norms in thinking and practice as well as the implications of these norms for the trajectory of community development.

Recently, the concept of sustainability has become associated with the notion of social-ecological resilience, as defined by Gunderson and Holling (2002) and other resilience theorists (e.g., Folke, 2006; Kinzig et al., 2006). As Gunderson and Holling have explained, sustainable systems are resilient ones and vice versa. But resilience scholars have also recognized that resilient social-ecological systems may be socially and ecologically destructive (see Gunderson and Holling, 2002; Healey, 2009; Maru et al., 2012). Resilience scholarship thus brings to the fore important questions about positive and negative types of resilience. This study adopts an

understanding of sustainability that includes the notion of resilience in order to acknowledge the intertwined and complementary emphases of resilience and sustainability scholarship.

1.5.2 Collaboration

The second constituent component of SSP is collaboration, which has been widely recognized as an integral part of any type of decision making that involves the public interest (Dobson, 2000; Walker et al., 2002; Burby, 2003; Smith, 2003). The promises of collaborative planning remain contested (Irvin and Stansbury, 2004; Brandt and Svendsen, 2013); however, most sustainability advocates assert that collaboration leads to more learning and capacity building and consequently to more equitable and ecologically rational outcomes (see Dryzek, 1987; Torgerson, 1999; Eckersley, 2004; Gibson et al., 2005). One ongoing discussion in the collaborative planning scholarship with particular relevance to SSP is about when and how the public should be included in decision making (see Fung, 2003). These topics relate back to the design of decision-making processes – an issue with which all SSP practitioners must contend.

1.5.3 Institutional Change

The third constituent component relates to institutional change, notably how practitioners have been incorporating important lessons about societal change into the basis of SSP initiatives. In turn, these concerns pertain to how human-made 'rules of game' emerge, persist and change, as well as how they constrain and enable human and organizational behaviour (see Hall and Taylor, 1998). They can inform how practitioners go about implementing sustainability goals within the constraints and opportunities offered by incumbent governance systems.

1.5.4 Effective Practice

The fourth constituent component is effective practice, which relates to the knowledge that we have gained about the practical needs (e.g., administrative, financial, political, etc.) associated with plan formulation and implementation stages in SSP. When and how we consider these needs in the planning process influence the successful enactment of sustainability goals.

1.5.5 Interdisciplinary Approach

Studying one of these components in isolation would not advance our understanding of local government SSP in the way that is currently needed. At this stage in the development of municipal SSP scholarship and practice, comprehensive approaches are necessary that synthesize insights from the pertinent research and investigate how practitioners have been attending to these insights 'on the ground'. But this begs more questions about which theories and concepts should be used to understand what planning for systemic change towards sustainability should mean and entail. Indeed, one body of research alone would not cover all of the constituent components of SSP. This study, therefore, calls for an interdisciplinary approach.

The analytical framework that I develop is derived from the following fields of study: sustainability assessment (e.g., Gibson et al., 2005), social-ecological resilience theory (e.g., Gunderson and Holling, 2002), the New Institutionalism (e.g., Hall and Taylor, 1996),

collaborative planning theory (e.g., Healey, 2006), and local government SSP practice (e.g., Doppelt, 2003).

Sustainability assessment scholars have devoted much attention to delineating what sustainability should mean and entail, as well as how to incorporate sustainability issues into all levels of decision making (George, 1999; Gibson, 2006; Partidario et al., 2009). As such, it deals directly with the first constituent component of SSP.

Resilience theorists have been more directly focused on transformative change in complex social-ecological systems and, in particular, the role that social-ecological resilience plays in maintaining sustainable and unsustainable ones (Gunderson and Holling, 2002; Walker and Salt, 2006; Walker et al., 2009). In attending to these matters, resilience scholars have developed insights that pertain mainly to the sustainability and institutional change components of SSP.

Collaborative planning scholars have focused much attention on how to design deliberative decision-making processes (Innes and Booher, 1999; Franklin and Ebdon, 2003; Fung, 2006). Advocates of sustainability assert that this kind of decision making is integral to making progress towards sustainability because, among other reasons, it integrates different types of knowledge, facilitates learning and new governance relationships, and leads to outcomes that are sensitive to collective needs and aspirations, as opposed to those of one particular group (Dryzek, 1987; Innes and Booher, 1999; Eckersley, 2004; Eguren, 2008). This body of literature relates mainly to the decision-making processes that are used to engage the public in SSP.

The New Institutionalism has been dedicated to understanding how institutions emerge, persist, change, and influence human behaviour (see Hall and Taylor, 1998). New Institutionalist scholars have thus elucidated the social, economic and political dimensions of societal change. Recently, resilience theorists have borrowed concepts from the New Institutionalism in order to explain the socioeconomic dynamics of transitions (see Hotimsky et al., 2006). Insights from the New Institutionalism pertain mostly to the societal change aspect of SSP, but they also help to explain the roles that human-made 'rules of the game' and other built and ecological conditions play in shaping SSP practice. Sustainability planning initiatives unfold in particular socioeconomic, ecological and built contexts, and these contexts bear on the constituent components of SSP. In attending to the structural effects of contextual circumstances scholars can better understand how certain approaches to SSP practice emerged and why they persist.

Finally, with respect to effective practice, case experience in municipal government SSP has contributed valuable lessons about the practical needs associated with creating and enacting sustainability goals (e.g., Lafferty, 2001; Doppelt, 2003; Infrastructure Canada, 2006; Marbek Resource Consultants, 2009; ICLEI, 2012; Llamas-Sanchez et al., 2013).

Together, these research fields illuminate a representative set of generic concerns of strategic planning for social change towards sustainability. The analytical framework pulls these concepts and insights together and then applies them in an analysis of the community-scoping step in local government SSP. The analysis focuses on various aspects of community scoping as well as the wider plan formulation process within which the community-scoping step is nested. In section 1.6 below I provide the research questions that structure the evaluation.

1.6 Research Questions

In this dissertation, I ask the following core research question:

1. What is the condition of local government SSP in Canada?

To answer this question, it is necessary to consider the ideal contents and processes of planning for societal change towards sustainability. For this purpose, I ask one sub-question that is essentially theoretical in that is identifies the fields of study upon which this study rests and it inquires into what these fields tell us about the basic concerns of SSP in any context:

    (a) What are the generic (content and process) concerns of SSP, as suggested by sustainability assessment, resilience theory, collaborative planning, the New Institutionalism and local government SSP case experiences?

Key ideas and insights from these areas of inquiry comprise the analytical framework.

An evaluation of all of the stages and steps in local government SSP would illuminate the most comprehensive portrait of prevailing practices; however, it is beyond the scope of this study to adopt such an all-inclusive approach. Rather, the focus of this study has been confined to an evaluation of the community-scoping step, which occurs in the plan formulation stage of the SSP cycle. For this purpose, I ask four empirical sub-questions, 1(b) to 1(e):

    b) What best practice principles did the plan formulation process cover in a range of local government SSP initiatives in Canada?

    c) What generic SSP concerns did the community-scoping frameworks initially cover?

Sub-question 1(b) aims to generate an understanding of the wider plan formulating process within which the community-scoping step is nested in each initiative, while sub-question 1(c) concentrates intently on the community-scoping frameworks that were used.

Because community scoping is a participatory process dedicated to understanding the local context, sub-questions 1(d) and 1(e) investigate the place-specific SSP concerns that were elicited from the public as well as how the public was included in the community-scoping step, respectively:

    (d) Relative to a representative set of local government-specific (content and process) SSP concerns, what place-specific issues were elicited from the public through community scoping?

    (e) How did practitioners include the public in the community-scoping step?

This thesis also seeks to uncover the contextual factors that have shaped prevailing community-scoping practices. This objective calls for an analytical framework that can explain the contextual underpinnings of community-scoping contents and processes. In this regard, key

concepts from the New Institutionalism are used, as expressed by the following question:

2. Using key concepts from the New Institutionalism, what contextual factors influenced prevailing community-scoping practices?

1.7 Research Methods

I adopt a qualitative methodological approach using a multiple case, case study design. The research involves two key stages:

- An investigation of community-scoping practice, and
- An exploration of three cases.

The first stage proceeds according to three research steps:

- A Canada-wide search for municipal SSP initiatives,
- An initial collection of basic qualitative data, which aims to answer question 1(b), and
- An in-depth evaluation of applied community-scoping frameworks, which seeks to answer questions 1(c), (d), and (e).

The purpose of the second, case study stage is to expose the contextual underpinnings of community-scoping practice, answering the second research question. Three cases are investigated, one in British Columbia, one in Alberta, and one in Ontario.

1.8 Contributions to Theory and Practice

By investigating the community-scoping frameworks that practitioners have used in municipal government SSP as well as why current practice is the way it is, this study begins to increase our understanding of

- the core concerns of strategic planning for social change towards sustainability;
- the state of community-scoping practice in local government SSP in terms of the extent to which these core concerns have been addressed; and
- the contextual underpinnings of predominant community-scoping practices (or why current practice is the way it is).

Because the community-scoping step is nested within the larger municipal SSP process and because it is a major part of the plan formulation process, the research expands our knowledge of the condition of local government SSP. In a sense, investigating the community-scoping step in order to better understand the state of local government SSP is similar to how a doctor listens to his/her patient's heartbeat in order to assess his/her overall health.

The theoretical contributions stem from the interdisciplinary analytical framework. In combining key concepts and insights from five independent bodies of research pertinent to SSP, this thesis

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contributes to theorizing about strategic planning for societal change towards sustainability. But the findings can be discussed in a combined way, in terms of the efficacy of the analytical framework, or in a way that considers each area of inquiry separately. In this study, I do a bit of both. I discuss what the findings suggest about the core concerns of strategic planning for societal change towards sustainability, specifically in a local government context. And I discuss how the findings contribute to each body of literature, respectively.

1.8.1 Sustainability Assessment

Recently, some sustainability assessment scholars have experimented with combining sustainability and social-ecological resilience requirements in evaluation (e.g., Gaudreau and Gibson, 2013). Sustainability assessment and resilience scholarship overlap and complement each other in ways that foster a more comprehensive understanding of what planning for social change towards sustainability should entail. This study enhances our comprehension of the strengths and limitations of combining sustainability assessment and resilience concepts in analysis.

Additionally, sustainability assessment scholars have tended to ignore the social change and implementation dimensions of sustainability-based decision making. In combining sustainability, social change and implementation concerns in a framework for analysis, this study contributes to our understanding of how these ideas can be combined in scholarly analyses as well as assessment and planning practice.

Finally, within the field of sustainability assessment there has been an effort to incorporate sustainability assessment procedures into strategic planning (see Benson & Jordan, 2004; Helming & Perez-Soba, 2011). This study increases our understanding of the contributions of sustainability assessment contents and processes to local government SSP and public sector strategic planning more broadly.

1.8.2 Social-Ecological Resilience Theory

The contribution to sustainability assessment explained, above, is also relevant to the resilience scholarship in that is illustrates the utility of combining sustainability and resilience concepts in analysis. Resilience concepts also relate to societal change in that they help to explain how systems shift from one identity to another. As such, the research increases our understanding of how they might be combined with concepts from institutional theory in an evaluative framework.

1.8.3 Collaborative Planning Scholarship

In investigating community-scoping processes, this study also explores how practitioners have included the public in local government SSP. Here, the collaborative planning literature informs the analytical lens. As discussed in the literature review, the collaborative planning scholarship has its own strengths and limitations with respect to understanding process design. I respond to these challenges by adopting an analytical approach that expands on a particular framework in such a way to better attend to the links between process, transformative learning and societal change. The research thus contributes to collaborative planning scholarship in this regard.

1.8.4 The New Institutionalism

The New Institutionalism literature is used in two different ways in this study. First, it is used in the analytical framework in order to better understand how practitioners have been planning for societal change. Second, the study tests the ability of institutional theory to explain why local government SSP is the way it is, or why there are certain norms in practice. Urban planning scholars have acknowledged the effects of institutions on planning processes, and they have relied on institutional theory to understand them (e.g., Brown, 2005; Llamas-Sanchez et al., 2013). But, as Verma (2007) notes, the institutional turn in the field of planning has emerged fairly recently, and so many questions remain about its ability to explain planning phenomena. One pertinent question that remains is whether the New Institutionalism recognizes the full range of socioeconomic, built and ecological pressures that bear on planning processes. This study contributes insights about the strengths and limitations of the New Institutionalism in this regard.

Additionally, by examining the contextual underpinnings of practice, this study increases our understanding of the links between institutional, built and ecological contexts and stakeholders' interpretations of the concept of sustainability, participatory planning, societal change and, more broadly, preconceived ideas about the role that practitioners, citizens and municipal governments should play in facilitating transitions towards sustainability. This study thus takes a valuable snapshot of local government SSP practice in Canada relative to some local-to-global structural influences.

1.8.5 Local Government Strategic Sustainability Planning Practice

The major practical contribution of this study is to local government SSP. By taking the pulse of community-scoping practice, the findings reveal how community-scoping and municipal SSP frameworks might be refined in order to better address societal change towards sustainability matters in the plan formulation stage. As I will discuss, later, this contribution relates to the practitioner literature that has begun to discuss ways of bridging the gap between plan development and implementation stages in local government SSP.

1.9 Thesis Structure

The organization of the thesis is straightforward. Chapter Two provides some key background and context information for the reader. First, I describe some international and Canadian experiences in local government SSP. In doing this, I emphasize the effects of context-specific circumstances and I introduce the reader to some key local-, regional- and global-scale factors that form the context within which municipal SSP must unfold in Canada. Specifically, I focus on the large-scale paradigm shift that has been underway in Western civilizations. This leads to a discussion of the contested concept of sustainability and the notion of 'procedural sustainability' (Robinson, 2004). Finally, I illustrate the need for local government SSP frameworks that attend to a comprehensive set of social change towards sustainability matters.

In Chapter Three, I review the fields of research that provide the basis for the analytical framework: sustainability assessment, social-ecological resilience theory, collaborative planning,

the New Institutionalism, and local government SSP case experiences.

Building on Chapter Three, Chapter Four discusses the literature and presents the analytical framework. The analytical framework consists of two parts, which relate to the purposes of the study. First, ideas and insights from the five fields of study are combined to create the evaluative framework. I use this framework to investigate the community-scoping step. Second, a smaller set of concepts from the New Institutionalism, alone, is used to investigate the contextual underpinnings of practice.

In Chapter Five, I present the research questions and methods.

The results and discussion chapters are divided into five chapters. Chapter Six shares the results of the descriptive data collection and in-depth analysis of the applied community-scoping frameworks. Chapter Seven discusses the findings of these research steps. Chapter Eight provides the results of the case studies and Chapter Nine discusses the findings using concepts from the New Institutionalism. In Chapter Ten, I concentrate on the implications of the results for theory and practice.

Finally, in Chapter eleven I summarize the study and give the conclusions.

Chapter Two: Background and Context

In this chapter, I discuss some ideas and terms that prepare the reader for later chapters. In section 2.1 I describe some international and Canadian experiences in local government SSP. This leads to a quick sketch in section 2.2 of the institutional, built and ecological contexts that have shaped local government SSP undertakings. I elaborate on some circumstances that comprise the big picture context for this study. Specifically, I describe the global-scale shift from a Cartesian worldview to a more ecologically grounded systems view of the world, and in connection with this shift I discuss the contested concept of sustainability and the notion of 'procedural sustainability', which reappear in the discussion chapters. Finally, in section 2.3 I demonstrate the need for local government SSP and community-scoping frameworks that attend to a comprehensive suite of social change towards sustainability concerns.

2.1 International and Canadian Experience in Local Government SSP

In 1992, political leaders from around the world gathered in Rio de Janeiro, Brazil, for the United Nations Earth Summit. Over the course of this Summit, they finalized a groundbreaking action plan for sustainable development, called *Agenda 21*. This 300-page, non-binding declaration of commitment to sustainability sought to provide guidance for action to be taken globally, nationally and locally by governments and other organizations. Chapter 28 of *Agenda 21* called for local governments to develop a Local Agenda 21 (LA21) action plan: "As the level of government closest to the people, they play a vital role in educating, mobilizing and responding to the public to promote sustainable development…By 1996, most local authorities in each country should have undertaken a consultative process with their populations and achieved a consensus on 'local Agenda 21' for the community" (United Nations, 1992, s. 28.1- s. 28.2).

Since 1992, over ten thousand local governments around the world have initiated LA21 sustainability initiatives (see ICLEI, 2012). According to ICLEI (2012), these undertakings can be categorized roughly according to the political level and type of organization that initiated them. Using this approach, ICLEI identified five types of LA21 processes (international cooperation, national policy, local government strategy, civil society initiative, and concerted action), noting that many LA21 endeavours may include features of more than one type (see ICLIE, 2012, p. 12).

Eckerberg (2001), for example, has emphasized the importance of National government financing for LA21 initiatives in Sweden, where 100% of the municipalities have adopted LA21 strategies. The initial financial support was part of the Social Democratic government's strategy to build a sustainable Sweden: "The rapid growth of LA21 in Swedish municipalities could thus be attributed to a top-down strategy from the national government…" (p. 15). Meanwhile, in the archipelago region of Aland, Finland, the successful enactment of LA21 goals has been attributed to a local NGO, a local champion, and a widespread concern to protect the ecologically sensitive islands upon which the region's tourism economy has been built (Niemi-Iilahti, 2001). Roberts and Diederichs (2002) have told the story of LA21 in the City of Durban, South Africa, where post-apartheid democratization has created a window of opportunity for

local sustainability efforts. In Japan, LA21 efforts have been shaped by traditional local government policy approaches, which have typically been the job of government-appointed experts whose freedom is limited by the supervisory role of the national government (Barrett & Usui, 2002). In Peru, representatives from NGOs, universities, local governments and grassroots organizations established the Cities for Life Forum to encourage the uptake of LA21 in Peruvian Cities. The Forum was instrumental in implementing the national law on participatory budgeting that requires all local and regional governments to engage in participatory budgeting annually (see ICLEI, 2012, p.12).

In Canada, one particularly celebrated case of local government SSP is the Resort Municipality of Whistler's *Whistler2020* initiative. Nestled in the Coast Mountains of interior British Columbia, Whistler was established as a Resort Municipality in 1975 (Resort Municipality of Whistler, 2013). Today, it is widely recognized as a world-renowned, four-season resort community. It has nearly 10,000 permanent residents and the population can swell to up to 55,000 on peak holiday weekends (Szpala & Robinson, 2008). The municipality's permanent residents are primarily people who have made a conscious choice to move to Whistler because of its natural beauty and quality of life. Thus, they possess a strong sense of community and a desire to protect the natural environment. Indeed, the scenic beauty and well being of Whistler's natural environment comprise the backbone of its tourism-based economy (Whistler, 2013).

In the late 1990s, a general concern emerged about the rapid growth that the community had experienced through much of the '90s (Szpala & Robinson, 2009). Many citizens began to question how this growth would impact the cost of living, the natural environment and the long-term interests of the tourism-based business community. In 2002, Dr. Karl-Henrik Robert, a Swedish cancer scientist, arrived in Whistler for a holiday and to give a series of presentations to the community on The Natural Step, a framework that he developed for SSP. His visit and presentations helped to catalyze a shift in the community's approach to sustainability planning. The Natural Step framework was widely embraced by community organizations. It was particularly well received by the Municipal government, a local ENGO, and the leaders of some of Whistler's most influential businesses. When Whistler made a bid for the 2010 Winter Olympics, it became even more important to the community that it have a strong sense of how it wanted to grow, as many citizens wanted to ensure that the Olympics would leave a positive legacy (Szpala & Robinson, 2009).

In 2004, the Town's council adopted *Whistler2020 – Moving Toward a Sustainable Future*. It was comprised of a vision for sustainability that articulated five priorities: enriching community life, enhancing the resort experience, protecting the environment, ensuring economic viability, and partnering for success. Seventeen strategy areas were created to achieve the vision, and Task Forces comprised of local experts, business leaders and concerned citizens were created for each strategy area. They agreed to meet annually to review progress and recommend actions that would move the community closer to its vision. Representatives from community organizations formally committed to implementing the actions (Szpala & Robinson, 2009).

Because it was one of the first examples of comprehensive sustainability planning in Canada and has been quite successful, Whistler's case has attracted much attention from scholars and practitioners. In particular, it has been praised for its extensive community engagement process

and its task force implementation approach, both of which have encouraged vital relationship building between the local government and community organizations (see Smith & Ling, 2007; Wilson, 2010; Clarke & MacDonald, 2012). According to Szpala and Robinson (2009), Whistler's experience demonstrates three key lessons for other communities embarking on their own SSP journey. Firstly, SSP requires a long-term commitment from all relevant stakeholders. Secondly, it requires broad and inclusive community engagement and, by extension, shared responsibility for implementation and monitoring. Finally, it is integral for stakeholders to commit to an action-oriented process using whatever resources are at hand: "Even the simplest action, with the most meager of resources, gets people into the game" (Szpala & Robinson, 2009, p. 11). These lessons have since been widely acknowledged in the scholarly and practitioner literature, as I will discuss in more detail in Chapter Three.

By highlighting the above cases I do not mean to imply that all local government planning for sustainability has been occurring inconformity with the aims of LA21. This is far from the reality. Waldron and Miller's (2013) review of neighbourhood-relevant approaches to sustainability in North America touches on many government- and community-led approaches to strategic planning for sustainability, including New Urbanism, Smart Growth, Eco-Cities, Civic Ecology, Transition Towns, and STAR Communities, among others. These approaches have been covered extensively elsewhere and it is beyond the scope of this dissertation to describe them in detail. It is conceivable that every region around the world would have its own unique trajectory with regards to formal SSP practice, with place-specific ebbs and flows in approaches and emphases.

In Canada, the most recent wave of public sector SSP has been occurring under the federal government's New Deal for Cities and Communities (Department of Finance Canada, 2005). Introduced in 2005 by liberal Prime Minister, Paul Martin, the New Deal was the then federal government's response to pressure from the Mayors of Canada's largest cities for increased funding for public infrastructure (Swift, 2004). Canada's infrastructure deficit was then estimated at approximately $123 billion (Mirza, 2007). Municipalities have borne the brunt of this problem:

> "With growing responsibilities and limited revenues, municipalities are often forced to choose between providing necessary services to their citizens on the one hand, and making necessary investments in the maintenance and construction of their public infrastructure on the other…The result is the municipal infrastructure deficit, a massive shortfall in the funds required to upgrade existing municipal assets" (Federation of Canadian Municipalities, 2008, p. 1).

In 2005, the federal budget delivered on Martin's proposed New Deal by establishing a Federal Gas Tax Fund. The Fund provided municipalities with a share of gas tax revenues, allocated on a per-capita basis for provinces, territories and First Nations: "Effective in 2005-06, Canada's cities and communities will receive a share of federal gas tax revenues worth $600 million. This funding will increase until it reaches $2 billion annually, equivalent to 5 cents per litre of gas tax revenues, by 2009-10" (Department of Finance Canada, 2005, p. 3). Under the terms of the Fund, each province has to enter into a Federal Gas Tax Agreement that provides for the transfer of funds from the (then) federal department of Infrastructure and Communities to appropriate provincial government departments or municipal organizations and, finally, to individual

municipalities (Department of Finance Canada, 2005, p. 5).

In order to be eligible for funding a municipality had to develop an 'Integrated Community Sustainability Plan' (ICSP), defined as "…a long-term plan, developed in consultation with community members, that provides direction for the community to realize sustainability objectives, including environmental, cultural, social and economic objectives" (Infrastructure Canada, 2005, p. 5). ICSPs were required to identify infrastructure projects that contribute to cleaner air, cleaner water, and reduced greenhouse gas emissions. Proposed projects were required to fall within one of eight infrastructure categories: drinking water and wastewater systems, solid waste management, community energy systems, public transit, local roads, and capacity building.

Aside from these eligibility requirements, ICSPs were obligated to integrate social, economic and environmental concerns, and be prepared with public participation (Infrastructure Canada, 2005b). Municipalities large and small across Canada responded to the Gas Tax incentive to undertake SSP. Clarke and Erfan's (2007) study of SSP undertakings in eight different Canadian regions found that a range of planning frameworks, collaboration models, and timeframes has been used. Some municipal governments have developed stand-alone ICSPs, while others have incorporated ICSP content and process requirements into other high-level strategic plans, including Official Plans and Growth Management Plans, among others. In many cases, municipalities have developed ICSPs that provide the policy framework for Official Plans. For example, in 2010 the City of Kingston, Ontario, adopted the *Sustainable Kingston Plan* (City of Kingston, 2010). This plan reflects the community's desire to respond to a much broader set of sustainability issues than just infrastructure ones. The preamble to the plan expresses a desire to counteract global trends in unsustainability, including widening gaps between the rich and poor, dwindling natural resources, diminishing biodiversity, and mounting human population pressures (p. 3). And it recognizes the need to change fundamentally the currently dominant patterns of thinking and behaving in order to reverse these dangerous trends (see Chapter Three).

In light of the ICSP phenomenon, much research has of late been undertaken about local government SSP in Canada. Here, it is important to note that the research has illuminated the different settings in which local government SSP has been occurring across Canada. These settings are comprised of a diverse range of institutional, ecological and built contextual forces that bear on plan formulation and enactment processes. In section 2.2 below, I briefly describe some contextual factors that have shaped local government SSP initiatives.

2.2 The Larger Context for Local Government Strategic Sustainability Planning

The examples of public-sector SSP that I highlighted, above, begin to depict some local-to-global institutional, built and ecological circumstances that bear on SSP contents and processes. In this section, I highlight in general terms some contextual factors that may be of particular significance to this study. In sub-sections 2.2.1 and 2.2.2, respectively, I focus more specifically on two global-scale factors that form the big picture context for this study: the paradigm shift from a Cartesian to a systems view of the world and the contested concept of sustainability. In Chapter Three, I set out a framework for understanding the contextual factors that might play out

in local SSP initiatives, as well as how they emerge, persist and change.

At the local level, social-ecological issues and shared values may influence a community's motivation for undertaking SSP. This was the case in Aland, Finland, and Whistler, British Columbia, where care for aesthetic beauty and ecological integrity are intricately tied to care for the long-term prosperity of a tourism-based economy. Similarly, Connelly et al. (2008) found that many rural communities have undertaken SSP in response to the desire to preserve small town values and enhance economic viability. First Nations communities have embarked on SSP initiatives as a means to preserve local natural resources, traditional values, and facilitate job creation. Built infrastructure concerns may also be key, as has been the case for many municipalities across Canada that have responded to the Federal Gas Tax incentive.

Crises events may also act as catalysts for local government strategic planning for sustainability (see ICLEI, 2012). This was the case in the city of Surat in Gujarat, India, where a plague outbreak sparked citizen action against the state. The citizens demanded appropriately regulated solid waste management at the local level. Finally, in 2000 the government of India enacted the Municipal Solid Waste Management Rules, which apply to all municipalities in India (ICLEI, 2012, p. 27). In Central America, destructive and costly hurricane incidents sparked local level sustainability policies that aim to prevent or minimize damage (ICLEI, 2012, p. 27). In the industrial city of Kitakyushu, Japan, air and water pollution levels prompted the city to participate in the national government's Eco-Town programme (ICLEI, 2012, p. 28).

Regional- and national-level legislative frameworks may also shape SSP undertakings. In Japan, LA21's voluntary partnership-based process has clashed with mandatory nationally driven policies for local environmental policy making processes, which have tended to rely on public opinion surveys (see Barrett & Usui, 2002). Similarly, in Canada, federal and provincial legislative frameworks influence the orientation of planning and decision making at the municipal level. Federal and provincial building codes, for example, restrict the extent to which municipal governments can make green building standards mandatory (Stirrett, 2013). And each province and territory has a different legislative framework that guides local government planning, including sustainability-based planning. For example, in British Columbia there has been a tradition of municipal climate change action planning supported by provincial legislation:

> "The B.C. Climate Action Charter commits local governments to lowering their carbon footprint and taking community-wide actions that demonstrate leadership on sustainable development. Signatories make planning for compact, complete and energy-efficient communities a priority and report out every year on their progress toward these goals as well as achieving carbon neutrality in their corporate emissions" (British Columbia Environment, 2007).

Here, it is important to note that local governments take different forms across Canada, depending on the history of municipal government in each province as well as local needs and demographics, among other factors. For example, Ontario has a two-tier system of local government and some single tier municipalities (e.g., Toronto, Greater Sudbury, Hamilton). New Brunswick's system of local government is comprised of Municipalities (cities, towns and villages), Rural Communities and Local Service Districts. Recently, New Brunswick started a

local government restructuring process in which new Regional Service Commissions will support the existing local government structure. British Columbia's local government consists of Municipalities (cities, district municipalities, resort municipalities, island municipalities, towns, villages) and Regional Districts for unincorporated areas of the province. Regional Districts provide a framework for inter-municipal cooperation for the purpose of providing regional governance and services. Any combination of municipalities and electoral areas can jointly decide to provide services and recover the costs from the beneficiaries. Similarly, Saskatchewan has municipalities, which are authorized to carry out local and regional planning, and district and inter-municipal planning, which consider broad issues that cross municipal boundaries.

It is beyond the scope of this study to explain the nuances in forms of local government across Canada. While forms of local government vary from province to province, local governments provide a similar range of services, especially with respect to local land use planning, municipal infrastructure, public health, arts and culture and recreation. This similar set of services provides an adequate basis for the evaluative purposes of this study, which does not consider how different forms of local government influence the quality of local government SSP.

Other influential contextual factors reflect pervasive ways of thinking and practice. These include, among others, widespread trends in modes of public administration. Attitudes towards public involvement in decision making may be influenced, in part, by shifts in approaches in public management that frame the relationship between governments and the general public. Vigoda (2002) provides a good description of a recent movement in contemporary public management to view the public as customers. In this model, the public is viewed as a passive client base with needs and demands to which governments should respond in order to maintain their legitimacy. This perspective stands in stark contrast to a view of the public as citizens who are formal 'owners' of the state, who participate as collaborative partners with government officials and administrators.

Additionally, there is a widespread acknowledgement among sustainability commentators that conventional local government administrative structures and processes inhibit progress towards sustainability (see Smith, 2003; Eckersley, 2004; Paehlke & Torgerson, 2005; Dryzek, 2010). Here, the main argument has been that hierarchical, silo-style approaches to government inherently contradict the complex integrated, systemic nature of social-ecological problems. As Doppelt (2003a) has noted, many SSP initiatives fail to get off the ground because they do not address the organizational changes required to effectively implement sustainability goals. Chief among these changes are cultural and structural ones that build the organizational capacity to communicate and coordinate in ways that cut across traditional disciplinary and departmental boundaries (see Doppelt, 2003a). For Gibson et al. (2005), the essential issue is about recognizing the links within and between social-ecological systems, sustainability principles, community sustainability concerns and sustainability goals. It is about examining, addressing and pursuing these things in a proactively integrative way as a means to contribute long-lasting synergistic benefits to community systems. Silo-style decision making processes, however, tend to inhibit this approach to decision making. What is needed is a shift from top-down vertical management structures to horizontal, collaborative approaches (Cohen, 2010).

There may be much overlap between different types of institutional, built and ecological influences, and they may be interwoven across local-to-global scales. British Columbia's

Climate Change Action Charter, for example, illustrates the link between global-scale climate change, locally felt social-ecological impacts, and local and regional policy contexts (see Gayton, 2008). In Whistler, intertwined concerns for rapid growth, the integrity of the natural environment, and the tourism-based economy shaped the concerns expressed in *Whistler2020*. Moreover, the links within and between different types of contextual influences may reinforce each other in ways that constrain and/or enable SSP initiatives. Brown (2005), for example, has demonstrated the links between resistance to integrated stormwater management, established stormwater management discourses, and culturally embedded administrative frameworks for stormwater management. Brown's analysis highlights how taken-for-granted, entrenched ways of thinking can perpetuate administrative inertia towards sustainability.

The influence of contextual factors on local government SSP efforts raises questions about the power that local governments have to facilitate systemic change towards sustainability. Indeed, in Canada municipalities have generally been perceived as 'creatures of the province' – a long-held view buttressed by federal and provincial laws that limit the power that municipalities have to influence local matters. Generally speaking, municipal governments have responsibility over planning and development (municipal zoning and economic development), public transportation, public utilities (sewage, water, and electric utilities), social welfare services (health, library and educational facilities), local policing and firefighting, and parks, recreation and culture, including the development and management of green spaces. They also have some authority over taxation, primarily through property or real estate taxes. Other revenue sources include development charges and fees for a range of public services (transit, recreation, parking tickets, etc.). The limited power that municipalities have over local matters, federal-provincial legislative frameworks, and conventional approaches to planning may severely limit the extent to which practitioners can plan for societal change towards sustainability. Or, conversely, they may present windows of opportunity to make critical changes.

By investigating the contextual underpinnings of practice, this study begins to shed light on the local-to-global circumstances that have shaped local government SSP practice in Canada. Different scholars have understood the shaping effects of contextual factors in different ways. Recently, Healey (2007) and other urban planning scholars (see Verma, 2007) have taken an institutional perspective in that they have stressed the shaping effects of human-made 'rules of the game' (laws, beliefs, values, norms, customs, etc.) in planning processes. Other scholars in this field have acknowledged the usefulness of institutional theory and institutional analysis as a means of understanding decision-making outcomes and implementation difficulties (e.g., see Lowndes, 2001: Motte, 2001; Inam, 2002).

Similarly, in the field of public sector strategic planning, Poister et al. (2010), have synthesized lessons learned from studies about how institutional (governance systems, laws, decision making processes, etc.) and organizational conditions (values, management capacity, skills and experience, etc.) have determined an organization's overall approach to and success of strategic planning initiatives. In the field of sustainability-based planning, Dale et al. (2008) have recognized the links between place-specific circumstances and grassroots sustainability undertakings. They describe how a shared sense of place based on the physical environment contributed to community activism against a private logging enterprise in Salt Spring Island, B.C. In similar studies, sustainability planning scholars have used the term 'community context' to

connote the link between contextual factors and planning processes (e.g., Kegler et al., 2011; Lane et al., 2011). Still others in this field have relied on institutional theory. Llamas-Sanchez et al. (2013), for example, used concepts from institutional theory to explaining the outcomes of LA21 in various municipalities in Spain.

Whereas institutional theorists have tended to emphasize the structural influences of formal and informal 'rules of the game', place scholars have tended to stress the effects of actors' 'sense of place', as well as the physical environmental characteristics and the geographic location of a place (see Cresswell, 2004). Studies that have used the term 'community context', however, have incorporated a range of different factors in their analysis. Lane et al. (2011), for example, have defined community context as

> "…everything about the people, place, and circumstances of a spatial unit, be it a neighborhood, city or region...The components of community context consist of both human and environmental factors including social, cultural, economic conditions, demographics, housing and education, public health and safety, natural environment, and resources as well as the built environment and mobility. These aspects are woven together by a set of needs, values, place characteristics, and quality-of-life concerns to create a unique community context" (p. 4).

In this study, I use the New Institutionalism to understand and explain the range of context-specific circumstances that underpin prevailing community-scoping practice. However, as I will explain in more detail, later, New Institutionalist scholars have tended to ignore the effects of built and natural environments on humans, organizations, and socioeconomic systems. This study thus contributes to our understanding of the strengths and limitations of institutional theory in this regard.

There are at least two mechanisms by which contextual factors shape municipal SSP initiatives and practice more broadly – whether viewed through an institutional, place, community context, or other conceptual framework. The first mechanism is openings for public participation, which would (ideally) allow community members to influence all phases of SSP. Through these openings, actors bring to the decision-making table a variety of concerns that reflect a particular set of norms, values and beliefs, as well as taken for granted ways of doing things. These things may be embedded in and/or reinforced by a diverse range of contextual factors including, among others, natural and built environments, legislative frameworks, planning paradigms and worldviews. The above mentioned and other scholars in the fields of urban planning, sustainability planning and business management have begun to illuminate the relationship between context and planning processes. But, generally speaking, SSP scholars have devoted little attention to this phenomenon in local government SSP.

The second mechanism is the frameworks that practitioners use to structure the SSP process. Specifically, the content and process components of the planning and community-scoping frameworks that practitioners use influence the way that contextual factors are identified, the range of factors that are identified, and how these factors inform subsequent steps in the planning process. By celebrating best practices and developing various approaches to municipal SSP, scholars and practitioners have implicitly illuminated how planning and scoping frameworks may shape the SSP process. But little research has been devoted to examining the ideas and

methods that have been applied and, in turn, the range of community-specific factors that have been identified through application of these ideas and methods.

The above discussion highlights local- and regional-level contextual factors that may shape SSP initiatives. These and others may be rooted in less obvious global-scale structural factors, including taken-for-granted worldviews and tensions between different worldviews. As Connelly et al. (2008) have shown, dominant economic rationales, privatization of public services, and a widespread market-based perception of public services may act as barriers to the successful enactment of sustainability goals. These factors, which are rooted in a mechanistic view of the world, inherently conflict with the systems-based view, which gives primacy to collective problem solving and defines services in terms of their social and environmental performance as opposed to market performance.

In Chapter Four, I explain how the analytical framework that I use in this study can help us to understand and explain the effects of different contextual factors. New Institutionalists, for example, have developed useful typologies of institutions and other concepts that explain institutional dynamics. At this point in the dissertation, I turn to a description of some key global-scale factors that provide part of the context within which local government SSP must unfold in Canada. In sub-section 2.2.1, below, I describe the global-scale shift from a Cartesian-Newtonian worldview to an ecologically grounded worldview informed by systems thinking. Finally, in sub-section 2.2.2 I discuss the contested concept of sustainability.

2.2.1 Paradigms in Transition

Many sustainability commentators have asserted that transitions towards sustainability require a paradigm shift – from the prevailing Cartesian–Newtonian worldview to an ecologically-grounded worldview informed by systems thinking (e.g., Schumacher, 1974; Sachs, 1995; Capra, 1996). The Cartesian-Newtonian worldview blossomed in Europe during the Scientific Revolution of the 16th and 17th centuries. During this period, fundamental changes occurred in medieval ways of understanding the physical world and how it should be organized, investigated and represented. The new mentality and perception of the cosmos that were formulated during this time gave Western civilizations the features of the 'modern' era, and these features have dominated our culture for the past three hundred years (see Capra, 1982). Capra provides an eloquent description of the Aristotelian and Christian-based ideas that underpinned the medieval period, and how they gave way to the mechanistic model of the universe that dominates Western contemporary societies. The following excerpt from Capra's (1982) *The Turning Point* nicely sums up the shift from medieval to modern outlooks:

> "The notion of the organic, living, and spiritual universe was replaced by that of the world as a machine, and the world-machine became the dominant metaphor of the modern era. This development was brought about by revolutionary changes in physics and astronomy, culminating in the physics of Copernicus, Galileo, and Newton. The science of the seventeenth century was based on a new method of inquiry, advocated forcefully by Francis Bacon, which involved the mathematical description of nature and the analytical method of reasoning conceived by the genius of Descartes" (p. 54).

Capra (1982, 1996) elaborates on the assumptions that underpin the Cartesian or mechanistic view of the world. Briefly, they include a belief that the universe is a mechanical system and the human body is a machine composed of some essential building blocks that can be understood in isolation; a belief in the objectivity and certainty of scientific knowledge and the supremacy of the scientific method; a view of the natural environment, space and time as purely material; an assumption of the separateness of mind and matter; the idea that unlimited material progress can be achieved through scientific and technological advancements; and the belief that the oppression of the female is a basic law of nature.

Different commentators have highlighted different features and consequences of this shift from medieval to modern worldviews (e.g., Polyani, 1944; Gibson, 1975; Marchant, 1980; Wilber, 1983). For example, in *The Death of Nature: Women, Ecology and the Scientific Revolution*, Carolyn Merchant (1980) asserts that the medieval view of the world was one in which the self, society and the cosmos were perceived as one living organism; interdependence among the parts of this organism was emphasized, and individual needs were subordinate to communal ones. Central to this interpretation was a view of nature as female – nurturing, mysterious, wild, and uncontrollable. But this depiction of nature was gradually supplanted by the assumptions that undergird the Cartesian paradigm. As Merchant puts it, the image of nature cast in the female gender was subjugated by two new images of nature that were central to the Scientific Revolution: nature as machine to be mastered and nature as disorder to be subdued and controlled. Thus, she asserts that seventeenth century science has played a major role in the contemporary ecological crisis, the domination of nature, and the devaluation of women.

Gibson's (1975) portrayal of the value of public participation, which rests on his explanation of the ethical basis for participation, traces the (roughly parallel) shift that occurred in our understanding of the essential nature of human beings and the implications of this shift for decision-making structures and processes. As Gibson states, quoting C.B. Macpherson's (1973) *Democratic Theory: Essays in Retrieval,*

> "In that part of human history which is for us most accessible – the present and recent past of modern industrial societies – human activities, interrelations, and judgements appear to have been based on one or the other (or a confused combination of both) of two distinct and incompatible concepts of human essence… 'the liberal, individualist concept of man as essentially a consumer of utilities, an infinite desirer and infinite appropriator' and 'the concept of man as an enjoyer and exerter of his uniquely human attributes or capacities'. Of these two, the concept of humans as consumers has been predominant in modern industrial societies" (p. 11).

According to Gibson (1975), the idea that humans are consumers or "…insatiable desirers and appropriators…moved by their essential nature to consume and acquire…" (p. 11) provided part of the foundation for the rise of industrial production and the capitalist market. Furthermore, it implies that human endeavours and social structures should be primarily concerned with ever-increasing production and consumption: "The industrial mode of production was justified in terms of its products, the massive quantities of consumables which were required of humans presumed to be essentially consumers whose needs could only be met through the ever-

increasing provision of commodities and services" (p. 12).

The idea that humans are exerters of attributes and qualities was the predominant view from Aristotle until the seventeenth century. In contrast to the idea that humans are consumers, it emphasizes the importance of expression over consumption and thus it values decentralized as opposed to centralized power, integration as opposed to fragmentation, and endeavors that encourage personal enlightenment as opposed to depersonalized activities. As Gibson (1975) explains, the idea that humans are exerters was displaced by the view of humans as consumers, but the exerter perspective did not disappear completely. Rather, it re-emerged as a challenge to the dominant view in the mid-nineteenth century, in the critiques of such socialist writers as, among others, Karl Marx, and this resurgence represented the rise of critical protest against the inhumane conditions imposed by industrial production processes and the industrial market society:

> "…what these critiques were demanding was the reintroduction of emphasis on a vision of human individuals acting and expressing themselves in society as opposed to the reality in industrial market society of individuals treated impersonally and often brutally as interchangeable elements of an encompassing socio-economic mechanism and as easily replaceable appendages to the production process…" (p. 13).

These critiques led to important social regulations and other types of interventions to reduce the cruelties of industrial market society, but they did not greatly affect the predominance of the view of humans as consumers (see Gibson, 1975, p. 13-15). Rather, evidence for the prevailing predominance of the consumer concept can be found in the organization of contemporary societies, which are characterized by "…concentration of power, specialization of function, and impersonality of treatment" (p. 15).

The modern or Cartesian package of ideas was resisted from the outset by conservationists, socialists, and romantics, among others. Their critiques contributed ideas that are evident in the alternative worldviews that we have today including, notably, the ecological or 'postmodern' paradigm. Many sustainability commentators have asserted that the Cartesian paradigm has had disastrous consequences for Earth's life support systems, and it has proven to be sorely inadequate in solving complex social-ecological problems (see Dobson, 2000; Paehlke & Torgerson, 2005; du Plessis, 2012). Capra (1982) provides a helpful elucidation of the ecological or systems view of reality (see p. 265-304). In contrast to the modern paradigm, it is based on an awareness of the essential interrelatedness and interdependence of all forms of life. It involves a shift in our way of perceiving ourselves in the world – from seeing ourselves as separate from others to seeing others and ourselves as interconnected parts of a whole. The ecological or systems view, then, perceives the world in terms of integration, relationships and context:

> "According to the systems view, the essential properties of an organism, or living system, are properties of the whole, which none of the parts have. They arise from the interactions and relationships among the parts. These properties are destroyed when the system is dissected, either physically or theoretically, into isolated elements" (Capra, 1996, p. 29).

Whole systems are understood to be intrinsically dynamic in nature. Their stable structures are manifestations of underlying formative processes, and these processes work together to co-create living, flexible organisms as opposed to rigid 'machines'. The modern linear view of cause and effect is thus cast aside for an understanding of the nonlinear cyclical multi-scale patterns of feedback that guide the functioning of all life. Similarly, the notion of genetic determinism is rejected for an appreciation of the principle of self-organization:

> "A living organism is a self-organizing system, which means that its order and structure and function is not imposed by the environment but is established by the system itself…This does not mean that living systems are isolated from their environment; on the contrary, they interact with it continually…" (Capra, 1982, p. 269).

This shift in perception and way of thinking entrains a shift in values – from anthropocentric ones to ecocentric ones – as well as the idea that science, technology, and our perceptions of reality reflect our values and assumptions. As Capra (1996) has put it, what we call a tree depends on our methods of observation and measurement (p. 40). The systems worldview, then, involves a shift from objective to 'epistemic' science or, in other words, an understanding that the universe reveals itself to us through the lenses that we adopt to view it. Furthermore, the ecological worldview acknowledges the inherent worth of all life, which is rooted in a spiritual sense that the natural world and the self are one (Capra, 1996, p. 12). Capra sums up these shifts in perception, thinking, and values as shifts from self-assertion to integration. In Western industrialized cultures, self-assertive values (expansion, competition, quantity, domination) have tended to be emphasized at the expense of integrative ones (conservation, cooperation, quality, partnership) (p. 9-10).

By investigating the substantive and procedural aspects of community-scoping practice, this study begins to shed light on how the notions of sustainability and municipal SSP have been interpreted and why. Because SSP must unfold within the context of this large-scale paradigm shift, it may reflect a mixture of mechanistic and systems interpretations of the world. In investigating the contextual underpinnings of practice, this study increases our understanding of how this paradigm shift might be unfolding at the local level in Canada.

The concept of sustainability and the sustainability discourse have played a central role in the shift from mechanistic to systems worldviews, and so they evidence the diversity that this shift has entrained as well as the context-specific ways in which sustainability has been interpreted.

2.2.2 The Contested Concept of Sustainability

The concept of sustainability has meant many different things to many different people and organizations. Indeed, Dobson (1996) has identified over 300, often competing and contradictory, interpretations. Similarly, there have been many explanations of the origins of the notion. Some accounts have stressed that the idea has always been present in one way or another in ancient, indigenous, and contemporary cultures (e.g., Capra, 1996; Gibson et al., 2005; Flint, 2013). Others have situated the origins of the concept in the environmental movement of the 1960s and '70s (Pezzoli, 1997; Mebratu, 1998; Runnalls, 2008; Miller, 2013). These accounts have tended

to highlight the publications, international conferences and agreements of the '60s, '70s, and '80s, which sought to establish a more equitable and ecologically rational model of economic development. And they have tended to divide the history of the concept into two periods, including the three decades of the '60s, '70s and '80s, which lead up to the UN-sponsored *Report of the World Commission of Environment and Development: Our Common Future* (also known as the Brundtland Report), and the decades after the Report was published. In these accounts, scholars have tended to quote the short definition of sustainable development that is commonly extracted from the Report: "Sustainable development is development that meets the needs of the present without compromising the ability of future generations to meet their own needs" (see WCED, 1987, p.43).

Over the years, scholars have attempted to come to grips with the myriad interpretations of sustainability that have emerged, and this has given rise to a diverse range of typologies. It is beyond the scope of this study to identify and describe all of them. But it is important to give the reader a sense of some often-cited approaches. In order to classify various conceptualizations of sustainability, scholars must first decide which bodies of literature should be analysed. This may be a difficult task, given the range of terms ('sustainability', 'sustainable development', 'environmental sustainability') that have been used to connote the idea. Indeed, there is much variation in this regard. Williams and Millington (2004), for example, developed a heuristic framework for navigating the rich literature on sustainable development, which is, according to them, comprised of discourses, approaches to decision making, and recommendations for solutions. Mebratu's (1998) analysis focuses on definitions and interpretations developed by international nongovernmental organizations, eco-theologists, eco-feminists, and eco-socialists. Dobson's (1996) typology is based on his evaluation of the literature on environmental sustainability and sustainable development. Similarly, Pezzoli (1997) identifies and conceptually maps ten 'fields of discourse' in order to outline a political ecology of sustainable development.

Once scholars have determined the focus of their analyses, they must figure out how to make sense of the different meanings they find. Williams and Millington (2004, p. 2) organized their classification according to one question that, according to them, represents the 'environmental paradox' upon which much of the sustainability literature rests: How can our demands on the Earth conjoin with the capability of the Earth to meet these demands? Their heuristic framework situates various responses along a continuum of 'weaker' to 'stronger' perspectives. The former reflect the Cartesian or mechanistic view that Earth's stock of resources should be expanded through, for example, making more efficient use of them, developing renewable ones, and creating substitutes for non-renewable ones. From this standpoint, environmental problems can be solved through advances in science and technology, humans are seen as separate from nature, the natural world is perceived as a resource to be used for human interests, and economic growth is believed to be a valid measure of progress. Advocates of this view see no need to fundamentally change the dominant discourse on economic growth and development.

In contrast, stronger approaches focus on changing the demands made on the biosphere. Stronger sustainability theorists view the Earth as finite and they are united by a belief that the demand-side of the equation must be radically altered by, for example, rethinking our relationship with the natural world, redefining the notions of 'wealth' and 'well-being', and fundamentally changing our view of economic progress and development – by making the shift from

mechanistic to holistic ways of knowing, thinking and behaving. They assert that natural systems should be protected because they have intrinsic value and biotic rights. Advocates of strong sustainability, therefore, prefer biocentrism to the anthropocentrism of weaker sustainability theorists, and they call for more small-scale, self-reliant, decentralized ways of living.

These taxonomies aim to bring clarity to the rich literature on sustainability. Indeed, when considered on an individual basis, each does. But when considered together, confusing contradictions emerge. For example, in Williams and Millington's (2004) classification, weaker interpretations are distinguished from stronger ones partly on the basis that advocates of the former believe that technological solutions can solve the problems of resource depletion and pollution. But Mebratu (1998) asserts that all of the definitions and interpretations considered in his study rest on acceptance that we must make a fundamental change to overcome the environmental crisis that we are facing. Mebratu briefly touches on some core tenets of deep ecology; however, he discusses them in relation to his 'Academic Version' category of interpretations, which include a different range of definitions than Williams and Millington's strong sustainability category. The differences in scholars' units of analyses and classification criteria, therefore, further muddle the task of making sense of the diverse range of conceptualizations that have emerged.

Robinson (2004) offers a bit of a way out of this conundrum with his notion of 'procedural sustainability'. He has argued that the concept of sustainability is essentially comprised of two dimensions, a substantive one and a procedural one. The substantive dimension specifies that sustainability is an integrative concept in that it requires the reconciliation of social, economic and ecological imperatives. The procedural dimension recognizes that sustainability is a process as opposed to an end-state. As such, it should not be viewed as a single concept or an end in itself. Rather, it is most important to understand that its meaning is constructed through place-specific social processes and this gives rise to multiple, context-specific understandings of what sustainability means and entails. The notion of procedural sustainability is thus defined as "…the emergent property of a conversation about desired futures that is informed by some understanding of the ecological, social and economic consequences of different courses of action" (p. 13). From this procedural perspective, any interpretation of sustainability may be accommodated, 'strong' or 'weak', 'modern' or 'postmodern' – as long as it were informed by an integrated consideration of the social, economic and ecological consequences of decisions.

In accommodating almost all visions of sustainability, Robinson's procedural interpretation departs from the sustainability scholarship that seeks to establish a universally applicable set of sustainability requirements or a coherent sustainability discourse. It represents an emergent or grounded approach to constructing and understanding the concept of sustainability, as opposed to a top-down or prescriptive one. This tension between emergent and prescriptive approaches to envisioning sustainability is present in all SSP initiatives. For example, planners must decide how to elicit information from the public as well as which information to gather in order to develop a collective vision of a sustainable organization and/or community. They might tackle these choices from a normative stance in that they may have particular ideas about how public participation *should* be done, which information *should* be gathered, and how this information *should* inform planning. But the information gathered from the public is grounded in the sense that it reflects the cultural context of a place, as well as the public's interpretation of the process

and what a sustainable community should look like. Indeed, there are normative aspects to the public's input too and so the entire SSP process is as all planning is – fundamentally value-laden. But from a procedural sustainability perspective, these phenomena constitute the social processes that give rise to multiple, community-specific visions for sustainable futures. Thus, while the concept of procedural sustainability departs from the scholarship that seeks to clarify the requirements of sustainability once and for all, it accommodates this scholarship by situating it within the grand participative process of constructing the meaning of sustainability.

Furthermore, Robinson's procedural view of sustainability emphasizes the role of public participation in the process of negotiating what sustainability should imply. Central to the concept of sustainability and the aim of making progress towards greater sustainability are questions about why a participative approach is needed. According to Gibson (1975), the answers to these questions are complex and they turn in part on basic assumptions about the nature of human beings as either consumers or exerters. I described these assumptions about human nature in the preceding sub-section. In Gibson's *The Value of Participation*, he explains that these ideas underpin two distinct theories of democracy, elite democracy and participatory democracy: "The two theories differ in their attitudes to the organizational requirements, the desirable extent, and ultimately, the purpose of democratic rule. More fundamentally, they differ in their basic attitudes to the essential nature and capabilities of human individuals" (p. 22).

Gibson provides a detailed elucidation of both theories of democracy (see p. 22-26). Briefly, proponents of elite theory would argue that participation has no intrinsic value for the individual, and they would generally limit public participation to the election of leaders and members of parliament. In fact, advocates of elite theory would prefer to do without public participation altogether because, among other reasons, they perceive individuals to be fundamentally self-centred, selfish and irrational. The following excerpt from Gibson's chapter nicely summarizes this position, while emphasizing the view (of humans as consumers) on which it rests:

> "It is this assumption which leads elite theorists to believe that the unsuppressed self-expression of individuals would be socially destructive and leads them to deny the theoretical possibility of a participatory system wherein individuals rule themselves harmoniously and cooperatively. Consequently, the consumer assumption leads elite theorists to conclude that the exercise of power by elite rulers is required if the necessarily conflicting demands of individuals are to be prevented from disrupting the continued and expanding provision of consumables" (p. 22).

In contrast, advocates of participatory democracy theory would contend that humans are exerters of qualities and potentialities as opposed to mere consumers of satisfactions, and thus humans require opportunities for self-expression and development. Additionally, they would assert that individual human interests are not essentially in continuous conflict, but instead the essential nature of human beings is compatible with collective life, and moreover the fundamental qualities of human beings would contribute positively in terms of individual and collective well-being – if they were allowed to grow and develop free from the dictates of authority. Participatory theorists thus consider participation to have intrinsic value for individuals because (a) it provides the circumstances for the expression of individual qualities and capacities, and (b) it reinforces and increases individuals' understanding of their own qualities and capacities, heightens their sensitivity to the needs of others, and deepens their comprehension of the

requirements for peaceful social interaction. As Gibson puts it, "Thus participation has both an expressive and an educative aspect. The interaction of these two aspects assures the viability as well as the value of participative social organization" (p. 23).

The notion of procedural sustainability adopts the exerter conception of humanity (with the emphasis on active participative engagement) and so it could be situated within the systems worldview because it acknowledges the value-laden nature of all knowledge, notably scientific knowledge, and it recognizes the interconnections and interdependencies within and between human and ecological realms. But Robinson's procedural sustainability concept would permit the expression of weaker and stronger approaches to sustainability, which may more or less reflect Cartesian and systems paradigms, as well as conflicting views about the nature of human beings.

All of this matters because our interpretations of sustainability shape our choices about the policies, goals, actions, etc., set out in sustainability plans. They may reflect a more or less radical or reformist, elitist or participatory approach to sustainability planning. Pearsall and Pierce (2010) have shown how conceptualizations of sustainability in the sustainability-based policies of large American municipalities have tended to emphasize physical infrastructure needs over environmental justice considerations. Similarly, Warner's (2002) evaluation of the sustainability plans of 77 US cities found that only five of them incorporated environmental justice concerns. Moreover, the goals that are set out in sustainability plans have implications for the trajectory of organizational and/or community development. Du Plessis (2012) alludes to this when she links the tenets of ecologism with design aspirations for the built environment (see p. 12). Research on the trajectory of community development as an outcome of sustainability planning is fraught with difficulties, however, not the least of which is the issue of linking interpretations of sustainability to the short- and long-term outcomes of planning, given the diverse range of other factors involved. Regardless of these difficulties, investigating these things in the context of SSP can reveal the conceptual orientations of various interpretations of sustainability and, by extension, the potential trajectory of development in a particular setting.

The essentials of sustainability set out by Gibson et al. (2005) offer the reader a sense of what sustainability means to many people and organizations. They are based on a thorough review of the academic and practitioner literature. As Gibson explains, they are rooted in the origins of the idea and are evident in a range of competing interpretations; therefore, they represent some shared fundamentals of the concept (see Box 1, below).

Box 1 Essentials of Sustainability

The concepts of sustainability is…

- a challenge to conventional thinking and practice;
- about long- as well as short-term well-being;
- comprehensive, covering all the core issues of decision making;
- a recognition of links and interdependencies, especially between humans and the biophysical foundations for life;
- embedded in a world of complexity and surprise, in which precautionary approaches are necessary;
- a recognition of both inviolable limits and endless opportunities for creative innovation;
- about an open-ended process, not a state;
- about intertwined means and ends – culture and governance as well as ecology, society and economy;
- both universal and context dependent.

(Gibson et al., 2005, p. 62)

As Box 1 shows, Gibson et al.'s essentials espouse a curious mix of radical/stronger and reformist/weaker interpretations of the concept. On the one hand, they acknowledge the subversive and integrative nature of the idea, as well as the notion of finitude, which reflect the stronger end of the spectrum of understandings. But in embracing 'endless opportunities for creative innovation' they underscore the potential for improvements through increases in efficiency and technological innovation, which is one distinguishing feature of the weaker perspective. Moreover, Gibson et al.'s essentials are neither 'deep green' nor 'light green' in a prescriptive sense. For example, they recognize that sustainability is a challenge to incumbent ways of thinking and behaving, but they do not specify which alternatives should be pursued. Later, Gibson et al. set out the core requirements for sustainability-based decision making that stem from these essentials, and they flesh out what a sustainable world should entail. I describe these requirements in more detail in Chapter Three.

This fusion of weaker and stronger approaches reflects Gibson's aim to capture some widely acknowledged basics of the notion. On a broader level, then, it reflects the tension between Cartesian and ecological worldviews. Gibson is not alone in combining weak and strong understandings of sustainability. Sustainability theorists in the field of regenerative design, for example, have argued that both light green and deep green approaches are necessary in making the transition to more sustainable societies (see Reed, 2007; Cole, 2012, Mang & Reed, 2012). Indeed, as Capra (1982) has asserted, it is important to recognize that the modern or machine-like view of the world is not altogether wrong-headed or misguided. Rather, it has contributed valuable knowledge about social and ecological systems: "The reductionist description of organisms can therefore be useful and may in some cases be necessary. It is dangerous only when it is taken to be the complete explanation" (p. 267).

By underscoring the contested-ness of sustainability, I do not mean to imply that anything should go with respect to how it might be interpreted. Even Robinson (2004) limits the extent to which

anything goes by insisting on a participatory approach and by making the integrative basis of the notion a minimum requirement for entry into the procedural sustainability realm. Moreover, as Gibson et al. (2005) have noted, there is now a widespread agreement among sustainability theorists that the concept should be integrative and comprehensive in its attention to multiple scales, present and future generations, and matters related to social equity and ecological integrity. This study, then, is partly concerned with how practitioners have been interpreting sustainability and SSP, considering the contested nature of the concept and some widely agreed upon essentials.

One of the basic assertions of this study is that practitioners could be doing better with regards to how they have been attending to societal change towards sustainability concerns in the plan formulation stage of SSP. Whether community-scoping frameworks have been attending to these concerns is a matter for investigation in this study.

2.3 The Need for Comprehensive Planning and Scoping Frameworks

As noted, previously, this study brings together concepts and insights from five pertinent fields of study in order to facilitate an understanding of what strategic planning for social change towards sustainability should require. An analytical framework emerges from my following review of the literature and I use it to evaluate the community-scoping frameworks (contents and processes) that practitioners have used in a range of local government SSP initiatives in Canada.

Different approaches to community scoping have been set out within larger SSP frameworks. Some SSP frameworks aim to be universally applicable (e.g., Global Reporting Initiatives Sustainability Reporting Guidelines), while others were created for a particular sector (e.g., ICLEI & IDRC, 1996; CBSR, 2009; Coady & Strandberg, 2012). Also, the term 'framework' has been defined in different ways, depending on the purposes of a particular study or initiative (see Peterson, 2008; CBSR, 2009). Here, SSP frameworks are defined as guidelines that provide direction for practitioners on how to undertake the plan formulation phase of SSP. They consist of a sequence of steps that aim to define the sustainability values and objectives of an organization or community as well as identify actions to pursue these objectives and monitor the outcomes (see Connelly et al., 2008). Table 1, below, summarizes some best-known frameworks that have been applied in local government SSP initiatives in Canada.

Table 1 Summary of Best-Known Local Government SSP Frameworks

Framework	Author(s)	Summary
Alberta Urban Municipalities Association Guide for Municipal Sustainability Planning	Alberta Urban Municipalities Association, 2006	This framework adopts a systems approach and it is structured around five dimensions of sustainability and five phases of sustainability planning.
Earth Charter Action Tool Guide to Community Development	Gwendolyn Hallsmith, Christian Layke, Melissa Everett, 2005	This framework is underpinned by the Earth Charter, which is a set of principles that build on the Universal Declaration of Human Rights, the World Charter for Nature, the Rio Declaration, Agenda 21, and other international declarations. It involves nine steps, embraces a systems worldview, and it is underpinned by a concern for identifying and meeting basic human needs.
Local Agenda 21 Planning Guide	International Council for Local Environment Initiatives & International Development Research Centre, 1996	This framework combines the methods and principles of community-based, environmental, and corporate planning to create an approach to local government SSP. It rests on five elements of sustainability planning and seven key steps, and it espouses a systems understanding.
Sheltair Adaptive Management Framework	Stantec	This framework rests on the concept of adaptive management. Adaptive management responds to change and learning through an iterative adjustment of plans, policies, and programmes. It requires a set of guiding principles, a ten-step planning process, and a systems approach.
Sustainable Cities: PLUS Planning Cycle	Nola-Kate Seymoar and the Sustainable Cities PLUS Network Steering Committee, 2008	This framework is comprised of six principles and six planning stages underpinned by a systems view of the world. It was developed by the members of the Sustainable Cities: PLUS Network, a peer learning network of cities and regions engaged in long term integrated planning initiatives.
The Natural Step	Dr. Karl-Henrik Robert (see The Natural Step, 2009)	This framework rests on a science-based, systems understanding of sustainability. It is primarily oriented towards organizational change. It takes a backcasting approach based on four sustainability principles, and there are four main steps in the planning process.

There is a paucity of research that evaluates the above and other municipal SSP frameworks in a systematic and comprehensive way. Two studies that are helpful in this regard include Markvart and Gibson's (2011) and Kennedy et al.'s (2007) respective analyses of the strengths and limitations of best-known local government SSP frameworks. Tables 2 and 3, below, summarize their key findings, which are organized according to the constituent elements of SSP, described in Chapter One: sustainability (including resilience), collaboration, institutional change, and effective practice.

Table 2 Key Strengths of Best-Known Local Government SSP Frameworks

Core Elements of SSP	Key Strengths of Best-Known Local Government SSP Frameworks
Sustainability (including social-ecological resilience)	• The frameworks provide a definition of sustainability and/or recommend a set of principles to guide the development of strategic goals. • The frameworks adopt a systems perspective. • Long-term timeframes are recommended.
Collaboration	• The frameworks espouse a broadly inclusive, participative, partnership-based approach to planning.
Institutional change	• Frameworks encourage tracking of indicators to monitor progress.
Effective practice	• Frameworks consider the implementation stage. • Frameworks recommend tiering or ongoing integration of plan goals in organization. • Frameworks encourage tracking of indicators to monitor progress. • Frameworks encourage periodic revisions.

(see Kennedy et al., 2007; Markvart & Gibson, 2011)

Some common strengths of the frameworks include their provisions of a definition of sustainability, their encouragement of a systems perspective, their adoption of long-term planning timeframes, and their collaborative decision making processes. These things have been widely recognized as essential to sustainability-based decision-making (see Gibson et al., 2005). But there is a general need for more specification of what sustainability should entail, especially in terms of generic requirements and for particular contexts of application. AUMA's Guide and Nova Scotia's template, for example, espouse sustainability pillars (social, economic, ecological, governance), but they are not precise about the range of concerns that should be incorporated under each pillar. Similarly, the Sheltair Adaptive Management Framework and AUMA's Guide suggest that sustainability principles should be used to guide SSP initiatives, but they do not discuss what the principles should cover. One advantage of this approach is that it leaves the specification of sustainability pillars or principles open to practitioners and the public. But the disadvantage is that important sustainability considerations may be missed. Indeed, this may be the case even in frameworks that provide and define a set of core principles. The Natural Step's science-based principles, for example, have been criticized for neglecting social or 'soft' sustainability concerns (Kennedy et al., 2007). Moreover, generally speaking, the frameworks do not ask practitioners to consider social-ecological resilience concerns, and even though all are based on a systems perspective, most do not incorporate attention to the multi-scale interactions within and between social-ecological systems.

All of the frameworks recognize the integrative basis of sustainability and all of them provide some suggestions with respect to how to integrate strategic sustainability plans with existing planning initiatives and municipal operations. But while most SSP frameworks acknowledge that

social, economic and ecological dimensions are interconnected, they do not explain how to *do* or actually undertake the process of integrated planning. More specifically, they do not provide direction on how to ensure that sustainability goals will contribute multiple, mutually reinforcing benefits to social, economic, and ecological systems. Among other things, an organization would be required to shift from a mechanistic to a more holistic way of thinking about how sustainability goals should be developed in the first place, which may be a challenge, given the departmentalized structure of public administrative organizations and the tendency of the frameworks to focus on discrete 'pillars', 'dimensions', 'spheres' or urban planning categories (e.g., transportation, waste management, etc.).

As Table 3 below shows, most of the limitations relate to the social change and enactment components of SSP, indicating the general state of practice in these regards. These weaknesses have led Kennedy et al. (2007) to question whether it can be argued that most SSP frameworks contribute to planning-implementation gaps. Indeed, for Doppelt (2003a, 2003), SSP practice has hit a wall of inertia for many reasons, not the least of which is a lack of concern for social change and practical implementation requirements early in the planning process. As Doppelt has noted, the trend in sustainability planning has been to set out lists of things to do, while neglecting *how* to do them: "Practitioners place comparatively little emphasis on *how* organizations can change their internal thought processes, assumptions and engrained behaviour to embrace new tools and techniques" (p. 16).

Table 3 Key Limitations of Best-Known Local Government SSP Frameworks

Core Elements of SSP	Key Limitations of Best-Known Local Government SSP Frameworks
Sustainability (including social-ecological resilience)	- Most frameworks do not adequately specify sustainability requirements. - Most frameworks do not give enough direction on how to do integrative planning. - Most frameworks do not consider how to design initiatives so that individual gains are likely to be mutually reinforcing. - Most frameworks do not devote enough attention to multi-scale systems interactions.
Collaboration	Most frameworks assume that broad stakeholder participation and agreement can easily be obtained.
Institutional change	- Many frameworks fail to require an initial assessment of a local government's capacity to undertake a long-term sustainability planning initiative. - Most frameworks do not give adequate consideration to the internal and external forces and contingencies that may impede the planning effort. - Most frameworks fail to link sustainability goals to budgeting and financing. - SSP frameworks embrace the (conventional) linear-rational model of plan development and implementation, and they assume a stable environment for the planning effort as opposed to a complex, dynamic one. - Frameworks do not distinguish between setting out actions and action planning.
Effective practice	- Many frameworks fail to require an initial assessment of a local government's capacity to undertake a long-term sustainability planning initiative. - SSP frameworks embrace the (conventional) linear-rational model of plan development and implementation, and they assume a stable environment for the planning effort as opposed to a complex, dynamic one. - Most frameworks do not address precisely who should have responsibility over implementing specific strategic goals. - The frameworks do not give adequate attention to the implications of various goals for key stakeholder groups. - Most frameworks do not give adequate consideration to the internal and external forces and contingencies that may impede the planning effort. - Most frameworks fail to link sustainability goals to budgeting and financing.

(see Kennedy et al., 2007; Markvart & Gibson, 2011)

According to Connelly et al. (2008), the implementation gap is ubiquitous in SSP, and it is underpinned by a lack of integration between plan development and implementation processes: "Often, the only linkage between planning processes and actual implementation is the plan – a document that on its own is insufficient…" (p. 28). Indeed, the gap issue is not just a public-sector phenomenon. Poister and Streib (2005), a well-known strategic planning scholar in the field of business management, has asserted that strategic planning is only useful when it is purposefully linked to implementation, and this is usually where the process breaks down. In public sector SSP, the implementation gap has long been recognized, as planners have often complained that wonderful community-based plans remain 'on the shelf' due to seemingly insurmountable implementation issues.

It has been widely recognized that implementation problems are primarily institutional in nature; they reflect culturally embedded ways of local government decision making as well as a host of other factors that constrain SSP initiatives more broadly (Wilsford, 1994; Meadowcroft, 1997; Dovers, 2001; Myers & Kent, 2008). I have already mentioned the challenges presented by silo-style decision-making structures and processes. Other systemic roadblocks may prevent the new power relationships, legislative reforms, and technological innovations, etc., required to foster transition towards greater sustainability (Brown, 2005; Lowndes, 2005; Kinzig et al., 2006). Implementation roadblocks, then, inevitably relate to societal change as well as how we anticipate the systemic constraints and opportunities associated with pursuing sustainability goals.

Thus, the solution to the planning-implementation gap lies partly in how planning frameworks anticipate societal change and implementation concerns during the plan development stage. Some considerations that are shared across the best-known frameworks described, above include formation of a stakeholder committee in the preparation phase of planning, given potential implementation needs; and identification of actions, resources and time schedules associated with implementing the strategic goals. Beyond these common considerations, each framework more or less addresses the planning-implementation gap in its own way. The Natural Step, for example, requires some analysis of the initiating organization in order to determine whether it has established a shared understanding of sustainability, assuming that having one would make implementation easier. Additionally, it asks practitioners to identify which stakeholders would influence the success of the sustainability initiative, indicating some anticipation of barriers and opportunities. The Local Agenda 21 Planning Guide asks practitioners to create implementation agreements with key stakeholders, as well as new internal and external decision-making processes that would promote operationalization. The EarthCAT Guide encourages practitioners to identify the 'leverage points' in community systems in order to facilitate enactment.

In devoting attention to these matters in the plan development stage, the above mentioned SSP frameworks help to bridge the planning-implementation gap. But all of the frameworks listed in Table 1, above, rest on a linear model of plan formulation and operationalization. The frameworks reveal that the conventional SSP process includes four major phases: plan preparation, implementation, monitoring and revision. The primary focus of the frameworks, however, has been on the plan preparation phase, and this has included some consideration for implementation, monitoring and revision matters. Generally speaking, all SSP frameworks set out directions for the following basic steps in the plan preparation phase:

- Preparation (including the formation of a stakeholder committee and deciding on the parameters of the initiative),
- Visioning (i.e., developing a shared vision of sustainability),
- Community scoping (i.e., some form of issues and assets analysis),
- Goal setting,
- Action planning (considering some implementation needs), and
- Planning for ongoing implementation, monitoring and revision.

The resulting plans, then, would contain details about the above matters. The implementation phase is assumed to unfold in a linear way based on the considerations in the plan and all of the groundwork (e.g., relationship building) accomplished during plan creation. It is conceivable, however, that a more holistic view of strategy formulation and enactment phases would carry important implications for this conventional model. In the linear model, a stakeholder committee is usually formed at the outset of planning and this committee, which may grow to include various task groups, is responsible for guiding the entire plan creation and implementation process. But this model does not aim to ensure that the original group of stakeholders is comprised of the actors needed for enactment. As Connelly et al. (2008) have asserted, SSP has been plagued by a lack of consideration of how to balance participation needs with the needs for incremental decisions required for enactment. Moreover, the traditional model does not seek to identify the full range of generic and context-specific needs, constraints and opportunities associated with operationalizing strategic goals. The lessons learned about societal change and implementation have revealed many of these generic and place-specific concerns and they will be described in more detail in Chapter Three.

Attending to these stakeholder and enactment matters earlier in the plan creation stage would not provide a 'magic bullet' solution to implementation problems, but they would certainly help to bridge the development-implementation gap that has long plagued SSP initiatives. In this study, I assert that there is much potential for community-scoping frameworks to better attend to sustainability, social change and implementation concerns in SSP. Sub-section 2.3.1, below, provides a more detailed description of some best-known community-scoping frameworks and explain how they might be refined in order to bridge the gap between plan development and implementation stages, while considering social change towards sustainability requirements.

2.3.1 Strengths and Limitations of Best-Known Community-Scoping Frameworks

Chapter One provided a brief definition of community scoping. To recap, it is a type of participatory analysis undertaken early in the plan creation stage of SSP. It provides a crucial opening through which practitioners and stakeholders can incorporate community-specific factors into the decision-making process (Lane et al., 2011; Flint, 2013). It aims to take stock of the socioeconomic, ecological and built conditions in a community in order to establish the basis for the development of strategic goals and indicators (ICLEI & IDRC, 1996; Flint, 2013). In Table 4, below, I summarize some best-known approaches to community scoping in municipal government SSP.

Different terms have been used to denote this kind of analysis in strategic planning circles. In the private sector, 'environmental scanning' and 'situational analysis' have been used to denote the

evaluation of a company's internal and external, macro- and industry-scale environments for the purpose of understanding competitive advantage and brand value, among other strategic objectives (see Stead & Stead, 2008; Hunger & Wheelen, 2011; Babatunde & Adebisi, 2012). Similarly, nongovernmental organizations have emphasized the importance of undertaking a 'context analysis' in order to better understand the socioeconomic and ecological environment within which they operate. The International Union for Conservation of Nature, for instance, requires a context analysis for their project approval process: "For IUCN to remain relevant in a rapidly changing and complex world, project managers need to be aware of and understand the broader context within which IUCN operates. This is essential in order to make the best possible strategic choices…" (IUCN, 2010, p. 5).

Many different frameworks have been developed for situation analysis. Hunger and Wheelen (2011) provide a good overview of some well-known frameworks that have been applied in business management. Lane et al. (2011) have undertaken an inventory of community context tools that have been used in transportation planning specifically. Flint (2013) gives a good summary of some general methods (written descriptions, checklists, surveys, etc.) that practitioners can use to undertake community scoping in community sustainability planning. One framework that has been extensively used in public, private and civil society sectors is called 'SWOT' (see Chermack & Kasshanna, 2007). It aims to match an organization's internal 'Strengths and Weaknesses' with the external 'Opportunities and Threats' within which it operates: "The SWOT analysis provides information that is helpful in matching the firm's resources and capabilities to the competitive environment in which it operates. As such, it is instrumental in strategy formulation and selection" (Babatunde & Adebisi, 2012, p. 4).

Here, the term 'community scoping' is used to denote the kind of situation analysis undertaken in local government SSP specifically. Depending on the approach taken in the design of the plan formulation process, the community-scoping step could be framed by a particular set of questions, themes, principles or criteria, and it may occur prior to or after the visioning step. In contrast to situation analysis in private sector strategic planning, community scoping is not underpinned by a primary desire to determine competitive advantage. Rather, it seeks to better understand a particular organizational and/or community context in order to ensure that the strategic goals, objective, policies, etc., that are developed are rooted in a shared understanding of socioeconomic, ecological and built sustainability concerns. The community scoping process may combine local knowledge with participatory technical assessments. According to ICLEI and IDRC (1996), two of the main benefits of community scoping are that it helps the community to establish priorities for action as well as baseline data against which progress towards sustainability goals can be measured. Indeed, Dekker and Singer (2011) have asserted that SSP has little significance in the absence of baseline data: "Cities must have a starting point, from which to establish their sustainability goals" (p. 30).

Because it is one of the first steps in the plan formulation stage of SSP, directions for community scoping are nested within local government SSP frameworks. Different SSP frameworks have taken more or less different approaches to analysing organizational and community sustainability concerns. Thus, there is a range of approaches to doing community scoping in local government SSP. But SSP scholars have devoted little attention to evaluating the content and process components of these approaches, especially in terms of how they attend to sustainability,

collaborative planning, social change and implementation concerns. Recently, scholars in the field of sustainable strategic management have begun to expand the conventional scope of environmental scanning frameworks around social, economic and ecological concerns, indicating a shift towards more integrative approaches to corporate strategy development (see Stead, 2004). But in the field of public sector SSP, the role that community-scoping frameworks might play in facilitating systems change towards sustainability has largely been ignored.

In light of the general need for a better understanding of the context and process components of community scoping frameworks, Table 4 below summarizes the respective approaches espoused by the best-known SSP frameworks described in Table 1, above. Then, I provide a brief critical discussion of these approaches.

Table 4 Summary of Approaches to Community Scoping

SSP Framework	Summary of Process Components	Summary of Content Components
Alberta Urban Municipalities Association Guide for Municipal Sustainability Planning (AUMA, 2006)	A 'Community Based Issue Analysis' step follows the visioning step. Task forces comprised of 'experts' from partner organizations may be assigned to do the analysis. The results of the analysis form the basis for 'Action Planning'.	A 'description of success' and a 'description of the current reality' are created for various strategy areas (e.g., water, air, etc.). The gap between these two descriptions reveals the types of initiatives that are needed for success.
Earth Charter Action Tool Guide to Community Development (Hallsmith et al., 2005)	With a core team of community stakeholders, an inventory of 'community needs and assets' and an assessment of the 'capacity for community improvement' is undertaken after the visioning step as the basis for the development of strategic goals. Then leverage points for positive change are identified to provide the basis for action strategies.	The inventory focuses on identifying the assets that the community uses to meet its needs. Universal and community-specific needs are considered. The capacity assessment concentrates on the adequacy of the assets to satisfy all of the needs in a particular community. Five sustainability areas structure these analyses: social, governance, economic, services and infrastructure, and environmental. Three sets of intervention points are identified: points that change system structure, points that target controlling variables, and points that target drivers of systems dynamics.
Local Agenda 21 Planning Guide (ICLEI & IDRC, 1996)	A 'Community-Based Issue Analysis' step follows visioning. Both participant assessment and technical assessment methods are used, involving extensive participation from the general public. A key stakeholder group is responsible for designing and undertaking this step. The results of the analysis provide part of the basis for subsequent action planning.	The analysis aims to identify the key issues that must be addressed to achieve the community vision. Broad areas of concern are selected to become the focus of more in-depth assessments, which aim to uncover the systemic nature of the issues and provide an accurate measurement of the baseline conditions related to each issue.
Sheltair Adaptive Management	A participatory 'Spheres and Issue Areas' step occurs after visioning to set the basis	The analysis is structured around three spheres (social, economic, environmental)

Framework	for the strategic goals.	that are further divided into issue areas.
Sustainable Cities: PLUS Planning Cycle (Seymoar, 2004)	An 'Establishing the Baseline, Exploring the Options' step is taken after visioning. Stakeholder working groups lead the process. This step provides the basis for the 'Developing Strategies' step.	The analysis is structured around sustainability 'themes' (economic, environmental, social, cultural and governance) and 'strategic areas' (e.g., land use, water, health, etc.).
The Natural Step (The Natural Step, 2009)	A 'Baseline Analysis' step follows an 'Awareness' step and forms the basis of the 'Compelling Vision' step, which synthesizes the learning from the analysis into long-term strategic goals.	The analysis aims to identify organizational assets and impacts, as well as evaluate stakeholder relationships in terms of how they might help or hinder the initiative. Four sustainability principles structure the analysis.

With respect to the sustainability component of SSP, most of the above described community-scoping frameworks leave open to interpretation the specific social, economic and ecological concerns that should be covered by the analysis. With the exception of the EarthCAT guide, which provides some description of basic human needs, and The Natural Step, which uses four sustainability principles, most of the frameworks espouse sustainability pillars (social, economic, ecological), as opposed to well-defined sustainability requirements. Again, The Natural Step's principles have been criticized for concentrating primarily on physical ecological matters. Similarly, the EarthCAT guide may be criticized for not describing the basis of its description of basic human needs. Moreover, they are categorized into discrete planning spheres (social, governance, economic, services and infrastructure, environmental), which do not encourage integrative thinking (see Hallsmith et al., 2005).

With the exception of the EarthCAT Guide, all of the community-scoping frameworks focus primarily on the plan development stage as opposed to both the development and enactment stages. In other words, all of them seek to identify community sustainability concerns in order to set the basis for the creation of strategic goals and/or strategies as opposed to detailed implementation plans. The EarthCAT guide departs somewhat from this approach in that it asks practitioners to identify 'leverage points for positive change' in community systems, which represent points within a complex system where small changes can instigate bigger changes. These leverage points were distilled from Donella Meadows' (1999) report, *Leverage Points: Places to Intervene in a System*, which draws from complex systems. The EarthCAT guide's directions for community scoping thus extend around both the plan development and implementation stages.

Even the EarthCAT Guide, however, does not consider the enactment phase in a comprehensive way. Notably, in emphasizing leverage points the framework builds on community assets but it does not direct practitioners to anticipate systemic barriers. Complex systems may present a diverse range of obstacles to the successful embedment of sustainability goals, and focusing solely on leverage points does not give adequate attention to these potential socioeconomic, built and ecological constraints. Moreover, the EarthCAT Guide's community scoping framework is not underpinned by the lessons learned from implementing sustainability goals in complex systems. As I will illustrate, later, these lessons reveal that there may be much organizational and community resistance to action on sustainability goals and many factors may interfere with

effective enactment over the long term. By attending to leverage points, however, the EarthCAT Guide evidences an approach to community scoping that begins to bridge the gap between plan development and enactment stages more so than other frameworks.

There is much potential for community scoping to play a greater role in facilitating effective transitions towards sustainability. As a form of analysis, it is essentially about getting to know the local context within which SSP must unfold. Local contexts contain the full suite of local to global factors that are needed for and may influence complex systems change. In a sense, then, local contexts constitute the 'plan formulation environment' and the 'plan implementation environment' of SSP. Here, the term 'environment' refers to the social, economic, built and ecological factors of a place that may shape SSP initiatives. All of the environmental factors that practitioners should consider for implementation are present in the local context during plan formulation. In conventional community-scoping practice, however, they have largely been ignored, and this has contributed to the gap between plan creation and enactment phases.

Because SSP is inevitably about planning for societal change towards sustainability, it necessitates an understanding of the plan implementation environment – during the plan creation stage. In the above described conventional model of SSP, however, community scoping occurs only once as the basis for the development of strategic goals. Clearly, the trend is to perceive plan formulation and implementation stages as independent, when we need to think of them as interdependent. There is much potential for community scoping to encourage a more holistic interpretation of these phases by extending around the enactment environment in order to investigate the needs, constraints and opportunities associated with implementing strategic goals.

It is conceivable that practitioners could approach this type of community scoping from a diverse range of theoretical perspectives. Resilience scholars, for example, might seek to assess the transformative capacity of a place as the basis for strategies for change. Transition management scholars might prefer to identify local niches for innovation (Schot & Geels, 2008). This study does not provide an in-depth description of the numerous approaches that might be taken. But it does evaluate applied community-scoping frameworks from a particular theoretical standpoint.

2.4 Summary

Since the early 1990s, thousands of local governments around the world have undertaken SSP initiatives. One oft-cited case in Canada is the Resort Municipality of Whistler's *Whistler2020* endeavour, which emerged in response to the community's intertwined worries about rapid population growth and urban development, the integrity and beauty of the natural environment, and the local tourism-based economy. The most recent wave of public sector SSP in Canada has been occurring under the Federal Government's 'New Deal for Cities and Communities', popularly known as the Federal Gas Tax Agreement, which aims to tackle the country's mounting municipal infrastructure deficit. In order to be eligible for funding a municipality must develop an 'Integrated Community Sustainability Plan' (ICSP), defined as "…a long-term plan, developed in consultation with community members, that provides direction for the community to realize sustainability objectives, including environmental, cultural, social and economic objectives" (Infrastructure Canada, 2005, p. 5).

The body of research that has accumulated around these efforts has revealed the diverse range of contexts within which they have unfolded. Many different institutional, ecological and built contextual factors may influence a community's motivation for pursuing SSP, the place-specific issues to which the initiatives respond, the goals that are created, the planning frameworks that practitioners use, and implementation success, among other things. This study concentrates on the contextual factors that have shaped prevailing community-scoping practice, considering especially how community-scoping frameworks have attended to the context-specific constraints and enablers that may influence societal change towards sustainability.

Two global-scale contextual factors that frame this study are the paradigm shift that has been underway in Western societies – from a mechanistic to a systems view of the world – and the contested notion of sustainability. The former entrains a rebirth of old ideas and a reinterpretation of the purely physical 'machine' universe as a dynamic, whole, spiritual-physical system in which an understanding of interrelationships and interdependencies is primary. This change in perception entrains a change in values – from self-assertive ones (e.g., expansion, competition, quantity, domination) to integrative ones (e.g., conservation, cooperation, quality, and partnership) in which all life is imbued with intrinsic value. And it embraces a view of humans as exerters of unique attributes and qualities, as opposed to consumers or insatiable desirers and appropriators of goods and services. This view of the essential nature of human beings as exerters has implications for social structures. Notably, it implies that a participative society is compatible with the essential nature of human begins and thus participatory decision making is a basic prerequisite for human well-being. Because SSP must unfold within the context of this large-scale paradigm shift, it may reflect a mixture of mechanistic and systems interpretations of the world. In investigating the contextual underpinnings of practice, this study increases our understanding of how this paradigm shift might be unfolding at the local level in Canada.

The concept of sustainability is contested and this has given rise to a diverse range of interpretations and many attempts by scholars to categorize the meanings that have emerged. This variety has muddled the task of figuring out what sustainability should mean and entail. Here, I embrace Gibson et al.'s (2005) essentials, which are rooted in some shared basics of the notion (see Box 1). I also adopt Robinson's (2004) 'procedural' conceptualization in which sustainability is seen a process as opposed to an end-state. Defined as "…the emergent property of a conversation about desired futures that is informed by some understanding of the ecological, social and economic consequences of different courses of action" (p. 13), Robinson's procedural understanding potentially accommodates any interpretation – strong or weak, dark green or light green – as long as it is formed in an inclusively participatory way and informed by serious consideration of the social, economic and ecological effects of our actions. In adopting this view, this study acknowledges the essentially normative basis of sustainability, while also accepting that our interpretations of these norms are part of a much larger social, participatory process of figuring out what sustainability should mean and entail.

The institutional, built and ecological contexts within which local government SSP must unfold and the contested, emergent concept of sustainability underscore the need for planning and community-scoping frameworks that are comprehensive in the way that they attend to the constituent components of planning for societal change towards sustainability: sustainability

(including resilience), collaboration, institutional change, and effective practice. In this chapter, I provided a critical review of some best-known SSP and community-scoping frameworks in light of how they devote attention to these elemental features. Notably, some common weaknesses include their lack of specification of what sustainability should mean, shortcomings in their instructions for how to undertake integrative planning, especially with respect to ensuring positive, mutually reinforcing contributions to society; inadequacies in their attention to critical societal change concerns, and their linear interpretation of plan formulation and implementation stages. I propose that community-scoping frameworks should devote attention to the core concerns of strategic planning for societal change towards sustainability, while bridging the gap between development and enactment stages. This requires an investigation of the plan formulation and plan implementation environments during the early stages of the planning process.

The need for more comprehensive local government SSP and community-scoping frameworks begs important questions about which bodies of research should inform such an approach. As I mentioned in the Introduction, this study draws from five pertinent fields of research that together attend to the constituent components of SSP: sustainability assessment, resilience theory, collaborative planning, the New Institutionalism, and local government SSP case experiences. I also rely on the New Institutionalism to investigate the institutional, built and ecological underpinnings of prevailing practice. Chapter Three explores these fields of study, concentrating on their core emphases and contributions.

Chapter Three: Literature Review

Taking the pulse of local government SSP in Canada requires an understanding of the basic concerns that SSP and scoping frameworks should cover in any context. In this thesis, I delineate a representative set of generic content and process considerations of SSP. Then, I specify these fundamental concerns for local government SSP and explain how they can be used to analyse and structure the community-scoping step.

As a first step in elucidating the generic content and process matters of SSP, I provide a review of the following fields of academic and practitioner research: sustainability assessment, resilience theory, collaborative planning, the New Institutionalism, and lessons learned from local government SSP experience about effective practice. These fields cover the constituent components of SSP described in Chapter One: sustainability (including resilience), collaboration, institutional change, and effective practice. Each provides a partial explanation of what SSP should mean and entail in any planning context. Key concepts and insights from these areas of inquiry comprise the analytical framework that I use to evaluate the community-scoping step in local government SSP. Additionally, I use concepts and insights from the New Institutionalism as a framework for investigating the contextual underpinnings of prevailing practices.

The academic and practitioner works that I have chosen represent one set of ideas among many that could frame this study. In choosing to focus on sustainability assessment, I have set aside a rich body of theoretical scholarship about sustainability briefly discussed in the last chapter. I selected the sustainability assessment literature because scholars within this field have had to defend their choices with respect to how they have interpreted the concept for analytical and decision-making purposes. It thus represents a practical integration and expression of the theoretical work. Moreover, sustainability assessment scholars have situated various sustainability essentials within a process for planning and assessment, which is most useful for my purposes.

In concentrating on the social-ecological resilience scholarship, I have not reviewed complex systems theory, which provides part of the basis for this field (see von Bertalanffy, 1969; Meadows & Wright, 2008). Because resilience theory is rooted in complex systems theory, it attends to its core concerns, notably to acknowledge the dynamic, multi-scale (vertical and horizontal) interdependencies within and between social-ecological systems. As such, the resilience scholarship represents a practical route into the rich body of complex systems understanding. Moreover, complex systems theory does not in itself set out prescriptions for sustainable societies, while social-ecological resilience scholars have delineated the attributes of a resilient world based, in part, on resilience and complex systems science. An in-depth review of complex systems theory, therefore, was considered superfluous for my purposes.

In focusing on collaborative planning research, I have set aside a number of pertinent fields with very similar theoretical foundations and concerns. The deliberative democracy scholarship, for example, is a close cousin to collaborative planning in that it is grounded in Habermas' theory of communicative action and is comprised of similar aims and ongoing debates. Deliberative democracy scholars, however, are concerned primarily with the tectonic plates of democratic

systems, as opposed to local government decision-making processes (see Dryzek, 1987; Smith, 2003: Eckersley, 2004). In other words, many advocates of deliberative democracy want to see the transformation of large-scale representative forms of democracy through more deliberative methods of policy formulation. In contrast, collaborative planning scholars have been chiefly concerned with local processes of public planning. Their research, therefore, resonates well with the focus of this study.

In selecting to focus on the New Institutionalism, I have not chosen to cover fields of research about, to name a few, the social construction of meaning (e.g., Miller, 2013), the rise and fall of complex civilizations (e.g., Tainter, 1998) and recent scholarship on transition management (e.g., Loorbach & Rotmans, 2010). The transition management scholarship is perhaps the most pertinent of these because it is concerned with purposeful societal change towards sustainability. It sets out the theoretical basis and a practical framework for complex sociotechnical systems change, and the framework has been applied in various contexts in the Netherlands (e.g., Kemp & Loorbach, 2003; van de Lindt & Emmert, 2008). Lessons learned from experience, however, have revealed that the transition management framework does not adequately address the institutions that may constrain and/or enable transitions (see Scholtlen, 2008;). New Institutional scholars have dedicated much attention to the cultural dimensions of socioeconomic systems. They have also developed various models of change, which could potentially form the basis for practical frameworks for societal change efforts (see Hall & Taylor, 1996). Thus, institutional theory was considered appropriate for this study.

Below, I begin the literature review with the sustainability assessment scholarship.

3.1 Sustainability Assessment

Sustainability assessment has been defined and applied in many different ways around the world (see Dalal-Clayton & Sadler, 2014). Here, it is understood as an instrument that evaluates the acceptability of a proposed or ongoing undertaking based on its contributions to sustainability (Partidario & Clark, 2000). It sits at the leading edge of a wide spectrum of integrative approaches to decision making and evaluation and, as such, it represents the latest stage in the evolution of environmental impact assessment (see Gibson, 2002). Integrative approaches to assessment emerged, in part, in response to the perceived limitations of conventional impact assessment methods, notably their primary focus on ecological systems (Gibson, 2002). In contrast, integrative approaches extend the traditional scope of environmental impact assessment around social, economic and ecological systems as well as the interrelations between and among them (Pope et al., 2004).

Given the purpose of sustainability assessment, scholars in this field have devoted much attention to figuring out what sustainability should mean and how it should be incorporated into decision- making processes. The sustainability assessment scholarship, therefore, has much to offer SSP practitioners with respect to understanding sustainability essentials as well as how these essentials should structure decision making and evaluative frameworks.

Below, I divide my review of the sustainability assessment scholarship into two major research

preoccupations: prescriptions for contents and prescriptions for processes.

3.1.1 Prescriptions for Contents

Sustainability assessment scholars have dedicated much research to developing appropriate guides or criteria for sustainability-based decision making (see Gibson et al., 2005; Pope et al., 2005; Dalal-Clayton & Sadler, 2014). Decision criteria seek to orient practitioners towards a particular set of interrelated social, economic, and ecological matters in order to identify and evaluate alternatives and select and implement the best option(s). As such, they elucidate what our planning and analytical frameworks should cover in order to ensure that our endeavours contribute enduring benefits to social-ecological well being. Because decision criteria constitute what sustainability assessment researchers have perceived to be the basic concerns of sustainability-based decision making, practitioners may use them to structure SSP initiatives, including the scoping step. For example, in scoping exercises decision criteria would represent the broad areas of concern that practitioners should address.

There is an ongoing discussion in the sustainability assessment literature about the desirability of various types of decision criteria relative to their potential to contribute to sustainability (see Sadler, 1999; George, 2001; Pope et al., 2005; Gibson, 2006; White & Noble, 2013). Three types of criteria have been emphasized: baseline conditions, sustainability objectives, and sustainability criteria (see Pope et al., 2005; Hacking & Guthrie, 2006). They relate back to three different conceptualizations of sustainability assessment: environmental impact assessment-driven integrated assessment, objectives-led integrated assessment, and criteria-led assessment for sustainability. Pope et al. (2004) have provided a helpful description of their core aims, strengths and limitations. There is now a widespread agreement that decision guides comprised of objectives and/or criteria have the greatest potential to deliver sustainable outcomes (see Pope et al., 2004; Gibson et al., 2005; Desmond, 2009; Croal et al., 2010; White & Noble, 2013).

This conversation about decision criteria has brought to the fore questions about sustainability essentials (Gibson et al., 2005; Hacking & Guthrie, 2006; Hermans & Knippenberg, 2006). Sustainability assessment scholars have tended to rest different sets of decision criteria on concepts and insights from one or more bodies of literature. As such, they reflect a variety of conceptualizations of what sustainability should mean and entail and, by extension, a range of interpretations of the core concerns of sustainability-based decision making. There is a paucity of research about the different sets of criteria that have been developed. Rather, studies of this sort have tended to focus on the extent to which various types of assessments have incorporated a concern for particular performance criteria (e.g., Fischer, 2002; Benson et al., 2004).

This study did not undertake an exhaustive review of the myriad decision criteria offerings. But one does not have to venture far into the literature to find oft-cited examples. Assessment scholars have tended to begin by acknowledging the socially constructed nature of the concept of sustainability and then undertake some sort of review and/or typology of the notion. Many sets of criteria have been delineated using this approach. All of them exhibit a tension between the contextual, emergent nature of the sustainability concept on the one hand, and the normative task of determining what progress towards sustainability should require on the other.

Hermans and Knippenberg (2006) derived a set of sustainability decision-making principles from Holling's (1973, 1996) notion of resilience and John Rawls's (1999) theory of justice. In doing this, they aimed to temper Rawls' primarily anthropocentric understanding of sustainability with a more ecocentric view. Their definition of 'ecocentric' is based on Dobson's (1996) typology, where ecocentric interpretations reject the notion of 'substitutability' between human and natural capital, and embrace the idea of 'intrinsic value' as the basis for protecting ecological systems. Unlike Rawls's emphasis on human rights and freedoms, however, Holling's notion of resilience does not underscore the rights and freedoms of non-humans. Nor does it directly acknowledge the intrinsic value of ecological systems. Rather, it stresses the features and functions of ecological systems and the multi-scalar dynamics of change in relation to resilience. As Dobson (2000) has explained, a deep ecocentric view of the world would extend such ethical notions as justice and equity to both human and non-human beings. Thus, Hermans and Knippenberg's resilience-based interpretation of ecocentrism merely injects a sensitivity to the elements and dynamics of ecological systems into Rawls's theory of justice, as opposed to extending an ecocentric ethical theory to both humans and non-human forms of life.

Other decision criteria rest on international agreements and/or national policy (see Lawrence, 1997; George, 1999; Benson & Jordan, 2004; Sheate et al., 2008). On the surface, these examples are less philosophical than those that are theoretically inclined. George (1999), for example, extracted two core principles, inter- and intragenerational equity, from the Brundtland Report and then specified them with the 27 principles of the Rio Declaration on Environment and Development. These principles reflect the internationally negotiated definition of sustainability mentioned earlier. As such, they may be criticized for encouraging the type of development that embraces a neoliberal model of economic growth, which has been rejected by advocates of a stronger sort of sustainability (see du Plessis, 2012).

Still other sets of criteria are based on a synthesis of the academic literature and practical experience. Gibson et al. (2005), for example, claim to have developed a comprehensive suite of sustainability requirements that cover social-ecological system integrity, basic human needs, rights, and freedoms; inter- and intragenerational equity, efficient use of natural resources, democratic governance, precaution and adaptation, and integrated thinking (p. 116-118). These requirements rest on a representative set of essentials of the concept of sustainability, which were derived from a review of a diverse range of interpretations (see Gibson et al., 2005, p. 59-62). However, this orientation begs questions about whose interpretations were excluded.

Different sets of criteria mirror more or less different understandings of sustainability and epistemological approaches. In situating particular sets of criteria within a discussion of the disputed nature of the concept, the respective authors imply that their contributions reflect an approximation of what sustainability means, as opposed to the *one* objective interpretation of it. Here, Robinson's (2004) procedural understanding of sustainability is pertinent in that, on a collective level, all of the different sets of criteria that have been developed reflect the essentially participatory, socially constructed nature of figuring out what sustainability should mean and entail.

Given the basic need in sustainability assessment to structure evaluations around sustainability considerations, the chief concern to establish decision criteria has been appropriate. Indeed, this

primary focus is useful for the purposes of this dissertation in that, as previously mentioned, practitioners can employ one or another set of criteria to structure SSP, including the scoping step. In focusing on this feature of assessment, however, sustainability assessment scholars have tended to ignore questions about the links between the application of different sets of criteria and the outcomes of evaluations. Claims of effectiveness have been primarily hypothetical. Pope and Grace (2006) have offered one empirical study along these lines in that they found that a lack of clarity in decision criteria influenced a panel's expectations of the proponent in terms of net sustainability contributions.

Generally speaking, however, more research is required about three interrelated kinds of questions related to the link between decision criteria, the evaluation process, and decision outcomes – questions that compel scholars to recognize the institutional dimensions of sustainability assessment. The first is concerned with the real-life implications of various decision criteria (and processes) for application in evaluation. Depending on the interests involved in a particular case, a proponent may reject a certain set of criteria by virtue of its interpretation of sustainability. The second relates to how decision criteria and processes, which emerge from a particular cultural context, influence the outcomes of an evaluation in terms of whether a proposal is deemed to be acceptable and the conditions placed on the proponent. The third is concerned with the link between decision criteria, processes, decision outcomes, and implementation of the conditions. Ideally, the conditions should be achievable within the constraints of established ways of doing things, or the changes required should be met with sufficient organizational and community capacity. With respect to implementation feasibility, one set of criteria may lead to more favourable conditions than another.

Indeed, the outcomes of sustainability assessment undertakings may require new relationships between different kinds of stakeholders and organizations, significant adjustments in the aims and technological components of projects, and new administrative structures and processes, among other things (e.g., Gibson, 2006c). In creating various sets of decision criteria, however, sustainability assessment scholars have focused most of their attention on the evaluation stage of sustainability assessment as opposed to the outcomes of the evaluation and the subsequent implementation phase. As we know from SSP scholarship, the implementation phase is where things tend to break down due to institutional inertia (e.g., Doppelt, 2003b; Connelly et al., 2008; Llamas-Sanchez et al., 2013).

A consideration of the institutional implications of sustainability assessment decisions is clearly needed. Here, the main implication for practice is that the focus of the evaluation stage should extend to the practical implementation and social change requirements of sustainability assessment decision outcomes. This wider scope would carry implications for the decision criteria used in the evaluation stage in that it would demand a concern for social change and implementation matters at some point during the evaluation stage of assessment.

Both sustainability assessment and SSP are prone to institutional inertia during the enactment stage. Like sustainability assessment, therefore, SSP frameworks should require some investigation of the real-life (institutional) implications of sustainability goals. The focus of planning and scoping should thus extend to implementation and social change considerations during the plan formulation stage of planning.

But the sustainability assessment research is limited in its ability to provide theoretical insights and practical lessons about the institutional implications of evaluation outcomes. Sustainability assessment scholars would need to borrow concepts from other disciplines, including institutional theory, in order to better understand and explain the institutional dimensions of sustainability assessment. One important area for further research in sustainability assessment, therefore, is how concepts and insights related to societal change might be incorporated into or used alongside sets of criteria for sustainability-based decision making. This study contributes to experience in this regard by creating an interdisciplinary framework that incorporates insights from institutional theory.

The issue of how to incorporate a combined set of sustainability and institutional change concerns into decision making relates to the process component of sustainability assessment. Sub-section 3.1.2 below discusses the process aspects of sustainability assessment in more detail.

3.1.2 Prescriptions for Processes

There has been an ongoing discussion among sustainability assessment scholars about best practices in the design of sustainability assessment processes. Here, the notion of process refers to the overarching characteristics of good practice. As Chaker et al. (2006) have described, different approaches to sustainability-based assessment have emerged in different planning contexts around the world. Indeed, there is no single preferred model and thus a universally accepted set of process steps and criteria for good practice have yet to emerge (Pope & Grace, 2006). Scholars have nonetheless underscored the usefulness of creating normative design criteria for good practice. Noble (2009), for example, has asserted that a common set of design principles can help to identify the overall 'state-of-practice' across sustainability assessment regimes, and so enable identification of opportunities for improvement. According to Gibson (2006d), the characteristics of earnest attempts to do sustainability assessment are now evident enough. Gibson et al. (2008) have provided a helpful summary of these best practice principles. They are presented in Box 2, below.

Box 2 Best Practice Principles for Sustainability Assessment Processes

- Early adoption of the concept of sustainability and consistent application of sustainability criteria throughout the planning process;
- Comprehensive consideration of sustainability concerns;
- Attention to context;
- Attention to alternatives and trade offs;
- Integration; and
- Broadly inclusive public participation.

(Gibson et al., 2008)

Similar to the primary focus of decision criteria, these principles are chiefly oriented towards the evaluation stage of sustainability assessment as opposed to both evaluation and implementation phases. Regardless of this limitation, their emphases are useful to SSP processes. In the

paragraphs that follow, I explain each of these principles, in turn, including what they suggest for SSP processes.

The 'early adoption and consistent application of sustainability criteria' requirement refers to when and how the concept of sustainability should be incorporated into decision making and analysis. There is a widespread agreement among sustainability assessment scholars that good practice begins with a commitment to ensure that undertakings contribute positively to community well being. For this purpose, sustainability decision criteria should be adopted at the outset of the planning process, before irreversible decisions are made, as this constitutes an appropriately proactive approach to sustainability-based decision making (Dalal-Clayton & Sadler, 1999; Partidario & Clark, 2000; Gibson, 2006). Sustainability decision criteria stipulate what pursuing sustainability should mean, and there is now a general agreement, that they should be applied throughout the planning process in order to ensure that every stage of decision making contributes positively to sustainability (see Gibson et al., 2005, Partidario & Clark book; Noble, 2002). As Gibson et al. (2005) have noted, this requirement distinguishes sustainability assessment from other forms of assessment that merely aim to mitigate or avoid significant adverse effects. It asks practitioners to choose from among the available options the one that offers the most promising set of multiple, mutually reinforcing, lasting improvements in all areas of sustainability concern, while avoiding significant adverse effects.

The 'comprehensive consideration of sustainability concerns' requirement flows naturally from the first one. It asks practitioners to ensure that the decision criteria adopted serve as a sufficient guide for decision making and analysis (see Gibson et al., 2008). As previously mentioned in sub-section 3.1.1, above, many sets of criteria have been developed for application in sustainability assessment undertakings. Gibson et al. (2005) assert that their adequacy as decision guides hinges, in part, on whether they represent the essential (generic) requirements for progress towards sustainability that apply to all planning initiatives everywhere. They must attend to socioeconomic as well as biophysical matters; they must consider the interests of present as well as future generations; and they must encourage practitioners to consider how these matters are interrelated and interdependent across scales of space and time. The above-mentioned objective to contribute multiple, mutually reinforcing and lasting gains rests on and takes advantage of the interconnections within and between the sustainability criteria. The basic idea is that practitioners should pursue all sustainability requirements jointly in such a way that they support and enhance each other over time (see Gibson et al., 2009).

These two best practice principles imply that good SSP and scoping in any context should begin with an adequate understanding of sustainability – one that is expressed proactively by explicit adoption of the concept and a comprehensive set of generic decision criteria. These criteria should structure all stages of planning and they should compel practitioners to develop goals that deliver synergistic benefits to all areas of sustainability.

The 'attention to context' requirement refers to how practitioners specify the decision criteria for the particulars of the case and context (see Pope et al., 2004; Gibson et al., 2005; Hacking & Guthrie, 2006). Most sets of sustainability criteria are initially generic and so they must be specified for the case and context in order to ensure proper sensitivity to the matters that may affect how they are pursued in particular circumstances. These matters may include trends and

conditions, capacities and other assets, barriers and opportunities, and vulnerabilities and stresses, among other things. They vary among different jurisdictions, sectors, ecosystems and cultures, etc., and they involve different mixes of considerations at various interrelated scales, from the global (climate change and the availability and costs of internationally traded commodities) to the local (public transportation needs of particular communities and the capacity of local governments to provide for these needs) (Gibson et al., 2008). As Gibson et al. (2008) have explained, the generic criteria should provide a comprehensive foundation for decision making and the specification step should integrate the particulars of the case and context with these generic requirements.

For the purposes of this study, a set of generic SSP considerations is specified for the local government SSP context in Canada. I describe how this is done in more detail in Chapter Four.

The comparative evaluation of alternatives has been widely acknowledged as an integral step in sustainability assessment processes (Gibson et al., 2005; Morrison-Saunders & Pope, 2013; Dalal-Clayton & Sadler, 2014). It aims to ensure that the most positive option is chosen as the preferred option, relative to the purposes of an undertaking, sustainability decision criteria, and the obligation to maximize net gains. Often, however, the act of choosing among options can lead to tensions and trade-offs. In other words, in many cases pursuing one alternative with a particular set of social-ecological benefits may raise problems in other important areas of sustainability concern. As Gibson et al. (2005) have explained, "Immediate poverty reduction may put more pressure on already stressed resources; preserving cultural diversity may make achieving gender equality more difficult; setting higher standards for forestry or agriculture may reduce the number of participants drawn into a process of improvement" (p.91). These and many other conflicts that may arise between sustainability objectives illustrate the tension that exists between the basic ideal to pursue positive gains in all sustainability requirements at once and the reality that this ideal is very difficult to accomplish.

There is a general agreement among sustainability assessment researchers that trade-offs should be acknowledged and proactively addressed. But little research has been undertaken on the content and process components of trade-offs, as well as how they have influenced the outcomes of decision making (see Morrison-Saunders & Pope, 2013). Recently, Morrison-Saunders and Pope (2013) and Gibson et al. (2005) have contributed practical frameworks for dealing with trade-offs in decision making. Morrison-Saunders and Pope give some high level principles for dealing with trade-offs throughout the decision making process, while Gibson et al. have developed generic trade-off rules that help practitioners to determine the acceptability of trade-offs during the comparative analyses of alternatives. In practice, however, there has been negligible application of these principles and rules.

In sustainability assessment, alternatives and trade-offs have been conceptualized primarily in the context of proposed industrial development projects (e.g., Gibson, 2006c, 2006d). This means that alternatives have been considered in terms of options for various features of an undertaking, considering their impacts on surrounding social-ecological systems. In SSP, alternatives and trade-off would need to be conceptualized in terms of the implications of different visions, goals and strategies for the trajectory of organizational and/or community development.

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In contrast to the discussion around trade-offs, sustainability assessment scholars have devoted much attention to the integration requirement. Four different types of integration have been emphasized – all of which are evidently relevant to SSP. The first relates to the need to recognize the links and interdependencies within and between social, economic, and ecological systems, present and future generations and multiple scales in decision making (Benevides et al., 2009). The second relates to the integration of objectives for seeking net gains. The basic idea is that it is not enough to provide a list of desirable social, economic and ecological goals. Rather, practitioners must strive to ensure that the goals are woven together in such a way to deliver mutually reinforcing gains to all areas of sustainability concern (Pope et al., 2004; Gibson, 2006; Gibson, 2006d). The third relates to the integration of sustainability decision criteria throughout the decision making process. The basic assertion here is that sustainability assessment should be viewed as an approach to decision making in which sustainability decision criteria guide all stages (Partidario & Clark, 2000). The fourth relates to how the sustainability assessment process is linked to responsible departments, agencies and jurisdictions. According to Noble (2002), sustainability assessment processes have tended to suffer from inadequate communication and coordination among the various experts, departments and organizations whose responsibility it is to carry out the recommendations of the assessment. Here, again, issues surrounding the institutional dimensions of sustainability assessment emerge.

Finally, the 'broadly inclusive public participation' requirement refers to when and how the public should be included in decision making, as well as how the public's input should influence decision making. It has been widely accepted that public participation must be a part of sustainability assessment processes (see Therivel & Partidario, 1996; Fischer, 2003; Gibson et al., 2005; Partidario et al., 2009; Gauthier et al., 2011). According to Gibson et al. (2005), however, the level of commitment to public participation and the design of public participation processes vary greatly among and within jurisdictions. That said, relative openness is now common and the general trend in practice has been towards greater openness (Gibson et al., 2005). With respect to best practices, the general consensus is that all interested and affected stakeholders should be involved early and throughout the planning process; authorities should be transparent with respect to when and how the public can participate; full and timely disclosure of pertinent information should be provided; there must be an ongoing dialogue between the public and the proponent; and the proponent should be transparent about how the public's input influenced decision making (see Sheate et al., 2001; Bond et al., 2004; Gibson et al., 2005; Pope & Grace, 2006; Gauthier et al., 2011).

In establishing these principles for meaningful public participation, sustainability assessment scholars have illuminated the parallels between sustainability assessment and collaborative planning theory and practice. These parallels are especially evident in assessment studies that have described the benefits and pitfalls of participatory forms of decision making (Webler et al., 1995; Palerm, 2000; Partidario & Clark, 2000; Bond et al., 2004; Pope & Grace, 2006; Sheate et al., 2008). Sustainability assessment scholars have tended to borrow from collaborative planning research as the basis for their understanding of good public participation process design (see Lawrence, 2000). This is because, unlike collaborative planning scholars, they have not been essentially concerned to develop theory around public participation. Rather, they have sought to establish and test good practice principles derived from other pertinent research fields. This study, then, cannot rely on the sustainability assessment scholarship as a means for understanding the collaboration component of SSP. I discuss this in more detail in section 3.3 below. Before that,

however, I first turn to a description of the social-ecological resilience scholarship.

3.2 Social-Ecological Resilience Theory

Social-ecological resilience theory is rooted in Gunderson and Holling's (2002) 'Panarchy' theory, which seeks to understand the source and role of change in complex adaptive social-ecological systems. The notion of social-ecological resilience has been central to this aim in that panarchy theorists have perceived the nature of change as something that hinges, in part, on how resilient a particular social-ecological system is. Thus, while sustainability assessment scholars would evaluate the impacts of human activities relative to sustainability decision criteria, panarchy theorists would investigate the impacts of human activities relative to the dynamics of social-ecological systems and the attributes of resilient ones. Resilience scholars would therefore require SSP scholars and practitioners to attend to these dynamics and attributes in planning and scoping.

Here, social-ecological resilience is defined as "…the capacity of a system to absorb disturbance and reorganize while undergoing change so as to still retain essentially the same function, structure, identity, and feedbacks…" (Walker et al., 2004, p. 5). It is measured by the amount of disturbance that a system can absorb before it crosses a critical threshold, which would result in a change in its essential identity (Gunderson & Holling, 2002, p. 28). Panarchy theorists have situated the notion of social-ecological resilience within a conceptual framework for understanding the behaviour of complex social-ecological systems. The metaphor of the adaptive cycle forms the basis of this conceptual framework, which has been developed and refined by Gunderson and Holling (2002) and colleagues (see Resilience Alliance, 2014).

Similar to sustainability assessment scholarship, the adaptive cycle metaphor rests on a complex systems view of the world in which social and ecological systems are interconnected and interdependent across scales of space and time (see Carpenter et al., 2001; Walker et al., 2006). It situates social-ecological systems within an eternal cycle of growth, collapse and renewal. The four phases of this cycle (exploitation, conservation, release and reorganization) are characterized by different sets of actors/organisms, structures and processes, and what happens in one phase at one scale may influence what happens in another phase at another scale. Figure 1, below, depicts the simplified, single scale adaptive cycle as defined by Gunderson and Holling (2002).

Figure 1 The Adaptive Cycle
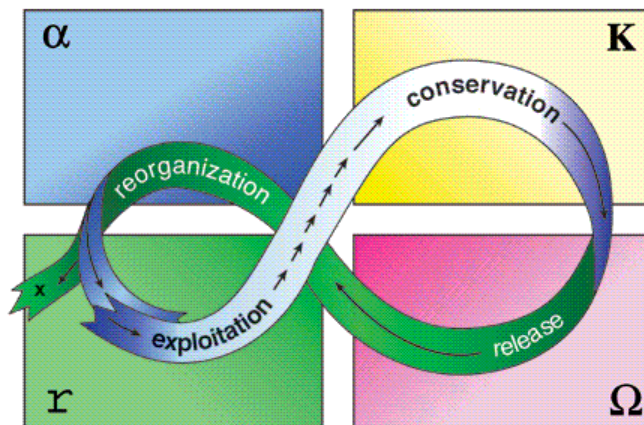
(Gunderson and Holling, 2002)

As Gunderson and Holling (2002) have explained, certain emergent features of social-ecological systems determine the degree of a system's resilience as it moves through these four phases. Two of these features are connectivity and rigidity. Resilience is highest when variability is high and the components of a social-ecological system are loosely interconnected and weakly regulated. Resilience declines as connectedness and stability increase and a system becomes more rigidly controlled by a particular set of established actors, structures, and processes. As connectedness and rigidity increase in the conservation stage, the system becomes more and more vulnerable to disturbances. Internal and external pressures may degrade the system's resilience until it finally succumbs to them. If this happens, all of the energy, materials, structures and processes, etc. that had accumulated during the conservation stage would suddenly be released, creating the foundation for the reorganization stage in which a different system forms. This integrated and dynamic interpretation of space-time and resilience has formed the basis for resilience-based approaches to decision making, including resilience assessment (see Resilience Alliance, 2007) and adaptive co-management (see Folke et al., 2005; Armitage et al., 2008).

A key aim of resilience-based decision making is to maintain or enhance systemic resilience in order to keep social-ecological systems from crossing critical thresholds into less desirable 'stable states' (Walker et al, 2002). And so resilience scholars would lend to SSP and scoping frameworks a direct intent to detect potentially dangerous thresholds and alternative future states. In this regard, resilience scholars offer useful concepts that SSP practitioners can use to structure decision making and evaluation.

For example, the notion of 'critical thresholds' has been employed to denote the point at which a system gives way to internal and external disturbances and then shifts from one stable state to another (see Carpenter et al., 1999; Beisner, 2003; Kinzig et al, 2006; Resilience Alliance, 2007). A stable state refers to a distinguishable arrangement of a system, which is characterized by a particular set of actors/organisms, structures and processes. Social-ecological systems have many potential stable states, which represent different possible futures for a system (see Gunderson and Holling, 2002). In order for a social-ecological system to pass from one stable state to another, a

critical threshold of a key controlling variable must be passed (Kinzig et al., 2006). Once it has been crossed, the structures and processes, etc., that characterized the previous stable state change. This shift from one stable state to another may result in a fundamental change in the identity of a system – for better or for worse (see Carpenter, 2003; Walker & Meyers, 2004; Cumming & Collier, 2005). Resilience-based decision making and planning should thus seek to identify the components of a system whose resilience should be maintained, as well as the human-made and natural pressures degrading the resilience of these components, in order to keep the system from crossing a critical threshold. The above described adaptive cycle metaphor has been used in different empirical contexts as a heuristic for better understanding and explaining thresholds as points where change occurs relative to resilience (see Soane et al., 2012).

The multi-scale influences and effects of these dynamics have been explained by the concepts of 'panarchy' and 'cascading effects' (Kinzig et al., 2006; Van Apeldoorn et al., 2011). The panarchy concept denotes the interconnections and interdependencies within and between adaptive cycles, including thresholds, at different scales (see Gunderson & Holling, 2002). The basic idea is that social-ecological systems are nested in a hierarchical arrangement of systems at different (horizontal and vertical) scales, each undergoing interlinked adaptive cycles. All of the components of the social-ecological systems experience the four-phases of the adaptive cycle at various speeds: "Needles, for example, cycle with a generation time of one year, foliage cycles with a generation time of ten years, and trees cycle with a generation time of one hundred years and more" (Gunderson and Holling, 2002, p. 71). The speed and size of the variable determines its place in the space-time hierarchy. A landscape, for example, has a slow and large adaptive cycle of centuries, while trees experience smaller and faster adaptive cycles. Because they are connected through feedback mechanisms, slower levels in the panarchy are shaped by faster levels and vice versa. Internal and external disturbances may trigger a collapse at one level, which, in turn, may cause a 'cascade' of effects up or down the levels in a panarchy (see Kinzig et al., 2006).

In investigating the features and dynamics of resilient social-ecological systems, resilience scholars have increased our understanding about the properties of resilient systems. In *Resilience Practice*, Walker and Salt (2012) provide a set of attributes of a resilient world, which represent some widely acknowledged basics. In Chapter Four, I discuss how these characteristics of resilient systems can be combined with sustainability decision criteria and used to structure SSP initiatives, including the scoping step. Box 3, below, presents these attributes.

Box 3 Walker and Salt's (2012) Attributes of a Resilient World

Diversity: A resilient world would promote and sustain diversity in all forms (biological, landscape, cultural, social and economic) as a major source of future options and system capacity to response to change and disturbance.

Ecological variability: Resilience is about embracing and working with ecological variability, rather attempting to control and reduce it (e.g. to maximize returns).

Modularity: Resilient systems consist of modular components. A resilient world would favour largely self-reliant systems (modules) to avoid over-connectedness and associated relations of dependence, which become vulnerable to shocks.

Acknowledge slow variables: There needs to be a focus on the controlling (often slowly changing) variables associated with thresholds.

Tight feedbacks: Resilience is about maintaining or strengthening feedbacks that are tight and strong enough in order to allow detection of thresholds before they are crossed (versus slow or delayed feedbacks with weak signals).

Social capital: Promote trust, well-developed social networks, and responsive leadership, all of which serve adaptability.

Innovation: Emphasize learning, experimentation, locally developed rules, and capacity and willingness to shift away from thresholds to undesirable futures or over thresholds to more desirable futures.

Overlap in governance: Foster redundancy of institutions, and a mix of governance players and relations and tools (e.g. common and private properties with overlapping access rights) to increase response diversity and flexibility.

Ecosystem services: Recognize important, even if unpriced, ecosystem services (e.g. pollination, water regime maintenance, climate reliability, nutrient cycling, etc.)

Fairness/Equity: A resilient world would acknowledge notions of equality among people, would encourage democratization to that everyone has a say, a sense of agency, and would promote the notion and practice of fair trade.

Humility: A resilient world would acknowledge our dependence on ecosystems that support us, would allow us to appreciate the limits of our mastery and accept that we have much to learn, and would ensure that our people are well educated about resilience and our interconnection with the biosphere.

(pp.193-195)

While the above attributes emphasize what resilient social-ecological systems would look like, resilience scholars would assert that they could not be maintained or enhanced without some vital capabilities (see Gunderson & Holling, 2002; Walker et al., 2004; Walker & Salt 2012). Notably, they have stressed that actors need to have the capacity to influence these requirements over the long term, and they need to be able to create a fundamentally new system when the

existing one becomes undesirable. Resilient social-ecological systems, then, must possess the attributes of 'adaptability' and 'transformability'.

Adaptability refers to the capacity of actors to manage a system's resilience as it responds to disturbances (see Walker et al., 2004). If the capacity to manage resilience is sufficiently high, actors could conceivably manage it in such a way to steer systems away from critical thresholds. Adaptability thus refers to the capacity of a system to adjust to disturbances while remaining within the current stable state. Transformability refers to the capacity of actors to "…create a fundamentally new system when ecological, economic, or social (including political) conditions make the existing system untenable" (see Walker et al., 2004, p. 3). In contrast, transformability relates to the capacity of a system to cross a critical threshold into a new stable state (see Folke et al., 2010). Transformational change, then, involves a fundamental shift in the nature of the stability state in that it introduces a new set of defining variables. Transformation can be intentional, initiated by a particular set of actors, or it can be imposed on an existing system by changing ecological or socioeconomic conditions (see Folke et al., 2010).

In the context of SSP, the notions of adaptability and transformability may be used as overarching concepts that reflect the potential of an organization and/or community, as determined through an investigation of sustainability and resilience issues and assets. I explain this in more detail in Chapter Four.

Resilience scholarship has tended to focus on how different approaches to decision making degrade resilience, adaptive capacity and transformability over time, as well as the effects of degraded resilience and how resilience can be maintained and enhanced. Much less attention has been devoted to understanding and creating decision frameworks for transformative change in social-ecological systems that are destructive but highly persistent or resilient in a negative way. The research has been primarily explanatory in that it has not been translated into prescriptions for change. In this regard, the New Institutionalism complements panarchy and resilience scholarship in that has increased our understanding of why and how socioeconomic systems change and resist change.

Furthermore, in focusing primarily on the attributes of resilience, resilience scholars have been criticized for neglecting the distributive dimensions of social-ecological systems (see Hotimsky, 2006). In this regard, sustainability assessment scholarship complements panarchy and resilience research in that sustainability assessment scholars have devoted a lot of attention to how power, resources, rights, freedoms and opportunities should be shared.

Both sustainability assessment and resilience scholarship possess a concern for inclusive decision-making processes, albeit in different ways. As I have already mentioned, sustainability assessment scholars have set out in a general way best practices with respect to when and how to include the public in decision making. Similarly, resilience scholars have addressed process in the design of decision-making frameworks for social-ecological resilience in that there has been a general acknowledgement that broadly inclusive and discursive processes are needed. But the core of sustainability assessment and resilience scholarship does not include much theorizing around public participation in decision making. Both fields of research, therefore, would benefit from more exchange between collaborative planning scholars. In section 3.3, below, I turn to a description of the collaborative planning scholarship.

3.3 Collaborative Planning

Collaborative planning scholars have illuminated valuable lessons about how SSP and the scoping step should be undertaken in terms of how the public should be involved. Many advocates of sustainability have called for forms of decision making that are inclusive, discursive, and free from domination by powerful interest groups and scientific expertise (Dryzek, 1987; Smith, 2003; Eckersley, 2004). Collaborative planning and other forms of discursive decision making emerged in response to this call, which rang loudly within the environmental movement over the latter half of the 20th century. There has been a strong shared belief among advocates of sustainability that complex environmental problems require forms of decision-making that are sensitive to the plurality of perspectives, systems, types of knowledge and uncertainty inherent in complex environmental problems (see Dobson, 2000). According to many sustainability theorists whose work overlaps with collaborative planning scholarship, decentralized and discursive decision-making processes are capable of attending to this inherent plurality and uncertainty and, therefore, they contribute to more equitable and ecologically rational decision outcomes (Smith, 1998; Torgerson, 1999; Paehlke & Torgerson, 2005). The basic assumption has been that collaborative decision-making encourages stakeholders from diverse backgrounds to build trusting relationships, learn from each other, critically reflect on a range of values and impacts, reach consensus on complex issues, and develop a sense of shared responsibility over decision results.

Collaborative planning has been defined in numerous ways. Some authors have stressed the consensus-driven, responsibility- and power-sharing aspects of collaborative processes (e.g., Singleton, 2002; Peterman, 2004; Cornwall, 2008). Peterman (2004), for example, has provided the following definition: "Seen as a means for arriving at consensus, the collaborative process involves the adoption of shared rules, norms and structures of decision-making, and the acceptance of joint ownership and responsibility for decisions" (p. 271). Other authors have emphasized the Habermasian, constructivist sociological frame through which collaborative planning scholars have tended to view the world (Innes, 1995; Forester, 1999; Healey, 2006). Healey (2006, p. 29), for example, has provided a helpful description of the core emphases of Habermas' (1981) 'communicative action' theory upon which collaborative forms of decision making rest:

- a recognition of the socially constructed nature of knowledge, interests, preferences, etc.;
- a recognition that knowledge and reasoning may take many forms (e.g., rational analysis, storytelling, statements in pictures, sounds, or words, etc.);
- a recognition that relations of power may oppress and dominate through strategic manipulation and through culturally embedded assumptions and practices;
- a recognition that collaborative consensus-building encourages shared power and responsibility over matters of public concern; and
- a realization that planning work is embedded in social contexts and, as such, has the potential to challenge and change these contexts.

Based on these theoretical starting points, collaborative planning scholars have generally agreed upon the following core features of good collaborative processes (see Innes & Booher, 1999,

1999b; Margerum, 1999; Mendelberg & Olseke, 2000; Burby, 2003; Peterman, 2004; Fung, 2006):

- public meetings that are inclusive of all interested and/or affected stakeholders;
- critical reflection and reciprocal understanding of the variety of interests at stake;
- collective decision making that appeals to the common good as opposed to self-interest;
- equal opportunity to participate;
- deliberations are free from coercive power;
- planners are (neutral) facilitators as opposed to experts;
- citizens are fully informed; and
- consideration of all alternatives.

One feature that distinguishes the collaborative planning literature from other scholarship related to discursive decision making (e.g., deliberative democracy, stakeholder theory) is that collaborative planning scholars have emphasized how established 'rules of the game' influence decision-making processes (e.g., Burby, 2003; Lahiri-Dutt, 2004; Ingamells, 2007). Recently, notable collaborative planning scholars have employed concepts from the New Institutionalism to better understand the intersection between planning and wider governance contexts (see Verma, 2007). The idea to open collaborative planning scholarship to conceptual influence from institutional theory, however, has been contested. Teitz (2007), for example, has asserted that the contributions of institutional theorists are problematic because the New Institutionalism is comprised of so many strands of thought divided along disciplinary lines. But Teitz has not acknowledged the recent trend within institutional thought to develop interdisciplinary frameworks (see Campbell, 2004). Healy's (2007) approach to resolving this problem has been to focus on one particular vein of New Institutional thought, the sociological variety, as the basis for investigating the links between planning and concrete manifestations of power. Indeed, as Healey (2007) has asserted, the wider governance context within which planning initiatives must unfold has an important normative implication for strategic planning: "It means that analysts of planning activity and those designing planning interventions need to develop the capacity to grasp and describe the 'situatedness' of planning activity" (p. 64).

In acknowledging the significance of context and defining a particular set of starting points and features of good practice, collaborative forms of decision making stand in stark contrast to traditional rational comprehensive models of planning, which have been described as hierarchical, reductionist and technocratic (see Allmendinger, 2009). Advocates of more participatory forms of decision making call for the transformation or replacement of the rational comprehensive model. When perceived as a whole, however, the collaborative planning scholarship reveals that the shift from rational comprehensive to collaborative forms of decision making is far from complete, even though it has been underway for quite some time. As Callahan (2007) has put it, "While the benefits of including citizens in the deliberative process are widely recognized, citizen participation is not routinely sought in the decision-making process" (p. 2).

The contested promises of collaborative decision making evidence the slow nature of this shift. According to many prominent commentators, collaborative models offer numerous potential benefits including, among others,

- enhanced legitimacy of decision outcomes (Kulipossa, 2004; Dryzek, 2010),
- changes in peoples' opinions, values, etc. (Smith, 2001; Kulipossa, 2004),
- more ecologically rational decisions (Eckersley, 2004),
- exposed power relations and, thus, avoidance of manipulation (Innes & Booher, 1999),
- enhanced implementation success (Burby, 2003),
- increased social capacity through relationship building (Kweit & Kweit, 2004), and
- positive outcomes of consensus achievement (Innes & Booher, 1999; Allmendinger & Tewdwr-Jones, 2002).

But for every study that has underscored one or more of these benefits, there is a study that has debunked them (e.g., Elstub, 2006; Parkinson, 2006, 2007; Neblo et al., 2010; Llamas-Sanchez et al., 2011; Martinez & Silvia, 2011). Indeed, the role of collaboration in changing decision-making outcomes for sustainability has also been questioned. For example, Brandt and Svendsen (2013) have shown that the costs of consensus building in Local Agenda 21 initiatives may exceed the benefits: "Why? Because as the number of participants grows, the more likely it is that the group will include individuals who have an extreme position and are unwilling to make compromises" (p. 266). Moreover, as Connelly et al. (2008) have stressed, power struggles, conflict, ambiguity, availability of resources, lack of leadership and opportunism, among other things, can easily sidetrack SSP initiatives.

In concentrating on the link between process design and meaningful citizen engagement, scholars have developed typologies of citizen participation. These typologies help to explain the nature of the exchange and the relationship between participants and public decision makers, as well as practitioners' opinions about public participation in planning initiatives. Thus, SSP scholars and practitioners can use them to analyse and design decision-making processes. Many different typologies have emerged from different research contexts and they span the fields of collaborative planning and deliberative democracy. Pretty's (1995) typology, for example, rests on experience in sustainable agricultural development projects. It characterizes seven modes of participation, which are placed along a spectrum of levels, from passive/manipulative to empowered or self-mobilization. Similarly, White's (1996) typology emerged from empirical research in development planning in developing countries. It distinguishes four types of participation (nominal, instrumental, representative, and transformative) and the key features of each.

I did not investigate the typologies proposed by various scholars in all fields of study that overlap with collaborative planning. Rather, here I highlight some oft-cited examples within the public administration literature. In this context, citizen participation is has been defined as

> "…participation in the planning and administrative processes of government. It is
> the interaction between citizens and administrators that focuses on policy issues
> and service delivery…In this context, citizen participation is considered to have a
> direct impact on policy formulation and implementation" (Callahan, 2007, p. 4).

One of the earliest and best known typologies is Arnstein's (1969) ladder, which categorizes quality of participation along rungs of a ladder that range from manipulation at the bottom and citizen power and control at the top. The bottom rung represents no participation from citizens, while the top rung represents citizens who are active and fully involved in partnerships with public administrators. Callahan (2007) has provided a helpful summary of other frequently cited typologies within the public administration research. Thomas (1995), for example, describes five approaches to decision making that correspond with the rungs of Arnstein's ladder of participation. At one extreme, public administrators make decisions independently without public input and, at the other extreme, inclusive public consultations inform decision making. Similarly, Timney (1998) depicts active participation as participation that requires citizens to be in control, own the decision-making process and formulate policy, while at the other end of the spectrum the agency maintains control and participation is merely a formality. In the middle transitional level, power is shared between citizens and decision makers and the role played by the public is primarily advisory.

Most of the typologies that have been proposed depict two extremes, with passive and uninvolved citizens at one end and engaged and active citizens at the other. Citizen participation, however, most often takes place somewhere in the middle and most models do not account for the diverse range of ways that citizens might participate between the extremes (Callahan, 2007). As Arnstein (1969) has noted, there may be dozens of levels in between the extremes and so ladder- or spectrum-style models of participation may be too simplistic to capture the complexities of many decision-making contexts. Similarly, Fung (2006) has been critical of typologies that depict a spectrum or levels of participation. He has argued that they are outdated analytical tools because they rest on the assumption that the highest level of participation is always desirable. Indeed, the typologies described above rest on the assumption that participation is valuable insofar as it serves to empower citizens and redistribute power to have-not citizens. As Fung suggests, however, there may be decision-making contexts in which a consultative role is more appropriate than full citizen empowerment. Simplistic typologies of public participation do not attend to larger questions about how much and what kind of participation is appropriate in a given context. Since there is no standard model of public participation in decision making, the task should be to understand the feasible and useful forms that participation might take place in various circumstances: "Whether public institutions and decision-making processes should treat members of the public as consumers, clients, or citizens depends partly on the context and problem in question" (p. 66).

In light of this concern to recognize the many ways in which citizens might participate in decision making, Fung (2006) developed an analytical framework that integrates three generic dimensions of public participation: who participates (scope of participation), how participants communicate with one another and make decisions together (mode of communication), and how discussions are linked with policy or public action (extent of authority) (see p. 66). When depicted visually, these three dimensions create a 'democracy cube' in which any decision-making process can be located (see Figure 2).

Figure 2 Democracy Cube
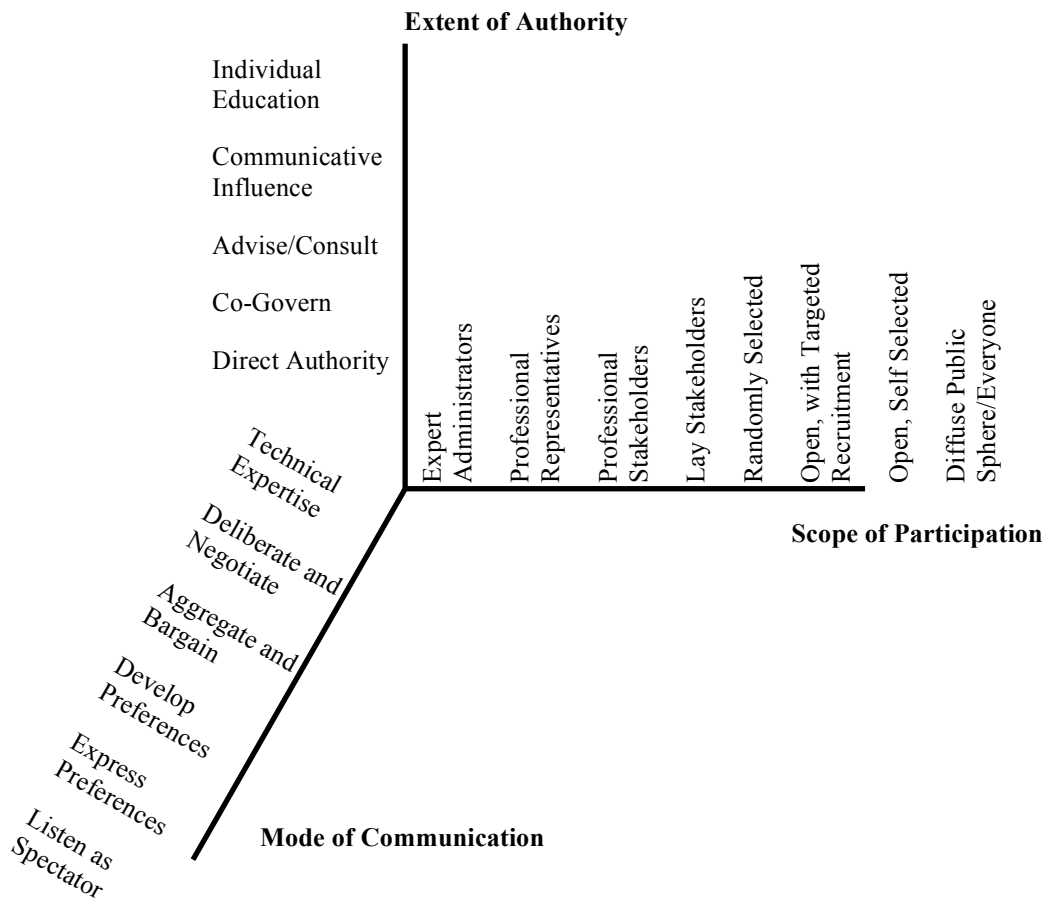
(Fung, 2006)

With respect to the first dimension, scope of participation, Fung identifies five common selection mechanisms, ranging from least to most restrictive: self-selected, selective recruitment, random selecting, lay stakeholder committees, and professional stakeholders. At the least restrictive end of this spectrum, participants are self-selected, meaning decision-making processes are open to all interested stakeholders. According to Fung (2006), the vast majority of public participation events use the least restrictive methods: they are open to all. However, these open-ended processes are often unrepresentative in that they tend to attract wealthier and better educated participants and/or those who have special interests (Fung, 2006). Selectively recruiting participants may address this problem by selecting participants from subgroups that are less likely to engage. Fung asserts that randomly selecting participants gives the best guarantee of representativeness. Finally, lay stakeholder committees and professional stakeholder methods of selection engage smaller groups of citizens and experts.

The second dimension, mode of communication, relates to how participants interact with one another in a particular decision-making venue. Fung (2006) describes six main modes of communication: listen as spectator, express preferences, develop preferences, aggregate and

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bargain, deliberate and negotiate, deploy technique and expertise (p. 69). The third mode, *develop preferences*, departs from listening and expressing modes in that it provides space and sufficient information for participants to explore and discuss issues, develop preferences, and perhaps transform their views based on their interactions with one another. The *deliberate and negotiate* mode departs from the first three in that it translates participants' views or preferences into a collective vision or decision. According to Fung, these kinds of processes are uncommon. Ideally, they are designed to encourage learning and, if appropriate, the transformation of personal views. They do this by providing options to the participants and then asking them to discuss the trade-offs between the options. In deliberation, for example, participants absorb educational materials and exchange perspectives in order to develop views and discover interests. This process leads up to a collective agreement over a matter of public concern. Fung arranges these six modes of communication along a continuum that ranges from least intensive to most intensive, depending on the level of investment, knowledge and commitment required. According to this continuum, the *deploy technique and expertise* mode is most intensive because, as Fung argues, it is the domain of technical experts employed to make decisions in the public interest, without public input.

The third dimension, extent of authority, gauges the impact of citizen participation. Fung (2006) describes five categories of influence and authority: personal benefits, communicative influence, advice and consultation, co-governing partnership, and direct authority. As Fung explains, most participatory venues give citizens little or no influence over policy or action. In these cases, people participate because they derive personal benefits (e.g., sense of civic obligation) from participating. *Communicative influence* refers to situations in which the public influences policy or action through public opinion. In *advice and consultation* mode, citizens provide input but public officials maintain power and authority over decision making. In *co-governing partnership* and *direct authority* approaches, citizens are more empowered. For example, in co-governing citizens engage in partnership with officials to develop and implement plans and policies and the highest level of empowerment occurs when citizens are given direct authority over public decisions and resources.

Fung (2006) demonstrates how the cube framework can be used to explore how various decision making processes address three key governance problems: legitimacy, justice, and effectiveness. When a decision is legitimate, it will reflect the interests of many citizens and many citizens will want to support it. As Fung explains, problems of legitimacy stem from rifts between officials and the broader public. Decision-making processes that are more inclusive and representative on the 'scope of participation' dimension and more intensive on the 'mode of communication' dimension, therefore, will increase the legitimacy of decisions. Similarly, injustice results from unfair access to decision making. When certain groups are excluded, too weak, or unorganized, their interests will likely not be addressed. Thus, participatory venues that are more inclusive, representative and give more direct authority to affected citizens will lead to more equitable decision outcomes. Effectiveness refers to implementation success and it increases when decision-making processes include affected citizens, allow for deliberation and negotiation, and give authority to citizens over final decision-making and implementation.

The main difference between Fung's (2006) framework and the other typologies described, above, are that Fung delineates three widely recognized dimensions of public participation, while

the others discuss them in a combined way in descriptions of various levels of participation quality. Also, Fung takes additional steps to connect these dimensions, both conceptually and visually, with the democratic ideals of legitimacy, justice and effectiveness. Analytically, then, Fung's framework is more attuned to capture the complexities of decision-making processes as well as their outcomes. But Fung's framework is puzzling in that it seems to contradict the theoretical promises of collaborative planning. Firstly, in stark contrast to the ideals of collaborative processes, Fung insists that full participation in decision making may not always be desirable. Secondly, he suggests that justice is not necessarily a result of deliberation, while the other typologies rest on a tacit assumption that deliberation and justice are intricately intertwined. Rather, based on experience in participatory budgeting in developing country contexts, Fung asserts that inclusion of previously excluded voices may be enough: "Justice results from the proper counting of their voices rather than from deliberation" (p. 73). Additionally, Fung insists that the most intensive mode of communication, which is defined by the level of investment, knowledge and commitment required, is the *deploy technique and expertise* mode in which citizens do not have a say. But public planning initiatives may require an equal amount of these things from citizens. Local government SSP, for example, requires substantial local knowledge and scientific expertise, as well as years of commitment and investment from citizens and officials. These contradictions may stem from Fung's orientation towards higher levels of decision making, as opposed to local ones. Or they may be underpinned by his aim to develop a framework that can accommodate a comprehensive range of decision-making processes.

The main similarity between Fung's (2006) framework and the other typologies is that they all focus primarily on delineating participation venues that vary in the degree to which citizens have influence and power over decision making. In adopting this perspective, however, they have ignored the links between process, learning, and transformative change. Research into the connection between learning and institutional change has been undertaken from a variety of theoretical perspectives in a diverse range of fields. In the field of planning, social learning has been attributed to the embedment of collaborative ideals in the design of decision-making processes (e.g., Petts, 2007). Here, the basic assumption is that good collaborative processes encourage critical reflection and inter-subjectivity, which, in turn, inspire the kind of learning required for institutional change.

With respect to conditions of unsustainability, change is required at individual (e.g., values) and collective (e.g., shared worldviews) levels. Sterling's (Sterling, 2010-11) pioneering work on transformational learning in sustainability education draws from Gregory Bateson's (Bateson, 1987) three levels of learning and change to describe the kind of learning necessary for paradigm change at individual and organizational scales. Bateson distinguished three orders of learning and change, which have been adopted widely in the field of organizational learning (e.g., Argyris & Schon, 1996). These orders of learning and change are presented in Table 5, below.

Table 5 Levels of Learning and Change

Orders of Change/Learning	Seeks/Leads To:	Can be Labelled As:
First order change Cognition	Effectiveness/Efficiency	Doing things better Conformative
Second order change Meta-cognition	Examining and changing assumptions	Doing better things Reformative
Third order change Epistemic learning	Paradigm change	Seeing things differently Transformative

(Adapted from Sterling, 2010-11)

As Sterling (2010-11) explains, in the first order, learning and change occur without a critical examination of prevailing norms. For example, learning at this level may involve a realization that something is not working effectively, and a response that involves corrective or adaptive thinking and behaviour that does not challenge the prevailing status quo. Ultimately, it results in doing more of the same. In the second-order, learning and change involve a significant shift in thinking and behaviour inspired by a critical examination of assumptions, values, beliefs, etc., and is about recognizing the connections between external and subjective dimensions of 'reality'. Learning and change at this level are more difficult and uncomfortable because they challenge the status quo. Ultimately, they result in doing better things. In the third order, learning and change involve a shift in an actor's perception of the world or, as Sterling has put it, "…a shift of epistemology or operative way of knowing and thinking that frames people's perception of, and interaction with, the world" (p. 7). Similar to second order learning, learning at this level requires thinking about and examining the foundations of our ways of thinking and behaving. It results in seeing things differently.

But these levels of learning do not offer a framework to assess whether our learning and change constitute progress towards sustainability. Here is where the sustainability assessment scholarship complements collaborative planning research. Sustainability decision criteria developed by sustainability assessment scholars could be used alongside the typologies that I have described in order to guide deliberations, learning and decision outcomes.

Additionally, collaborative decision-making processes promise to encourage the kind of second- and third-level learning described by Sterling; however, there is a paucity of research about the link between the design of decision-making processes and critical thinking about the assumptions, values, and worldviews that underpin sustainability problems. In the context of Fung's (2006) democracy cube, transformative learning may be incorporated alongside the democratic ideals of legitimacy, justice and effectiveness. When set against Fung's three generic dimensions of participation, we can begin to understand how different decision-making models might encourage different levels of learning and change. Building on Fung's Cube, it seems reasonable that less restrictive or more inclusive, deliberative forms of decision making in which power and responsibility is shared would lead to higher levels of learning and change. Later, in Chapter Four, I present Fung's Democracy Cube with Sterling's (2010-11) levels of learning.

Collaborative planning scholars who have investigated process design as a means to achieve collaborative ideals and social change have tended to ignore the roles played by institutional contexts in achieving these things. Conversely, collaborative planning scholars who have demonstrated how institutions shape decision-making outcomes have tended to neglect how process design shapes these outcomes. Indeed, little research has been undertaken that considers how both process design and institutional context shape decision making processes. This study begins to contribute insights in this regard in that it investigates the process components of the community-scoping frameworks that practitioners have adopted in municipal SSP initiatives, as well as the institutional underpinnings of why they were adopted. In section 3.4, below, I turn to a review of the New Institutionalism, which can be used to better understand the structural effects of institutional systems and how they change.

3.4 The New Institutionalism

In this study I use the New Institutionalism for two purposes. First, key concepts and insights from the three schools form part of the analytical framework, which is used to examine how local government SSP practitioners have been attending to societal change concerns. The second purpose is to investigate the contextual underpinnings of prevailing community-scoping practices.

Institutional theorists have increased our understanding of what institutions are as well as how they emerge, persist, change, and structure human and organizational behaviour. Strategic sustainability planning scholars and practitioners can use this knowledge in planning for social change and in investigating the systemic implications of our sustainability goals.

It is now conventional to distinguish three different schools of New Institutional thought: rational choice institutionalism, historical institutionalism, and sociological institutionalism (see Hall & Taylor, 1996). It is beyond the scope of this dissertation to describe each school in exhaustive detail. As Thelen (1999) has noted, each variety represents a sprawling literature containing great internal diversity; therefore, it is difficult to draw concrete lines between them. Notwithstanding this challenge, notable institutional theorists have provided helpful summaries of the tendencies that apply, albeit unevenly, within each school of thought (e.g., Hall & Taylor, 1996; Scott, 2001; Campbell, 2004). For the purposes of this study, I provide a concise overview of how institutional scholars from each school have tended to respond to the following central questions: what are institutions, how do institutions emerge, persist and change; and how do institutions influence human and organizational behaviour?

3.4.1 What are Institutions?

Scholars working within the three varieties of New Institutional thought have understood institutions and institutional dynamics in different ways. For example, Douglas North, a widely recognized scholar in the rational choice school, has defined institutions as "…formal rules, informal constraints (norms of behavior, conventions, and self-imposed codes of conduct), and the enforcement characteristics of both" (North, 1993, p.36). This definition, which considers both formal and informal 'rules of the game', is one of the most widely quoted within and beyond the New Institutionalist literature. As indicated by the emphasis on enforcement

mechanisms, this school has tended to emphasize the regulative dimension of institutions, as opposed to the normative or cognitive dimensions (see Scott, 2001).

Scholars working within the historical school of institutional thought have also emphasized the formal and informal dimensions of human-made rules (see Steinmo et al., 1992; Hall & Taylor, 1996; Campbell, 2004). But they have tended to underscore the temporal dimension, viewing institutions as the outcomes or legacies of emergent historic processes (Campbell, 2004, p. 25). On this basis, rules of engagement are seen as relatively persistent features of long-term temporal landscapes and one of the central factors shaping the trajectory of socioeconomic development.

Sociological New Institutionalists have defined institutions as "formal rules and taken-for-granted cultural frameworks, cognitive schema, and routinized processes of reproduction" (Campbell, 2004, p. 11). Again, formal and informal rules of the game have been recognized; however, these scholars have tended to stress the normative and cognitive dimensions: the unwritten customs and cultural and cognitive frameworks that structure human and organizational behaviour. To sociological institutionalists, institutions are "…not just formal rules, procedures or norms, but the symbol systems, cognitive scripts, and moral templates that provide the 'frames of meaning' guiding human action" (Hall and Taylor, 1996, p. 947). Thus, they would find institutions everywhere, from laws and policies, to handshakes, to the meanings attributed to colour (see Powell & DiMaggio, 1991, p.9).

For SSP purposes, these concepts explain the types of institutions that constitute established ways of doing things. Once they are established they may become very difficult to change – even if they turn out to be socially and ecologically destructive. Brown (2005), for example, has demonstrated how established administrative processes have stifled the implementation of more sustainable approaches to urban stormwater management. Others have shown how natural resource management regimes have persisted in the face of collapse (Walker et al., 2009). Still others have focused on how socioeconomic systems have become locked into poverty traps (Nayak et al., 2014). These studies reveal how different types of human-made rules could impede and/or enable the successful enactment of sustainability goals. Armed with this knowledge, scholars and practitioners can create SSP and scoping frameworks that aim to identify the formal and informal, regulative, normative and cognitive aspects of organizations and/or community systems.

Some scholars, however, have criticized the New Institutionalism as a whole for not providing a unified understanding of institutions. For example, O'Riordan and Jordan (1999) have argued that a synthesis of the many strands of New Institutionalist thought is not possible due to the contradictory interpretations among them. But other new institutional scholars have advocated more exchange among the varieties (see Hall & Taylor, 1996; Thelen, 1999; Campbell, 2004). North, for example, has embraced concepts and insights from rational choice, historical and sociological perspectives in order to investigate the effects of institutions on economic performance (see North, 1990, 1996a, 1996b; 2005). Similarly, Hall and Taylor (1996) favour as much interchange as possible among the schools. They have argued that each variety of new institutional thought provides a partial illustration of the institutional dynamics at work in a given context, or a different but relevant dimension of the human action and institutional impacts there.

Consistent with the interdisciplinary approach adopted in this study, as well as the essentially integrative basis of SSP, I proceed under the assumption that there is much to gain from the erosion of boundaries between the schools. Indeed, there has been a widespread recognition among planning scholars that both formal and informal rules shape decision-making processes and decision outcomes (see Lowndes, 2005; Healey, 2006; Verma, 2007). From this standpoint, local systems of governance have been perceived as nested within institutional matrices, wherein formal and informal rules are interconnected and interdependent (North, 1990; Lowndes, 2005). As Lowndes (2005) has emphasized, forces for institutional emergence, persistence and change coexist and play out in complex ways within these institutional matrices.

3.4.2 How do Institutions Emerge, Persist and Change?

An understanding of how institutions emerge, persist and change can underpin our investigations of organizational and/or community systems and so inform the creation of strategies for social change towards sustainability.

New Institutionalists have used a range of concepts and models of change to understand and explain how institutions emerge, persist and evolve over time. The different schools have tended to attribute these dynamics to different 'logics' that guide human and organizational behaviour. Rational choice scholars have argued that actors create, maintain and change the 'rules of the game' in order to realize certain (primarily economic or political) gains from cooperating with them (Hall & Taylor, 1996). From this perspective, the dynamics of rule systems depend, in part, on the 'utility calculations of individuals' and their strategic interactions (Peters, 2005, p.61; Hall & Taylor, 1996). From a sociological perspective, however, social legitimacy may be just as important. Actors, which include organizations, may adopt certain customs, structures and processes, etc., because they are widely valued in a particular cultural context or because they have been generally accepted as normal, useful or good. Notable sociological new institutionalists, March and Olsen (1989), have described this phenomenon as the 'logic of appropriateness'.

Scholars from the historical variety would add a direct concern for long-term temporal processes. Here, the emphasis has tended to be on the development of human-made rules over time, notably how they have emerged from historical conflicts and established arrangements (Thelen, 1999). In order to persist, formal and informal rules need to be continually renegotiated, reinterpreted and reinforced by actors over time: "…without continual renegotiation and reinterpretation, as well as the support of ancillary institutions, such as customs, beliefs and assumptions, institutions would lose their social embeddedness, and hence cease to function at all" (Immergut & Anderson, 2008, p. 356).

From a sociological perspective, persistence occurs through social processes of institutionalization. Institutions may become so embedded in the cultural fabric of an organization or society that they become taken-for-granted, internalized by actors, and legitimized and maintained through ongoing (unconscious) participation from actors (Scott, 2001). The historical and sociological varieties have also emphasized the role played by power relations and the distribution of power in institutional dynamics. Here, the (political, economic, and social) interests of elite players in complex governance networks are seen as a major force

for emergence, persistence and change. Actors in positions of power are more capable of creating and maintaining the organizational and institutional arrangements needed to reinforce the structures and processes, laws, norms, etc., from which they derive great benefits (Hall & Taylor; Powell & DiMaggio, 1991; Scott 2001).

Institutional theorists have developed some useful concepts that have been widely used to understand and explain the dynamics of institutions. The concept of 'path dependence' has been of great importance to all three varieties' depictions of emergence, persistence and change (Pierson, 2004). Path dependence has been defined in different ways (see Pierson, 2004; Streeck & Thelen, 2005). Here, it refers to "…a process whereby contingent events or decisions result in the establishment of institutions that persist over long periods of time and constrain the range of actors' future options, including those that may be more efficient or effective in the long run" (Campbell, 2004, p. 65). Thus, once a given law, custom, technology, etc., is established, it may become very difficult to change. In particular, the economic and social costs of change may become prohibitively high. As Pierson (2000) has explained:

> "In an increasing returns process, the probability of further steps along the same path increases with each move down that path. This is because the relative benefits of the current activity compared with other possible options increase over time. To put it a different way, the costs of exit – or switching to some previously plausible alternative – rise" (p. 252).

Institutional scholars have used the concept of path dependency to explain, for example, the persistence of different types of capitalism (see Campbell, 2004, p.66). But the notion of path dependency may also be used to explain how new institutional arrangements form. Ordinarily, the positive feedback or self-reinforcing mechanisms associated with the notion of path dependency have been viewed as mechanisms of institutional stability or lock-in. As Streeck and Thelen (2005) have suggested, however, they can also be mechanisms of change if increasing returns to a new institutional arrangement displace the old one. Indeed, the self-reinforcing effects of the new path may eventually weaken the self-reinforcing effects of the old path (p. 173).

The concept of 'diffusion' has also been ubiquitous in institutional scholarship. Diffusion refers to the process by which formal and informal rules spread through an organization, community or system with little alteration (see Campbell, 2004). The extent to which an idea becomes embedded across space and time indicates the strength of that idea, or the extent to which it has become institutionalized (see Scott, 2001). Two mechanisms that facilitate diffusion are translation and enactment (see Campbell, 2004). The notion of translation refers to how actors blend new ideas into established ways of thinking and behaving. An actor's location within the institutional framework increases the likelihood that a new idea will be introduced. But once it has been introduced, the process of translation influences its impact: "Institutional entrepreneurs must blend new ideas into local practice. This tends to ensure that implementation of a new idea rarely constitutes a total break with past practice" (Campbell, 2004, p. 80). Success also depends on the degree of political support an idea carries, power struggles, and the capacity (financial, administrative, etc.) of an organization to adopt and implement the new idea. Moreover, the way a particular innovation is translated depends on the actors responsible for translation. Some

actors, for example, will be motivated to translate ideas in particular ways to serve their own interests. Others will be more concerned with cognitive and/or normative goals.

Implicit in these explanations of institutional dynamics is the role that actors have played. In investigating this role, institutional scholars have stressed the notions of 'structure' and 'agency', as well as the interplay between them. In sub-section 3.4.3, below, I provide an explanation of these concepts.

3.4.3 How do Institutions Influence Human and Organizational Behaviour?

Human-made rules of engagement may be perceived as the means for holding societies together or, as Giddens has put it, they constitute the enduring orderliness of human action (Giddens, 1984). This orderliness (or disorderliness) is the outcome of a continual interplay between actors and the institutions that structure society. People create and maintain the rules of the game and, in turn, these rules constrain and shape their perceptions, actions, and identities. There has been an ongoing debate among institutional theorists about the precise relationship between structure and agency or, as other scholars have put it, constraint and freedom (see Streeck & Thelen, 2005). Scott (2001) has summarized this debate as one in which there are two general camps. One camp has tended to emphasize the structural constraints on human and organizational behaviour, while the other has stressed the ability of actors to innovate and purposefully enact institutional change. Streeck and Thelen (2005) have offered a more integrated view, which may help to resolve the debate: "Instead of separating institutional development into periods in which agency matters more than structure or the other way around, the aim must be to understand the way actors cultivate change from within the context of existing opportunities and constraints…" (p. 19).

The different schools of institutional thought have tended to emphasize different structural constraints. Rational choice institutionalists have tended to stress regulatory constraints (e.g., laws, contracts, etc.) and strategic calculus, while historical and sociological institutionalists have tended to concentrate more on cognitive (e.g., shared values and beliefs) and normative (e.g., social obligations, binding expectations, etc.) constraints, as well as the 'logic of appropriateness', described above (Steinmo et al., 1992, Campbell, 2004). Rational choice scholars have frequently invoked the concept of 'bounded rationality' to explain how rules help to define an actor's choices and actions. This idea refers to the limited ability of actors to make well-informed decisions due to uncertainty, as well as the constraints imposed by prevailing rules of the game (see Alston et al., 1996; Campbell, 2004). Similarly, historical and sociological scholars have frequently relied on the concept of 'choice-within-constraints' to understand the reciprocal relationship between actors and institutions. Established formal and informal rules affect the range of alternatives available to actors, and the information (or lack of information) available to them creates the certainty (or uncertainty) within which they must pursue their interests.

The duality of structure and agency in institutional thought brings to the fore questions about an actor's ability to interpret well-established rules of engagement in creative ways. As I have described, institutional theorists from all schools have emphasized the different logics that underpin institutional dynamics. An actor's sense of what is appropriate or profitable relates to his/her interpretation of the world. But institutional scholars have tended to ignore the links

between an actor's interpretation of the rules and institutional emergence, persistence and change. More research is required to better understand the nuances in the literature in this regard; however, at this early stage it seems reasonable to assert that institutionalist scholars have left relatively underexplored questions about actors' interpretations of established formal and informal rules. One key question that remains is how and when actors have influenced governing institutional arrangements by interpreting the rules differently. This was the case in a land use dispute in Caledon, Ontario, where concerned citizens, town planners and members of council teamed together against a quarry developer in a controversial land use issue. The struggle ended with gains and losses for all players. The gains that were made by the citizens included some positive changes to Caledon's aggregate resource management policies, and they emerged from the citizens' creative interpretation of provincial-level obligations for local land use planning. Caledon's story demonstrates how actor's interpretations of established laws and policies can affect institutional change. But institutional scholars have remained primarily focused on understanding how institutions constrain human and organizational behaviour, as opposed to how they might interpret them as opportunities.

Moreover, the depiction of structure and agency, provided above, concentrates primarily on the relationship between institutions and actors. The structure-agency relationship, however, can be scaled up to illustrate the interplay between decision-making processes, governance systems and the local-to-global institutional context within which they operate. As Lowndes (2005) has explained in her study of local government in England, local governments and local governance systems are nested within wider institutional frameworks that exist at different spatial scales, from the local to the global. Thus, the institutions of local governments are shaped by rules of engagement emanating from higher levels of government, broader socioeconomic systems, and locally specific customs, among others things. This understanding of local government and governance rings true in local government SSP processes, where a diverse range of actors vie for a say in formulating strategic policy, and where a complex mixture of (local to global) formal and informal rules of the game constitute the local planning context.

Furthermore, institutional scholars have tended to ignore the roles played by 'material' ecological and built environmental factors in institutional emergence, persistence and change. These contextual factors cannot be defined as institutions in the traditional sense, but they nevertheless behave like institutional constraints and enablers in that, similar to institutions, they form part of the surrounding context within which actors, organizations and SSP initiatives are nested. As I described in Chapter Two, the natural environment played a key role in the successful enactment of LA21 goals in the Finnish example of local government SSP. Many other examples of how care for the natural environment has influenced local governance and policymaking can be found in the scholarly literature (e.g., Hancock, 1993; Edge & McAllister, 2009). Moreover, environmental social scientists have demonstrated the links between natural-built-institutional systems and human behaviour (e.g., Brown et al., 2009; Brown & Westaway, 2011; Head, 2014). In focusing primarily on the regulative, normative and cognitive elements of institutional systems, however, institutional scholars have tended to exclude natural and built environmental factors from their analyses and theory building.

This study uses the New Institutionalism for two purposes. First, key concepts and insights from the three schools form part of the analytical framework, which is used to examine how SSP

practitioners and citizens have been attending to societal change concerns. The second purpose is to investigate the institutional underpinnings of prevailing practices. In doing this, I aim to better understand why practitioners have or have not been attending to societal change towards sustainability concerns, as well as why citizens have been concerned with a particular range of community issues. This second purpose brings into sharp focus a range of socioeconomic, natural and built environment considerations that fall outside of the usual scope of institutional analysis. This study, therefore, contributes to our understanding of the strengths and limitations of institutional theory with respect to its ability to attend to the institutional, socioeconomic, ecological and built factors that shape local government SSP practice.

3.5 Lessons Learned from Local Government SSP about Effective Practice

The bodies of literature described above illuminate some theoretically grounded requirements for SSP. Sustainability assessment, resilience and collaborative planning scholars tell us something about what decision making for sustainable societal change should mean and entail in terms of contents and processes, while institutional theorists help us to better understand the range of institutional constraints and enablers that may shape SSP initiatives.

But this depiction of basic requirements does not cover all of the practical needs associated with operationalizing sustainability goals in complex organizational and/or community contexts. This section deals with the scholarly and practitioner literature in the field of local government SSP that has revealed the practical requirements for effective practice (e.g., Conroy & Berke, 2004; Garcia-Sanchez & Prado-Lorenzo, 2008; ICLEI, 2012). These requirements relate to the real-life political, administrative, financial, planning process, and governance needs for successful plan formulation and enactment. Table 6, below, summarizes the literature in this regard.

Table 6 Practical Requirements for Effective SSP Practice

Practical Requirements	Description
Financial	-Adequate financial resources for planning and implementation stages (Berke & French, 1994; Campbell, 1996; Conroy & Berke, 2004; Kern et al., 2004; Garcia-Sanchez, & Prado-Lorenzo, 2008; Echebarria et al., 2011).
Political	-Long-term political leadership and support (Conroy & Berke, 2004; Kern et al., 2004; Connelly et al., 2008; Garcia-Sanchez, & Prado-Lorenzo, 2008; Fidelis & Moreno Pires, 2009). -Supportive local and higher-level policies (Conroy & Berke, 2004; Garcia-Sanchez, & Prado-Lorenzo, 2008; Echebarria et al., 2011).
Administrative	-Long term leadership and support from senior management (Fidelis & Moreno Pires, 2009; Leung, 2009; de Vries, 2011 -Adequate expertise (Connelly et al., 2008; Garcia-Sanchez, & Prado-Lorenzo, 2008; Fidelis & Moreno Pires, 2009; de Vries, 2011). -Adequate staff resources (Garcia-Sanchez, & Prado-Lorenzo, 2008; Connelly et al., 2008; Fidelis & Moreno Pires, 2009; de Vries, 2011). -Integration of planning and implementation processes within the organization (Arts et al., 2005; Connelly et al., 2008; Garcia-Sanchez, & Prado-Lorenzo, 2008; Leung, 2009; Echebarria et al., 2011). -Integration of sustainability principles and objectives in day to day operations and other plans (Fidelis & Moreno Pires, 2009; Leung, 2009; Echebarria et al., 2011).
Governance	-Development of partnerships and networks (Connelly et al., 2008; Fidelis & Moreno Pires, 2009; Leung, 2009; Echebarria et al., 2011; Barrutia & Echebarria, 2012; Barrutia et al., 2013). -Strong community support (Dalton & Burby, 1994; Lafferty, 2001; Conroy & Berke, 2004; Leung, 2009
Planning process	-Long-term planning horizon (Gibson et al., 2005; Fidelis & Moreno Pires, 2009; Marbeck Resource Consultants, 2009) -Focus on learning about sustainability in the planning process (Fidelis & Moreno Pires, 2009; Leung, 2009; Marbeck Resource Consultants, 2009; de Vries, 2011). -Broad multi-stakeholder participation and collaboration (UN, 1992; Grant et al., 1996; Innes, 1996; Innes & Booher, 1999; Potapchuk, 1996; Adolfsson, 2002; Conroy & Berke, 2004; Varol et al., 2011).

These practical needs reflect the lessons learned about the barriers and opportunities encountered in public sector SSP. Many of the requirements are self-explanatory and so they do not require extensive discussion. Less obvious, however, are the overlap between the various requirement categories and the ways in which they reinforce each other. For example, adequate financial resources for long-term sustainability planning may be integral to the participatory process,

creating new champion organizations and gaining broad community support for particular sustainability goals. Moreover, if addressed, many of the requirements create positive synergistic effects. For example, incorporating learning about sustainability issues into the planning process may work synergistically with the integration of sustainability principles into an organization to create a shared understanding of what sustainability means. This, in turn, may add to the momentum for sustainability planning. Similarly, multi-stakeholder collaborative processes may generate trust, new relationships, power sharing and, in turn, increased capacity for implementation. These requirements for effective practice, then, should be viewed as a package of practical needs that support one another in ways that create positive effects.

Rich bodies of literature are associated with many of the requirements for effective practice. I have already touched on the collaborative planning scholarship, which connects directly with the planning process requirements and overlaps with the governance requirements. Additionally, much research has been undertaken about governance for sustainability (see Kemp et al., 2005; Meadowcroft et al., 2005). It is beyond the scope of this dissertation to describe the various literatures that connect with each requirement category. Rather, I provide a vignette for three recently celebrated Canadian cases, which demonstrate how many of these requirements have played out on the ground.

These three celebrated cases were found in the practitioner research and websites of organizations (Federation of Canadian Municipalities, Canadian Mortgage and Housing Corporation, etc.) that have highlighted good local government SSP practices. They represent different local contexts from across Canada in order to shed light on how effective practice matters have played out in various settings. One limitation of this approach, however, is that the cases have not been studied over the long term. Thus, I cannot comment on the long-term effects that meeting one or more of the requirements for effective practice has generated in each context. This reveals the need for more research that investigates the outcomes of SSP initiatives that have fulfilled these requirements in different ways.

3.5.1 Craik Sustainable Living Project, Craik, Saskatchewan

In 2001, the Town of Craik and the Rural Municipality of Craik No. 222, in south central Saskatchewan, formed an inter-municipal partnership in order to develop and implement a long-term plan for a sustainable community-based project. Together, these rural communities have a population of approximately 700 people (Statistics Canada, 2011b). The partnership, called the Craik Sustainable Living Project (CSLP), emerged in response to the need for tangible local initiatives that address the impacts of climate change, population decline, as well as contribute to the revitalization of the rural community. As Connelly et al. (2008), have explained, "Rather than embarking on traditional economic development initiatives in competition with surrounding towns, leaders in the community were convinced that sustainable community development provided the key to long-term stability and rural revitalization" (p. 33).

The CSLP aims to serve as a model for positive change towards sustainability in other rural communities in Saskatchewan and beyond faced with similar issues. Four goals were established at the outset of the planning process:

- Raise awareness about sustainable living, climate change, and healthy living;
- Inspire and enable sustainable change in other communities by example;
- Continue to build the profile of the community provincially, nationally and internationally; and
- Build upon the relationship of the CSLP with local people (Craik Sustainable Living Project, 2009).

There are four main components to the plan: construction of a multi-purpose Eco-Centre/demonstration building, community outreach and education, community action, and eco-village development. Each of these components involves extensive and long-term community involvement and each was designed to provide employment opportunities, raise awareness about the sustainable use of energy, water and other resources, and promote Craik as a sustainable community. The five-year planning process involved the following activities, among others:

- Numerous educational seminars on sustainable living alternatives for local residents;
- Creation of a steering committee comprised of community members, professionals, administrators, and officials to oversee the development of the entire project;
- Securing funding for the five-year term of the plan (approximately $250,000 was secured through grants and low-interest loans);
- Construction of the Eco-centre, conversion of a golf course to a biocide free, ecologically sensitive course, and a new sustainable housing development or eco-village community; and
- Tours of the Eco-centre (Craik Sustainable Living Project, 2009).

Community resources drove the construction of the Eco-centre in that it relied on local workers, community volunteers, in-kind contributions from surrounding businesses, and funding from local fundraising campaigns. Other funding came from the Federation of Canadian Municipalities Green Municipal Funds program. According to Connelly et al. (2008), reliance on external consultants and other expertise was intentionally kept to a minimum in an effort to build local expertise through learning by doing.

Today, the CSLP is a thriving not-for-profit organization. The Eco-centre, which has received many awards and much media attention (Craik Sustainable Living Project, 2009), continues to serve as a focal point to raise awareness and demonstrate the benefits of sustainable living alternatives. The Eco Village is nearing completion, with a number of off-grid housing units already built. Construction has relied on recycled materials, straw bale, passive and active solar power, grey water recycling, and composting toilets, among other green building methods. According to the nonprofit organization, Fellowship for Intentional Community (2013), the half-acre building lots were sold for just $1.00 in order to attract new residents to the Town. Among other attractions, the Village boasts a new schoolhouse called 'The Praxis International Institute' that hosts students from around the world who want to learn about living sustainably.

3.5.2 Imagine Our Future, City of Williams Lake, British Columbia

In 2009, the City of Williams Lake, a small city of approximately 11,000 people (Statistics Canada, 2011c) nestled in the Cariboo region of central British Columbia, launched its *Imagine*

Our Future process – an integrated community sustainability planning (ICSP) initiative. The City's economy has traditionally relied heavily on ranching, mining, milling, and forestry, and so it faces many challenges confronted by similar resource-based towns, notably the rising costs of fuel and, with respect to the forestry industry, the Mountain Pine Beetle epidemic. According to a survey that was conducted in 2011, the most critical local issues include, among others, crime and safety, unemployment, and air quality (City of Williams Lake, 2010). The ICSP undertaking was thus perceived as an integrated way to respond to the City's pressing social, economic and environmental concerns.

During the plan development stage, a new internal working group called the 'Integrated Planning Task Force' served to connect various municipal departments through interdepartmental communications. The task force, which included representation from Development Services, Social Planning, Recreation Services, Public Works, Corporate Services, Economic Development, and Financial Services, coordinated public engagement events and delivered staff training on sustainability planning, among other activities. Externally, the City consulted with the Resort Municipality of Whistler for advice on appropriate greenhouse gas emission reductions targets and other ICSP policies. They also sought advice on tools and implementation tips from officials and staff from the Town of Canmore, Alberta. Funding for plan formulation was provided from a local not-for-profit organization and the Federal Gas Tax transfer (Federation of Canadian Municipalities, 2010).

The plan adopts a 25-year timeframe, and it functions as a high-level strategic document. It consists of a Sustainability Declaration, which was adopted by Council as the formal policy to guide all decision making. It sets out four sustainability principles adapted from The Natural Step: "By seeking innovative and flexible solutions to the challenges that confront us, by sharing our knowledge, and by coordinating our actions, we strive to attain the following sustainability principles:

- Reduce our contribution to the progressive build-up of materials (and their associated wastes) that are extracted from the Earth's Crust;
- Reduce our contribution to the progressive build-up of synthetic materials produced by society;
- Reduce our contribution to the ongoing physical degradation of nature; and
- Reduce our contribution to the conditions that undermine people's ability to meet their basic needs" (City of Williams Lake, 2010, p. 8).

The plan is structured around ten Strategic Priority Areas that cover social, economic, cultural, governance, and environmental categories of sustainability and urban planning: Social Well-Being, Resilient Economy, Partnering with First Nations, Distinctive Arts and Culture, World Class Recreation, Affordable Housing and Liveable Neighbourhoods, Lively Downtown, Cherished Local Ecosystems, Active and Convenient Transportation, and Local Food and Agriculture. Each Strategic Priority Area is comprised of three components:

- A 'Description of Success' that describes the state of the priority area in the future (20-25 years ahead);

- A description of the 'Current Reality', which describes the current situation, including community issues and assets; and
- 'Transition Strategies' that provide guidance on how to close the gap between the Current Reality and Description of Success.

In 2010, the ICSP received the Federation of Canadian Municipalities Sustainable Community Award in recognition of the innovative community engagement and public participation process that was developed by the planning team. A diverse range of methods was used to raise awareness of the initiative and gather input from the public. These included, among others, information booths in popular parts of the City, a series of 'Kitchen Table' conversations hosted at homes of citizens with their neighbours, "Hot Spot' conversations at popular community hangouts like Tim Horton's, a series of 'Community Partner Café' events to engage community leaders, and 'Youth Multi-Media Workshops' to gather the views and opinions of the next generation.

Within the municipal organization, implementation of the ICSP has involved the allocation of funding from the municipal budget to various projects and activities that aim to fulfill the community vision. One of the first tasks was to translate the Transition Strategies into the Official Community Plan (OCP). The work of consultants and planners in this regard has involved a review of various Master Plans, policies and bylaws in order to ensure that land use planning is aligned with the long-term vision of the community. The ICSP also sets out the promise to create a municipal decision-making framework for capital projects and land use decisions. It will be used to screen all major decisions in order to ensure consistency with the plan. The ICSP also sets out the goal to establish implementation committees for each Strategic Priority Area. These committees will be comprised of community partner organizations and they will meet twice a year to establish priorities and targets, and develop and implement action plans (City of Williams Lake, 2010).

3.5.3 Sustainable Kingston Plan, City of Kingston, Ontario

The City of Kingston has a population of approximately 123, 363 (Statistics Canada, 2011d) and it is situated in Eastern Ontario, where the St. Lawrence River flows out of Lake Ontario (City of Kingston, 2010). It aspires to be Canada's most sustainable City. One step towards achieving this goal is the implementation of the *Sustainable Kingston Plan*, an Integrated Community Sustainability Plan. The preamble to the Plan reveals the community's overarching objective to counteract today's globally present (and locally relevant) environmental problems:

> "Kingstonians are not alone in their desire to implement change to support sustainable development. The list of global challenges keeps growing: climate change; widening gaps between the rich and the poor (both globally and in Canada), dwindling non-renewable resources, shrinking natural habitats, diminishing biodiversity, and growing human population pressures… *Sustainable Kingston* recognizes that while we may have little influence on major global issues, we can all do our part to design a different future…" (City of Kingston, 2010, p. 3).

The Federation of Canadian Municipalities Green Municipal Fund provided part of the funding for the plan development phase. Approved by Council in 2010, the Plan consists of three parts: the Plan itself, a governing body, and a website. The Plan is structured around four pillars of sustainability (cultural vitality, economic health, environmental responsibility, and social equity), which are further divided into various planning themes (e.g., arts, economic development, infrastructure, health and wellness, etc.). Each theme includes a theme statement, high-level goals and indicators. The goals are meant to provide guidance to the community and influence the actions taken by the community partners. Below is an excerpt of the goals listed under the theme of Energy, Air and Climate Change:

- Reduce the amount of energy that residents, businesses and industry consume.
- Generate enough local renewable energy to meet all of our needs.
- Reduce and/or mitigate our greenhouse gas (GHG) emissions to become carbon neutral.
- Minimize noise pollution.
- Work within our power to reduce the number of smog days to zero (City of Kingston, 2010, p. 35).

Within the municipality, the plan will function as a high-level framework for aligning master plans, including the Official Plan. Within the community, it is meant to guide the strategic planning and actions of Community Partners, including businesses, community organizations and individual citizens. A project management team and an internal steering committee comprised of City Councillors and citizens oversaw the plan development process. The committee worked with the public to develop the theme statements and goals. A community champion was assigned to each sustainability pillar and his/her job was to oversee consultation on matters specific to the respective pillars. The public participation methods included a community sustainability charrette, a sustainability summit, targeted sector consultations, and an online public survey.

The governing body is an independent not-for-profit organization whose mandate is to oversee the implementation of the Plan. This implementation method reflects the City's desire to inspire community ownership in its transition towards sustainability: "The *Sustainable Kingston Plan* will be implemented within the community and is not a project or program of the City of Kingston – though the City will be a partner in pursuing its goals" (p. 9). Like all not-for-profit organizations, a Board of Directors will govern it. As the Plan prescribes, Members of the Board should be comprised of funders, partners, and committed citizens. Among other responsibilities, the Board must ensure transparency, monitor and evaluate performance, and report annually to the community on progress. The organization appeals to partner organizations and citizens to implement the Plan's goals, and to a range of sources within the community for the required funding. The reliance on community partners reflects the City's effort to build community capacity and collaboration amongst a diverse group of local businesses, organizations and community groups. In the Land Use and Built Environment theme, for example,

The website serves as a conduit for members of the community to sign up as partners. It also provides public access to a dynamic inventory of actions that various Community Partners have taken to fulfill the plan goals. According to this website, the Sustainable Kingston initiative now has 98 community partners, and over 500 actions have been completed.

3.5.4 Discussion of Case Experiences

The three cases, described above, begin to illuminate the context-specific ways in which generic requirements for effective practice play out, as well as the diverse ways in which communities may approach effective municipal SSP. Again, Robinson's (2004) notion of procedural sustainability is useful here in that it can explain how different approaches to SSP emerge from contextualized social processes. From this standpoint, it would seem that there is no magic bullet formula for success, and the case examples provided, above, seem to validate this view. Craik's inter-municipal initiative used a citizen-driven project to raise awareness about sustainable living, gain stakeholder support and funding, and generate momentum to pursue some community revitalization goals. Williams Lake took a top-down, government-led approach where implementation has relied heavily on interdepartmental communications, policy reform, and tiering. Kingston's approach sits somewhere between Craik's grounded effort and Williams Lake's top-down style in that the plan development stage was government led, but implementation has been a community affair, guided by an independent not-for-profit organization.

One question that emerges from this quick exploration of cases is whether long-term success, measured in terms of progress towards certain goals, can be attributed partly to whether the generic requirements for effective practice were met, and which ones were met. In this regard, local government SSP research has been primarily hypothetical in that it has used logic, as opposed to empirical findings, to connect the lessons learned from failures and/or overcoming various challenges with good practice requirements. In other words, effective practice requirements essentially represent a rational response to these lessons learned, as opposed to evidence from cases that have applied them. But, as I have previously noted, there is a paucity of research that links outcomes to effective practice criteria or other variables such as implementation models. Clarke's (2010) study, which examined the implementation of various collaborative regional sustainable development strategies, begins to shed light on the relationship between various types of outcomes (plan, organizational, process, action, personal) and four archetypal structures for implementation: implementing through joint projects, implementing through partner organizations, implementing through a focal organization and informal implementation. Clarke's research thus provides valuable evidence that our approaches to local government SSP matter.

If there is no magic bullet formula for effective practice, then approaches to local government SSP must matter in a context specific way, as opposed to a universal way. In other words, the lessons learned from experience cannot necessarily be translated into universally applicable prescriptions for good practice. This suggests an inherent tension between, on the one hand, the contextual way in which SSP is understood, conducted and evolves and, on the other hand, the need for a common understanding of what good municipal SSP is and how to do it as well as the need for synthesis and dissemination of the lessons learned in this regard. At any rate, it seems that the generic requirements for effective practice, presented in Table 6, above, may be used as an approximate guide, while the circumstances of a place will ultimately determine whether and how they are met as well as how they play out and evolve.

The generic requirements that I have identified are useful for the purpose of examining the range of effective practice requirements covered in each case. More research is required to accurately investigate the cases from this critical perspective; however, it seems that each initiative more or less addressed the requirements in a more or less different way. All of them secured adequate financial resources for the development and implementation stages – Williams Lake through municipal budgeting and Craik and Kingston through a combination of municipal funding and fundraising by not-for-profit organizations. All of the cases had clear goals, albeit different goals based on different community needs, issues and assets. All of them recognized the importance of adopting a long-term planning horizon and all used multi-stakeholder participatory processes that incorporated the notions of learning and awareness, though using different methods. Still, questions persist about the link between these requirements for effective practice and the long-term operation of the organizations in Craik's and Kingston's cases, and internal municipal support for Williams Lake's sustainability goals. There seem to be no guarantees – only the theoretical promise of increased community capacity and environmental consciousness, among other outcomes.

With respect to implementation, the generic requirements for effective practice reveal some areas of weakness. Again, more research is required for a precise analysis; however, based on the information provided, above, reporting on Williams Lake's and Kingston's initiatives is not clear on how they went about integrating the planning and implementation stages of SSP. Generally speaking, there is little guidance on how to do this, so it is not surprising that the plans do not provide details in this regard. Moreover, participants in both cases seem to be pushing ahead with implementation successfully despite their lack of attention to this requirement. This indicates that some attention might have been devoted to, for example, targeting specific stakeholders early on in the process to ensure adequate representation for implementation purposes. Or, in Williams Lake's case, the internal committee may have helped to bridge the gap between plan development and enactment processes. Cultural factors may also work towards bridging the gap. In Craik's case, for example, the strong history of citizen engagement in revitalization efforts would certainly play a key role. Moreover, as one citizen of Craik put it, because the Town is small and in need of new ideas and residents, bureaucratic red tape did not stall the sustainability project; the Town was ready for innovative solutions and positive change.

All in all, the above cases demonstrate that generic requirements for effective SSP practice are a good idea. They have emerged from experience and, as such, they are rooted in what we have learned by doing. Moreover, they are useful in analyses of SSP initiatives. But the cases also demonstrate that context may be just as important and so evaluating SSP undertakings in light of generic effective practice requirements alone can explain only part of the whole picture. Moreover, because they have emerged from context-specific experiences, they cannot be viewed as static or comprehensive – once and for all. Rather, they should be viewed as a dynamic approximation of what is needed for effective practice – based on what we have learned thus far.

This study does not investigate SSP initiatives in light of whether and how they have attended to generic requirements for effective practice. Rather, these requirements form part of the analysis of whether and how practitioners have been attending to the theoretical and practical requirements for societal change towards sustainability. I combine the generic practical requirements presented, above, with insights about how social change occurs in order to illustrate

a more comprehensive view. From this standpoint, it becomes clear that the above generic requirements, which were derived primarily from the practitioner literature, miss some potentially critical considerations related to institutional and contextual factors and dynamics. This, in turn, reveals how SSP has been conventionally viewed: as a process for developing and implementing strategic sustainability goals, as opposed to a process for facilitating systemic change towards strategic sustainability goals. In other words, the social change element has largely been ignored in prescriptions for good practice.

This review of the academic and practitioner research aimed to increase our understanding about the ideal (generic) content and process concerns of planning for societal change towards sustainability. This study rests on the idea that SSP and scoping frameworks should espouse these considerations in order to contribute to sustainable societal change. This review also illuminated how concepts from the New Institutionalism can be used to expose the contextual underpinnings of prevailing SSP and scoping practices. In section 3.6, below, I summarize the contributions of each field of research in these regards.

3.6 Summary

In this chapter I reviewed the following five bodies of research, each of which contains a partial explanation of the basic concerns of SSP: sustainability assessment, social-ecological resilience theory, collaborative planning, the New Institutionalism, and lessons learned from local government SSP experience about effective SSP practice. Additionally, concepts from the New Institutionalism help to illuminate the contextual underpinnings of prevailing practices. In sub-sections 3.6.1 to 3.6.5, below, I summarize the main contributions of each field of study.

3.6.1 Sustainability Assessment

In delineating decision criteria and best practice principles for processes, sustainability assessment scholars have illuminated the kinds of futures (or the *ends*) for which we should be aiming as well as how (or the *means* by which) we should be getting there. Planning practitioners may use one or another set of decision criteria to structure SSP initiatives, including the scoping step. For example, in scoping exercises decision criteria would represent the broad areas of sustainability concern that practitioners should address. Sustainability assessment best practice principles imply that good SSP should include early adoption and consistent application of the concept of sustainability throughout the planning process; comprehensive consideration of sustainability concerns; attention to context; attention to alternatives and trade offs; integration; and broadly inclusive public participation.

The primary focus of sustainability assessment scholars on establishing decision criteria and best practice principles has meant that the research has tended to ignore important questions about the links between contents, processes and outcomes. Many of these questions are institutional in nature. A consideration of the real-life (institutional) implications of sustainability assessment would widen the focus of the research around both evaluation (i.e., applied criteria and processes) and implementation phases (i.e., decision outcomes and accompanying implications for established ways of thinking and practice), which would, in turn, carry implications for

decision criteria.

Both sustainability assessment and SSP are susceptible to institutional constraints during the enactment stage. This common problem suggests that SSP frameworks should also require some investigation of the real-life (institutional) implications of sustainability goals. The focus of planning and scoping should thus extend to implementation and social change considerations during the plan formulation stage of planning.

But the sustainability assessment research is limited in its ability to provide theoretical insights and practical lessons about the institutional implications of evaluation outcomes. One important area for further research in sustainability assessment, therefore, is how concepts and insights related to societal change might be incorporated into or used alongside sets of criteria for sustainability-based decision making. This study contributes to experience in this regard by creating an interdisciplinary framework that incorporates insights from institutional theory.

3.6.2 Social-Ecological Resilience Theory

The resilience scholarship tells us that SSP and scoping frameworks should consider the multi-scale dynamics of complex systems, the attributes of resilient social-ecological systems, and how systems dynamics and other factors degrade and/or maintain resilience. In connection with this, SSP and scoping practice must include a concern to maintain and enhance the resilience of desirable systems, while pushing resilient but destructive systems towards greater sustainability. In these regards, resilience scholars lend to SSP some helpful concepts that practitioners can employ to structure SSP and scoping frameworks.

These concepts include the notion of resilience and the following corollaries, which I explained in section 3.2: panarchy, the adaptive cycle metaphor, controlling variables, critical thresholds, cascading effects, regime shifts, alternative stable stages, adaptability and transformability. These ideas help us to visualize and explain the complex, multi-scale relationships within and between social-ecological systems. Additionally, Box 3 set out the attributes of a resilient world as defined by resilience theorists, Walker and Salt (2012): diversity, ecological variability, modularity, acknowledge slow variables, tight feedbacks, social capital, innovation, overlap in governance, ecosystem services, fairness/equity, and humility.

Strategic sustainability planning practitioners can use these ideas to guide decision-making and analysis. But transforming well-established social-ecological systems requires some understanding of how human-made rules emerge, persist, change and influence human and organizational behaviour. Social-ecological resilience theory, however, has emerged from studies that have focused primarily on the dynamics of ecological systems. This is partly why there has been a recent move within the resilience scholarship to borrow concepts from the social sciences, notably institutional theory, to explain the links between people, institutions and ecological systems.

Furthermore, similar to the sustainability assessment literature, resilience theory does not directly address questions about the design of collaborative decision-making processes and the links between design, learning and decision outcomes. While there is a general agreement among resilience and sustainability assessment researchers that broadly inclusive, multi-stakeholder

participation is ideal, theorizing about the effects of different decision-making models has not been central to their research agenda. Here, academic work in the field of collaborative planning can increase our understanding of process design for effective SSP, including the scoping step.

3.6.3 Collaborative Planning

Collaborative planning theory tells us that SSP practitioners need some understanding of how to design decision-making processes that are broadly inclusive, collaborative, and oriented towards transformative learning. For the purposes of this study, the most useful collaborative planning research has given us analytical frameworks that SSP scholars and practitioners can use to evaluate, characterize and design decision-making processes.

In this chapter, I provided Fung's (2006) Democracy Cube and Sterling's (2010-11) Orders of Learning and Change as staring points for analysis and process design. Fung's Democracy Cube integrates three generic dimensions of public participation: who participates, how participants communicate with one another and make decisions together, and how discussions are linked with policy or public action. Together, these dimensions illuminate the quality of participative processes. Sterling's Orders of Learning and Change parallels three levels of learning with three levels of change. First and second orders of learning involve doing things better and doing better things, respectively, while third order learning involves seeing things differently. In Chapter Four, I illustrate how Fung's and Sterling's frameworks can be combined to illuminate the links between decision-making processes, learning and social change.

But Fung's (2006) Democracy Cube Sterling's (2010-11) levels of learning do not offer a framework to assess whether our decision-making processes, learning and change constitute progress towards sustainability. Here is where the sustainability assessment scholarship complements collaborative planning research. Sustainability decision criteria developed by sustainability assessment scholars could be used alongside the typologies that I have described in order to guide deliberations, learning and decision outcomes.

3.6.4 The New Institutionalism

Institutional theory suggests that SSP practitioners should have some understanding of what human-made rules are, how they emerge, persist and change, and how they influence human and organizational behaviour. Scholars working within the three streams of institutional thought have tended to emphasize three different types of institutions: regulative (formal laws, formal decision-making processes, etc.), normative (standards, informal codes of conduct, etc.), and cognitive (symbols, beliefs, customs, etc.) (Scott, 2001). And they have developed many helpful concepts that increase our understanding of how and why institutions emerge, persist and change (see Hall & Taylor, 1996). These concepts include, notably, the notions of path dependency and increasing returns, actors' logics of instrumentality and appropriateness, diffusion or the process by which institutions spread across organizations and sectors, agency, bounded rationality, uncertainty, and social processes of renegotiation and reinterpretation.

The social-ecological resilience literature lends to institutional theory helpful concepts that depict how human-made rules interconnect and interact across scales, while sustainability

assessment scholars can help us to examine the extent to which our new ideas contribute lasting benefits to human and ecological well being. The contested, socially constructed, sticky nature of institutional systems compels us to take collaborative approaches to institutional design that offer opportunities for deliberation, critical reflection, learning and change.

In this study I use the New Institutionalism for two purposes. First, key concepts and insights from the three schools form part of the analytical framework, which is used to examine how SSP practitioners and citizens have been attending to societal change concerns. The second purpose is to investigate the contextual underpinnings of practice. In doing this, I aim to better understand why practitioners have or have not been attending to societal change towards sustainability concerns, as well as why citizens have been concerned with a particular range of issues and assets. This second purpose brings into sharp focus a range of socioeconomic, natural and built environment considerations that fall outside of the usual scope of institutional analysis. This study, therefore, contributes to our understanding of the strengths and limitations of institutional theory with respect to its ability to attend to the institutional, socioeconomic, ecological and built factors that shape local government SSP practice.

3.6.5 Lessons Learned from Local Government SSP about Effective Practice

The lessons learned from local government SSP practice reveal that we need a good understanding of the practical needs associated with creating and successfully implementing undertakings to move towards sustainability goals. Five general categories of practical needs have been emphasized: financial, political, administrative, governance and planning process. The local government SSP empirical research has shown that these needs play out in different ways, depending on the case and context, and there seems to be no magic bullet combination for success. Regardless of the contextuality of experience, the case research implies that practical enactment needs have critical implications for plan formulation processes. Specifically, a more holistic view of development and enactment stages is required, and so planning and scoping frameworks should help us to bridge the gap between plan formulation and implementation stages.

Together, key concepts and insights from the above-described bodies of literature illuminate a representative set of core requirements for SSP and scoping frameworks. Chapter Four is dedicated to discussing how these concepts and insights can be brought together in an evaluative framework that scholars can use to investigate the community-scoping step in local government SSP specifically.

Chapter Four: Analytical Framework

In this chapter I present the analytical framework used in this study. Each body of research reviewed in Chapter Three (sustainability assessment, resilience theory, collaborative planning, the New Institutionalism, and lessons learned from local government SSP experience about effective SSP practice) is reviewed in terms of how it informs an understanding of the basic considerations of SSP in any context. In doing this, I delineate some key ideas that best represent the respective contributions of each field in these respects, and I discuss how they overlap and complement each other in ways that affect how they should be combined in an evaluative framework.

From this discussion emerges an integrated set of generic content and process concerns of SSP that form the analytical framework (see section 4.2). Scholars and practitioners respectively will be able to use this framework to evaluate aspects of SSP undertakings in any sector and practitioners can use it to guide SSP initiatives, including the scoping step.

For the purposes of this study, the generic considerations that form the integrated evaluative framework need to be specified and teased apart in order to analyze different aspects of the community-scoping step in local government SSP. This specification step elaborates on the general concerns of SSP by elucidating the context-specific matters they should cover. In section 4.3, I illustrate how this should be done for the purposes of this study.

Finally, in section 4.4 I discuss the concepts from the New Institutionalism that I use to investigate the contextual underpinnings of prevailing community-scoping practices.

4.1 What Are The Generic Concerns of Strategic Sustainability Planning?

The bodies of research that I reviewed in Chapter Three can be discussed in terms of what they tell us about the ideal contents and processes for SSP and scoping frameworks, considering both plan formulation and enactment environments. In the sub-sections that follow, I organize the discussion according to content and process categories, and in each category I consider both plan creation and enactment environments.

4.1.1 Generic Content Concerns of SSP, Considering the Plan Formulation Environment

The decision criteria that sustainability assessment researchers have delineated can be conceptualized as the broad categories of concern that SSP and scoping frameworks should cover. They represent the essential considerations that should guide our investigation of the plan enactment environment and inform our SSP goals. As I previously described, sustainability assessment scholars have created many different sets of decision criteria. I begin with a generic set developed by Gibson et al. (2005). As Gibson et al. note, they integrate considerations from a range of fields including complex systems theory, corporate greening undertakings, and growth management planning, among others. While they have been widely recognized in the sustainability assessment field, this study contributes to our understanding of their utility in an

urban planning/SSP context. Box 4, below, presents Gibson et al.'s decision criteria.

Box 4 Gibson et al.'s (2005) Generic Sustainability Decision Criteria

1. Socio-ecological system integrity: Build human-ecological relations to establish and maintain the long-term integrity of socio-biophysical systems and protect the irreplaceable life support functions upon which human as well as ecological well-being depends.

2. Livelihood sufficiency and opportunity: Ensure that everyone and every community has enough for a decent life and that everyone has opportunities to seek improvements in ways that do not compromise future generations' possibilities for sufficiency and opportunity.

3. Intragenerational equity: Ensure that sufficiency and effective choices for all are pursued in ways that reduce dangerous gaps in sufficiency and opportunity (and health, security, social recognition, political influence, etc.) between the rich and the poor.

4. Intergenerational equity: Favour present options and actions that are most likely to preserve or enhance the opportunities and capabilities of future generations to live sustainably.

5. Resource maintenance and efficiency: Provide a larger base for ensuring sustainable livelihoods for all while reducing threats to the long-term integrity of socio-ecological systems by reducing extractive damage, avoiding waste and cutting overall material and energy use per unit of benefit.

6. Socio-ecological civility and democratic governance: Build the capacity, motivation and habitual inclination of individuals, communities and other collective decision making bodies to apply sustainability requirements through more open and better informed deliberations, greater attention to fostering trust, reciprocal awareness and collective responsibility, and more integrated use of administrative, market, customary and personal decision making practices.

7. Precaution, adaptation, and innovation: Respect uncertainty, avoid even poorly understood risks of serious or irreversible damage to the foundations for sustainability, plan to learn, design for surprise and manage for adaptation.

8. Immediate and long-term integration: Apply all principles of sustainability at once, seeking mutually supportive benefits and multiple gains.

(pp. 88-121)

Similar to these decision criteria, the attributes of resilient systems that social-ecological resilience researchers have defined can be employed as broad categories of concern that should frame planning and analysis. I presented Walker and Salt's (2012) attributes of a resilient world in section 3.2. These attributes constitute a revised set that build on the original set published in Walker and Salt's (2006) *Resilience Thinking*. The amended 2012 version represents the authors' response to critiques from sustainability scholars and other commentators, notably with respect to their insufficient attention to the participative and distributive dimensions of social-ecological systems (e.g., Hornborg, 2009). Indeed, when examined closely against Gibson at al.'s (2005)

criteria, it becomes evident that Gibson et al.'s criteria provide comprehensive coverage of Walker and Salt's (2012) attributes.

To elaborate, Gibson et al.'s (2005) "social-ecological system integrity" criterion, which emphasizes protecting the integrity of vital social-ecological systems, overlaps with Walker and Salt's (2012) "diversity" and "ecosystem services" criteria in that the latter are integral to achieving the former. In this regard, however, Walker and Salt contribute helpful particulars by listing the different types of diversity that should be maintained and by suggesting that ecosystem services should be recognized in decision making. There are still other areas of cohesion. For example, Walker and Salt's "ecological variability", "modularity", "acknowledging slow variables" and "tight feedbacks" properties are consonant with Gibson et al.'s wish to maintain the long-term integrity of social-ecological systems. Again, Walker and Salt's main contribution is that they sketch out in greater detail the system properties that constitute social-ecological system integrity. But Gibson et al.'s notion of "social-ecological system integrity" is essentially synonymous with the notion of social-ecological resilience. As Gibson et al. have put it:

> "For sustainability, the objective is not to prevent system change but to organize and manage our activities so that the changes we influence still preserve the system conditions and services upon which we rely. That means preserving the 'integrity' of systems – their ability to adjust and reorganize in ways that maintain their key functions" (p. 96).

The latter bit of this quote represents another way of defining social-ecological resilience. Furthermore, Gibson et al.'s (2005) devotion to broad participation in decision making attends to Walker and Salt's (2012) "overlap in governance" attribute in that both seek to employ a range of forms of decision making (public, private, civil society, individual) to pursue sustainability goals. Walker and Salt's "social capital" property is represented by Gibson et al.'s "social-ecological civility and democratic governance" criterion in that the latter emphasizes building capacity, fostering trust, responsive leadership and multi-stakeholder governance networks – all of which serve adaptive capacity. Similarly, the ideas housed in Gibson et al.'s "precaution, adaptation, and innovation" principle overlap with the resilience notions of adaptation and innovation in that both stress that, in a complex systems context, there is a need for dynamic responses to stresses and opportunities in planning processes. Moreover, both are undergirded by a desire to shift development trajectories away from dangerous thresholds towards more positive futures. Walker and Salt's idea to recognize important ecosystem services is inherent in Gibson et al.'s "resource maintenance and efficiency" principle. Both set out an important prerequisite for a more sustainable system of production and consumption in market-driven economies. Where Gibson et al. aim to reduce extractive damage, avoid waste and cut overall material and energy use, Walker and Salt seek to recognize unpriced ecosystem services. Both relate to how we perceive vital ecological goods and services, considering the limits of nonrenewable ones. Finally, Walker and Salt's "fairness" property is covered by Gibson et al.'s "livelihood sufficiency" and "equity" criteria, and the attribute of "humility" is covered by Gibson et al.'s principle of "precaution and adaptation". Again, Walker and Salt inject a specific concern for fair trade in connection with equity and, with respect to precaution and adaptation, they elaborate on the things that we should all learn about.

The main contribution of social-ecological resilience theorists to our understanding of what is required in SSP is that they have developed some helpful concepts to explain the dynamics of complex social-ecological systems. These dynamics represent complex systems realities that we should identify in our investigation of the plan formulation environment. Notably, resilience scholars would dedicate a direct concern to identify controlling system variables, dangerous and more promising thresholds, and associated shifts into more or less desirable social-ecological futures, while considering the multiple interconnected scales at which these dynamics play out.

These three resilience concepts (controlling variables, thresholds, and alternative futures) and the multi-scale context within which they unfold entrain the other key resilience concepts described in the literature review. For example, the concepts of cascading effects and regime shifts are corollaries to the notion of thresholds in that systems that cross a critical threshold of a controlling variable may flip into another regime or state of equilibrium, causing a domino effect or cascade of changes in systems at other scales. Similarly, the alternative futures or equilibrium state idea assumes that a shift has occurred, along with all of the positive and negative consequences that together form a new state of being. These three concepts, therefore, are most useful for the purposes of this study.

But what does all of this imply for the aim of this study to delineate a representative set of generic concerns of SSP? Because Gibson et al.'s (2005) generic decision criteria already cover a comprehensive suite of sustainability and resilience matters, they provide a good foundation into which the finer details of resilience dynamics and attributes can be incorporated. For the purposes of this study, I integrate these resilience details with the generic sustainability decision criteria in the specification step. This will be explained and presented in more detail, later, in section 4.3.

4.1.2 Generic Contents, Considering the Plan Implementation Environment

So far, I have discussed how sustainability decision criteria, resilience attributes and systems dynamics can be translated into generic concerns that can frame planning and analysis, considering the plan formulation environment. But these matters do not give us a sufficient understanding of what is required for the social change and effective implementation practice components of SSP, which compel us to investigate the plan implementation environment.

As I mentioned previously, the scoping step in SSP provides the basis for strategic goals. Once our SSP goals have been created we must have some understanding of their implications for incumbent systems. As I noted in Chapter Three, sustainability assessment scholars have tended to concentrate on elucidating generic sustainability decision criteria and prescriptions for processes and thus important questions remain about the broader institutional implications of sustainability assessment contents, processes and decision outcomes. Here is where the New Institutionalism, resilience theory, and lessons learned about effective SSP practice inform our understanding of the basic concerns of SSP, especially with respect to the plan implementation environment. In the paragraphs that follow, I discuss the key contributions of these fields of study, respectively, beginning with the New Institutionalism.

New Institutional theorists have increased our understanding of how SSP goals might fit in with and/or be rejected by established modes of thinking and practice. We can use these ideas to structure our investigation of plan enactment conditions. For example, in contrast to sustainability assessment and resilience scholarship, insights from the New Institutionalism imply that effective implementation of sustainability goals must depend partly on the way that we consider the formal and informal rules that they might challenge as well as the ones that they could potentially leverage. In other words, planning for social change requires a good understanding of the systemic realities that might facilitate and/or impede the institutionalization of desired adjustments. Here, Scott's (2001) categorization of institutions is helpful in that it directs our attention to the range of formal and informal rules that comprise plan formulation and enactment environments. They represent the different types of constraints and enablers that we should consider in the scoping step. Table 7 below presents Scott's categorization of institutions.

Table 7 Three Pillars of Institutions

Regulative	Normative	Cognitive
-Formal laws and rules -Contractual obligations -Formal systems of power and governance -Formal protocols and standards	-Norms -Values -Informal social obligations -Informal systems of power and authority -Roles (e.g., job definitions)	-Shared beliefs and customs -Shared mental models -Identities -Symbols

(Adapted from Scott, 2001, p. 77)

Scott's (2001) categorization of institutions explains what institutions are, but it does not explain how institutions emerge, persist, change and influence human behaviour. New Institutionalist concepts that explain these dynamics pertain to the implementation environment because they provide clues about how practitioners might adjust established ways of doing things. They include the following concepts, which were explained in Chapter Three:

- Agency,
- Bounded rationality (including uncertainty),
- Path dependency,
- Renegotiation and reinterpretation,
- Diffusion,
- Logic of instrumentality, and
- Logic of appropriateness.

Devoting attention to the notion of agency would encourage practitioners to identify which actors would be best positioned to affect established structures in order to implement new ones. Similarly, in addressing the logics of instrumentality and appropriateness practitioners would gain a better understanding the interests and motivations of key stakeholders. Exploring these interests should inform the way in which we enact our sustainability goals. Attending to the

notion of bounded rationality, including uncertainty, would give practitioners a deeper understanding of the formal and informal rules that may hinder and/or encourage the embedment of new ideas. By addressing path dependent effects, practitioners could gain valuable insights into the historic roots of and interconnections between different established ways of doing things as well as anticipate the effects of new ways. Incorporating the notions of renegotiation and reinterpretation would emphasize the identification and purposeful creation of openings for participative decision making, which should allow for a critical examination of alternatives. In attending to diffusion practitioners would be encouraged to ensure that their new ideas are supported by key organizations in the community.

There is complementary overlap between New Institutional theory and resilience scholarship with respect to our understanding of how institutions behave. Where New Institutionalists have concentrated on the links between institutions, people, and socioeconomic systems, resilience scholars have underscored the complex, multi-scale systems dynamics that ultimately influence social-ecological systems change. The following insights from resilience theory (see Gunderson & Holling, 2002) direct our attention towards the complex systems context within which human-made rule systems reside:

- Panarchy,
- Adaptive cycle,
- Controlling variables,
- Thresholds,
- Cascading effects,
- Regime shifts,
- Alternative stable states,
- Transformation, and
- Adaptation.

A consideration of complex systems dynamics in scoping would give practitioners much needed insight into the multi-scale implications of particular sustainability goals as well as how they could be best implemented in light the complexities of established ways of thinking and practice. As previously explained, the concepts of controlling variables, thresholds and alternative futures entrain the other key resilience concepts listed above. With respect to understanding the plan enactment environment, however, the notion of thresholds is especially useful in that it encourages us to think about how our goals might contribute to positive change and entrain multiple positive effects at different levels. The threshold concept, therefore, is most useful in this regard. The notions of adaptability and transformability provide useful overarching themes that can frame our analyses. From this standpoint, the specific issues, assets, constraints and enablers that we identify can be reinterpreted as things that constitute the adaptive and transformative potential of an organization and/or community.

The above-mentioned ideas from the New Institutionalism and resilience theory, however, provide little insight into the practical needs associated with effective enactment. Here is where the lessons learned from SSP practice can be combined with our understanding of institutional dynamics, constraints and enablers. In section 3.5 of the literature review I provided a table that lists the different categories of practical requirements (financial, political, administrative, governance, and planning process) that we should consider in our investigations of the plan

enactment environment.

But what does all of this suggest about the generic concerns of SSP? The above described social change concepts and practical needs categories are too elaborate for a useful set of generic SSP criteria. But they can be distilled into a general concern to attend to the implementation environment, notably the real-world constraints, enablers and practical needs associated with operationalizing sustainability goals in complex dynamic institutional contexts. In practice, attending to these kinds of concerns in analysis should help to ensure that our SSP initiatives enable the emergence of policy innovations, novel approaches to development, new interactions between governments and citizens, and alternative administrative structures and processes, among other things.

Gibson et al.'s (2005) generic sustainability decision criteria are essentially amenable to these considerations in that they recognize the links between multiple scales, systems, and generations. Moreover, they embrace the notion of "immediate and long-term integration" by asking us to "Apply all principles of sustainability at once, seeking mutually supporting benefits and multiple gains" (p. 118). Thus, for the purposes of this study, Gibson et al.'s criteria provide an opening to incorporate greater attention to these enactment realities, which are essentially institutional in nature. Using Gibson et al.'s (2005) generic decision criteria as a starting point, the above-discussed ideas can be addressed in the specification step.

Below, I turn to a discussion of generic SSP process principles, considering both plan formulation and enactment environments.

4.1.3 Generic Processes, Considering Plan Formulation and Enactment Environments

In Chapter Three (see Box 2) I explained the best practice principles for assessment processes, as prescribed by sustainability assessment scholars. These principles explain what the plan formulation process within which the scoping step is nested should entail. To remind the reader, the following best practice principles should apply:

- Early adoption of the concept of sustainability and consistent application of sustainability criteria throughout the planning process;
- Comprehensive consideration of sustainability concerns;
- Attention to context;
- Attention to alternatives and trade offs;
- Integration; and
- Broadly inclusive public participation.

It is important to note that there is inevitable overlap between the ideal SSP contents and processes that I provide in this study. For example, Gibson et al.'s (2005) generic decision criteria attend to important participative process concerns, namely with the "social-ecological civility and democratic governance" criterion. There are also complementarities between collaborative planning and sustainability assessment scholarship in the emphasis on broadly inclusive public participation. Collaborative planning scholars would place more emphasis on deliberation and critical reflection, which are not evident in the above best practice principles. I

address this issue in creating the integrated analytical framework in section 4.2, below.

Furthermore, for the purposes of this study, the basic requirement for broadly inclusive public participation calls for an understanding of process design. The above principles for best practices, however, are too general to provide such guidance. But they can be used in combination with Gibson et al.'s (2005) initial generic decision criteria as the basis for further elaboration of process design. I address this specification issue later, using Fung's (2006) Democracy Cube and Sterling's (2010-2011) levels of learning and change.

So far, I have isolated some key ideas that represent the respective contributions of each field of research that I reviewed in Chapter Three in terms of what they tell us about the basic concerns of SSP in any context. In section 4.2, below, I discuss how these ideas could be integrated in an evaluative framework for the purposes of this study.

4.2 The Integrated Analytical Framework

Needed for this study is an analytical framework comprised of the core generic (content and process) concerns of SSP, considering plan formulation and implementation environments. These are the concerns that planning and scoping frameworks should cover in all types of SSP. In this study, I explore how they can be integrated in a framework for evaluating community-scoping practice in local government SSP specifically.

Gibson et al.'s (2005) generic decision criteria are used as the foundation for creating the analytical framework because they attend to a comprehensive suite of sustainability concerns and resilience attributes that can guide analysis and decision making in any context. However, as I explained above, for the purposes of this study Gibson et al.'s decision criteria should be adjusted in order to give more direct attention to

- the institutional dimensions of SSP, especially in relation to social change and the implementation environment,
- the practical needs associated with implementing SSP goals, and
- learning and institutional change, notably with respect to the design of collaborative decision-making processes.

Box 5, below, presents the generic concerns of SSP, adapted from Gibson et al.'s (2005) original set.

Box 5 The Core Generic Concerns of Strategic Sustainability Planning

1. Socio-ecological system integrity: Build human-ecological relations to establish and maintain the long-term integrity of socio-biophysical systems and protect the irreplaceable life support functions upon which human as well as ecological well-being depends.

2. Livelihood sufficiency and opportunity: Ensure that everyone and every community has enough for a decent life and that everyone has opportunities to seek improvements in ways that do not compromise future generations' possibilities for sufficiency and opportunity.

3. Intragenerational equity: Ensure that sufficiency and effective choices for all are pursued in ways that reduce dangerous gaps in sufficiency and opportunity (and health, security, social recognition, political influence, etc.) between the rich and the poor.

4. Intergenerational equity: Favour present options and actions that are most likely to preserve or enhance the opportunities and capabilities of future generations to live sustainably.

5. Resource maintenance and efficiency: Provide a larger base for ensuring sustainable livelihoods for all while reducing threats to the long-term integrity of socio-ecological systems by reducing extractive damage, avoiding waste and cutting overall material and energy use per unit of benefit.

6. Socio-ecological civility and democratic governance: Build the capacity, motivation and habitual inclination of individuals, communities and other collective decision making bodies to apply sustainability requirements through more open, more collaborative and better informed deliberations, greater attention to fostering trust, reciprocal awareness, collective responsibility, social learning and social change, and more integrated use of administrative, market, customary and personal decision making practices.

7. Societal change: Ensure that planning and decision-making processes are designed to increase our understanding of the formal and informal institutions (laws, norms, values, beliefs, etc.) that enhance and/or diminish our capacity to pursue and apply sustainability requirements in all aspects of society.

8. Precaution, adaptation, and innovation: Respect uncertainty, avoid even poorly understood risks of serious or irreversible damage to the foundations for sustainability, plan to learn, design for surprise and manage for adaptation.

9. Immediate and long-term integration: Apply all principles of sustainability at once, seeking mutually supportive benefits and multiple gains.

10. Effective Implementation: Ensure that planning and decision making devote early attention to the practical needs and institutional constraints and enablers associated with pursuing the personal, organizational and broader systemic adjustments required to make progress towards sustainability.

As Box 5 shows, more emphasis on collaboration, social learning and social change was incorporated in the "social-ecological civility and democratic governance" criterion. An additional broad category, "social change", was incorporated in order to better emphasize the institutional dimensions of sustainability. Finally, an "effective implementation" concern was inserted in order to devote adequate attention to the plan implementation environment,

specifically with respect to giving early attention to the practical needs and systemic constraints and enablers associated with pursing social change towards sustainability.

These basic decision criteria should be accompanied by the following best practice principles for SSP processes:

- Early adoption of the concept of sustainability and consistent application of sustainability criteria throughout the planning process;
- Comprehensive consideration of sustainability concerns, including social change and implementation matters;
- Attention to context;
- Attention to alternatives and trade offs;
- Integration; and
- Broadly inclusive collaborative decision-making processes that encourage deliberation, critical reflection, learning and change.

Similar to how Gibson et al.'s (2005) initial criteria were revised, these best practice principles were adjusted to give more attention to social change and implementation concerns as well as collaboration, critical reflection and learning.

These content and process concerns can be used by scholars to evaluate aspects of SSP and practitioners can employ them to structure SSP and scoping frameworks. But they do not provide enough detail about the specific matters that should be addressed in planning for social change towards sustainability in a particular context. In the specification step we can look more closely at the finer details.

In section 4.3, below, I explain how the specification step elaborates on these core generic content and process concerns of SSP.

4.3 Specifying the Analytical Framework

In this section, I clarify three key things about the specification step. First, in sub-section 4.3.1 I describe the purpose of specification and illustrate the analytical framework (see Figure 3). In sub-section 4.3.2 I demonstrate how the analytical framework should be specified for scholars' evaluations of the community-scoping step and local government SSP initiatives. Finally, in sub-section 4.3.3 I describe how different parts of the analytical framework are used in this study to examine different aspects of the community-scoping step.

4.3.1 The Purpose of Specification

As I explained in Chapter Three, the specification of generic sustainability decision criteria is a basic feature of sustainability assessment (Gibson, 2006b; Gibson et al., 2008). Because I use the generic (content and process) concerns of SSP to examine the community-scoping step in a range of local government SSP undertakings, I specify the analytical framework any local government SSP context in Canada.

For the purposes of this study, three key considerations should influence the specification step. First, specification should bear in mind the intent of community scoping to better understand community conditions and potential development trajectories. These community conditions can be conceptualized in resilience terms, using the three main resilience concepts that I delineated earlier: controlling variables, thresholds, and alternative stable states. For each generic category of SSP concern, community scoping should attend to these resilience matters.

Secondly, community scoping in local government SSP calls for an approach to specification that attends to all relevant areas of planning that fall under municipal responsibility or within the scope of a particular undertaking. Municipal organizations have tended to divide these areas of planning along departmental lines (e.g., transportation, housing, parks and recreation, etc.). One key aim of community scoping and SSP, however, is to engender a more integrated understanding of community systems. Structuring the specification step around the planning activities that are common across municipal departments can foster a more integrated view. These common activities include development undertakings, uses of land, uses of public revenue, policy and plan formulation and implementation, and frameworks for decision-making and analysis.

Finally, for the purposes of this study the specification step should be structured around plan formulation and plan implementation concerns, as well as content and process elements. Here is where the specifics associated with decision-making process design, social change matters (institutional constraints and enablers), and practical implementation needs extend logically from the core generic concerns of SSP.

Figure 3, below, depicts the analytical framework, including the specification step. Then, sub-section 4.3.2 illustrates how the generic concerns of SSP should be specified for the purpose of examining community-scoping practice in local government SSP.

Figure 3 Framework for Analysing Municipal Government SSP Initiatives

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┌─────────────────┐                ┌─────────────────┐                 ┌─────────────────┐
│  Concepts and   │  Integration   │  Core Generic   │ Specification   │   Municipal     │
│ Insights from   │ ─────────────▶ │  Concerns of    │ ─────────────▶  │  Government     │
│   Literature    │                │      SSP        │                 │  SSP Concerns   │
└─────────────────┘                └─────────────────┘                 └─────────────────┘
         │                                  │                                   │
         ▼                                  ▼                                   ▼
┌─────────────────┐                ┌──────────────────────┐            ┌─────────────────┐
│  Sustainability │                │ -Social-ecological    │            │    Contents     │
│   Assessment    │                │   system integrity    │            └─────────────────┘
└─────────────────┘                │                       │               ╱         ╲
                                   │ -Livelihood          │              ╱           ╲
┌─────────────────┐                │  sufficiency         │    ┌──────────────┐  ┌──────────────┐
│   Resilience    │                │  and opportunity     │    │    Plan      │  │    Plan      │
│     Theory      │                │                       │    │ formulation  │  │implementation│
└─────────────────┘                │ -Intragenerational   │    │ environment  │  │ environment  │
                                   │  equity              │    └──────────────┘  └──────────────┘
                                   │                       │           │                 │
┌─────────────────┐                │ -Intergenerational   │           ▼                 ▼
│    The New      │                │  equity              │    ┌──────────────┐  ┌──────────────┐
│ Institutionalism│                │                       │    │  Specific    │  │Specific needs,│
└─────────────────┘                │ -Resource maintenance│    │sustainability│  │ constraints & │
                                   │  and efficiency      │    │and resilience│  │   enablers   │
                                   │                       │    │   matters    │  └──────────────┘
┌─────────────────┐                │ -Social-ecological   │    └──────────────┘
│  Collaborative  │                │  civility and        │           │
│    Planning     │                │  democratic governance│          ▼
└─────────────────┘                │                       │    ┌─────────────────┐
                                   │ -Social change       │    │    Processes    │
                                   │                       │    └─────────────────┘
┌─────────────────┐                │ -Precaution,         │           │
│  Lessons from   │                │  adaptation,         │           ▼
│  SSP Practice   │                │  and innovation      │    ┌─────────────────┐
└─────────────────┘                │                       │    │ Decision-making │
                                   │ -Immediate and       │    │ process design  │
                                   │  long-term           │    │    choices      │
                                   │  integration         │    └─────────────────┘
                                   │                       │
                                   │ -Effective           │
                                   │  implementation      │
                                   └──────────────────────┘
```

Figure 3 depicts the (a) the five bodies of research upon which the analytical framework rests, (b) the core generic concerns of SSP, which represent an integrated set of key insights from these five fields, and (c) the specified framework, including particular contents, processes and plan formulation and implementation matters.

4.3.2 Specifying the Analytical Framework for Local Government SSP

Three specification steps are needed. First, the core generic concerns of SSP should be specified for the local government SSP context and for investigating the context-specific conditions that community-scoping frameworks should cover in relation to the plan formulation environment. Box 6, below, demonstrates how the core generic concerns should be specified for the local government SSP context and, more specifically, for the purpose of examining the community conditions that community-scoping frameworks have covered. These community conditions are the locally specific matters that, in practice, should provide the basis for SSP goals.

Box 6 Local Government-Specific Concerns of SSP

The community-scoping step should seek to better understand the key controlling variables and associated (positive and negative) thresholds and potential (positive and negative) alternative future conditions for each of the following generic concerns of SSP:

1. Socio-ecological system integrity

2. Livelihood sufficiency and opportunity

3. Intragenerational equity

4. Intergenerational equity

5. Resource maintenance and efficiency

6. Socio-ecological civility and democratic governance

7. Societal change

8. Precaution, adaptation, and innovation

9. Immediate and long-term integration

10. Effective Implementation

In exploring these matters, the community-scoping step should consider (for each generic concern) the impacts that all types of development, uses of land, uses of public revenue, PPPs, frameworks for decision making and analysis have on all relevant areas of municipal planning including (but not limited to) the following: air, soil and water quality and quantity, farmland quality and quantity, food security, governance capacity, local government administrative capacity, community adaptive capacity, individual and household incomes, local economic systems, physical infrastructure systems, healthcare systems, greenspace, recreation systems, arts and culture, natural habitat systems.

Scholars can use these local government-specific concerns of SSP to examine the matters that community-scoping framework have covered in investigating community conditions or the plan formulation environment. The main assertion of this analytical approach is that, in practice, community scoping should aim to identify the locally specific issues and assets associated with each generic concern of SSP, while devoting attention to all relevant areas of local government planning. The investigation should expose the drivers of these issues and assets as well as associated dangerous and promising thresholds and potential development trajectories. These resilience matters relate to the three key resilience concepts that I identified earlier: controlling variables, thresholds, and potential alternative futures.

The second specification step attends to the matters that community-scoping frameworks should cover in order to better understand the plan enactment environment or social change and implementation concerns. These matters relate primarily to the generic concerns of "social change", "immediate and long-term integration", and "effective implementation". They are elaborated by Scott's (2001) categorization of institutions, other concepts from institutional theory, the practical needs associated with effective implementation, and attention to multi-scale interconnections, notably positive thresholds. Table 8 below specifies the social change considerations and Table 9 specifies the practical implementation needs.

Table 8 Local Government-Specific SSP Social Change Concerns

For each goal created, the community-scoping step should consider the community-specific regulative, normative and cognitive factors that may constrain and/or enable successful implementation, while also devoting attention to multiple scales of influence and interaction and positive threshold effects.

Broad Implementation Concern Categories	Community-Specific Implementation Concerns
Regulative constraints and enablers (laws and rules, contractual obligations, formal systems of power and governance, formal protocols and standards, etc.)	-Municipal, regional, provincial, federal legislative frameworks -Engineering standards, building codes -Resource extraction protocols -Local, regional, provincial decision-making processes -Etc.
Normative constraints and enablers (norms, values, informal social obligations, informal systems of authority, roles, etc.)	-Informal building standards -Informal relationships of power between members of business community and local government -Informal farming practices -Informal resource extraction practices -Etc.
Cognitive constraints and enablers (shared beliefs and customs, shared mental models, identities, symbols, etc.)	-Decision-making frameworks -Personal beliefs, habits, customs -Collective beliefs, habits, customs -Worldviews, scientific paradigms, planning paradigms -Views about appropriate roles of planners, politicians, citizens -Etc.
Practical needs (financial, political, administrative, governance, planning process)	-Municipal, regional, provincial finances needed -Local, regional, relationship networks needed -Specific actors and departments needed -Planning horizon and interaction with other planning cycles at different scales -Opportunities for participation needed at different levels -Etc.

Agency	Describe how the actors needed to implement each goal can leverage their positions to support and/or inhibit implementation.
Logic of appropriateness	Describe why relevant actors who may reject and/or support each goal, emphasizing their assumptions, beliefs and values.
Logic of instrumentality	Describe why relevant actors may reject and/or support each goal, emphasizing their social, economic and political interests.
Bounded rationality (including uncertainty)	Describe how the formal and informal rules that we identified may constrain and/or enable successful implementation.
Path dependency	Describe how the institutional constraints and enablers associated with each goal are interconnected in ways that support and/or inhibit implementation, including the socioeconomic costs of required adjustments.
Renegotiation and reinterpretation	Identify opportunities for discussing and negotiating our goals with relevant stakeholders.
Diffusion	Identify the organizations in our community and beyond that could support the implementation of our goals.

Table 9 Local Government-Specific SSP Implementation Concerns

For each goal created, consider the practical community-specific needs required for successful implementation, while also devoting attention to multiple scales of influence and interaction.

Practical Implementation Needs Categories	Community-Specific Implementation Needs
Financial needs	-Detailed budget associated with each goal -Implications of the costs for municipal budget
Political needs	-Identify local political champions -Identify provincial political champions
Administrative needs	-Identify internal champions in relevant departments at all levels -Identify internal management processes required for enactment -Identify needed expertise and training for implementation -Identify specific staff needed for day-to-day operationalization
Governance needs	-Identify champions in relevant private and community organizations in the community and beyond -Identify partners in other local governments -Identify partners in provincial government

	-Identify community champions
Planning process needs	-Create a long-term implementation timeline -Identify opportunities for multi-stakeholder collaboration -Identify opportunities to raise awareness of benefits of the goal

The third specification step concentrates on process design matters, which flow from the generic "social-ecological civility and democratic governance" and "societal change" criteria as well as the best practice principle about broadly inclusive collaborative decision-making processes. As Figure 4, below, shows, I adapt Fung's (2006) Democracy Cube to incorporate Sterling's (2010-11) levels of learning and change categories.

Figure 4 Democracy Cube with Levels of Learning

Extent of Authority

Direct Authority

Co-Govern

Advise/Consult

Communicative Influence

Individual Education

Deliberate and Negotiate

Aggregate and Bargain

Develop Preferences

Express Preferences

Scope of Participation

Mode of Communication

First Order Learning/Change

Second Order Learning/Change

Third Order Learning/Change

Expert Administrators

Professional Stakeholders

Randomly Selected

Open, Self Selected

Level of Learning & Change

As I noted in Chapter Three, Fung's (2006) democracy cube framework did not attend directly to the links between process design, learning and change. To fill this gap, therefore, I introduced some relevant research by Sterling (2010-11) which attends to learning and change in a way that is compatible with Fung's (2006) democracy cube. Dividing decision-making processes into these four dimensions can illuminate how certain design choices may influence the quality of public participation.

This ends my explanation of how the generic concerns of SSP should be specified for the purpose of analysing community scoping in local government SSP. In sub-section 4.2.3, below, I clarify how different parts of the analytical framework should be used to examine various aspects of community-scoping practice.

4.3.3 Applying the Analytical Framework

So far, I have integrated the central ideas from five pertinent fields of research into a set of generic concerns of SSP. Then, I demonstrated how these generic concerns should be specified for the purpose of analysing community-scoping practice in local government SSP. In this sub-section, I clarify which parts of the analytical framework I use to examine different aspects of community scoping. The analytical framework attends to the content and process components of community scoping. The content component devotes attention to the concerns that should be covered in investigations of the plan formulation and implementation environments. The process component covers the broader plan formulation context within which community scoping is nested and the decision-making processes employed in the community-scoping step specifically. Table 10 below summarizes how scholars should use the different parts of the analytical framework to evaluate the community-scoping step in local government SSP.

Table 10 Applying Different Parts of the Analytical Framework

Parts of the Analytical Framework	Focus of Analysis
Best practice principles for the plan formulation process, as adapted from the sustainability assessment literature (see sub-section 4.1.3)	-These best practice principles should be used to evaluate the wider plan formulation process within which the community-scoping step is nested.
Generic concerns of SSP, as adapted from Gibson et al. (2005) (see Box 5) Three key resilience concepts (thresholds, controlling variables, and alternative futures)	-These generic concerns should be used to evaluate the range of SSP concerns initially covered by the community-scoping frameworks.
-Local government-specific concerns of SSP (see Box 6), including three key resilience concepts (thresholds, controlling variables, and alternative futures)	-These concerns should be used to investigate the community-specific sustainability and resilience concerns elicited from the public through application of the community-scoping frameworks.
Local government-specific SSP social change and implementation considerations (see Tables 8 and 9), including multiple scales of influence, interaction and positive threshold effects.	-These concerns should be used to investigate the community-specific social change and implementation concerns that emerged from application of the community-scoping frameworks. These matters comprise the plan enactment environment.
Fung's (2006) Democracy Cube with Sterling's (2010-11) levels of learning (see Figure 4)	-These process design concerns should be used to examine the decision-making processes that were used to include the public in the community-scoping step.

As I mentioned in the Introduction and elsewhere, this study also seeks to deepen our comprehension of the contextual underpinnings of prevailing community-scoping practices. Section 4.4, below, explains how scholars can use concepts from the New Institutionalism for this purpose.

4.4 Investigating the Contextual Underpinnings of Practice

This thesis seeks to uncover the contextual underpinnings of community-scoping practice. For this purpose a separate analytical framework is required that can help us to better understand the range of contextual factors at play. In this study I use concepts from the New Institutionalism in this regard. Here, Scott's (2001) categorization of institutions is useful in that it represents the main types of institutions in a given setting. But other concepts are needed that explain *how* institutions influence community-scoping practice. Table 11 below presents the concepts from

the New Institutionalism that can be used to understand the contextual underpinnings of community-scoping practice.

Table 11 Key Explanatory Concepts from the New Institutionalism

Types of Institutions that Influence Practice	How Institutions Influence Practice
-Regulative (formal laws and rules, contractual obligations, formal systems of power and governance, etc.) -Normative (norms, values, informal social obligations, informal systems of authority, roles, et.) -Cognitive (shared beliefs and customs, shared mental models, identities, symbols, etc.)	-Agency -Bounded rationality (including uncertainty) -Path dependency -Diffusion -Renegotiation and reinterpretation -Logic of instrumentality -Logic of appropriateness

I explained these concepts in sub-section 4.1.2, above, as well as in Chapter Three. They relate primarily to the institutional context within which local government SSP and community scoping unfold. What is missing are the ecological and built contextual factors that might directly influence SSP undertakings. As I explained in the literature review, institutional theorists have generally not viewed built and natural systems as structural constraints – even though they may behave in the same way as institutions. This study, then, tests the limitations of the New Institutionalism's ability to attend to the built and natural environmental structural factors that may influence community-scoping practice.

In section 4.5, below, I turn to a summary of this chapter.

4.5 Summary

In this chapter, I explained the analytical framework that I used in this study. Scholars can employ this framework to analyse aspects of SSP and practitioners can use it to guide SSP initiatives. There were three key sections to this chapter. First, I considered how each body of research reviewed in Chapter Three (sustainability assessment, resilience theory, collaborative planning, the New Institutionalism, and lessons learned about effective SSP practice) informs our understanding of the generic concerns of SSP. This section set the ground work for an investigation of the concepts and insights that best represent the respective contributions of each field, and I discussed how they overlap and complement each other in ways that affect how they should be combined in an evaluative framework.

An integrated set of generic (content and process) concerns of SSP emerged from this discussion. Gibson et al.'s (2005) generic sustainability decision criteria provided an appropriate foundation because they cover a comprehensive suite of sustainability, resilience and participatory governance considerations. For the purposes of this study, however, three key enhancements

were made in order to give more direct attention to

- the institutional dimensions of SSP, especially in relation to social change and the implementation environment,
- the practical needs associated with implementing SSP goals, and
- learning and institutional change, notably in relation to the design of collaborative decision-making processes.

Box 5 presented the generic concerns of SSP, adapted from Gibson et al.'s (2005) original set. These basic decision criteria are accompanied by the following best practice principles for SSP processes, which were adapted from the sustainability assessment literature:

- Early adoption of the concept of sustainability and consistent application of sustainability criteria throughout the planning process;
- Comprehensive consideration of sustainability concerns, including social change and implementation matters;
- Attention to context;
- Attention to alternatives and trade offs;
- Integration; and
- Broadly inclusive collaborative decision-making processes that encourage deliberation, critical reflection, learning and change.

Together, these generic content and process concerns represent the considerations that SSP and scoping frameworks should cover in any context.

In the final section, I explained how these generic concerns should be specified to evaluate community-scoping practice in local government SSP in Canada. Three specification steps were needed. First, the generic concerns of SSP were specified for the local government SSP context and, more specifically, for investigating the matters that community-scoping frameworks should cover in relation to the plan formulation environment. As Box 6, showed, this specification step was also framed by three key resilience concepts (controlling variables, thresholds, and potential alternative future conditions) that direct our attention to the multi-scale dynamics of complex systems.

Second, concepts from the New Institutionalism and lessons from local government SSP practice were elaborated for the purpose of examining the context-specific social change and implementation considerations that community-scoping frameworks should cover in relation to the plan enactment environment. As Tables 8 and 9 showed, this specification step was structured around Scott's (2001) categories of institutions (regulative, normative and cognitive), concepts from the New Institutionalism that depict how institutions influence our behaviour, and the broad categories of practical needs associated with implementation.

Finally, process design matters were considered. Here is where Fung's (2006) democracy cube with Sterling's (2010-11) levels of learning and change were used to elucidate the quality of decision-making processes (see Figure 4).

Sub-section 4.3.3 served to clarify which parts of the analytical framework should be applied in order to examine different aspects of community scoping in local government SSP (see Table 10).

Best practice principles for the plan formulation process should be employed to evaluate the broader plan formulation process within which the community-scoping step is nested.

The generic concerns of SSP and the three key resilience concepts (controlling variables, thresholds, alternative futures) should be used to evaluate the range of SSP concerns initially covered by community-scoping frameworks.

The local government-specific concerns of SSP, including the three key resilience concepts, should be applied to investigate the context-specific sustainability and resilience concerns that were elicited from the public through application of the community-scoping frameworks. Local government-specific SSP social change constraints and enablers, implementation needs and a concern for multiple scales of interaction and positive threshold effects should be used to investigate the place-specific social change and enactment matters that community-scoping frameworks covered though application.

Fung's (2006) democracy cube with Sterling's (2010-11) levels of learning and change should be employed to examine the decision-making processes that community-scoping frameworks employed to include the public.

Finally, section 4.4 set out the concepts from the New Institutionalism that I used to investigate the contextual underpinnings of prevailing community-scoping practice. Table 11 presented these concepts, which depict different types of institutions as well as how human-made rules emerge, persist, change and influence human endeavours.

Chapter Five: Research Design

In this chapter, I provide the research questions, explain the methods that were used in the different research stages and steps, and describe the study biases and limitations.

5.1 Research Questions

In this thesis, I asked the following core research question:

1. What is the condition of local government SSP in Canada?

This question called for an analytical framework comprised of a representative set of generic content and process concerns of SSP. The first research question, therefore, was accompanied by one sub-question that was essentially theoretical. It identified the fields of study upon which the analytical framework was built and inquired into what these fields tell us about the essential aspirations of SSP in any context:

(a) What are the generic (content and process) concerns of SSP, as suggested by sustainability assessment, resilience theory, collaborative planning, the New Institutionalism and local government SSP case experiences?

I addressed this theoretical sub-question in Chapters Three and Four, which led to the analytical framework. In Chapter Three I provided a review of the academic literature and practitioner publications. This review relied on influential peer-reviewed books and articles, overview books and articles, supplementary academic articles, and reports published by consulting companies, government agencies and government organizations. In Chapter Four, I developed the analytical framework based on key concepts and insights from these academic and practitioner works.

An evaluation of all of the stages and steps in local government SSP would have created the most comprehensive depiction of prevailing practices; however, it was beyond the scope of this study to adopt such an all-inclusive approach. Rather, as previously explained, this dissertation aspired to depict the overall condition of local government SSP by evaluating the community-scoping step, which occurs in the plan formulation stage of the SSP cycle. For this purpose, four empirical sub-questions, 1(b) to 1(e), were asked:

(b) What best practice principles did the plan formulation process cover in a range of local government SSP initiatives in Canada?

(c) What generic SSP concerns did the community-scoping frameworks initially cover?

Sub-question 1(b) aimed to generate an understanding of the wider plan formulating process within which the community-scoping step was nested in each initiative, while sub-question 1(c) concentrated intently on the community-scoping frameworks that were used.

Because community scoping is a participatory process dedicated to understanding the local context, sub-questions 1(d) and 1(e) sought to investigate the place-specific SSP concerns that were elicited from the public and how the public was included in the community-scoping step, respectively:

> (d) Relative to a representative set of local government-specific (content and process) SSP concerns, what place-specific issues were elicited from the public through community scoping?

> (e) How did practitioners include the public in the community-scoping step?

This thesis also sought to uncover the contextual factors that shaped prevailing community-scoping practices. This objective called for an analytical framework that could explain the contextual underpinnings of community-scoping contents and processes. In this regard, key concepts from the New Institutionalism were used, as indicated by the following question:

> 2. Using key concepts from the New Institutionalism, what contextual factors influenced prevailing community-scoping practices?

The empirical research proceeded according to two key research stages, described in section 5.2, below.

5.2 Empirical Research Stages and Steps

The methodological approach and methods employed in this study are based, in part, on the methods used in similar studies (e.g., Berke & Conroy, 2000; Warner, 2002; Pearsall & Pearce, 2010). In these studies, the general approach used was to determine the unit of analysis (e.g., plans) and sample size, using population parameters. Then, an inventory phase was undertaken in which appropriate plans and/or local government sustainability initiatives were found, using Internet searches and other information sources. Finally, there was an evaluation using a particular analytical framework.

For the purposes of this dissertation, a qualitative methodological approach was adopted, using a multiple case, case study design. This research involved two key stages:

- An investigation of community-scoping practice, and
- An exploration of three cases.

The first stage involved three research steps:

- A Canada-wide search for municipal SSP initiatives/plans,
- An initial collection of basic qualitative data, and
- An in-depth evaluation of the applied community-scoping frameworks.

The second, case study stage aimed to expose the contextual underpinnings of community-

scoping practice. For this purpose, three cases were investigated, one in British Columbia, one in Alberta, and one in Ontario.

The following sections explain the purpose of each research stage and the methods used, including how the data were collected, analysed and reduced.

5.3 Stage One: Investigating Community-Scoping Practice

The investigation of community-scoping practice aimed to answer the empirical sub-questions, 1(b) to 1(e), provided above. It involved a Canada-wide search for municipal SSP initiatives, basic qualitative data collection, and an in-depth evaluation of the community-scoping step. Sub-sections 5.3.1 and 5.3.2, below, describe the methods that were used.

5.3.1 Canada-Wide Search for Municipal Strategic Sustainability Planning Initiatives

The goal of this step was to find as many cases of municipal SSP as possible in order to provide the basis for the qualitative data collection and in-depth analysis. The scope of the Canada-wide inventory extended around

- census subdivisions (CSDs) with 10,000-plus populations;
- English-speaking, non-First Nation municipalities;
- municipal governments;
- stand-alone SSPs; and
- corporate-level municipal government SSPs.

A CSD is "…the general term for municipalities (as determined by provincial/territorial legislation)…" (Statistics Canada, 2012). The 10,000-plus population frame ensured that the inventory would capture a diverse range of socioeconomic, geographic and built contexts across Canada, while remaining feasible with respect to the time that it would take to search all of the CSDs.

The search excluded Québec and French-speaking communities in other provinces in order to ensure the feasibility of the search and the analyses of the plans. All First Nation CSDs were also excluded because their populations were less than 10,000.

Population data from the 2011 census undertaken by Statistics Canada were used to identify appropriate CSDs. A total of 5,253 CSDs were found (Statistics Canada, 2011). These CSDs were organized in the database according to provincial and territorial categories. Table 12, below, presents the number of CSDs per province/territory arranged in order from greatest to least.

Table 12 Number of CSDs per Province/Territory

Province/ Territory	Total CSDs
QC	1,285
SK	959
BC	743
ON	574
AB	435
NL	376
MB	287
NB	273
PEI	113
NS	99
NT	41
YT	37
NU	31
Total CSDs	**5,253**

Québec CSDs, other French-speaking CSDs, First Nation CSDs and all other CSDs with populations of less than 10,000 were removed from the database, leaving 298 English-speaking, non-First Nation CSDs with populations of 10,000-plus. Table 13, below, depicts the number of CSDs included in the database per province/territory, arranged in order from greatest to least.

Table 13 Number of CSDs Included in the Database

Province/ Territory	Total CSDs
ON	143
BC	57
AB	44
NS	13
MB	11
NB	10
SK	9
NL	7
PEI	2
NT	1
YT	1
Total CSDs	**298**

Municipal government websites were searched for published, publicly accessible strategic sustainability plans (SSPs). The following search keywords were used consistently:

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- Community sustainability plan,
- Integrated community sustainability plan (ICSP),
- Sustainability strategy,
- Official plan, and
- Green plan.

In total, 216 SSPs were found. The highest number of plans was found in British Columbia, Ontario and Alberta. The lowest number was in the Atlantic Provinces, Saskatchewan, Manitoba, and the Northern Territories. Table 14, below, presents the number of plans that were found, from greatest to least across Canada.

Table 14 Number of Local Government SSPs Found

Province/Territory	Number of Plans
British Columbia	67
Ontario	67
Alberta	39
New Brunswick	11
Nova Scotia	8
Newfoundland	6
Saskatchewan	5
Manitoba	4
Prince Edward Island	4
Yukon Territory	3
Northwest Territories	2
TOTAL	**216**

Three main types of plans were found: Integrated Community Sustainability Plans, Official Municipal Plans, and other strategies (e.g., Green Plans, Sustainability Charters, Smart Growth Plans, etc.). Table 15, below, shows the total number of plans that were found per type.

Table 15 Types of SSPs Found

Province/ Territory	Integrated Community Sustainability Plans	Official Municipal Plans	Other Strategies
Alberta	11	11	17
British Columbia	6	30	31
Manitoba	1	2	1
New Brunswick	3	3	5
Newfoundland	6	0	0
Northwest Territories	0	0	2
Nova Scotia	6	1	1
Ontario	13	28	26
Prince Edward Island	2	2	0
Saskatchewan	0	4	1
Yukon Territory	1	1	1
TOTAL	**49**	**82**	**85**

The SSPs that met the selection criteria were included in the database. Box 7, below, presents the selection criteria.

Box 7 Local Government SSP Selection Criteria

1. The plan adopts a community-wide scope.
2. The plan is high-level and seeks to influence lower- and same-level plans, policies, etc.
3. The plan adopts a long-term perspective (5 years or over).
4. The plan explicitly adopts the concept of sustainability.
5. The plan sets out social, economic, and ecological objectives and goals.
6. The plan includes a description of community-specific concerns.
7. The objectives and goals seek to adjust aspects of community systems.
8. The planning process included input from the public.
9. The plan considers the implementation stage.
10. The plan was developed and approved by relevant authorities between the years 2000 – 2010.

These criteria rest on the definition of SSP provided earlier. The community-wide scope was aimed at capturing plans that set out goals for the community systems that fall under municipal responsibility (e.g., transportation, drinking water, waste, etc.) as opposed to goals that were more narrowly oriented towards the performance of a municipal organization. Many SSPs, for example, have focused solely on corporate sustainability goals, for example employees' use of natural resources as well as building design and fleet vehicle efficiencies, among other things.

The requirement for a high-level plan reflects the traditional aim of strategic planning to direct lower- and same-level plans, policies, and programmes. The concept of sustainability was expected to be explicitly present in the plans in order to be considered a type of SSP. The social, economic and ecological dimensions of sustainability relate to the integrative basis for sustainability planning. A description of community-specific concerns was required as this pertains to whether some form of community scoping was done. The institutional change component of SSP was covered by the criterion that asked the plans to include goals that seek to adjust aspects of community systems. As appropriate, the public participation criterion required the SSP process to include input from the public. Finally, some consideration for implementation was required as the basis for examining whether the community-scoping step extended around enactment concerns.

Sixty-five SSPs met the selection criteria (see Appendix A). Table 16, below, shows the total number of plans that met the selection criteria per Province and Territory, from greatest to least.

Table 16 Number of SSPs that Met Selection Criteria

Province/Territory	Number of Plans
British Columbia	20
Ontario	15
Alberta	10
Nova Scotia	6
New Brunswick	3
Newfoundland	3
Prince Edward Island	3
Yukon Territory	3
Northwest Territories	2
Manitoba	0
Saskatchewan	0
Total CSDs	**65**

Most of the selected plans that were from British Columbia, Ontario and Alberta, while the fewest number of plans was from the Atlantic Provinces and Northern Territories. Zero plans from Manitoba and Saskatchewan met the selection criteria. Most of the plans that met the selection criteria were Official Municipal Plans or Integrated Community Sustainability Plans. Table 17, below, depicts the number of different types of plans in the database.

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Table 17 Number of Different Types of Plans in Database

Province/ Territory	Integrated Community Sustainability Plans	Official Municipal Plans	Other Strategies
Alberta	5	3	2
British Columbia	4	13	3
New Brunswick	1	1	1
Newfoundland	3	0	0
Northwest Territories	0	0	2
Nova Scotia	5	1	0
Ontario	5	7	3
Prince Edward Island	1	2	0
Yukon Territory	1	1	1
TOTAL	**25**	**28**	**12**

Most of the plans that did not meet the selection criteria were approved after 2010 and/or they did not include a description of community context. Others were excluded because they did not include a description of implementation concerns, their timeframes were too short (less than 5 years), they had an inter-municipal or regional municipal focus, they did not set out goals, objectives, or strategies; and/or the concept of sustainability was not present in the plan.

All of the plans that met the selection criteria were organized in the database according to provincial and territorial categories. These were the plans that were included in the qualitative information collection step.

5.3.2 Basic Qualitative Data Collection

The basic qualitative data collection step aimed to answer sub-question 1(b): What best practice principles did the plan formulation process cover in a range of local government SSP initiatives in Canada? The goal of this data collection step was to generate a broad brushstrokes understanding of the wider plan formulation process within which the community-scoping step was nested in each SSP initiative – relative to some best practice principles, as explained in sub-section 4.1.3.

Once the database was completed, all of the plans were read and some basic qualitative information was collected about each plan. For each best practice category, questions were asked that prompted yes/no responses or short descriptive answers. Table 18, below, lists the questions asked for each best practice category.

Table 18 Focus of the Basic Qualitative Data Collection Step

Best Practice Category	Qualitative Data Collected
Early adoption of the concept of sustainability and consistent application of sustainability criteria throughout the planning process	-What definition of sustainability or resilience was adopted? -Were sustainability principles used to guide the plan formulation stage, including the community-scoping step?
Integration	-Was integrative thinking demonstrated in the plan? If so, how?
Alternatives and trade offs	-Were alternatives and trade-offs considered in plan formulation?
Broadly inclusive collaborative decision-making processes	-What methods were used to include the public? -How did the information elicited from the public influence the plan?
Consideration of social change and implementation matters in the plan formulation stage	-Were social change and implementation concerns incorporated in the plan formulation stage?
Best-Known Frameworks	-Was a best-known framework used to guide the plan formulation stage and the community-scoping step?

As Table 18 shows, it was noted whether a best-known SSP framework was used to guide the plan formulation stage and the community-scoping step. This concern for planning frameworks, however, was not included in the initial best practices provided in the literature review. Nonetheless, it was considered because SSP frameworks rest on ideas about what SSP should entail and thus they provide clues about different interpretations of best practices.

The 'attention to context' principle was not included in this data collection step because the act of community-scoping itself fulfills this best practice principle. Additionally, the 'comprehensive consideration of sustainability concerns, including social change and implementation matters' principle was not included because it was addressed in the in-depth analysis of community-scoping.

The selected plans were organized per province/territory in a Word file and the questions and findings were provided beneath each plan. Then, the data were reduced using Excel. One sheet was created per question and the results were entered per plan. The findings were then quantified. This quantification step included, for example, a calculation of the number of municipal SSP initiatives that exhibited integrative thinking, how many used best-known SSP frameworks, how many considered alternatives and trade offs, and how many incorporated a concern for implementation and social change, etc. Statistical analysis was not undertaken. Rather, only a simple quantification of the results was done.

5.3.3 In-Depth Analysis of Applied Community-Scoping Frameworks

Once the qualitative data were collected, an in-depth analysis of the community-scoping step was undertaken using the analytical framework set out in Chapter Four. The purpose of this analysis was to answer sub-questions 1(c) to 1(e):

(c) What generic SSP concerns did the community-scoping frameworks initially cover?

(d) Relative to a representative set of local government-specific (content and process) SSP concerns, what place-specific issues were elicited from the public through community scoping?

(e) How did practitioners include the public in the community-scoping step?

Only the plans that provided enough information about the community-scoping step were selected for this analysis. The following information was required:

- a detailed description of the methods used to undertake the community-scoping step,
- a detailed description of the community-scoping framework used, and
- a detailed description of the range of context-specific concerns elicited from the public through application of the framework.

Twenty-six SSPs provided enough information about the community-scoping step to be selected for this evaluation step. Table 19, below, lists these initiatives.

As indicated by the research sub-questions, the following content and process elements of the community-scoping step were analysed:

- the range of generic SSP concerns initially covered by the frameworks,
- the range of context-specific local government SSP concerns that emerged from application of the frameworks,
- the methods used to include the public in the community-scoping step, and
- the purposes for which community-scoping was undertaken.

Table 19 Municipal SSPs Selected for More In-Depth Analysis

Province/Territory	SSP Initiative
Alberta	Camrose Municipal Sustainability Plan
	Cochrane Sustainability Plan
	Lethbridge City Municipal Development Plan/Integrated Community Sustainability Plan
	Lethbridge County Integrated Community Sustainability Plan
	Spruce Grove Your Bright Future Municipal Development Plan
British Columbia	Fort St. John Today & Tomorrow: Our Strategic Plan
	Prince George Integrated Community Sustainability Plan
	Prince Rupert Quality of Life Community Plan
	Sooke DM Official Community Plan
	Sooke DM Sustainable Development Strategy
	Williams Lake Imagine Our Future Integrated Community Sustainability Plan
Newfoundland and Labrador	Gander Integrated Community Sustainability Plan
	Mount Pearl Integrated Community Sustainability Plan
Northwest Territories	Yellowknife Community Based Strategic Plan
	Yellowknife Smart Growth Development Plan
Nova Scotia	Cape Breton Regional Municipality Integrated Community Sustainability Plan
	Chester Municipality Integrated Community Sustainability Plan
	Municipality of the District of Lunenburg Integrated Community Sustainability Plan
	Truro Community Sustainability Plan
	West Hants Municipality Integrated Community Sustainability Plan
Ontario	Bracebridge Community-Based Strategic Plan
	Collingwood Sustainable Community Plan
	Huntsville Unity Plan
	Kingston Sustainable Kingston Plan
Prince Edward Island	Charlottetown Integrated Community Sustainability Plan
Yukon Territory	Whitehorse Strategic Sustainability Plan

To remind the reader, Chapter Four developed an integrated analytical framework and demonstrated how it should be specified and parsed for the purposes of this study. As Chapter Four explained, different parts of the integrated evaluative framework were required to analyse different aspects of the community-scoping step. Table 20, below, summarizes how this was done in order to answer sub-questions 1(c) to 1(e).

Table 20 Parts of the Analytical Framework Used to Evaluate Community Scoping

Part(s) of the Analytical Framework Used	Aspects of Community Scoping Evaluated
-The core generic concerns of SSP (i.e., the integrated framework), including three key resilience concepts (thresholds, controlling variables, and alternative futures) (see Box 5)	-The range of SSP concerns initially covered by the community-scoping frameworks.
-Local government-specific concerns of SSP, including three key resilience concepts (thresholds, controlling variables, and alternative futures) (see Box 6)	-The community-specific SSP sustainability and resilience concerns elicited from the public through application of the community-scoping frameworks.
Local government-specific SSP social change and implementation considerations, including a concern for multiple scales of influence and interaction and positive threshold effects (see Tables 8 and 9)	-The community-specific social change and implementation concerns that emerged from application of the community-scoping frameworks.
Fung's (2006) Democracy Cube with Sterling's (2010-11) levels of learning and change (see Figure 4)	-The decision-making process used to include the public in the community-scoping step.

The analyses were undertaken in Word, using tables. One table comprised of relevant concept categories was created for each aspect of community scoping that was evaluated. See Appendix B for the tables that were used in the analyses.

The findings were also reduced in Word. The purpose of the reduction step was different for each aspect of community scoping that was analysed. With respect to the range of concerns initially covered by the community-scoping frameworks, the aim was to categorize the initiatives according to the comprehensiveness of their coverage of generic SSP matters. If the frameworks covered all generic concerns, they were categorized as "comprehensive". If they covered most sustainability (including resilience) concerns they were categorized as "selective". If they covered only a few sustainability (including resilience) concerns they were categorized as "narrow".

Similarly, the results of the evaluation of context-specific concerns were reduced in order to identify the most popular and least popular categories of concern, using the local government concerns of SSP as the categories (e.g., Social-Ecological System Integrity, etc.). I also identified the most and least popular community-specific concerns, using broad urban planning categories (e.g., physical infrastructure, local economic development, arts and culture, recreation, etc.).

The results of the analysis of decision-making processes were reduced to facilitate a simple quantification of the number of SSP initiatives that adhered to one or more scope of participation, mode of communication, etc., as per the adapted Democracy Cube framework.

5.4 Investigating the Contextual Underpinnings of Practice

Whereas the basic qualitative data collection and in-depth analysis steps took the pulse of community-scoping practice, the case study research explored the contextual factors that shaped practice or why practice is the way it is, as per the second research question. The following three cases were selected:

- Town of Cochrane Sustainability Plan, from the Town of Cochrane, Alberta,
- Town of Huntsville Unity Plan, from the Town of Huntsville, Ontario, and
- My Prince George Integrated Community Sustainability Plan, from the City of Prince George, British Columbia.

According to Yin (2003), case studies allow for an understanding of events within their real-life contexts, especially when context may bear significantly on the phenomenon under investigation. Yin further explains that case studies are most appropriate when

- the type of question being posed is a how or why question;
- the researcher has no control over the context and phenomena; and
- the focus of the research is on contemporary events as opposed to historical ones.

This dissertation met the above three conditions. First, the purpose of the case studies was to better understand why community-scoping practice is the way it is. This "why" question was answered through exploring how actors and contextual factors influenced practice. The researcher had no control over these factors. Finally, the focus of the research was on recent municipal SSP initiatives as opposed to historical urban planning circumstances.

Theory development is also an important reason to conduct case study research (Yin, 2003). As mentioned in the Introduction, this study contributes to theory development in a number of ways. First, by combining sustainability assessment and resilience concerns in evaluation it increases our understanding of the utility of such an approach to analysis. Additionally, in combining Fung's (2006) dimensions of process design with Sterling's (2010-11) levels of learning and change it contributes to our understanding of this approach to evaluating decision-making processes. Finally, in integrating sustainability, resilience, collaboration, social change and practical implementation matters in a set of generic concerns of SSP, the research contributes to theory building about what strategic planning for social change should entail.

In the sub-sections that follow, I explain why these cases were selected and the methods that were used to collect, analyse and reduce the data.

5.4.1 Case Study Selection

Three cases were chosen according to the following criteria:

- The cases must represent the common and atypical approaches to community scoping that were found with respect to the range of sustainability (including resilience), social change and implementation concerns that were covered and the decision-

making processes used.
- The cases must be from three different provinces.
- Availability of interviewees.

The Town of Cochrane's SSP initiative was selected because the community-scoping framework that was used represented the most common approach that was encountered with respect to the content component of community scoping. There were twenty-one other options in this category. Cochrane's initiative was selected because of its location in Alberta and the availability of the interviewees.

The Town of Huntsville's SSP undertaking was chosen because it covered a good range of implementation concerns and so it represented atypical practice in this regard. Only two other options, the City of Kingston's and the Municipality of Chester's SSP initiatives, fell into this category. Huntsville's SSP undertaking was selected because of the availability of the interviewees as well as its location in Ontario.

Prince George's SSP initiative was the only one that addressed a good range of resilience concerns. It also used an atypically strong collaborative process. Thus, it was selected because of these usual characteristics as well as its location in British Columbia and the availability of interviewees.

5.4.2 Interview Methods

In-depth, semi-structured, face-to-face and, when appropriate, telephone interviews were conducted with key planners, consultants, local politicians, and citizens who participated in each SSP initiative. This key informant interview technique is used in qualitative research when the informants are crucial to understanding a particular phenomenon (Crabtree & Miller, 1999). Indeed, as Crabtree and Miller (1999) have noted, key informants possess specific information, knowledge, perspectives and observations pertinent to a study. Two main reasons for using key informants are to collect information otherwise unavailable to the researcher and to gain a deeper understanding of particular cultural phenomena (Crabtree & Miller, 1999). This study used key informants in order to gain access to information about why certain decisions were made in the design of community-scoping frameworks as well as why particular local concerns emerged as most important in the community-scoping step. This information was sub-textual in the plans selected for analysis. The key informants, then, were instrumental in shedding light on these tacit data.

In total, seventeen interviews were undertaken, six from Prince George, six from Cochrane, and five from Huntsville. A snowball sampling method was used to identify appropriate key informants. According to Palys (2003), snowball sampling is useful when the target population is not immediately accessible. Indeed, accessibility was an issue in this study because the SSP initiatives were completed in the recent past in distant places and I, the researcher, did not have any prior connections with the key stakeholders. Lead consultants were first identified who then provided the names and contact information of the key planners, local politicians and citizens involved. Table 21 below shows the interviews that were carried out.

Table 21 Interviews Undertaken Per Municipal SSP Initiative

Municipal SSP Initiative	Interviews Undertaken
City of Prince George Integrated Community Sustainability Plan	Lead consultants: 1 Lead planners: 2 Key citizens: 2 Key local politicians: 1
Town of Cochrane Sustainability Plan, Alberta	Lead consultants: 3 Lead planners: 1 Key citizens: 1 Key local politicians: 1
Town of Huntsville Unity Plan, Ontario	Lead consultants: 2 Lead planners: 1 Key citizens: 1 Key local politicians: 1

It is important to note that the information provided by these key informants was inevitably influenced by their position in society as well as the role they played in the respective SSP initiatives. The biases and limitations associated with this interview method are explained in sub-section 5.6.5, at the end of this chapter.

Box 8 presents the questions posed to participants who were planners and consultants. Box 9 presets the questions posed to the interviewees who were citizens and politicians.

Box 8 Questions for Planners and Consultants

1. As a consultant/planner involved in development the Town/City of X's sustainability plan, how was your approach influenced by the community context (local political issues, stakeholder relationships, environmental problems, community interests, etc.)?
2. What influenced your choices in designing the community-scoping framework?
3. What influenced your choice of public participation methods in the community-scoping step?
4. What influenced your choice to focus/not focus on implementation and social change concerns?
5. In your opinion, why are implementation and social change considerations so often ignored in the plan development stage of local government SSP?
6. In your opinion, which community concerns emerged as most important in the community scoping step? In your opinion, why are these concerns so important?

Box 9 Questions for Local Politicians and Citizens

1. In your opinion, what inspired the development of the sustainability plan?
2. In your opinion, why is sustainability so important to the Town/City?
3. In your opinion, what community concerns emerged as most important in the community-scoping step? In your opinion, why are these concerns so important?
4. In your opinion, why are implementation and social change considerations so often ignored in the plan development stage of SSP?

5.4.3 Data Analysis and Reduction

The interviews were recorded and transcribed. The responses for each question were organized in Word. Then, for each response the social, economic, ecological and built contextual factors that were expressed were identified (e.g., small town feel, Bow River, educational background, professional experience, etc.). Using Word files, these contextual factors were coded according to key concepts from the New Institutionalism. To remind the reader, the following concepts were utilized in coding the contextual factors expressed by the interviewees:

- Types of institutions: regulative, normative, cognitive
- Concepts that depict how institutions may influence practice: agency, bounded rationality (including uncertainty), path dependency, diffusion, renegotiation and reinterpretation, logic of instrumentality and logic of appropriateness.

The data were reduced in Word using the above concepts as categories. The goal of this reduction step was to find common and unique insights by grouping the responses according to the concept categories. The results illuminated the institutional roots of prevailing practices as well as efficacy of the New Institutionalism to explain the contextual factors that influenced each case.

5.5 Reliability and Validity

The terms reliability and validity have their roots in quantitative, positivist research (Golafshani, 2003). Indeed, as Golafshani (2003) explains, many researchers who tend to employ qualitative methods have asserted that these notions are inappropriate for qualitative studies because they are inadequately defined in quantitative terms. Nevertheless, they remain factors with which qualitative researchers have generally been concerned and so they are discussed briefly here.

Reliability refers to the degree to which a method of analysis generates consistent results over time and across different observers (see Palys, 2003). In this dissertation, the methods that carry the greatest consequences for reliability include the particular local government SSPs selected for the study, interpretations of the concepts used in the analyses, and the data reduction steps.

With respect to the selection of SSPs, reliability was ensured by the precise scope of the Canada-wide inventory, use of 2011 Statistics Canada data for CSD identification, consistent use of

particular keywords to find published SSPs online, and clear local government SSP selection criteria. With respect to the data collection and analyses, reliability was provided by the concise definitions of the concepts and detailed explanation of the analytical framework and how it should be applied. As Palys (2003) has explained, this approach to guaranteeing reliability is referred to as inter-rater reliability: "If you've adequately specified what a particular construct means to you, other researchers should be able to read your explanation (or be trained by your procedures) and then proceed to make the same judgements you would" (p. 64).

Validity refers to whether the methods used measure what they intended to measure (see Palys, 2003). In this thesis, validity was maintained by the analytical framework, which was created specifically for the purpose of answering the research questions. Additionally, the qualitative information collection step, in-depth analysis, and case studies flowed directly from the main research questions and in this way they contributed to the validity of the findings.

5.6 Biases and Limitations

The limitations of the research include considerations related to theory, disciplinary focus, scope and bias.

5.6.1 Theoretical Orientation of the Research

As previously mentioned, local government SSP and community-scoping frameworks could be analysed according to many different sets of criteria. The analytical basis for this study rests on theories, concepts and lessons learned about planning and decision-making for societal change towards sustainability. Within this broad subject area, the research concentrates on the academic and practitioner research reviewed in Chapter Three. The findings of the analysis, therefore, are affected by the theoretical orientation of the analytical framework. This orientation can be described according to the roots of each area of inquiry. Sustainability assessment scholarship has been influenced by sustainability theory, complex systems theory, the tradition of project-level environmental impact assessment and, more recently, strategic assessment of plans, policies and programmes (Gibson et al., 2005). Social-ecological resilience theory stems from complex systems theory and empirical investigations of resilience in complex ecological systems in temperate regions (Gunderson & Holling, 2002). The New Institutionalism espouses a constructivist understanding of how actors behave and interpret the world (Gailing & Leibenath, 2013). Collaborative planning rests primarily on Habermas' communicative theory, which presents a particular view of how social and environmental justice might be achieved through decision-making processes (Healey, 2006). This study thus presents a particular set of core concerns of SSP based on these fields of study. Other fields of study could have been used and thus would have given the research a more or less different theoretical orientation. The findings of this study are nonetheless relevant in that they reflect the central emphases of the above-mentioned fields of study, which represent leading-edge fields of inquiry related to planning for social change towards sustainability. Moreover, the research contributes back to these fields valuable insights that help to develop theory in various ways.

5.6.2 Interdisciplinary Approach

Because this study combined key concepts and insights from five different fields of research, it did not explore each field in an exhaustive way. Rather, the study focused on identifying the core research preoccupations, ideas and insights offered by each. It drew primarily from seminal works and academic books and articles that provided good overviews of theory and practice in each field. Understandably, then, the concepts and insights that comprise the analytical framework may not represent an inclusive set. The analytical framework should therefore be viewed as preliminary and subject to change based on further research.

5.6.3 Scope of Canada-Wide Search

The 10,000-plus population frame helped to ensure that the database would capture a diverse range of contexts across Canada. But Canada's provinces and territories contain many CSDs with populations less than 10,000. Some of these smaller municipalities have undertaken celebrated SSP initiatives (e.g., Whistler 2020). Similarly, the focus on English-speaking, non-First Nation municipalities excluded all of Quebec, other French-speaking municipalities, and the majority of First Nation communities. The focus on municipal government omitted inter-municipal and regional types of local government including, for example, Regional Districts in British Columbia, District Planning Authorities in Saskatchewan, and Counties in Nova Scotia. Some of these types of municipalities have also undertaken notable SSP initiatives (e.g., Metro Vancouver's Sustainable Region initiative, the Severn Sound Sustainability Plan, etc.). Finally, the scope did not cover plans that were sustainability based but narrowly focused on one or another public service area (e.g., social housing strategies, transportation master plans, growth management plans, etc.).

The main significance of the database scope was that it did not cover all local government SSPs and so it may have missed some unique and/or exemplary cases. Unique cases may represent unusual and/or exemplary approaches and help to generate a nuanced understanding of SSP practice. Moreover, outlier examples may provide benchmarks against which a range of SSPs could be evaluated. Nevertheless, the above described database focus was sufficiently wide to capture enough unique, exemplary and conventional SSP initiatives to illustrate gradations in quality.

5.6.4 Scope of In-Depth Analysis of Community Scoping

The scope of the in-depth analysis extended around community scoping in which the general public was involved in a transparent participatory process. This focus excluded community-scoping undertakings that were not participatory but relied on municipal staff and other experts in scientific or technical background studies. In cases where these studies were done, a range of concerns pertinent to planning for social change towards sustainability may have been addressed; therefore, this thesis may have overlooked some exemplary contributions. Nevertheless, the scope of the analysis and number of cases included in this study were sufficient to generate important findings about prevailing practices.

5.6.5 Case Study Bias and Limitations

As previously mentioned, the key informants who participated in this study were selected for the tacit knowledge they possessed about why certain decisions were made and why particular community concerns emerged as most important in each case. Because the snowball method relied on the lead consultants for the names and contact information of other key informants, the other interviewees identified by the lead consultants were most likely participants who, in their view, held a positive view of the process. Additionally, the data were inevitably influenced by the respective roles played by the interviewees in each case. The lead consultants, for example, may have been careful to ensure that their responses enhanced their credibility.

One limitation of the key informant approach was that the interviews could not capture all possible reasons why certain decisions were made and why particular community concerns emerged as most important. The findings of this study, therefore, were limited by the knowledge and perspectives expressed by the key informants. Because the key informants were involved in the respective cases over the long term, their insights were highly pertinent; however, a greater number of interviews would have generated a more comprehensive understanding of the contextual underpinnings of community-scoping practice.

5.6.6 Small- and Medium-Sized Municipalities in Canada

Finally, it is important to note that the inventory of local government SSP initiatives identified appropriate SSP initiatives primarily from small and medium-sized municipalities. Small (<10,000 and 10,000-99,999), medium (100,000-499,999) and large (500,000-999,999) municipalities in Canada have different socioeconomic and ecological challenges and opportunities, which may be more or less related to their size (see Federation of Canadian Municipalities, 2008b; Kennedy & Wilson, 2008). This study, however, did not set out to examine local government SSP in relation to the literature on the particular issues and opportunities of small- and medium-sized municipalities in Canada. Rather, in this study none of the plans from larger municipalities met the selection criteria.

Nevertheless, it is important to note that the findings of the analysis may more or less reflect the problems and opportunities of small and medium sized municipalities in Canada. More research is needed to unpack the findings of the analyses in order to determine the extent to which they were influenced by the size of the municipality.

5.7 Summary

In this thesis, I aimed to portray the condition of local government SSP, asking the following core research question:

1. What is the condition of local government SSP in Canada?

This question was accompanied by one sub-question that was essentially theoretical in that it identified the fields of study upon which the analytical framework was built and it inquired into

what these fields tell us about the essential aspirations of SSP in any context:

(a) What are the generic (content and process) concerns of SSP, as suggested by sustainability assessment, resilience theory, collaborative planning, the New Institutionalism and local government SSP case experiences?

Chapters Three and Four dealt with this theoretical research question.

An evaluation of all of the stages and steps in local government SSP would have created the most comprehensive depiction of prevailing practices; however, it was beyond the scope of this study to adopt such an all-inclusive approach. Rather, this dissertation aspired to depict the overall condition of local government SSP by evaluating the community-scoping step, which occurs in the plan formulation stage of the SSP cycle. For this purpose, four empirical sub-questions, 1(b) to 1(e) were asked:

b) What best practice principles did the plan formulation process cover in a range of local government SSP initiatives in Canada?

c) What generic SSP concerns did the community-scoping frameworks initially cover?

Sub-question 1(b) aimed to generate an understanding of the wider plan formulating process within which the community-scoping step was nested in each initiative, while sub-question 1(c) concentrated intently on the community-scoping frameworks that were used.

Because community scoping is a participatory process dedicated to understanding the local context, sub-questions 1(d) and 1(e) sought to investigate the place-specific SSP concerns that were elicited from the public and how the public was included in the community-scoping step, respectively:

(d) Relative to a representative set of local government-specific (content and process) SSP concerns, what place-specific issues were elicited from the public through community scoping?

(e) How did practitioners include the public in the community-scoping step?

This thesis also sought to uncover the contextual factors that shaped prevailing community-scoping practices. This objective called for an analytical framework that could explain the contextual underpinnings of community-scoping contents and processes. In this regard, key concepts from the New Institutionalism were used, as indicated by the following question:

2. Using key concepts from the New Institutionalism, what contextual factors influenced prevailing community-scoping practices?

The empirical research involved two key stages: an investigation of community-scoping practice, and an exploration of three cases. The first stage involved three research steps:

- A Canada-wide search for municipal SSP initiatives,

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- An initial collection of basic qualitative data, and
- An in-depth evaluation of the applied community-scoping frameworks.

The second, case study stage aimed to reveal the contextual underpinnings of community-scoping practice. For this purpose, three cases were investigated, one in British Columbia, one in Alberta, and one in Ontario.

In the paragraphs that follow I summarize the methods that were used in these research stages and steps.

First, a Canada-wide search for municipal SSPs was undertaken in order to provide the data necessary for the qualitative data collection and subsequent analyses. The scope of the Canada-wide inventory extended around

- census subdivisions (CSDs) with 10,000-plus populations;
- English-speaking, non-First Nation municipalities;
- municipal governments;
- stand-alone SSPs; and
- corporate-level municipal government SSPs.

In total, 298 CSDs were included in the search for municipal SSPs. Then, municipal government websites were searched for published, publicly accessible SSPs. The following search keywords were used consistently:

- Community sustainability plan,
- Integrated community sustainability plan (ICSP),
- Sustainability strategy,
- Official plan, and
- Green plan.

A total of 216 SSPs were found. The SSPs that met a particular set of selection criteria (see Box 7) were included in the database. Sixty-five SSPs met the selection criteria (see Appendix A).

Once the inventory was completed, the plans were read and basic qualitative data were collected. This data collection step sought answer sub-question 1(b) in order to generate a broad brushstrokes understanding of the wider plan formulation process within which the community-scoping step was nested in each SSP initiative. For each best practice category, questions were asked that prompted yes/no responses or short descriptive answers (see Table 18). The sixty-five SSPs were organized per province/territory in Word and the questions and results were provided beneath each plan. The data were reduced using Excel in order to facilitate a simple quantification of the results.

Next, an in-depth analysis was performed of the community-scoping frameworks that were applied in each initiative. This evaluation aimed to answer sub-questions 1(c) to 1 (e). Twenty-

six SSPs were selected for this analysis on the basis of the information that was provided by the plans about the community-scoping step (see Table 19).

Different parts of the integrated evaluative framework were required to analyse different aspects of the community-scoping step. Table 22, below, summarizes how this was done to answer sub-questions 1(c) to 1(e).

Table 22 Methods and Analytical Framework Used for Questions 1(c) to 1(e)

Research Questions	Methods	Analytical Framework
1(c) What generic SSP concerns did the community-scoping frameworks initially cover? 1(d) Relative to a representative set of local government-specific (content and process) SSP concerns, what place-specific issues were elicited from the public through community scoping?	-In-depth analysis of applied community-scoping frameworks using parts of the analytical framework. -Selection criteria were used to choose municipal SSPs that included enough information for the in-depth analysis.	1(c) The generic concerns of SSP and three key resilience concepts (controlling variables, thresholds, and alternative futures) were used to examine the range of concerns initially covered by the community-scoping frameworks. 1(d) The local government-specific concerns of SSP and three key resilience concepts (controlling variables, thresholds, and alternative futures) were used to analyse the community-specific sustainability and resilience matters elicited from the public through application of the community-scoping frameworks. 1(d) Local government-specific social change and implementation considerations were used to examine the place-specific social change and implementation concerns that emerged from application of the community-scoping frameworks.
1(e) How did practitioners include the public in the community-scoping step?		1(e) Fung's (2006) Democracy Cube with Sterling's (2010-11) levels of learning and change were used to evaluate the decision-making processes used to include the public in the community-scoping step.

The in-depth analysis and data reduction were undertaken in Word, using tables. The purpose of the reduction step was different for each aspect of community scoping that was investigated. With respect to the range of concerns initially covered by the community-scoping frameworks, the aim was to categorize the initiatives according to the comprehensiveness of their coverage of

generic SSP matters. Similarly, the results of the evaluation of context-specific (sustainability, resilience, social change and implementation) concerns were reduced in order to identify the most popular and least popular categories of concern, using the local government-specific concerns of SSP as the categories. The results of the analysis of decision-making processes were reduced to facilitate a simple quantification of the number of SSP initiatives that adhered to one or more scope of participation, etc., as per the adapted democracy cube framework.

The Canada-wide search for municipal SSPs, qualitative data collection and in-depth analysis of applied community-scoping frameworks constituted the first stage of the research. Stage two involved an investigation of three cases in order to expose the contextual underpinnings of prevailing community-scoping practices. Table 23, below, describes the methods that were used.

Table 23 Methods and Analytical Framework Used for Question #2

Research Question	Methods	Analytical Framework
2. Using key concepts from the New Institutionalism, what contextual factors influenced prevailing community-scoping practices?	-Three case studies: (Town of Cochrane Sustainability Plan, from the Town of Cochrane, Alberta, Town of Huntsville Unity Plan, from the Town of Huntsville, Ontario, and My Prince George Integrated Community Sustainability Plan, from the City of Prince George, British Columbia). -Case study selection criteria -In-depth, semi-structured, face-to-face or telephone interviews with key informants (lead consultants, lead planners, local politicians, and key citizens)	-Concepts from the New Institutionalism: (regulative, normative, cognitive institutions and concepts that depict institutional behaviour: agency, bounded rationality, uncertainty, path dependency, diffusion, renegotiation and reinterpretation, logic of instrumentality and logic of appropriateness).

The cases were chosen according to selection criteria (see sub-section 5.4.1). Seventeen interviews were undertaken, six from Prince George, six from Cochrane, and five from Huntsville (see Table 21). A snowball sampling method was used to identify key informants (see Crabtree & Miller, 1999; Palys, 2003).

The interviews were recorded and transcribed. The responses for each question were organized in Excel. Then, for each response the social, economic, ecological and built contextual factors

that were expressed were identified (e.g., small town feel, Bow River, educational background, professional experience, etc.). These contextual factors were coded according to key concepts from the New Institutionalism. The data were reduced in Excel using these concepts as categories. The aim of this reduction step was to generate findings about which institutions were most significant with respect to why certain choices were made in the design of community-scoping frameworks and why particular community concerns emerged as important. By extension, this method allowed for extrapolation about the institutional underpinnings of prevailing practice more generally. Finally, the results illuminated the efficacy of the New Institutionalism to explain the contextual factors that influenced each case.

Chapters Six to Ten present and discuss the findings.

Chapter Six: Stage One Results – Investigating Community-Scoping Practice

In this chapter, I share the results of the basic qualitative information collection step and the in-depth analysis of the applied community-scoping frameworks. The findings that emerged begin to illuminate the condition of local government SSP in terms of the best practice principles that the plan formulation process covered, the generic SSP concerns that the applied community-scooping frameworks addressed, the range of local government-specific matters that were elicited from the public, and the processes that were used to include the public in the community-scoping step.

6.1 Basic Qualitative Data Collection

As I described in Chapter Five, qualitative information was collected about the 65 plans that met the selection criteria in order to generate a broad brushstrokes understanding of the broader plan formulation process within which the community-scoping step was nested. As I explained in Chapter Five (see Table 18), this research step was structured around best practice principles categories. I also collected information about whether a best-known framework was used to guide the plan formulation stage, including the community-scoping step. Sub-sections 6.1.1 to 6.1.8, below, describe the findings that emerged from this step.

6.1.1 Definition of Sustainability

The majority (38/65 or 58%) of the SSPs included a definition of sustainability explicitly based on the classic Brundtland definition (United Nations, 1987). Many (31/65 or 47%) of the plans also expressed their own, plan-specific understanding of the concept. Other plans (14/65 or 21%) incorporated their own definition without referring to the Brundtland Report. The plans that did not include a definition used the words 'sustainability' or 'sustainable development' throughout as a noun or adjective. Thirteen plans (20%) fell into this category. Table 24, below, provides a sampling of the plan-specific definitions. Table 36 in Appendix C shows the data in this category.

Table 24 Plan-Specific Definitions of Sustainability

Province/ Territory	SSP Initiative	Plan-Specific Definition of Sustainability
Alberta	Fort Saskatchewan Community Sustainability Plan	Sustainability requires big picture thinking and integrated problem solving that results in: • Meeting social and cultural needs; • Promoting fair and just governance; • Building a strong economy; • Respecting the environment so that the basis for life, a healthy ecosystem, is protected; and • Successfully integrating all of these over the long term.
British Columbia	Dawson Creek Official Community Plan	Sustainability involves understanding the relationship between and embeddedness of environmental, social (including cultural) and economic realms. A cornerstone of sustainability is resilience, which refers to the capacity of a community to undergo change and still retain its quality of life, and basic function and structure. This requires communities to proactively plan for change and uncertainty. It promotes self-sufficiency, equity, shared responsibility, and good governance.
	City of Nanaimo Official Community Plan	The definition of sustainability has evolved significantly since 1987, with a stronger emphasis placed on social and cultural equity. Given this backdrop, sustainability for Nanaimo needs to recognize the interrelationships between our city's environment, society and economy. Sustainability is about recognizing (that) our economy exists within society; society exists within the environment; and the environment surrounds and supports society. Within the context of the City of Nanaimo, a community that is sustainable is defined as one that offers homes that are located near shops, schools, recreation, work and other daily destinations. These communities offer safe and convenient opportunities to walk, cycle or take public transit.
New Brunswick	Saint John Integrated Community Sustainability Plan	Three primary characteristics of a sustainable community are: I. A sustainable community recognizes the importance of long range planning and in doing so has a vision and goals that describe the future. This forward-looking perspective allows the community to determine what needs to be done today to reach tomorrow. II. A sustainable community uses a whole systems approach to provide for balanced priorities because it is understood that environmental, economic, social and cultural needs are interrelated. III. In a sustainable community, community groups, institutions, businesses, volunteer agencies, governments and individuals must work together to set goals, form plans and implement solutions.
Newfoundland and Labrador	Mount Pearl Integrated Community Sustainability Plan	In a sustainable Mount Pearl, the environment is conserved, local businesses are promoted and, because of its special strengths, the community participates with confidence in the modern economy. Social networks are strong, people are engaged in the process of local governance, and the community is open to and adept at managing complexity and change. In a sustainable Mount Pearl, community groups, institutions, businesses, volunteer agencies, governments and individuals work together to set goals, form plans and implement

		solutions. We recognize that in achieving a sustainable future, local government needs support, and that everyone has an important role to play.
Nova Scotia	Queens RGM Municipal Planning Strategy	The sustainability of our communities depends on our ability to find a balance between quality of life, maintaining a healthy natural environment and achieving economic prosperity, which form the cornerstones or pillars of sustainable development.
Ontario	Huntsville Unity Plan	The community understands that for Huntsville, sustainability is about protecting and valuing the natural environment - not using natural resources faster than they can be replenished; recognizing and acknowledging that there are limits to growth and development; recognizing that communities must prepare for climate change; retaining Huntsville's small rural Town feel; ensuring the community can foster its thriving arts and cultural community; recognizing and celebrating its strong sense of belonging and history; and ensuring there are economic opportunities to attract and retain youth while balancing the needs of all our residents, visitors and businesses. In this spirit, the Unity Plan was developed around three key pillars of sustainability; environment, economy, society to encompass these core values of the community.
	City of Vaughan Community Sustainability and Environmental Master Plan	Sustainability means we make decisions and take actions that ensure a healthy environment, vibrant communities and economic vitality for current and future generations. In Vaughan we lead by example as responsible stewards of our community. Our decisions entail determining the impact of our actions on the environment; weighing the social/cultural consequences; and understanding any financial implications. Our actions will enhance both the natural and built environments.
Prince Edward Island	Summerside Official Plan	*Sustainability* is a measure of the City's continuing ability to maintain economic growth and a healthy tax base, to share social access to jobs, housing and services, and to exercise responsible environmental stewardship for the benefit of present and future generations.
Yukon Territory	Whitehorse Strategic Sustainability Plan	"Sustainability means living within the Earth's Limits. It means living in a world where feeding people does not necessitate polluting ground water and coastal shorelines. Where transporting people and goods does not mean polluting our air and changing our climate. Where heating our homes and powering our industries does not require vast amounts of polluting fossil fuels. **Sustainability means doing things better – not doing without**." David Suzuki, Foreword to Sustainability Within a Generation 2004

A superficial reading of the plan-specific definitions revealed differences in how the concept has been understood and conveyed across Canada. These differences will be discussed in more detail in Chapter Seven.

6.1.2 Application of Sustainability Principles

In most cases (38/65 or 58% of the plans), sustainability principles were adopted to 'guide', 'inform' and/or 'provide the basis' for more specific goals, objectives, strategies and/or policies.

In seven cases, well-known sustainability principles were set out. The City of Penticton and the City of Powell River in British Columbia used the Canadian Mortgage and Housing Corporation's Principles of Sustainable Communities (2000). Strathcona County and the City of Camrose in Alberta used The Natural Step principles (The Natural Step, 2009). The City of Calgary in Alberta, the City of Thunder Bay in Ontario and the City of Saint John in New Brunswick used the Melbourne Principles (UNEP, 2002). In many cases (31/65 or 47%), practitioners and/or citizens created their own principles or guiding framework (see Table 37 in Appendix C).

The majority (53/65 or 81%) of SSPs also included a vision, overarching objectives, strategic directions, values, or policies, which were meant to guide or inform decision making. Thus, while sustainability principles were not always adopted, there was a good deal of variety across Canada with respect to the high-level guides that were used. To illustrate this diversity, Table 25, below, summarizes some of the distinct approaches that were taken.

Table 25 Sampling of High-Level Guides

Province/ Territory	SSP Initiative	High-Level Guides
Alberta	Strathcona County Municipal Development Plan	Vision, strategic directions, The Natural Step principles
	Wood Buffalo ICSP	Sustainability strategic direction, statement of sustainability, sustainability principles
British Columbia	Penticton Official Community Plan	CMHC principles of sustainable communities
	Surrey Sustainability Charter	Vision, sustainability CUBE
New Brunswick	Saint John ICSP	Vision, Melbourne Principles
Newfoundland and Labrador	Mount Pearl ICSP	Vision and goals
Northwest Territories	Yellowknife Smart Growth Plan	Smart growth principles
Nova Scotia	Cape Breton ICSP	Vision and goals
Ontario	Brampton Official Plan	Vision, objectives, sustainable planning framework, sustainability policies, characteristics of a sustainable city structure
Prince Edward Island	Charlottetown ICSP	Vision statements and sustainability principles
Yukon Territory	Whitehorse ICSP	Vision, community values, criteria to prioritize infrastructure projects

Generally speaking, the process by which these high-level guides influenced decision making was unclear. The tendency was to provide a brief description about how they were used, without any demonstration within the plan itself. More research is required, then, to investigate how they might have been used in an informal way. But there were some exceptions to this trend. Dawson Creek City's Official Community Plan, for example, identifies which high-level goals underpin the different policies. Similarly, Fort Saskatchewan City's Community Sustainability Plan, AB, lists the sustainability principles addressed in each goal section. In both of these cases, however, it was unclear whether the principles were applied in a proactive way from the outset of the planning process, or were recognized after the goals and policies had been developed. Lethbridge County's ICSP, AB, is clearer in this regard in that it provides a table that shows how overarching sustainability goals and visions were used in a backcasting approach to strategizing. Basically, for each sustainability pillar (governance, social, economic, environmental), the table presents the goals and associated visions for the future, a description of present conditions, and steps that should be taken to realize the visions. Similarly, Saint John City's ICSP, NB, shows how guiding principles and goals were used to evaluate and prioritize a list of potential actions.

None of the initiatives used a set of principles to structure the community-scoping step. This means that the high-level guides adopted at the outset of planning were not used to structure the community-scoping frameworks. Rather, in many cases, open-ended questions were used in order to elicit information from the public. Other initiatives used more restrictive approaches that involved voting or expressing preferences on policy options.

6.1.3 Integrative Thinking

All of the plans acknowledged that sustainability requires a systems approach that recognizes the connections among social, economic and environmental systems; inter-departmental coordination and the alignment of strategic plans and priorities; and coordination of provincial, regional and community initiatives. The majority (59/65 or 91%) of SSP initiatives, however, did not demonstrate integrative thinking in the community scoping step and development of sustainability goals and/or strategies (see Table 38 in Appendix C). Rather, the tendency was to organize the information and create the goals and strategies in relation to their respective sustainability pillars or discrete urban planning categories.

But six of the plans exhibited some integrative thinking with respect to how the strategies or goals would contribute to multiple community concerns and/or how they should be implemented. Surrey City's Sustainability Charter, from British Columbia, for example, provides a table that shows the multiple sustainability pillars covered by each sustainability goal. The table is meant to help in the coordination of actions under each goal. Similarly, Mount Pearl's ICSP, from Newfoundland, includes a table that illustrates how each priority action contributes to various sustainability pillars (society, culture, economy, governance, environment). Prince George City's ICSP, from British Columbia, provides a similar set of tables that depict the range of sustainability goals covered by each strategy. The strategies were prioritized according to the range of goals they covered. For example, the strategies that addressed a greater range of sustainability goals were given higher priority. The Town of Cochrane's Sustainability Plan, from Alberta, prioritizes their actions in a similar way, by identifying which actions covered the greatest number of community systems. Terrace City's Sustainability Strategy, from British

Columbia, provides a brief description of how each strategy relates to other sustainability priorities. Similarly, in the Northwest Territories, Yellowknife's Smart Growth Development Plan describes the sustainability impacts for each major goal, including how these impacts connect to other community systems. These examples reflect a retrospective approach to integration, however, which stands in contrast to developing sustainability goals based on an integrated understanding of community concerns.

6.1.4 Consideration of Alternatives and Trade-Offs

None of the SSP initiatives were designed to create and investigate alternative sustainability visions, goals and their associated trade-offs.

6.1.5 Broadly Inclusive Public Participation

A diverse range of methods was used to engage community members in the plan formulation process. These methods varied from initiative to initiative and included the following:

- surveys (email, online, telephone, in-person),
- questionnaires (online, in-person),
- face-to-face interviews,
- online feedback processes,
- calls for submissions,
- visioning sessions (using workshops, community cafés, focus groups, facilitated discussions),
- trade show booths,
- committees (steering, advisory, technical), and
- citizen working groups/action groups/teams.

The majority of the SSP undertakings followed three basic process steps in the plan development stage:

- visioning and community scoping,
- development of goals (or targets, strategies and/or policies), and
- implementation planning, including monitoring considerations.

The majority (47/65 or 72%) of the SSP initiatives described that the feedback received from the public 'influenced' or 'provided the basis' for the vision statement, goals and, depending on the type of plan, actions, strategies and policies (see Table 39 in Appendix C).

6.1.6 Social Change Considerations Incorporated in Plan Formulation

All of the SSPs incorporated the idea of social change in one way or another. There was a general acknowledgement of the need to adapt and respond to socioeconomic and climate change in innovative ways. Additionally, the notion of 'change' was present in the descriptive text and many plans included goals, policies and/or strategies that conveyed a direct concern to transition to clean energy sources, encourage local food consumption, promote green technologies, and

implement creative zoning solutions, among other aspirations.

The vast majority (62/65 or 95%) of SSPs, however, were not clearly underpinned by a social change agenda in that the purpose of the initiatives was not to develop detailed strategies for community-based transitions. There were some atypical plans in this regard, however (see Table 40 in Appendix C). For example, in British Columbia, Williams Lake's ICSP (see City of Williams Lake, 2010) was structured around developing 'Transition Strategies', which aim to close the gap between the current reality and descriptions of success in various urban planning categories (e.g., active transportation, local food and agriculture, lively downtown, etc.). Similarly, in Alberta the Town of Cochrane's Sustainability Plan included "Pathways to the Future" that depict a transition from Cochrane's current reality to a more sustainable future (see Town of Cochrane, 2009), and the County of Lethbridge's ICSP described the steps that should be taken to move from current conditions to the community's vision for sustainability (see County of Lethbridge, 2009).

6.1.7 Implementation Considerations Incorporated in Plan Formulation

All of the plans expressed some concern for implementation. However, the findings suggest that, generally speaking, practitioners have not been considering community-specific implementation needs in a detailed and comprehensive way in the plan formulation stage. The results revealed four general approaches to addressing implementation considerations (see Table 41 in Appendix C). These approaches can be situated along a spectrum of weakest-to-strongest approaches, depending on the range of implementation concerns that were covered. At the weakest end of the spectrum, the SSPs provided only a brief summary of next steps. In the case of many Official Municipal Plans, only a description of municipal implementation tools was provided, including zoning bylaws, plan amendments and land use plans, among others. At the average-to-strong end of the spectrum, the SSPs set out actions or strategies for each goal or policy that was developed. These actions or strategies set out a range of initiatives that should be pursued to achieve the sustainability goals. Stronger SSPs provided details about timeframes, responsible actors and budget considerations for many of the associated actions or strategies. But these details were vague and not tied to a particular framework. At the strongest end of the spectrum, the SSPs included all of these general details as well as a proposed implementation governance model. The in-depth analysis of the community-scoping step describes these weak and strong approaches in more detail.

6.1.8 Applied Best-Known SSP and Community-Scoping Frameworks

Thirteen plans were clear about using a best-known SSP framework. Table 26, below, lists these plans and the frameworks they used.

Table 26 Municipal SSP Initiatives that Used a Best-Known SSP Framework

Province/ Territory	SSP Initiative	Applied Well-Known Planning Framework
Alberta	Calgary: *imagineCalgary Plan for Long Range Urban Sustainability*	-Sustainable Cities: PLUS Planning Cycle -The Earth Charter Community Action Tool (EarthCAT)
	Camrose Municipal Sustainability Plan	-The Natural Step -AUMA Comprehensive Guide for Municipal Sustainability Planning
	Fort Saskatchewan Community Sustainability Plan	-AUMA Comprehensive Guide for Municipal Sustainability Planning -Framework for Strategic Sustainable Development (The Natural Step)
	Strathcona County Municipal Development Plan	The Natural Step
British Columbia	Williams Lake Integrated Community Sustainability Plan	The Natural Step
Newfoundland And Labrador	St. John's Integrated Community Sustainability Plan/Municipal Plan	Newfoundland and Labrador ICSP Template
	Town of Gander Integrated Community Sustainability Plan	
Nova Scotia	Cape Breton Integrated Community Sustainability Plan	Nova Scotia ICSP Template
	Chester Municipality Integrated Community Sustainability Plan	
	Municipality of the District of Lunenburg Integrated Community Sustainability Plan	
	Municipality of West Hants Integrated Community Sustainability Plan	
Prince Edward Island	Charlottetown Integrated Community Sustainability Plan	PEI ICSP Template
Yukon Territory	Whitehorse Integrated Community Sustainability Plan	Yukon ICSP Template

More research is required to determine precisely how the frameworks were used in each case and why. A reading of the plans suggests that they were not followed in a precise and comprehensive way. For example, Camrose and Fort Saskatchewan combined various elements from two different frameworks as opposed to using one in an all-encompassing way. Camrose's use of The Natural Step principles was relatively casual in that they did not tightly structure the visioning

process: "These visions were not limited to these system conditions, but took them into consideration" (City of Camrose, 2010).

Many of the SSP initiatives that were not clear about using a best-known planning framework were Official Municipal Plans, some of which aimed to cover the requirements for ICSPs as well. In these cases, Provincial obligations for local Official Plans, along with ICSP guidelines, may be perceived to constitute a planning framework, as both set out requirements for contents and processes.

The majority of the SSP initiatives were not explicit about using a well-known community-scoping framework. There were some exceptions to this general rule. Table 27, below, lists the initiatives that applied a well-known framework in the scoping step.

Table 27 SSP Initiatives that Used a Best-Known Community-Scoping Framework

Province/ Territory	SSP Initiative	Applied Community Scoping Framework
Alberta	Calgary: *imagineCalgary Plan for Long Range Urban Sustainability*	The 'Human Needs' framework from the EarthCAT Guide to identify community system needs.
British Columbia	Prince George: *Integrated Community Sustainability Plan*	Scenario Planning was used to identify a range of 'External Forces' that may affect the city.
Newfoundland and Labrador	Mount Pearl: *Integrated Community Sustainability Plan*	'Basic Questions of Sustainability' were used, which are provided by the Provincial Guidelines for ICSPs.
	Town of Gander: *Integrated Community Sustainability Plan*	
Nova Scotia	Municipality of Chester: *Integrated Community Sustainability Plan*	Used a SWOT analysis.
Northwest Territories	Yellowknife: *Community Based Strategic Plan*	Used a SWOT analysis.
Yukon Territory	Whitehorse: *Integrated Community Sustainability Plan*	A 'Community Inventory and Assessment Checklist' was used to identify infrastructure needs and assets. This is provided by the Yukon Territory's ICSP template.

The results suggest that, in most cases, practitioners developed their own approach to community scoping as opposed to adhering strictly to an established one. Generally speaking, the frameworks aimed to identify different types of concerns: trends, issues/challenges, assets/opportunities, priorities, preferences, opinions, values, desires, hopes, dreams, needs, ideas for change, images of success, etc. In most cases, urban planning categories (e.g., land use,

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transportation, economy, health and well-being, etc.) sustainability pillars (social, economic, environmental, cultural, governance), or some combination of these were used to organize the questions and answers.

This completes the description of the results that emerged from the qualitative information collection step. Section 6.2 below shares the findings of the in-depth evaluation of the applied community-scoping frameworks.

6.2 In-Depth Analysis of Applied Community-Scoping Frameworks

Once the basic qualitative information step was completed, an in-depth examination of applied community-scoping frameworks was undertaken. As explained in Chapter Five, different parts of the analytical framework were used to evaluate different aspects of the community-scoping step. Twenty-six SSPs provided enough information to be selected for this analysis (see Table 19). Sub-sections 6.2.1 to 6.2.5 below share the results.

6.2.1 Generic SSP Concerns Initially Covered

This part of the analysis was framed by the generic concerns of SSP and three key resilience concepts (controlling variables, thresholds and alternative futures).

Some of the community-scoping frameworks were obviously underpinned by the concepts of sustainability and social change. For example, the frameworks used by Camrose, Williams Lake, Lunenburg, Truro, Charlottetown and Mount Pearl were comprised of open-ended questions that asked citizens to think about their current reality, visions for a sustainable future and how they might transition to these futures. Generally, the frameworks were not clearly structured around resilience and implementation considerations. With respect to resiliency matters, a general lack of direct attention was devoted to external and internal, positive and negative pressures and how various community issues interact across scales. Many frameworks, however, used open-ended questions that could encourage thinking and action around these matters.

Two initiatives, Prince George and Prince Rupert, used frameworks that were clearly based on a particular theme. In Prince George's case, citizens were asked to list all of the 'external factors' that might affect Prince George and its ability to achieve its desired future. This indicates an orientation towards social-ecological resilience; however, the plan did not intentionally adopt a resilience lens. Prince Rupert's framework was underpinned by a 'quality of life' theme in that it was comprised of quality of life statements, and citizens were asked to agree or disagree with them and rate their importance. The statements, however, were primarily oriented towards livelihood sufficiency concerns.

The community scoping frameworks were grouped into three categories that represent the range of generic concerns initially covered. These categories were defined based on the content and process elements that comprised the frameworks. They include 'comprehensive coverage', 'selective coverage', and 'narrow coverage'. The comprehensive coverage category represents the community scoping frameworks that were comprised of open-ended questions or other

methods and workshop processes. These frameworks covered most generic SSP criteria in an implicit way. The selective coverage category represents the frameworks that covered a good range of generic sustainability concerns. These frameworks were comprised of mixed methods, including questions, workshops, and questionnaires or surveys – all of which used predetermined response options at some point. Conceptually, they were less oriented towards the generic social change and implementation criteria. The narrow coverage category represents the frameworks that covered a narrow range of generic SSP criteria. These frameworks used primarily questionnaires or surveys with predetermined response options. Table 28 below organizes the SSP initiatives according to the coverage category in which their respective community-scoping framework fits.

Table 28 Potential Coverage of the Community-Scoping Frameworks

Comprehensive Coverage	Selective Coverage	Narrow Coverage
Bracebridge Community-Based Strategic Plan	Collingwood Sustainable Community Plan	Prince Rupert Quality of Life Community Plan
Camrose Municipal Sustainability Plan	Fort St. John Today & Tomorrow: Our Strategic Plan	
Cape Breton Regional Municipality Integrated Community Sustainability Plan	Kingston Sustainable Kingston Plan	
Charlottetown Integrated Community Sustainability Plan	Lethbridge City Municipal Development Plan/Integrated Community Sustainability Plan	
Chester Municipality Integrated Community Sustainability Plan	Lethbridge County Integrated Community Sustainability Plan	
Cochrane Sustainability Plan	Sooke DM Official Community Plan	
Gander Integrated Community Sustainability Plan	Spruce Grove Your Bright Future Municipal Development Plan	
Huntsville Unity Plan	Whitehorse Strategic sustainability Plan	
Lunenburg Municipal District Integrated Community Sustainability Plan	Yellowknife Smart Growth Development Plan	
Mount Pearl Integrated Community Sustainability Plan		
Prince George Integrated Community Sustainability Plan		
Sooke DM Sustainable Development Strategy		
Truro Community Sustainability Plan		
West Hants Municipality Integrated Community Sustainability Plan		
Williams Lake Imagine Our Future Integrated Community Sustainability Plan		
Yellowknife Community Based Strategic Plan		

As Table 28 shows, most of the community-coping frameworks used open-ended questions that could potentially cover a comprehensive range of generic SSP considerations. Chester and Prince George used other methods that were included in the comprehensive coverage category. Chester used a SWOT analysis and Prince George explored external factors that may affect the community. Tables 42 to 44 in Appendix D present excerpts from this analysis.

6.2.2 Community-Specific Sustainability (Including Resilience) Concerns Covered

This part of the analysis was structured around local government-specific SSP concerns and three key resilience concepts (see Tables 20 and 22). It focused on the community-specific sustainability and resilience concerns that were elicited from the public through application of the community-scoping frameworks. Tables 45 to 50 in Appendix D provide excerpts from this analysis.

It is interesting to note that the vast majority of the SSP initiatives used sustainability pillars, urban planning categories, or some combination of these to organize the public's responses, and there was no mechanism to recognize the interconnections. In contrast, the SSP criteria were designed to encourage integrative thinking and so they do not represent discrete (social, economic, ecological) categories of concern. Rather, each criterion addresses multiple interrelated areas of sustainability and so there is much overlap within and between the criteria in this regard.

This tension between the discrete categories and the integrative nature of the analytical framework posed a challenge with respect to how the findings should be interpreted. It was decided that it would be best to recognize the full range of context-specific sustainability (including resilience) criteria to which the concerns related, while also considering their obvious emphases.

Most of the community-specific concerns that emerged were directly related to Gibson et al.'s (2005) 'Livelihood Sufficiency and Opportunity' principle. These primarily reflected the participants' desires to have "…enough for a decent life…" and "…opportunities to seek improvements…", as defined by Gibson et al. (2005, p. ?). In contrast to Gibson et al.'s conceptualization of the Livelihood Sufficiency and Opportunity principle, however, these concerns did not reflect any intentional thinking about the interconnections within and between present- and future-generation livelihood sufficiency and opportunity. This was most clearly demonstrated in a general lack of attention to the distributive dimensions of the principle.

The livelihood sufficiency concerns that were most frequently expressed included the following:

- Physical infrastructure (e.g., need link between local and regional transportation systems, accommodate growth with more infrastructure, keep up with aging infrastructure, more bike paths, new crosswalk, new traffic lights, etc.),
- Public services (e.g., health care, affordable child care, services for people with mental health issues, needs of aging population, etc.),
- Local economic development (e.g., promote local tourism, promote small enterprise, more local markets, thriving local economy, local employment opportunities, etc.),

- Arts and cultural opportunities (e.g., more opportunities for arts and culture) and
- Recreational opportunities (e.g, more leisure pool programs, more tai chi programs, more basketball, need a local arena, etc.),
- Cost of living (e.g., rising costs of energy and transportation, high costs of oil and gas, city is built out, affordable housing, etc.),
- Downtown revitalization (e.g., downtown needs revitalization, need a thriving downtown, etc.),
- Safety,
- Residential, commercial and industrial development (e.g., better hotel accommodations, more growth to improve tax base, invest in mining, develop the port, more shopping, more population growth to improve quality of life, etc.),
- Education and training opportunities, and
- Local agriculture (e.g., encourage farmers to grow, need a farmers market, need strong local food system, etc.).

The least frequently expressed concerns were related to the distribution of wealth, opportunities, rights and freedoms. In this regard, the following issues emerged:

- Local markets are inaccessible to farmers,
- Land value for subdivisions is greater than continued farming,
- Farmers do not make adequate income,
- Commodification of water,
- Access to lakes, rivers, coastline,
- Dependence on global markets and resource prices,
- Dependence on oil,
- Limits of tax system,
- Living wages for all,
- Debt to service ratio, and
- Live within our means.

While the above matters were clearly oriented towards Gibson et al.'s 'Livelihood Sufficiency and Opportunity' principle, they overlapped in important ways with the other sustainability criteria. It is beyond the scope of this analysis to describe in detail how each concern did this. But there are many obvious good illustrations. For example, though the common desire for adequate health care did not evidently include a worry for how health care services are distributed, it implicitly related to the inter- and intragenerational distributional effects of public health care systems. In fact, most of the livelihood and sufficiency cares overlapped with Gibson et al.'s intra- and intergenerational equity criteria – even though there was no evident concern for these things in the public's responses. Similarly, though the common wish for a thriving downtown core was directly related to present-generation economic circumstances, it overlaps with social-ecological integrity and resource and maintenance efficiency matters. Resource maintenance and efficiency concerns also relate to the general desire for more bike lanes and walking trails. Many of the considerations may work synergistically to impact other sustainability areas. For example, affordable housing, cost of living, poverty, dependence on oil, and other economic development cares may come to bear on community capacity for adaptive

and multi-stakeholder governance, ecological integrity, and the quality and quantity of natural resource systems.

The second-most frequently expressed context-specific matters were directly related to Gibson et al.'s (2005) present-generation 'Resource Maintenance and Efficiency' principle. Again, a general lack of direct attention was devoted to the impacts of present-day actions on the long-term integrity of social-ecological systems. Rather, the public's cares were primarily oriented towards the "…reducing extractive damage, avoiding waste and cutting overall material and energy use per unit of benefit" ideas in Gibson et al.'s Resource Maintenance and Efficiency principle. The issues that were most common across Canada included the following:

- Physical infrastructure (e.g., more bike and walking trails, convenient transportation options, better public transit, traffic congestion, infrastructure repair needed, need rapid transit connections, parking takes up too much space, better synchronization of traffic signals, etc.),
- Waste management (e.g., improved waste collection, composting programs, increased recycling, stormwater management, waste diversion, etc.),
- Development (e.g., smart growth, green development initiatives and standards, appropriate development, close main street on weekends, poorly planned development, brownfield development, recognize connection between local economic development and infrastructure development, etc.),
- Growth planning (e.g., protect town from growth, city is built out, low impact economy, need urban containment boundary, growth management plan, growth and infrastructure issues, how to accommodate growth),
- Energy (e.g., conservation, limits on fossil fuel consumption, invest in renewable energy, energy conservation, need local carbon offset program, need alternative fueled vehicles, etc.),
- Water (e.g., water conservation programs, growing demand, low flush toilet rebate program, etc.), and
- Land (e.g., keep land for industry, adequate supply of land, sell marginal land for development, efficient use of land).

The least frequently expressed concerns in this category included the following:

- Limit growth through controlled population growth,
- Slower growth, controlled growth,
- Slow food movement,
- Long commute times, more integrated approach to planning, eliminate idling, reduce consumption, zero waste initiatives, weekly limits for waste, live within our means, post-materialist values.

There was obvious overlap between these resource efficiency worries and a care for social-ecological system integrity. Other, perhaps less conspicuous areas of interconnection included governance issues. For example, there are links between urban sprawl and municipal capacity to generate revenue and, in turn, associated abilities to deliver vital good and services. Other connections relate to present- and future-generational equity and livelihood matters, all of which,

in turn, influence our ability to adapt to and plan for changing circumstances.

The third-most prevalent community-specific sustainability concerns were related to Gibson et al.'s 'Social-Ecological Civility and Democratic Governance' and 'Socio-Ecological System Integrity' principles. With respect to the former, the matters that were most common across Canada included the following:

- Community and governance capacity (e.g., strong civic culture, strong volunteerism, strong sense of community, partnerships with other governments and businesses, partnerships with local ranch owners, trust, strong leadership, regionally responsive government, networking between government and stakeholders),
- Planning processes (e.g., inclusive processes, transparent processes, First Nations involvement, accessible government, accountability, revenue sharing, shared services, sustainability committees, education programs, holistic planning needed, greater fiscal responsibility, good understanding of sustainability),
- Conflict and competition (e.g., rising conflict over natural resources, competition for natural resources, Canadian-US closeness, achieve balance in competing interests), and
- Economic stability (e.g., pressures on government finances, strong tax base to cover service costs).

The least frequently expressed concerns in this regard were related to power:

- Foreign powers controlling debt,
- Protectionism,
- Power of corporations,
- Rise of religious fundamentalism,
- Power shifts between federal and provincial governments,
- Local control over local government.

With respect to Socio-Ecological System Integrity, the most commonly expressed matters were related to what should be protected, restored and maintained, including the following, among others:

- Air quality, water quality and quantity, green spaces, historic ranches, farmland, soil, wetlands and wildlife corridors, old growth trees, trees along river, riparian areas, biodiversity, areas for parkland.

Other commonly expressed matters related to the way that we think about natural systems:

- Develop culture of environmental stewardship, consume less, respect traditional wisdom of animals about plants, value Lake Ontario, recognize the links between the environment and health, and attach value to the natural environment.

Still others were related to the factors threatening the integrity of local natural systems:

- Gravel pits destroying river, forestry, mining, agriculture have negative impacts on local ecosystems; climate change, light pollution, noise pollution, invasive weeds, and invasive insects.

Again, there was a lot of overlap between these issues and livelihood, equity, and resource maintenance issues. The unfair distributional effects of resource extraction, for example, have been well documented in Canada and around the world (e.g., The International Human Rights Clinic, 2010; Stuckler et al., 2013). And economic stability, the power of corporations, and inclusive decision making may all bear on community capacity to enhance the integrity of vital social-ecological systems (Allmendinger & Tewdwr-Jones, 2002; Barnaud & Van Paassen, 2013; Miles, 2013). All of these matters may influence our ability to plan for and adapt to changing circumstances.

The least frequently expressed considerations were related in a direct way to Gibson et al.'s (2005) 'Intragenerational Equity', 'Intergenerational Equity' and 'Precaution and Adaptation' principles. With respect to the former, the most common equity concerns were intragenerational in that they implicitly addressed the objective of reducing gaps (in sufficiency and opportunity) between the rich and poor. In this regard, the most common matters that emerged were poverty reduction, affordable housing, accessibility to natural resources and markets, and rising costs of living. The most common intergenerational equity concerns that emerged were rising cost of living and reducing poverty and homelessness.

With respect to Gibson et al.'s (2005) 'Precaution and Adaptation' principle, the most common considerations that emerged were the desire for 'progressive' or innovative community and sustainability planning or long-range planning. Only six municipal SSP initiatives included the desire for a progressive community: Prince George's Integrated Community Sustainability Plan, Fort St. John's Today & Tomorrow: Our Strategic Plan, Cochrane's Sustainability Plan, Lethbridge City's Municipal Development Plan/Integrated Community Sustainability Plan, Huntsville's Unity Plan, and Chester's Integrated Community Sustainability Plan. That said, many of the worries that emerged in direct relation to the other criteria could impact our capacity to plan in such a way to recognize and adapt to change, uncertainty, and surprise.

It is important to note that many of the community-specific concerns were expressed in a general way, using broad terms (e.g., 'poverty reduction', 'preservation of farmland', 'conservation of energy', 'economic growth', etc.) as opposed to identifying particular community issues or assets related to these broad sustainability areas. That said, many concerns that emerged began to illustrate the particularities of the communities. Table 29 below lists some of the most distinct sustainability concerns that emerged from the community-scoping step. Note that these concerns are presented in the same way that they were presented in the plans.

Table 29 Distinct Sustainability Concerns that Emerged from Community Scoping

Province/ Territory	SSP Initiative	Distinct Sustainability Concerns
Alberta	Camrose Municipal Sustainability Plan	- Seasonal work - Bailey Theatre project - Live within our means
	Cochrane Sustainability Plan	- Protect ranchlands and historic ranches - Do not become a bedroom community - Need a growth cap
British Columbia	Fort St. John Today & Tomorrow: Our Strategic Plan	- Need for detox centres and mental health facilities - Enough taxes to cover service costs - Need long-range planning
	Prince George Integrated Community Sustainability Plan	- Less materialist culture, post-materialist values - Conflict over natural resources - Appropriate technology movement
	Sooke DM Sustainable Development Strategy	- Slow food - Space for cremation in the cemetery - Better hotel accommodations
	Sooke DM Official Community Plan	- Bring back bartering - Gravel pits destroying river - Public washrooms in downtown core - Want a Tim Horton's, meat shop, Starbucks, Dairy Queen
	Williams Lake Imagine Our Future Integrated Community Sustainability Plan	- Difficult to attract and retain professionals - Alcoholism and obesity - Traditional wisdom about animals and plants - Need to preserve First Nations culture - Higher unemployment among First Nations - Domination of rental stock
Ontario	Bracebridge Community-Based Strategic Plan	- Slow the rate of clear-cutting - Keep Muskoka forests the same - Expand licenced childcare
	Huntsville Unity Plan	- Seasonal jobs - Huntsville in charge of Huntsville - Close Main Street down on weekends - Use four-stroke engines
Nova Scotia	Cape Breton Regional Municipality Integrated Community Sustainability Plan	- Clean up Sydney Harbour - Invest in mining - High costs of oil and gas - Keep kids in Cape Breton
	Chester Integrated Community Sustainability Plan	- Fishing opportunities - Aquaculture issues - Single municipal government for district

		- Work closely with First Nations - Seasonal employment
Newfoundland & Labrador	Gander Integrated Community Sustainability Plan	- Emissions from airport - Protect Gander Lake
Northwest Territories	Yellowknife Smart Growth Development Plan	- Business should be responsible for cleaning up litter - Better synchronization of traffic lights - First Nations participation in planning - Downtown revitalization efforts should reflect First Nations culture
Yukon Territory	Whitehorse Strategic Sustainability Plan	- Subsidized bus passes for low income families - Current development is marginalizing families with low incomes - Gentrification of downtown

In the vast majority of SSP initiatives, the community-scoping step was not clearly structured around social-ecological resilience matters. In attending to the above sustainability criteria, however, the public's responses implicitly covered resilience concerns related to Walker and Salt's (source) diversity and modularity attributes, which were implicitly covered by Gibson et al.'s (2005) decision criteria. For example, the most common diversity concerns were economic diversity (especially job opportunities), diversity in housing options, diversity in transportation options, and cultural diversity. The most common modularity concerns were related to the economy (e.g., local economic development) and local food systems. The notions of controlling variables, thresholds and multiple equilibrium states, however, were rarely expressed directly. Williams Lake's ICSP initiative identified that the community is at a critical juncture (or threshold) with respect to moving from a resource town to a new economy. In Cape Breton's undertaking, the community expressed a worry about a declining population, which could be interpreted as a controlling variable. Similarly, Chester's plan highlighted the city's aging population issue and the problem of slow loss of public access to the coastline due to ownership changes, which could be perceived as controlling variables or threshold matters.

Two of the SSP initiatives covered a relatively good range of resilience concerns. Prince George's Integrated Community Sustainability Plan expressed concerns related to controlling variables, thresholds, multiple equilibrium states as well as diversity, modularity and innovation. Charlottetown's Integrated Community Sustainability Plan included emphasis on fast and slow variables, diversity and modularity.

Finally, some concerns emerged that were not well covered by the sustainability criteria. These concerns were mostly related to community spirit (e.g., people are friendly, can-do attitude, optimism about the future), sense of place (e.g., do not become a bedroom community, do not want to look like Scarborough, do not want to be another Barrie), built environment aesthetics (e.g., lack of character in commercialized zones, keep the small downtown feel, keep old style façade look on Manitoba streets), and natural environment aesthetics (e.g., dark skies).

6.2.3 Community-Specific Social Change Concerns Covered

Social change concerns relate to the plan enactment environment. Local government-specific SSP social change considerations and a consideration for multiple scales of interaction and positive threshold effects were used to evaluate the range of community-specific social change matters that were covered (see Table 20 and 22).

The vast majority of SSP initiatives did not purposefully undertake a community-scoping step in order to investigate the place-specific constraints and enablers and accompanying multi-scale realities that may influence the successful enactment of particular sustainability goals. The initiatives that came closest to doing this were those that included a concern for social change in the open-ended questions or other methods that structured the scoping frameworks. Chester's ICSP, from Nova Scotia, was atypical in this regard in that it identified some challenges and opportunities associated with operationalizing each sustainability goal. While an institutional lens did not guide Chester's investigation, it covered many regulative, normative and cognitive elements of institutional systems.

Many of the plans set out actions or strategies for the sustainability goals and these covered the policies, plans, programmes and other initiatives that should be pursued in order to achieve them. Some common legislative implementation concerns were ideas to align other plans, policies and programs with the sustainability strategy, and create new bylaws or policies that would support strategic goals. Some common normative concerns included ideas for new principles, standards, checklists, and incentives that would aid in enacting particular goals or policies. Cognitive considerations were covered by ideas for awareness campaigns, public information programs, education and training, or promoting a particular attitude towards, for example, conservation and stewardship.

6.2.4 Community-Specific Implementation Concerns Covered

Like social change matters, community-specific implementation issues relate to the enactment environment. Local government-specific SSP implementation needs (financial, political, administrative, governance, and planning process) and a consideration for multiple scales of interconnection and interaction were used to evaluate the range of community-specific implementation matters covered (see Tables 20 and 22).

As previously described, in all of the initiatives the community-scoping step did not extend to implementation in such a way that the goals and implementation plans were linked through some scoping of community-specific enactment needs. All of the plans, however, recognized the importance of implementation and all expressed a general concern to develop partnerships for effective enactment; organizational tiering and incorporating sustainability goals in all levels of the organization; the need for monitoring and revision; and ongoing public participation in decision making. Sub-section 6.1.7 above described four general approaches to enactment planning in the plan development stage. They were described according to a weak-to-strong spectrum of approaches, depending on the range of implementation concerns that were covered. Table 30 below organizes the SSPs that were selected for further analysis according to these four general approaches.

Table 30 Four General Approaches to Implementation Planning

Weakest	Stronger		Strongest
Brief Summary of Next Steps	**Actions Identified for Goals**	**Actions and Details Provided (Timeframes, Budgets, Actors) for Goals**	**Actions, Details and a Proposed Governance Model**
Whitehorse Strategic Sustainability Plan, YT	Camrose Municipal Sustainability Plan, AB	Bracebridge Community-Based Strategic Plan, ON	Huntsville Unity Plan, ON
	Cape Breton Regional Municipality ICSP, NS	Charlottetown ICSP, PEI	Kingston Sustainable Kingston Plan, ON
	Cochrane Sustainability Plan, AB	Chester Municipality ICSP, NS	
	Collingwood Sustainable Community Plan, ON	Gander ICSP, NL	
	Fort St. John Strategic Plan, BC	Lunenburg Municipal District ICSP, NS	
	Lethbridge City ICSP, AB	Mount Pearl ICSP, NL	
	Lethbridge County ICSP, AB	Prince George ICSP, BC	
	Prince Rupert Quality of Life Community Plan, BC	Spruce Grove Your Bright Future Municipal Development Plan, AB	
	Sooke DM Official Community Plan, BC	Truro Community Sustainability Plan, NS	
	Sooke DM Sustainable Development Strategy, BC	Yellowknife Smart Growth Development Plan, NT	
	West Hants Municipality ICSP, NS		
	Williams Lake Imagine Our Future ICSP, BC Yellowknife Community Based Strategic Plan, NT		
	Yellowknife Community Based Strategic Plan		

As Table 30 shows, most of the plans selected for further analysis set out actions or strategies associated with the goals or policies. These actions or strategies reflected some thinking about implementation as well as social change requirements; however, the vast majority did not reflect an effort to identify the particular governance, administrative, financial and planning process needs associated with enactment.

The plans listed in the third column, which provided timeframes, responsible actors and budget considerations, were general in the information they provided. For example, timeframes were usually considered in terms of short-, medium-, and long-term categories; costs were approximate costs and, in a few cases, potential funding sources were listed. Responsible actors were also provided in general terms, using the names of departments or, in some cases, the names of municipal and private-sector organizations.

Finally, as previously noted, Huntsville's and Kingston's plans are relatively stronger than all the others. Similar to the above mentioned plans, they set out actions that represent initiatives that should be pursued and they provide details about potential partners and financial considerations. Unlike most of the other plans, however, Huntsville's and Kingston's plans provide more specific details with respect to these things, and both plans provide a proposed implementation model. Huntsville's Unity Plan provides a proposed organization model, which includes a Unity Plan Implementation Committee that reports to Council, a Sustainability Coordinator whose responsibility is to oversee implementation, and a Sustainability Director responsible for overall progress. The proposed Implementation Committee is comprised of Council members, staff, community organizations and individuals, and it covers six different themes that represent social, economic, ecological and built community systems. Kingston's plan proposes a governance model, which includes a non-profit organization that is community-based and arm's length from municipal government. The organization is given responsibility for implementing the plan. The Board of Directors should be comprised of key members of the community and they should be responsible for, among other things, creating partnerships with community organizations for the purpose of enactment.

The Municipality of Chester was atypical in that it provided information about the timeframes, resources, opportunities and challenges associated with each strategic goal. The identification of opportunities and challenges was what differentiated this undertaking from the others. Regardless, this SSP initiative was categorized as stronger, as opposed to strongest, because it did not set out a governance model nor was it specific with respect to the resources needed.

6.2.5 Processes Used to Include the Public in Community Scoping

Fung's (2006) democracy cube framework with Sterling's (2010-11) levels of learning and change was used for the evaluation of the processes used to include the public in the community-scoping step (see Figure 4).

With respect to the 'scope of participation' dimension, most (21/26 or 81%) SSP initiatives used methods that were broadly inclusive as opposed to restrictive, as the majority of the initiatives fell under the diffuse public sphere, open/self selected, and open with targeted recruitment categories. In many cases, however, multiple methods were used with varying degrees of

inclusiveness or restrictiveness. For example, many initiatives (17/26 or 65%) combined inclusive workshops with steering committees, which were comprised of a relatively small number of stakeholders whose job it was to oversee the plan creation process. Lethbridge City's ICSP initiative, for instance, used a Future Scenario exercise that was open to the entire community. But they also created a Community Advisory Group and a Technical Advisory Group, both of which provided insight throughout the development and refinement of the Plan. The use of these groups reflects Fung's (2006) 'lay stakeholders' and 'expert administrators' categories, respectively, which represent more restrictive methods.

With respect to 'mode of communication', all of the cases fell into the 'express preferences' mode in that all of them asked participants to answer open-ended questions, vote on preferences, and/or answer surveys and questionnaires. Generally speaking, the community-scoping step was not designed to encourage deliberation and negotiation over various ideas, issues, assets or options for sustainable community systems change. Again, however, the findings showed that a small number of cases (3/26 or 7%) used methods that reflect a more intense mode of communication. In Prince George City's ICSP initiative, for instance, future scenario workshops allowed participants to brainstorm about different external factors that could affect the City, prioritize a final list of factors, select the two most critical factors, sketch out different scenarios using different combinations of the two factors, and create stories based on these scenarios. Similarly, in the Town of Cochrane's initiative, Action Groups were asked to discuss various community concerns and then aspects of the plan were created based on their input. In the Town of Collingwood's initiative, participants were asked to discuss the trade offs and benefits of various development options under consideration. These interactive methods reflect a more deliberative mode of communication in that participants had an opportunity to develop preferences and perhaps learn from each other by reflecting on different opinions.

With respect to 'extent of authority', all of the cases fell into the 'communicative influence' extent of authority in that the scoping step was designed to receive input from stakeholders as opposed to encouraging co-governance or direct authority over the SSP process. The differences between the communicative influence and advise/consult categories were blurry, however. Many of the plans stated that the information gathered influenced the creation of the goals, objectives, strategies, etc., which suggests a more consultative role. Again, Prince George's and Cochrane's cases encouraged co-governance and direct authority in that the participants' created parts of the respective plans. But the aim of the approach in these cases was not to facilitate co-governance in the design of the whole process, nor in the ongoing enactment of the goals.

With respect to the three 'orders of learning and change', the results showed that all of the initiatives reflected the first order of learning and change, which results in doing things better while remaining conformative. In all cases, the community-scoping step was not intentionally designed to encourage learning, an examination of assumptions, and seeing things differently. More research is required, however, to better understand whether or not participants did examine their assumptions and see things differently regardless of the lack of direct attention to these things. The findings suggested that second order learning and change may have occurred in three cases, Prince George City's ICSP, the Town of Cochrane's Sustainability Plan undertaking, and Collingwood's Sustainable Community Plan initiative. In Prince George's case, the future scenario exercises could have encouraged second order learning. In Cochrane's case, Action

Groups were given the opportunity to discuss the interconnections within and between community systems and concerns. In Collingwood's case, community workshops encouraged discussion around nine key proposed options that the Town was considering for the development of a sustainable community. The participants were asked to discuss the tradeoffs and benefits of each option and then decide as a group on the preferred option.

6.3 Summary

This chapter shared the results of the basic qualitative information collection step and in-depth analysis of applied community-scoping frameworks. When interpreted together, these findings begin to reveal prevailing community-scoping practices and, by extension, the condition of local government SSP more broadly. The results also begin to increase our understanding of the efficacy of the analytical framework. The following summary presents the results of these research steps.

6.3.1 Basic Qualitative Data Collection

Qualitative information was collected about each plan in order to generate a broad brushstrokes understanding of the broader plan formulation process within which the community-scoping step was nested in each initiative. This research step was structured around best practice principles categories. Information was also collected about whether a best-known framework was used to guide the plan formulation stage, including the community-scoping step. Table 31 below summarizes the findings of this step.

Table 31 Summary of Findings from Basic Information Collection Step

Basic Information Collected	Summary of Findings
Definition of sustainability	The majority (58%) of the SSPs included a definition of sustainability based on the Brundtland definition. Many (47%) plans also expressed a plan-specific understanding of the concept. Other plans (21%) incorporated their own definition without referring to the Brundtland Report. The plans that did not include a definition used the words 'sustainability' or 'sustainable development' throughout as a noun or adjective. Thirteen plans (20%) fell into this category. Table 24 provided a sampling of the plan-specific definitions. A superficial reading of these revealed differences in how the concept has been understood and conveyed across Canada. The major differences among them will be discussed in more detail in Chapter Seven.
Application of sustainability principles	In most cases (60%), sustainability principles were adopted to 'guide' and/or 'provide the basis' for more specific goals, strategies and/or policies. In seven initiatives, well-known sustainability principles were set out and, in many cases (49%), citizens created their own principles or guiding framework. The majority of SSPs (80%) also included a vision and/or overarching goals or objectives, which were meant to guide or inform decision making. Generally speaking, the process by which these high-level guides influenced decision making was unclear. The tendency was to provide a brief description about how they were used, without any demonstration.
Integrative thinking	All plans acknowledged that sustainability planning requires a systems approach, inter-departmental coordination, the alignment of strategic plans and priorities, and coordination between provincial, regional and community initiatives. The majority (91%) of SSP initiatives did not demonstrate integrative thinking in the community scoping step and development of sustainability goals. The tendency was to organize the information and create the goals in relation to their respective pillars or discrete urban planning categories. The exceptions to this trend included plans that showed how the sustainability goals or actions addressed various sustainability pillars (e.g., Surrey, Mount Pearl, Prince George, Cochrane, Terrace, and Yellowknife).
Consideration of alternatives and trade-offs.	None of the SSP initiatives was designed in such a way to develop and investigate alternatives and trade-offs.
Broadly inclusive public participation.	A diverse range of methods was used to engage community members in the plan formulation process. These methods included a spectrum of more or less restrictive and/or open-ended approaches. The prevailing practice was to undertake the community-scoping step once, concurrently with visioning, at the outset of plan development. Most of the SSPs described that the feedback received from the public 'influenced' or 'provided the basis' for the vision statement, goals, actions, policies, etc.
Social change considerations incorporated in plan formulation	All of the SSPs emphasized the idea of social change in one way or another. The vast majority of SSPs, however, were not clearly underpinned by a social change agenda in that the purpose of the initiatives was not to develop strategies for community-based transitions. There were some exceptions in this regard. West Hants' ICSP begins with a purpose statement that emphasizes the imperative to change our ways. Williams Lake's ICSP was structured around developing 'Transition Strategies', which aim to close the

	gap between the current reality and descriptions of success in various urban planning categories.
Implementation considerations incorporated in plan formulation	All of the plans expressed some concern for implementation. However, the findings suggest that, generally speaking, practitioners have not been considering community-specific implementation needs in a detailed and comprehensive way in the plan formulation stage.
Applied Best-Known SSP and Community-Scoping Frameworks	Thirteen plans used a well-known SSP framework (see Table 26). A superficial reading of the plans suggests that they were not followed in a precise and comprehensive way. Seven SSPs used a well-known community-scoping framework (see Table 27). Generally, practitioners developed their own approach to community scoping. The frameworks aimed to identify different types of concerns: trends, issues/challenges, assets/opportunities, priorities, preferences, opinions, values, etc. In most cases, urban planning categories (e.g., land use, transportation, economy, etc.) sustainability pillars (social, economic, environmental, cultural, governance), or some combination of these were used to organize the questions and answers.

6.3.2 In-Depth Analysis of Applied Community-Scoping Frameworks

Twenty-six SSPs provided enough information about the community-scoping step to be selected for this evaluation step. Table 19 listed these initiatives. Table 32 below shares the results of the analysis.

Table 32 Summary of Findings from In-Depth Analysis of Community Scoping

Aspects of the Analysis	Summary of Findings
Range of concerns initially covered by the community-scoping frameworks This analysis was framed by the core generic concerns of SSP and three key resilience concepts (controlling variables, thresholds and alternative futures)	The community-scoping frameworks were grouped into three categories that represent the range of generic concerns initially covered: 'comprehensive coverage', 'selective coverage', and 'narrow coverage'. Table 28 organized the SSP initiatives according to these categories. Most of the community-coping frameworks used open-ended questions that could cover a comprehensive or selective range of generic SSP considerations.
Context-specific sustainability and resilience concerns elicited from the public This analysis was framed by local government-specific SSP concerns and three key resilience concepts.	Most of the concerns that emerged were directly related to Gibson et al.'s (2005) 'Livelihood Sufficiency and Opportunity' principle. The second-most frequently expressed matters were directly related to Gibson et al.'s present-generation 'Resource Maintenance and Efficiency' principle. The third-most prevalent sustainability concerns were related to Gibson et al.'s 'Social-Ecological Civility and Democratic Governance' and 'Socio-Ecological System Integrity' principles. The most infrequently expressed considerations were related in a direct way to Gibson' et al.'s 'Intragenerational Equity', 'Intergenerational Equity' and 'Precaution and Adaptation' principles. Generally, the community-scoping step was not clearly structured around resilience, social change, and practical implementation matters. In attending

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	to the above sustainability criteria, however, the public's responses implicitly covered resilience concerns related to 'diversity' and 'modularity'. The notions of controlling variables, thresholds and multiple equilibrium states, however, were rarely directly expressed. Two of the SSP initiatives covered a relatively good range of resilience concerns. Prince George's Integrated Community Sustainability Plan included concerns related to controlling variables, thresholds, multiple equilibrium states as well as diversity, modularity and innovation. Charlottetown's Integrated Community Sustainability Plan expressed concerns related to fast and slow variables, diversity and modularity.
Context-specific social change concerns covered Local government-specific social change considerations and a concern for multiple scales of influence, interaction and positive threshold effects were used to evaluate the range of context-specific social change matters that were covered.	The vast majority of SSP initiatives did not undertake a community-scoping step in order to investigate the systemic constraints and enablers associated with enacting particular sustainability goals. The initiatives that came closest to doing this were those that included a concern for social change in the open-ended questions or other methods that structured the scoping frameworks. Chester's ICSP, from Nova Scotia, was atypical in this regard in that it identified some challenges and opportunities associated with operationalizing each sustainability goal. While an institutional lens did not guide Chester's investigation, it covered many regulative, normative and cognitive elements of institutional systems. Many of the plans set out actions or strategies, which covered the regulative, normative, and cognitive dimensions of institutional systems.
Context-specific implementation concerns covered Local government-specific implementation needs and a concern for multi-scale influences and interactions were used to evaluate the range of context-specific implementation matters covered	All of the plans recognized the importance of implementation and all expressed a general concern to develop partnerships for effective enactment; organizational tiering and incorporating sustainability goals in all levels of the organization; the need for monitoring and revision; and ongoing public participation in decision making. The plans were organized according to weak, strong, and stronger approaches to considering enactment needs (see Table 30). Most of the plans considered implementation by setting out actions. But few initiatives investigated practical implementation needs in a detailed and comprehensive way. In all of the cases, the community-scoping step did not extend around implementation in such a way that the goals and implementation plans were connected through some scoping of community-specific enactment needs.
Processes used to include the public in community scoping Fung's (2006) democracy cube framework with Sterling's (2010-11) levels of learning and change was used for the evaluation of the community-scoping processes.	With respect to 'scope of participation', most SSP initiatives used methods that were broadly inclusive as opposed to restrictive. In many cases, however, multiple methods were used with varying degrees of inclusiveness or restrictiveness. The vast majority of cases reflected the 'express preferences' mode of communication in that most initiatives asked participants to answer questions, vote on preferences, and/or answer surveys and questionnaires. Generally speaking, the community-scoping step was not designed to encourage deliberation and negotiation over various ideas, issues, assets or options for sustainable community systems change. The vast majority of the community-scoping methods reflected the 'communicative influence' extent of authority in that the scoping step was designed to receive input from stakeholders as opposed to encouraging co-governance or direct authority over the SSP process. All of the initiatives reflected the first order of learning and change, which results in doing things better while remaining conformative. In all cases, the community-scoping step was not intentionally

	designed to encourage learning, an examination of assumptions, and seeing things differently. More research is required to better understand whether or not participants examined their assumptions and see things differently regardless of the lack of direct attention to these things. The findings suggested that second order learning and change may have occurred in three cases: Prince George, Cochrane, and Collingwood.

The results of the basic information collection and in-depth analysis of community-scoping frameworks reveal the extent to which local government SSP initiatives have covered the core concerns of strategic planning for social change towards sustainability. More specifically, the findings evidence our understanding about what local government SSP should mean and how it should be pursued. Chapter Seven contains a discussion of the findings.

Chapter Seven – Discussion of Stage One Results

In this chapter, I discuss the findings of the basic information collection step and in-depth evaluation of community scoping. Then, I discuss the efficacy of the analytical framework that I used in these research steps and the implications of the findings for theory and practice.

7.1 Results of Basic Qualitative Data Collection

As explained in Chapter Five, the basic information collection step aimed to generate a broad brushstrokes understanding of the plan formulation process within which the community-scoping step is nested. Information was collected about best practice categories (early adoption and consistent application of sustainability, integration, alternatives and trade offs, broadly inclusive participative processes, consideration of social change and implementation matters) as well as whether a best-known local government SSP framework was employed.

In order to avoid unnecessary repetition, I combine my discussion of the findings that emerged about public participation methods, social change and implementation considerations with the findings that emerged with regards to these topics from the in-depth analysis of the applied community-scoping frameworks. These findings are consistent and reinforce each other in ways that create overlap in the discussion.

7.1.1 Adoption of the Concept of Sustainability

The widespread presence of the WCED (1987) definition of sustainable development evidences a shared commitment to and understanding of the concept of sustainability in local government SSP. It also suggests that the Brundtland interpretation of the term has become institutionalized within the municipal government sector in Canada. This entrenchment has been supported, in part, by broad acceptance of the Brundtland definition in the political arena over the past twenty-five years. Indeed, the ubiquitous use of this version of sustainable development suggests that it has become a taken-for-granted norm to use it.

On the other hand, the unique definitions of sustainability that emerged reveal plan-specific or community-specific interpretations. Table 29 gave a sampling of the different expressions that were found. A comprehensive analysis of the commonalities and divergences among them is beyond the scope of this dissertation. Upon superficial examination it is clear that, while there are common elements among them, they can be distinguished by fundamental differences in their conceptual orientations. All of the definitions mentioned three or more dimensions of sustainability (i.e., some combination of social, cultural, economic, environmental, and governance dimensions), which indicated a common, conceptual-level understanding of the integrative basis of the concept. That said, Summerside's definition was primarily oriented towards economic concerns. Other conceptual orientations were found in Dawson Creek's definition, which espoused the notions of resilience, change and uncertainty; Whitehorse's interpretation, which emphasized living within biophysical limits and doing things better; and Huntsville's definition, which expressed the idea that there are limits to growth and development.

These different interpretations of sustainability could be placed along a spectrum of weak to strong understandings of the concept, as described in Chapter Two. Summerside's interpretation could be situated at the weaker end where efficiencies and technological improvements could be emphasized, while Dawson Creek's, Whitehorse's, and Huntsville's could be placed somewhere along the stronger end, where the finitude of Earth's natural resources and the need to change our relationship with the natural world would be embraced (see Williams and Millington, 2004).

The presence of common and plan-specific understandings of sustainability is consistent with Robinson's (2004) procedural view of the concept in that these different definitions evidence the context-specific social processes by which the meaning of sustainability is produced. Or, using Robinson's terms, they reflect how sustainability emerges out of a conversation about desired futures informed by some understanding of the social, economic and ecological consequences of our actions. But this does not mean that all conceptualizations are created equally. Indeed, from a procedural standpoint, the normative basis of sustainability is essentially contested and the plan-specific definitions that emerged reflect this contestation. Only a minority of plan-specific definitions expressed the notions of limits to growth and doing things better, and none of the plan-specific interpretations conveyed a Capra-esque or deep-green sensitivity to the spiritual connections between and intrinsic worth of all forms of life (see Capra, 1982; Dobson 2000).

The popular Brundtland definition of sustainable development reflects an internationally negotiated one, which emerged out of different United Nations initiatives since roughly the mid-1970s. While it has been instrumental in generating a globally shared vision for the future of our planet (see Pezzoli, 1997; Mebratu, 1998), it is has been contested and resisted (Robinson, 2004; du Plessis, 2012). One major criticism has been that, in attempting to link environment and development issues, the Brundtland definition embodies an anthropocentric worldview, which suggests that the solution to the intertwined problems of poverty and environmental degradation is more development, albeit development that is sensitive to ecological concerns. As Robinson (2004) has asserted,

> "…the Brundtland Commission called for a '5-10-fold' increase in gross world industrial activity over the next century to meet the needs of the poor…This was greeted with cries of incredulity and horror by an environmental movement weaned on Kenneth Boulding's and Herman Daly's arguments about the need for a steady-state economy…" (p. 4-5).

Included in the Brundtland conceptualization is a vision for a society in which everyone has enough for a decent life, and this includes basic material necessities (e.g., clean water, adequate nutrition, shelter, etc.) and non-material prerequisites (e.g., freedom of religion, protection from injustice, etc.). As du Plessis (2012) has explained, principles for sustainable cities have been proposed based on these ideals, and they encourage such things as compactness, mixed-use neighbourhoods, and energy efficiency, among others. But the extent to which these ideas represent new ways of thinking and practice is debatable. Indeed, as Robinson (2004) has asserted, the Brundtland definition calls for much needed improvements in efficiency and governance reform, but it does not ask for radical changes in values and worldviews.

This emphasis on reform as opposed to transformative change has led some scholars to question whether the Brundtland definition and other internationally negotiated sustainability-based documents (e.g., Agenda 21) have truly embraced a new model of socioeconomic development. Du Plessis (2012), for example, has asserted that these types of documents promote a Western-style neoliberal model of economic growth, negate non-Western, non-industrialized cultures as inferior, and associate poverty with the inability to consume, thus fuelling a consumption- and needs-based interpretation of economic growth and development. Moreover, it is based on a 'less harm' perspective, which conforms to the dominant capitalist model of economic growth and development (see Waldron & Miller, 2013). Some sustainability commentators have argued that such an approach is necessary but inadequate because minimizing harm and reducing our ecological footprint slow but do not end the degradation of vital social-ecological systems (see Waldron & Miller, 2013). As Waldron and Miller (2013) have argued, "Given the anticipated two billion increase in urban dwellers worldwide in the near future, even 'less bad' urban solutions, on the aggregate, will fall short" (p. 9). They merely slow down the decline.

One obvious element, among others, missing from the Brundtland and plan-specific interpretations of sustainability is the objective of contributing net positive benefits to social-ecological well being, which would indicate a shift in thinking and practice. Scholars within the field of sustainability assessment and regenerative sustainability have offered some clues as to how this should be done. Gibson (2005), for example, demonstrates how decision-making frameworks should integrate attention to all sustainability requirements with particular attention to interactive effects than will help to deliver multiple, mutually reinforcing, lasting gains to social-ecological well being. Similarly, regenerative design scholars have developed principles for the design of buildings and neighbourhoods that emphasize a positive, co-evolutionary relationship between built and natural systems (see Cole, 2012, Cole, 2012b). Both of these net positive approaches to thinking and practice entrain a particular set of implications for decision-making structures and processes and governance and institutional systems more broadly (see Reed, 2007).

Here, it is important to note that there are elements of the ecological or systems worldview in the Brundtland and plan-specific definitions. As previously mentioned, all of the definitions do rest on an understanding of the integrative basis of sustainability, which is in concordance with the deep green understanding of human and non-human systems as interconnected and interdependent. But the overall lack of emphasis on mutually reinforcing beneficial outcomes, among other deep green aspirations reveals that this shift in thinking has not yet penetrated municipal government SSP in a pervasive way.

But what do these findings imply about the condition of local government SSP as well as the trajectory of community development? At this early stage, the findings suggest that practitioners and citizens have been committed to the concept of sustainability in municipal SSP initiatives. However, they have also been committing to a model that conforms to the prevailing capitalist model of economic growth and development. Because this model is rooted in a Cartesian paradigm, it entrains a perception of humans as consumers or insatiable desirers of commodities and services, and an accompanying preoccupation with ever-increasing production and consumption (see Gibson, 1975; Capra, 1982, 1996). From this standpoint, the answers to questions about how human demands on the Earth can conjoin with the capability of the Earth to

meet these demands emphasize minimizing and mitigating harm and increasing efficiencies through technological innovations. While these ideas evidence a much-needed conservation and resource efficiency culture at the local level in Canada, there is clearly room for improvement towards deeper green aspirations and net positive approaches that aim to fundamentally change our relationship with the natural world.

7.1.2 Consistent Application of Sustainability Principles

The findings revealed that the prevailing practice in municipal SSP has been to adopt high-level guides (principles, goals, visions, or policies) without demonstrating how they were used in the plan development stage. Indeed, none of the initiatives used a set of principles or criteria to structure the community-scoping step. According to the interviewees from Cochrane's SSP initiative, a process guided by open-ended questions is more effective than using a set of predetermined principles or criteria because the former are more flexible and can better capture the context-specific opinions, values, knowledge, etc. of a community. Previous experiences may also influence a practitioner's choice not to use high-level criteria to guide the planning process. For example, one interviewee from the Cochrane case had a negative experience using The Natural Step's principles and so she did not want to use them again.

Regardless of the reasons for this prevalent approach, it stands in sharp contrast to best practice prescriptions that have been developed by sustainability assessment scholars for strategic planning (see Gibson, 2006). As previously described, these prescriptions include, among other assertions, the idea that sustainability decision criteria should guide decision making throughout the strategic planning cycle. Ideally, sustainability assessment and municipal SSP would be fully integrated, blurring the disciplinary boundaries between strategic planning and assessment. Clearly, however, there has not been such a merging of assessment and strategic planning practice in municipal government SSP in Canada. This could be because (a) well-known SSP frameworks have not been based on an integrated understanding of planning and assessment traditions; (b) SSP and sustainability assessment have evolved independently and there has not been a lot of exchange among strategic planning and assessment scholars and practitioners; and (c) provincial legislative frameworks for municipal-level strategic planning do not require sustainability assessments of proposed plans and policies.

The practical implications of merging sustainability assessment with municipal government SSP represent an area for further research. In a merged model, all of the steps in SSP development and implementation stages would need to be structured around the core concerns of local government SSP, specified appropriately for the context and translated into language that is accessible to the participants. Additionally, the basic steps in the plan creation stage of SSP would change. Steps would be required for the analysis of alternative goals and/or alternative ways of achieving these goals. Indeed, in a merged assessment-SSP model there would a more in-depth investigation of alternative futures, their relative contributions to sustainability, and the trade-offs associated with pursuing one or another way forward. It is conceivable that more analysis in the plan development stage of SSP would require more time, expertise, community consultations and financial resources, and practitioners may resist any additional analytical steps on this basis. One interviewee from the Town of Cochrane case strongly resisted the idea that alternative goals should be analysed relative to a set of sustainability principles. According to

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this interviewee, the extra time and financial resources required for the additional analysis would be impractical because timelines are too short and planning budgets barely cover one round of public consultations.

This all leads to questions about outcomes, specifically whether an integrated assessment-SSP model would lead to more comprehensive plans, more successful enactment, and greater progress towards sustainability over the long term. Indeed, it may be that the goals that emerge from application of established SSP frameworks or approaches structured around open-ended questions would be just as comprehensive as the goals that emerge from an integrated assessment-SSP model. This study begins to shed light on this question about comprehensiveness by evaluating the community-scoping step using a framework comprised of the core concerns of planning for social change towards sustainability. Moreover, outcomes related to comprehensiveness, enactment and progress towards sustainability may be more influenced by community context than any applied approach. More research is required to answer these and other questions related to outcomes.

7.1.3 Integrative Thinking

The findings about integrative thinking reveal the need for practical tools that help practitioners to translate the notion of integrative planning for sustainability into processes that integrate the social, economic and ecological dimensions of sustainability.

The findings also revealed that, generally speaking, there is a lack of understanding among practitioners about how to integrate social, economic and ecological considerations in a proactive way in SSP. The prevailing practice has been to use sustainability pillars or discrete urban planning categories in the identification and categorization of community concerns as well as the creation of sustainability goals – without recognizing the interconnections within and between them. That said, the findings also showed that practitioners have recognized that integrative thinking is a basic requirement of sustainability. Also, a handful of initiatives attempted to illustrate how their goals would contribute to multiple dimensions of sustainability, indicating a retrospective sort of integrated thinking. Beyond these examples, the research did not uncover evidence of integrative thinking in local government SSP.

More research is required to better understand how these somewhat contradictory findings should be interpreted. At this early stage, it seems reasonable to assert that a range of practical and more philosophical factors underpin them. According to one consultant from the Prince George case, it is difficult to begin with an integrated approach because participants need time to hear each other's stories and better understand a community's problems in order to learn how the social, economic and ecological dimensions of a place are interconnected. In his opinion, SSP processes should work to encourage an integrated understanding of a community and this should lead to showing how various goals are interconnected at some point in the planning process.

On a collective level, the findings expose a tension between a prevailing mechanistic worldview and an emerging ecological or systems worldview, as described in the literature review. On the one hand, the widespread recognition of the integrative basis of sustainability reveals a general understanding of the notion. Additionally, the initiatives that showed how their goals relate to

multiple sustainability dimensions indicate some understanding of how to operationalize it. These findings suggest a shift in mindset towards the integrative thinking aspect of the systems worldview. On the other hand, the findings evidence a general lack of understanding about the practical, process-related implications of integrated thinking for SSP, and this lack of understanding underscores the embeddedness of the mechanistic worldview and its accompanying (departmentalized, hierarchical) organizational structures and processes. It also depicts a deeper widespread confusion about how to conceptualize the interconnections within and between social-ecological systems. Generally speaking, practitioners seem to understand the notion of integration on a superficial conceptual level, and they do not yet understand how to design processes that reflect an integrated approach.

Thus, in this regard the results convey the location of practice within a large-scale, long-term transition from a mechanistic worldview to a worldview rooted in a systems perspective. At the very least the findings suggest that, on a collective level, we are in the midst of figuring out how to translate our conceptual understanding of integrative thinking into decision-making structures and processes. The contradictions in the findings begin to delineate the point at which practitioners are situated in the evolution of their understanding about the conceptual and practical process-related implications of an integrated view of the world. They also portray the extent to which the (hierarchical and departmentalized) organizational structures and process associated with the mechanistic worldview are institutionalized at the local level. Indeed, the findings suggest that more research is required to develop tools that help practitioners to design decision-making processes that encourage integrated thinking in the context of the prevailing structures and processes of municipal government organizations.

7.1.4 Alternatives and Trade-Offs

Alternatives and trade-offs were not considered in any of the local government SSP initiatives. The SSP initiatives were not structured around an aim to investigate the most positive vision and goals or development trajectory from a range of potential visions, goals or development trajectories that reflect the local context. This finding pertains mainly to the implications of sustainability assessment contents and processes for local government SSP and the community-scoping step more specifically. I discuss these implications in more detail in Chapter Nine.

7.1.5 Applied Best-Known Municipal SSP and Community-Scoping Frameworks

The findings about the use of best-known frameworks begin to illuminate the overall condition of local government SSP practice as well as why practice is the way it is. On a more practical level, they increase our awareness of the challenges that may accompany our efforts to refine practice.

Generally speaking, practitioners have been crafting plan-specific principles, objectives or policies to guide the creation of the plans, and three basic process stages have been undertaken: visioning and community scoping, creation of goals and actions, and implementation planning. Similarly, practitioners have tended to develop their own approaches to community scoping, most of which have been structured around open-ended questions and/or predetermined response options. In the majority of initiatives, practitioners used urban planning categories or

sustainability pillars to structure the questions and/or responses from the public.

These results imply that there is a shared understanding among practitioners with respect to the steps in the plan creation stage of SSP and how community scoping should be undertaken. The interviews from the three cases provided some interesting insights in this regard. It may be that one or more planning frameworks were considered in the pre-development phase, but not adopted for one reason or another. One planner from the Prince George initiative mentioned that he did quite a bit of preparatory research, including interviews with other planners and consultants about the methods that other municipalities have been using to undertake SSP. This reveals how information sharing among professionals can influence practitioners' choices and so spread certain planning norms across organizations. Over time, this can lead to a shared understanding of how strategic planning should be undertaken. As I noted in Chapter Three, this phenomenon can be explained by the concept of 'diffusion', and the dissemination of information is one mechanism by which diffusion occurs (see Scott, 2001; Campbell, 2004).

Additionally, one consultant from the Town of Cochrane case noted the importance of having positive past experiences with certain planning frameworks. He had used elements from the *EarthCAT Guide to Community Development* in a previous sustainability planning effort, but he found that they were too rigid and difficult for citizens to understand. Thus, he did not use the EarthCAT Guide in Cochrane's initiative. Indeed, well-known municipal SSP frameworks may be impractical for the context of municipal government SSP. Three of the major planning constraints expressed by the interviewees were time, financial, and human resources. Practitioners are often given short timeframes and a limited budget with which to create a sustainability plan. Budgets may be insufficient to cover the additional expertise required to apply a best-known planning or scoping framework. Many best-known planning and community scoping frameworks contain lengthy directions, which may require more time, more funding and a level of expertise that practitioners do not have. Connelly et al. (2008) also found that communities have tended to rely on an organic process to guide plan development and implementation, based on available resources and capacities: "…planning frameworks and tools were considered to be too complex, required too many resources and suffered from a lack of coordination between various tools and the everyday functioning of local government" (p. 23).

These findings raise questions about whether a community-scoping framework based on sustainability (including resilience), collaboration, social change, and effective implementation considerations would be feasible and thus embraced by municipal SSP practitioners. As previously discussed in the literature review, there is a need for frameworks that give directions to practitioners in these regards. But the findings suggest that, in order to be practical, such frameworks must consider the planning realities that may affect their applicability, while introducing new ideas. Moreover, the findings suggest that even if a new approach to community scoping were adopted in one strategic planning initiative, it may not be widely embraced unless practitioners have a positive experience using it and unless many other actors disseminate knowledge of it across relevant organizations.

7.2 Results of In-Depth Analysis of Community-Scoping Frameworks

The results of the in-depth analysis reveal the general state of current practice with respect to how practitioners have been attending to the core concerns of SSP and the context-specific concerns of local government SSP. These findings relate primarily to the choices that practitioners have made with respect to contents and processes, as well as the contextual factors that have shaped their choices.

In the sub-sections that follow, I discuss the results of the analysis. I begin by considering the results of my evaluation of community-scoping contents and processes (sub-sections 7.2.1 to 7.2.4) and I end with a discussion of the efficacy of the analytical framework that was used to evaluate these contents and processes (sub-section 7.2.5). In order to avoid unnecessary repetition, I have combined my discussion of the findings about the context-specific social change and practical implementation concerns that were elicited from the public through application of the community scoping frameworks. Because these two components of SSP are so closely acquainted, there was much overlap in the findings.

7.2.1 Range of Concerns Initially Covered by the Community-Scoping Frameworks

The results showed that practitioners have mostly been using open-ended questions that may more or less implicitly cover the core concerns of SSP – as opposed to a set of specified criteria. Generally, the open-ended questions were oriented towards identifying community issues and assets, as well as citizens' values, desires, and priorities. The interviews suggest that practitioners put a lot of thought into design. One interviewee from the Town of Cochrane case mentioned that, as a practitioner, he is always aware of the tension that exists between expert/practitioner knowledge and community-based knowledge. When choosing among options for community-scoping frameworks, this tension comes to the fore. This interviewee prefers to use open-ended questions as opposed to a set of principles or criteria based on a particular set of ideas because, in his opinion, open-ended questions resonate more with community stakeholders who may not be familiar with many of the concepts associated with social change towards sustainability. Thus, it is less overwhelming and more effective to boil these concepts down into easy to grasp questions that could inspire thinking about these things. Moreover, in his opinion open-ended questions are capable of capturing the values, opinions, knowledge, issues and assets of a community, while principles or criteria may not appear to be relevant in a particular community context.

The tension between practitioner and community knowledge in the design of community-scoping frameworks entrains important questions about the role that practitioners should play in SSP. For example, should they be leaders or facilitators, and how much responsibility should be vested in either role? In using open-ended questions loosely rooted in the concepts of sustainability and social change, practitioners have set aside a diverse range of standards and lessons learned that could structure the community-scoping step. Moreover, in doing this they have left the meaning and purpose of sustainability planning open to the group of stakeholders present at the community-scoping events and, more specifically, the most vocal citizens within this group.

The findings revealed that open-ended questions performed better than predetermined response options with respect to the range of initial/generic and community-specific concerns covered. In

using predetermined response options, practitioners have taken a more authoritative role in deciding which ideas should underpin the community-scoping step and, by extension, which ideas should define sustainability. Thus, the findings suggest that an open-ended approach that gives shared responsibility to the public over deciding what sustainability planning should mean is more effective with respect to covering a more diverse range of matters related to making progress towards sustainability. But the findings also showed that the open-ended questions tended to miss critical sustainability concerns in application, notably those related to inter- and intragenerational equity, precaution and adaptation, as well as many resilience and social change considerations. A greater level of expert/practitioner knowledge and responsibility in decision making may help to correct these gaps. But this would not skirt the important questions about the appropriateness and effectiveness of their role and choices in this regard.

The general use of open-ended questions loosely grounded in sustainability planning concepts illuminates the deeper intentions of the SSP initiatives themselves and, on a collective level, the systemic constraints within which the purposes of SSP have been conceived. This study adopts a high bar in that it examines municipal SSP undertakings in light of a set of requirements for serious attempts to plan for sustainable societal change. When viewed against these requirements, it is clear that the community-scoping frameworks were not underpinned by an intention to shift community systems towards a clear set of sustainability goals. Rather, they were structured around a chief aim to better understand and respond to immediate community issues and aspirations for the future. Community context was interpreted primarily through the lens of issues and assets and what communities *want*. A range of local-to-global factors reinforces this conceptualization of practice including, naming a few, a general lack of understanding of how to plan for social change, constraints on municipal government powers and responsibilities, funding programmes that do not require societal change towards sustainability, and other impediments related to well-established large-scale socioeconomic norms and interests.

7.2.2 Context-Specific Sustainability (and Resilience) Concerns Covered

The general lack of concern for resilience matters reflects the status of resilience theory as an emerging analytical approach whose practical implications have not yet penetrated local government SSP.

The overall lack of attention to inter- and intragenerational equity and precaution and adaptation concerns highlights the limitations of the open-ended approach to community scoping in terms its ability to cover a comprehensive set of local government SSP concerns. It also reveals the inadequacy of the pillars, sustainability dimensions, and/or urban planning categories that were used in many cases to organize the place-specific matters that were elicited from the public. Clearly, these categories do not encourage thinking about all interrelated areas of sustainability concern.

It is interesting to note that the results in this category expose a dominant vision and a less noticeable, minority vision for community development in Canada. The former is undergirded by a mechanistic worldview (see Capra, 1982, 1996) and a weak interpretation of sustainability (see Mebratu, 1998). It projects a business-as-usual, consumption- and growth-based community development trajectory, supported by an efficiency-based model of resource maintenance and a

mitigative approach to social-ecological system integrity problems. Here, the primary concerns were livelihood sufficiency ones, and the tacit response to such widespread socioeconomic issues as local employment opportunities, the rising cost of living, the need for affordable housing, the need for transit connections, downtown revitalization, etc., was more development (e.g., more commercial, residential and industrial development, more shopping opportunities, more transit connections, etc.), albeit the kind of development that increases efficiencies, conserves vital natural capital, and protects local ecological systems from significant negative impacts of development. This dominant vision, however, was one in which growth was taken for granted as a vital necessity that should be accommodated. It was primarily oriented towards present-generation, individual wants and needs, and it almost completely ignored the distributive dimensions of socioeconomic systems.

In contrast, the less conspicuous, minority vision included a concern for the distributive dimension of socioeconomic systems (e.g., accessibility of markets to farmers, living wages for all, access to vital natural resources); it questioned the power of corporations and our dependence on global markets and fossil fuels; it underscored the limits of municipal capacities to raise funds for the maintenance and provision of public infrastructure and services; it acknowledged slow controlling variables, critical thresholds (or limits), and alternative states of equilibrium; and it emphasized the notions of living locally, zero waste, slowing the pace of growth, limiting growth, and long-range integrated planning.

While there is much overlap between these two visions, they represent potentially vastly different desires and futures. One key point of divergence between them is that the leading vision is rooted in a Cartesian-esque faith in science and technology and associated assumptions about the possibility of unlimited growth within finite social-ecological systems (see Capra, 1982, 1996), while the minority vision is preoccupied with the idea of placing limits on and slowing the pace of growth as per a stronger interpretation of sustainability (see Mebratu, 1998). Moreover, they are rooted in different theoretical models of production, consumption and economic development, which entrain different value systems. The predominant vision could be characterized by the tenets of industrial capitalist societies, while the peripheral vision could be characterized by the ideals of a host of emerging or extant alternative frameworks for economic systems, which more or less reflect an ecological worldview.

For decades, sustainability theorists and scholars in other fields have been critical of the predominant model of economic growth in contemporary Western societies (see Polyani, 1944; Carson, 1962; Meadows et al., 1972; Bookchin, 1987; Dobson, 1990; Norberg-Hodge, 1999; Jackson, 2011). Here, I refer to Capra's (1982, 1996) appraisal, which connects with the discussion that I provided, earlier, in Chapter Two. As Capra explains, the prevailing model is rooted in the fragmentary and reductionist Newtonian-Cartesian paradigm (see p. 188-233). At the basis of this paradigm is the failure to recognize that economic systems are just one feature of a dynamic, whole social-ecological organism; a disregard for the fundamentally value-laden nature of the discipline of economics and economic systems; and a preference for abstract quantitative models that exclude crucial qualitative measures. One key characteristic of the incumbent view, among others, is that it is obsessed with economic, technological, and institutional growth at all costs, and this obsession is a consequence of an overemphasis on the values of expansion, competition, individualism and self-assertion as well as an overconfidence

in the potential for effective control and repair.

The minority vision may be perceived as a reaction to the failures of the dominant one, especially with respect to its devastating global-scale social-ecological impacts and its promises to deliver prosperity and well being to all. It is beyond the scope of this thesis to describe the full range of ideas for alternative economic systems (and associated moral, political and governance systems) that have existed and are emerging or reemerging in response to these perceived failures. Schneider et al. (2010) provide a helpful review of the burgeoning literature on one alternative, 'sustainable degrowth'. The concept of sustainable degrowth is pertinent to this study because it reflects the findings of the research with respect to the minority concerns, summarized above. It represents a departure from the entrenched view that economic growth, wellbeing and progress are inextricably interconnected. Defined as "…an equitable downscaling of production and consumption that increases human well-being and enhances ecological conditions at the local and global level, in the short and long term" (p. 12), it embraces some age-old (by now seemingly impossible) ideals that remain iconoclastic relative to conventional standards.

This description of sustainable degrowth is clearly superficial. A more in-depth exploration of a range of pertinent alternatives, their areas of divergence and overlap, and their respective strengths and limitations is needed. Notwithstanding this brevity, the dominant and minority visions that emerged form the community-scoping step project two potential trajectories for community development rooted in fundamentally different ontological foundations. Similar to the findings about the universal and plan-specific definitions of sustainability and understandings of the notion of integration, these findings begin to depict the tensions between the prevailing Cartesian-Newtonian worldview and the systems or ecological worldview, as well as the extent to which the transition from the former to the latter is taking place at the local level in Canada. As Capra (1982) emphasizes, this transition is closely associated with advancements in modern physics, which have exposed the limitations of the reductionist, positivist scientific model and accompanying societal structures and processes that emerged during the Scientific Revolution and have dominated Western industrial societies for over two hundred years.

7.2.3 Context-Specific Social Change and Implementation Concerns Covered

Generally speaking, implementation has been a point of consideration in the plan development stage of local government SSP. However, in the vast majority of initiatives the community-scoping step did not extend around an investigation of the community-specific constraints, enablers and practical needs associated with societal change and enactment. The prevailing practice was to focus primarily on the plan creation environment as opposed to both plan creation and enactment environments. The chief purpose was to investigate place-specific issues, assets, desires, values, and priorities as the basis for sustainability visions, goals and actions. The scoping step was not used to investigate alternative future trajectories and enactment paths or strategies for societal change towards sustainability.

These findings are consistent with research that stresses the prevailing gap between plan development and enactment stages. Specifically, it reveals that, generally speaking, practitioners have understood creation and enactment stages as independent as opposed to interconnected. Indeed, as Connelly et al. (2008) assert, one major problem in local government SSP is that

practitioners have not been considering these two phases in an integrated way. This trend can be attributed to a widespread, shared understanding among practitioners of how strategic planning should be done.

We must also acknowledge the constraints imposed by the legislative landscape that governs the distribution of power and responsibility among provincial and local levels of government. Provincial government downloading, for example, may have devastating impacts on local capacities to fund the provision of services, let alone sustainability planning (see Duffy et al., 2014). And provincial laws and policies restrict municipal authority over critical matters related to local-level societal change (e.g., Winfield & Taylor, 2005). This legislative framework and distribution of authority is reinforced by Canada's tripartite structure of government and, in turn, it contributes to a culturally embedded perception of municipal governments as 'creatures of the province' (see Cote & Fenn, 2014). Complex sustainability problems and sustainability planning challenge this perception of local government in that complex sustainability problems play out at the local level and require local action. But for many reasons, municipal politicians and planning practitioners may not question the traditional role of local government. They may fear the consequences of pushback from the province and/or private sector, which may be costly.

Thus, social change through municipal SSP requires a creative interpretation of the above-mentioned prevailing legislative framework, the distribution of authority between provincial and municipal levels of government and the taken for granted perception of local governments as creatures of the province. Certain local sustainability goals may call for lobbying for policy changes at higher levels and greater municipal authority over local problems. As the results of this study show, however, there is an unaddressed social change bar beyond which local government SSP practice has not reached. This may be because the dominant legislative landscape and perception of municipal government is so culturally embedded that practitioners and politicians simply do not think about questioning it. Moreover, the socioeconomic consequences of questioning it may be too daunting to encourage creative interpretations of prevailing norms.

Here, again, we must address practitioners' and citizens' identities or norms related to the role that these actors *should* play in local government SSP. More research is required to better understand the range of identities that these actors may adopt in strategic planning and why. At this stage in the research it seems fair to assert that practitioners may be champions of change, bastions of the prevailing order, or passive rule followers (see Healey, 2007). Similarly, as previously described, members of communities may be perceived as consumers and passive clients or exerters and active citizens to whom resources, power and responsibility over community planning should be given (Gibson, 1975; Vigoda, 2002).

Another, more practical reason for this widespread approach may be that, generally speaking, practitioners have not been using well-known SSP frameworks that provide some direction in this regard. Moreover, the lessons that have been learned over the past twenty-five years of practice about social change and effective implementation have not been adequately fed back into the basis of the frameworks and tools that practitioners have been using on the ground. Thus, norms in implementation and social change planning lag behind the research that highlights these lessons.

Finally, different forms of local government SSP initiatives entrain different norms with respect to the amount of attention devoted to social change and implementation. The weak-to-strong categories that emerged with respect to implementation planning suggest that this might be the case. For example, Official Plan creation processes have typically not included an in-depth consideration of implementation and social change because they are high-level documents that set out policies for other levels of planning. ICSP processes, however, may demand more attention to enactment due to the goal- and project-based nature of many of these initiatives.

The interviews revealed a range of personal- and organizational-scale reasons why social change and effective implementation matters have generally not been considered in an integrated, comprehensive and systematic way though community scoping. Possible reasons include the following:

- Lack of education, skills, and knowledge transfer
- Uncertainty,
- Short term political cycles,
- Norms in strategic planning,
- Municipal planning structures and processes, and
- Insufficient time and resources.

These reasons are rooted in deeper institutional constraints, which I discuss later in Chapter Nine.

Other norms in planning may also contribute. According to many of the interviewees, implementation considerations are simply not incorporated in Requests for Proposals and Terms of References for strategic planning initiatives. Instead, they focus solely on the creation of strategic goals in the form of a plan. According to one interviewee, insufficient time and resources have generally been devoted to identifying the range of concerns that should be included in Requests for Proposals, and this translates into the Terms of References because consultants are hired based on how they respond to the Requests.

Finally, as mentioned in Chapter Six, Chester's, Huntsville's and Kingston's SSP initiatives departed from the above described general trend in implementation and social change planning. I described some reasons for this departure in Huntsville's case, which may extend to the other cases. These three cases provide some indication of the condition of exemplary practice. Relative to the norm, they represent somewhat innovative approaches in their consideration of governance models and implementation opportunities and challenges. But even these examples would benefit from frameworks and tools that provide guidance on the full range of social change and enactment needs, constraints and opportunities that should be considered in the plan development stage of SSP.

7.2.4 Processes Used to Include the Public in Community Scoping

The analysis of the community-scoping step found that the majority of the initiatives did not apply a strong collaborative approach framed by an intention to facilitate paradigm change, as defined by Fung's (2006) Democracy Cube and Sterling's (2010-11) Levels of Learning and

Change. In other words, they did not intentionally encourage deliberation, co-governance or direct authority, critical reflection and a high level of learning. Open processes in conversational, round table workshops settings were often used; however, it was clear that the chief aim of the workshops was to elicit information from the public as opposed to encourage transformative learning, develop governance networks, create community capacity, or give direct community authority to the public over particular sustainability goals. In the Cochrane and Prince George cases, the public was given direct control over the contents of the plan during the plan formulation stage. However, this approach did not reflect a strong collaborative one in which the public was put in a position of shared power and responsibility over enactment.

These findings depict a shared understanding of the role that the public should play in community scoping, the purpose of the community scoping step and local government SSP, and the roles that practitioners should play in these processes. In turn, these are influenced by wider norms in strategic planning, established systems of governance, and multi-scale policy frameworks. In these regards, the findings portray an approach to public sector strategic planning in which there is an embedded relationship of power between the public, municipal officials and administrators. In this power relationship, members of the public are viewed as 'customers' as opposed to 'citizens' (see Vigoda, 2002). Vigoda (2002) has argued that low levels of participation, collaboration and partnership usually accompany this approach to public administration: "The role of 'customer' or 'client' denotes a passive orientation of citizens toward another party, which is more active in trying to satisfy the customer/client's needs" (p. 2). This view is further reinforced by conventional bureaucratic organizational structures, which favour a hierarchical order of power and responsibility and limited, fragmented channels of communication and coordination (Paehlke & Torgerson, 2005). In fact, these findings evidence an interpretation of humans as consumers as opposed to exerters of qualities and potentialities and, by extension, an elitist view of the role that the individuals and officials should play in decision-making in the public sphere.

Some of the plans (e.g., Cochrane, Collingwood, Prince George, Williams Lake) declared the importance of collaboration and community ownership, especially with respect to implementation success. These expressions framed the entire planning initiative – beyond community scoping. They were especially notable in the Huntsville and Kingston initiatives, which encouraged co-governing and direct authority through their respective proposed organization and governance models for enactment. Thus, it is important to distinguish between the approach to public participation that was taken in the community-scoping step and the approach that was taken in the overall planning process. Additionally, the interviews revealed that practitioners' choices in methods might be underpinned by collaborative planning aspirations. Interviewees from the three cases revealed a concern to engage a broadly inclusive range of people, increase the level of trust among stakeholders, encourage community ownership, and create momentum in the community for enactment. Thus, while a reading of the plans indicated that the primary purpose of the community-scoping step was to gather information, the interviews suggested that practitioners embraced intentions that mirrored stronger collaborative planning principles.

7.2.5 Efficacy of the Analytical Framework Used to Evaluate Community Scoping

As I mentioned previously, scholars can use the core concerns of local government SSP as a framework for evaluating sustainability planning and practitioners can use it to guide sustainability planning. In this sub-section, I discuss the efficacy of the scholarly framework. Later, in Chapter Nine, I turn to the practical issues surrounding applying the framework in SSP initiatives.

When interpreted as a whole, the analytical framework was able to illuminate prevalent and atypical approaches to thinking and practice. The findings that emerged provided fertile ground for further deconstruction in order to expose our interpretations of the constituent components of SSP as well as the potential trajectory of community development. In this way the analytical framework helped to answer big questions about where we are going and how we are getting there – both collectively and on a case-by-case basis. Additionally, in exposing predominant approaches it effectively revealed where we need to go from here in terms of the aspects of practice that should be improved.

The local government-specific concerns of SSP identified the most frequently expressed concerns as well as the overlap with other sustainability matters; however, it could not reveal the intensity of the context-specific concerns that emerged from the public. As the case studies revealed, the most frequently expressed concerns may not be the most intensely felt by the public. This issue of frequency versus intensity is rooted in the integrative basis of the criteria. They were designed to encourage overlap and reveal the interconnections and interdependencies within and between social-ecological systems, issues, assets, impacts, benefits, etc. As such, they do not facilitate the identification of the most important concerns. Rather, they facilitate a deeper understanding of the complexities within and between them. This orientation is most appropriate for sustainability-based planning and assessment, which should attend to these complexities. But it may be problematic for analyses that seek to identify one or more concerns that were paramount in a community. This study did not aim to do this; however, the investigation of the public's concerns in the case study interviews brought this issue of frequency versus intensity to the fore.

The integrated nature of the sustainability (and resilience) criteria raised important questions about to how we should analyse the context-specific concerns that were elicited from the public. These concerns were most often organized according to discrete urban planning categories or sustainability pillars. For example, the worries that were listed under the urban planning categories or pillars related to many sustainability criteria and this overlap was acknowledged in my analysis. The risk in recognizing the overlap, however, is that all of the worries could be perceived as relevant to all of the sustainability criteria. This would defeat the purpose of generating insights about gaps in practice with respect to the sustainability matters that were most often and least frequently attended to. In this regard, the urban planning categories and pillars were helpful in that many of the cares listed in each category were obviously chiefly oriented towards one criterion or two criteria. Here, the deeper conceptual issue is related to the implications of a systems worldview for our notions of what might be most important or most intense, as well as how we should conceptualize the purposes of our analyses.

The criteria were also limited in their ability to capture concerns related to built and natural aesthetics and spirituality. These included issues surrounding the *look and feel* of a place (e.g., small town feel, Western aesthetic, rural character, natural beauty, etc.), and identity issues (e.g., Western hospitality, kind community, dynamic downtown spirit, unique town, etc.). Because these concerns are rooted in worries about the impacts of growth and development, they could be assigned to many interrelated sustainability criteria, including Gibson's social-ecological integrity, resource maintenance and efficiency, and democratic governance criteria. But these identity considerations were not directly addressed to the same degree as many other considerations that were covered by the criteria.

The Fung's (2006) Democracy Cube with Sterling's (2010-11) levels of learning and change framework was able to generate important insights about prevailing approaches to thinking and practice relative to the ideal. The four dimensions of the Cube helped to increase our understanding of the general quality of the public participation processes used in community scoping. One particularly relevant finding that emerged was about the predominant view of the public as clients or consumers as opposed to active citizens or exerters who should be given direct authority over matters of community development. This view underpinned trends in process design, especially with respect to the degree to which the processes were designed to be deliberative and facilitate transformative learning.

The adapted Democracy Cube framework, however, was simplistic in its spectrum-style depiction of scope of participation, mode of communication, extent of authority, and level of learning and change. At times, the difference between the various levels on the spectra was fuzzy. For example, in many cases workshop settings (in which participants were asked to answer some open-ended questions) could have fallen into the 'express preferences', 'develop preferences', or 'deliberate and negotiate' categories along the mode of communication spectrum, depending on the nature of the conversations that occurred during the workshops. It could have been that in answering the questions certain participants developed preferences and negotiated with other participants about their answers. Given the lack of case research into the nature of the conversations, it was important to consider the intention of the participation events. Because the events were not structured around an aim to have deliberations around options for community development, most of them fell into the 'express preferences' category.

Notwithstanding this limitation, the Democracy Cube was able to capture the complex nature of the relationship between the spectra. For example, it was found that Cochrane's Action Groups and Prince George's scenario exercise reflected a high level of extent of authority even though they used processes that were restrictive in nature. This finding implied that restrictive processes do not necessarily correlate with a low level of citizen authority and ownership over decision making. But many sustainability commentators would assert that inclusive processes foster a greater sense of power, ownership and responsibility over decision-making outcomes (Innes, 1995; Fung, 2003, 2006; Healey, 2006; Callahan, 2007). Thus, it seems reasonable to assert that a greater extent of authority would have been produced had Cochrane's and Prince George's processes been more inclusive. The main point here is that one strength of the Democracy Cube frameworks was that it exposed this disassociation between the spectra.

Section 7.3 below summarizes the main points from this chapter.

7.3 Summary

The findings from the basic information collection and in-depth analysis of applied community-scoping frameworks begin to illuminate the condition of local government SSP in terms of the plan formulation process within which the community-scoping step is nested, the range of generic SSP ideas initially covered by the applied community-scoping frameworks, and the suite of local government-specific SSP considerations that were elicited from the public through application of the frameworks. The following sub-sections summarize the findings in these regards.

7.3.1 Results of Basic Qualitative Data Collection

Communities have been committing to the concept of sustainability as an overarching idea; however, the predominant interpretation of the concept conforms to the prevailing capitalist model of economic growth and development. From this standpoint, answers to questions about how our demands on the Earth can conjoin with the capability of the Earth to meet these demands emphasize the kind of socioeconomic development that minimizes and mitigates harm and increases efficiencies. While these ideas evidence a much-needed resource conservation and efficiency culture at the local level in Canada, there is clearly room for improvement towards deeper green aspirations, notably net positive approaches that aim to fundamentally change our relationship with the natural world, values and worldviews. The findings in this category can be partly attributed to broad acceptance of the WCED definition of sustainable development at the local level in Canada and around the world as well a wider societal constraints that discourage more fundamental societal change through local government planning.

In contrast to the best practices for SSP processes derived from sustainability assessment, practitioners have been adopting high-level guides without demonstrating how they were used. None of the initiatives applied a set of criteria to structure the community-scoping step. The practical implications of merging sustainability assessment processes with municipal government SSP represent an area for further research. In a merged model there would a criteria-led investigation of community conditions, alternatives and the trade-offs associated with pursuing one or another way forward. The findings in this category are partly rooted in the disciplinary-bound evolution of municipal SSP and sustainability assessment practice, and practical matters, namely insufficient time and financial resources that constrain plan formulation processes. More research is required to determine whether an integrated assessment-SSP model would lead to more comprehensive plans, more successful enactment, and greater progress towards sustainability. Similarly, the findings about alternatives and trade-offs highlighted the need for more research about the practical implications of combining sustainability assessment contents and processes with local government SSP and community-scoping frameworks.

The findings about integrative thinking reveal the need for practical tools that help practitioners to translate the notion of integrative planning for sustainability into processes that integrate the social, economic and ecological dimensions of sustainability. A general uncertainty about how local issues are interconnected and the tension between a prevailing mechanistic worldview and an emerging ecological or systems worldview undergirded the results in this category. On the whole, the findings began to delineate the point at which practitioners are situated in the

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evolution of their understanding about the conceptual and practical process-related implications of an integrated view of the world. They also portrayed the extent to which the (hierarchical and departmentalized) organizational structures and process associated with the mechanistic worldview are institutionalized at the local level.

Clearly, there is a shared understanding among practitioners with respect to the steps in the plan creation stage of municipal SSP and how community scoping should be undertaken. This shared understanding can be explained by the concept of diffusion (see Campbell, 2004). Practical planning constraints (especially expertise, time, and budget) and positive or negative experiences with one or another best-known framework may also influence whether they are used. These findings raised questions about whether a community-scoping framework based on the generic concerns of SSP would be feasible and embraced by municipal SSP practitioners. Clearly, there is a need for frameworks that give directions to practitioners with respect to planning for societal change towards sustainability. But the findings suggested that more research is required to better understand the planning realities that may affect their applicability.

7.3.2 Results of In-Depth Analysis of Community-Scoping Frameworks

The prevalent use of open-ended questions to structure the community-scoping step may reflect practitioners' choices with respect to how do deal with the tension between expert/practitioner knowledge and community-based knowledge about sustainability planning. Practitioners may believe that open-ended questions resonate more with community stakeholders and are more capable of capturing citizens' values; high-level criteria may be too difficult to understand and irrelevant in a particular community context. This tension raised questions about role that practitioners should play in local government SSP. Should they be leaders or facilitators? In using open-ended questions, practitioners have set aside a diverse range of standards and lessons learned that could structure the community-scoping step.

That said, the findings showed that an open-ended approach that gives shared responsibility to the public over deciding what sustainability planning should mean may be more effective with respect to covering a more diverse range of community-specific sustainability matters. But the results also showed that the open-ended questions tended to miss critical local government-specific SSP concerns in application. A greater level of expert/practitioner knowledge and responsibility in decision making may help to correct this tendency.

The results of the analysis of community-specific concerns that were elicited from the public exposed a dominant vision and a less noticeable, minority vision for community development. The former projected a business-as-usual, consumption- and growth-based community development trajectory, supported by an efficiency-based model of resource maintenance and a mitigative approach to social-ecological system integrity problems. It almost completely ignored the distributive dimensions of socioeconomic systems. In contrast, the minority vision included a concern for the distributive dimension of socioeconomic systems; it questioned the power of corporations and our dependence on global markets and fossil fuels; it underscored the limits of municipal capacities to raise funds for the maintenance and provision of public infrastructure and services; it acknowledged slow controlling variables, critical thresholds, and alternative states of equilibrium; and it emphasized the notions of living locally, zero waste, slowing the pace of

growth, limiting growth, and long-range integrated planning.

The overall lack of attention to community-specific resilience, inter- and intragenerational equity and precaution and adaptation concerns highlighted the limitations of the open-ended approach in terms its ability to cover a comprehensive set of local government-specific SSP concerns. It also revealed the inadequacy of the sustainability pillars and/or urban planning categories to encourage thinking about all interrelated areas of sustainability concern.

Indeed, the community-scoping frameworks were clearly not underpinned by an explicit intention to shift community systems towards sustainability goals. Community context was interpreted primarily through the lens of what communities *have* versus what communities *want*. The community-scoping step did not extend around an investigation of the place-specific constraints, enablers and practical needs associated with societal change and enactment. This predominant practice can be attributed to a widespread, shared understanding among practitioners about how strategic planning should be done as well as the constraints imposed by the legislative landscape that governs the distribution of power among provincial municipal governments. Another, more practical reason may be that, generally speaking, practitioners have not been using well-known local government SSP frameworks that provide some direction in this regard. Embedded norms related to the role that practitioners and citizens should play in local government SSP may also contribute. Practitioners may be champions of change, bastions of the prevailing order, or passive rule followers (see Healey, 2007). Similarly, the public may be perceived as consumers and passive clients or exerters and active citizens to whom resources, power and responsibility over community planning should be given (see Gibson, 1975; Vigoda, 2002

The majority of the initiatives did not apply a strong collaborative approach framed by an intention to facilitate paradigm change. In the Cochrane and Prince George cases, the public was given direct control over the contents of the plan during the plan formulation stage; however, this approach did not reflect a strong collaborative one in which the public was put in a position of shared power and responsibility over enactment. These results portrayed an approach to public sector strategic planning in which there is an embedded relationship of power between the public, officials and administrators. In this power relationship, members of the public are viewed as 'customers' as opposed to 'citizens' (see Vigoda, 2002) or consumers as opposed to exerters (see Gibson, 1975). This view is further reinforced by conventional bureaucratic organizational structures, which favour a hierarchical order of power and responsibility and limited, fragmented channels of communication and coordination (see Paehlke & Torgerson, 2005).

7.3.3 Efficacy of the Analytical Framework Used to Evaluate Community Scoping

When interpreted as a whole, the analytical framework was able to illuminate prevalent and atypical approaches to thinking and practice. The findings that emerged provided fertile ground for further deconstruction in order to expose our interpretations of the constituent components of SSP as well as the potential trajectory of community development. In this way the analytical framework helped to answer big questions about where we are going and how we are getting there – both collectively and on a case-by-case basis. Additionally, in exposing predominant approaches it effectively revealed where we need to go from here in terms of the aspects of

practice that should be improved.

The integrated framework is flexible in that it can be parsed in order to evaluate different aspects of community scoping. The local government-specific concerns of SSP were able to identify the most frequently expressed concerns as well as the overlap with other sustainability matters; however, they could not reveal the intensity of the context-specific concerns that emerged from the public. Additionally, the integrated nature of the sustainability (and resilience) criteria raised important questions about to how we should analyse the context-specific concerns that were elicited from the public, which were most often organized according to discrete urban planning categories or sustainability pillars. Finally, the criteria were also limited in their ability to capture place-specific matters related to built and natural aesthetics and spirituality.

The Fung's (2006) Democracy Cube with Sterling's (2010-11) levels of learning and change framework increased our understanding of the general quality of the public participation processes used in community scoping. One particularly relevant finding that emerged was about the predominant view of the public as clients or consumers as opposed to active citizens or exerters who should be given direct authority over matters of community development. This view underpinned trends in process design with respect to the degree to which they encouraged deliberation, critical reflection and transformative learning. The adapted Democracy Cube framework, however, was simplistic in its spectrum-style depiction of scope of participation, mode of communication, extent of authority, and level of learning and change. At times, the difference between the various levels on the spectra was fuzzy. Notwithstanding this limitation, the Democracy Cube was able to expose the disassociation between levels of the spectra; open processes did not necessarily correlate with greater deliberation, direct authority and learning.

This stage of the research provided a valuable snapshot of community scoping practice and the wider plan formulation process within which the community-scoping step is nested. In my discussion, above, I highlighted some potential reasons why some particular approaches are predominant today. In Chapter Eight, the case studies probe more deeply into the contextual factors that have shaped community-scoping practices. In Chapter Nine I use concepts from institutional theory to further elucidate these contextual factors and deepen our understanding of why practice is the way it is.

Chapter Eight: Results – Case Studies

As explained in Chapter Five, the second stage of the research involved an investigation of three case studies. Interviews with key informants aimed to reveal the contextual underpinnings of prevailing community-scoping practice. The interviews were coded using key concepts from the New Institutionalism in order to expose the systemic roots of the choices made by the planning teams in the design of the community-scoping step.

In this chapter I tell the case stories, focusing on why specific decisions were made in creating the community-scoping frameworks. Because these cases were included in the in-depth examination of community scoping, I dedicate parts of each story to the results. This was done in order to give the reader a good sense of the community-scoping methods that were used in each undertaking. Insights from the semi-structured interviews are woven throughout the stories.

The first story concentrates on the Town of Cochrane's Sustainability Plan initiative in Alberta. This case provides an example of the most common approach to community-scoping contents that was encountered across Canada in that it was structured around a set of open-ended questions that could potentially cover a comprehensive set of generic SSP matters. The second case is about the Town of Huntsville's Unity Plan effort in Ontario, which represents an exemplary case with respect to the range of implementation concerns that were incorporated in the plan formulation stage. The third story focuses on the City of Prince George's ICSP undertaking in British Columbia, which represents an atypical case because it used a strong collaborative scenario approach that covered a good range of social-ecological resilience considerations.

Sections 8.1 to 8.3 tell the case stories. Finally, in section 8.4 I present the results of my analysis of the case stories, using concepts from the New Institutionalism.

8.1 Town of Cochrane Sustainability Plan

The Town of Cochrane is nestled in the foothills of the Rocky Mountains, along the banks of the Bow River in southern Alberta. Pre-European inhabitants of this area included the Iyanhe (Stoney) Nakoda who lived a nomadic lifestyle, trapping various animals for fur and hunting the buffalo (Rocky Mountain Nakoda, 2014). When the Town was founded in the early 1870s, the land was used primarily for ranching and agriculture. In fact, the Town was named after Senator Matthew Henry Cochrane, the first large leasehold rancher in Southern Alberta (Town of Cochrane, 2000). Today, a solid bronze statue of a cowboy on horseback, called the 'Men of Vision', overlooks the historic Cochrane Ranche – a symbol of the Town's Western heritage (see Figure 5).

Figure 5 The 'Men of Vision' Statue Overlooking Cochrane
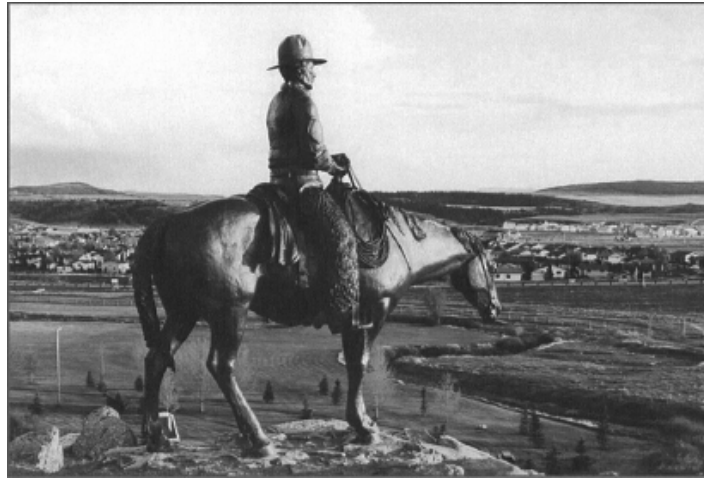
(Town of Cochrane, 2008)

According to Read (1983), steady population growth in the area began in the late 1880's when a large area of the land leased by Senator Cochrane was given up. This growth was fueled by industrial development, mainly brickyards, quarries and coal mines as well as the Town's location along the railway line and its role as a supply centre for the surrounding rural communities (Read, 1983; Town of Cochrane, 2000). More recent growth waves occurred in the 1970s and 1990s. From 1996 to 2001, for example, Cochrane was the fastest growing small urban centre in Canada (Town of Cochrane, 2008). During this time, the population grew from 7,424 to 11,798. Today, the Town boasts a population of 18,750 and the projected population for 2060 is approximately 65,000 (Town of Cochrane, 2011).

Located just 35 kilometres northwest of Calgary, the Town's growth has been attributed, in part, to its location within the rapidly growing Calgary Census Metropolitan Area (Town of Cochrane, 2011). Calgary's ability to annex new land in order to contain new urban development was curtailed after 1994, and this has put pressure on surrounding municipalities to accommodate population growth in the area (see Ghitter & Smart, 2009). A more affordable housing market makes Cochrane and other municipalities within the Calgary region attractive to professionals who would like to start a family. Indeed, in real estate circles Cochrane has been promoted as one of Calgary's bedroom communities – just minutes west of the city limits and a 40-minute commute to the downtown core (Morris-Reynar, 2012). Approximately half of Cochrane's residents commute to Calgary for work (Town of Cochrane, 2011).

According to one interviewee, many long-time citizens want to keep Cochrane a small town and that means preserving its western heritage and maintaining a vibrant local economy. This desire to preserve Cochrane's western heritage has been embedded in the Town's *Western Heritage Design Guidelines* (Town of Cochrane, 2000), which aim to "…reinforce and promote architectural aesthetics that reflect Cochrane's unique natural environment, western heritage, and sense of place" (p.2). With respect to the downtown core, for example, the Guidelines intend to maintain the look and feel of the historic buildings that stood there in the late nineteenth century (see Figure 6, below).

Figure 6 The Look Favoured in Western-Style Building Design Guidelines in Cochrane

(Town of Cochrane, 2000)

In sharp contrast to these preservationist desires, other residents expect big-city services, high-quality local recreation opportunities and commercial development, and they do not want to have to drive all the way to Calgary to get to them. In 2007, a land use dispute erupted when the Town's Council voted to allow big box store developments on a large piece of land within the downtown core area. Domtar Inc. formerly used the land for a wood-preserving facility, but when Domtar ceased operations in 1988, Springwood Land Corporation, an Edmonton based commercial real estate development firm, purchased the land. Springwood's plan was to remediate and redevelop the site as a commercially zoned area (Springwood, 2010). According to one interviewee, many citizens who pushed to have the Design Guidelines and other by-laws that limited the size of commercial developments felt betrayed by Council when it amended a land-use bylaw in order to allow stores as large as 200,000 square feet on the site. Soon after, it was suspected that a Walmart would be coming to Town, as expressed in a local real estate news outlet, *The Western Investor*: "It's widely believed Wal-Mart will anchor the site, in part because Springwood has been developing Wal-Mart-centred projects in Western Canada's secondary markets for more than a decade" (Western Investor, 2011).

Around the same time, a young Councilor decided to run for Mayor. He ran on the platform of developing Cochrane's first long-range plan. He tied his platform to what he was hearing from many citizens about uncontrolled growth, loss of identity, and other concerns related to what it would be like to live in Cochrane when it was no longer a small town. He perceived a desire in the community to take control of how the Town was growing, to develop a road map to guide growth, rather than just letting it happen. When the Councilor won the election and became Mayor, the idea to develop a long-range plan became Cochrane's first SSP initiative. According to some of the interviewees, the sustainability plan became part of his attempt to bring the community together and heal some of the wounds caused by the big box store by-law dispute. Indeed, the entire Council save the new Major was voted out during the municipal election that followed this land use issue.

The consultants and planners who led Cochrane's SSP initiative were fully aware of the tensions that had arisen around the big box store struggle and situation of having a new council. One consultant in the case felt strongly that the decision-making process should be sensitive to this

local context. So the planning team decided to design the process in a way that would help to rebuild the trust that had been lost between many active citizens and the previous Council. They wanted to create the Plan directly with the community as opposed to having an expert-driven process. In order to attract as many people as possible to the initiative, they used simple language to express the concept of sustainability and they developed a visual brand for the project that would resonate with the residents – the famous 'Men of Vision' image. They used the Brundtland Commissions' definition of sustainable development as the starting point for understanding sustainability.

According to one planner in this case, the planning team felt that it was important to connect with the community in places where people would frequently meet, as opposed to asking people to attend Town Hall meetings, which had not worked in Cochrane in the past. During the first four months of the work, then, the planning team held broadly inclusive visioning and community-scoping events at various organizations and community events around the Town. They distributed visioning toolkits and postcards so individuals could host a visioning session at home with family and friends and/or fill out the postcard and return it to City Hall. They heard from over 500 people who answered the following questions:

- What do you value about Cochrane?
- What changes would you most like to see?
- What are your hopes and dreams for Cochrane in the next 50 years?
- How can you help make this happen?

These four questions reflect an open-ended approach to community scoping clearly underpinned by the notion of community systems change, but only implicitly underpinned by the concept of sustainability. Since the initiative was an SSP initiative and the Plan incorporated the Brundtland definition of sustainability, the initiative as a whole was clearly framed by the concept. Moreover, because the questions are open-ended, they could potentially cover a comprehensive range of generic SSP concerns, as opposed to a selective or narrow range.

When asked about why this open-ended approach was taken (as opposed to a criteria- or principles-based approach), one consultant in the case said that he was influenced primarily by his knowledge of and prior experience with other frameworks. Previously, he had used elements from a well-known SSP framework that represents a principles-based approach to SSP, but he found that this framework was too rigid and difficult for citizens to understand. Thus, he prefers to use open-ended questions because, in his opinion, they resonate more with community stakeholders who may not be familiar with the academic and/or planning concepts associated with sustainability-based planning. In his opinion, it is less overwhelming and more effective to boil these concepts down into easy-to-grasp questions that could inspire thinking about social change towards sustainability. Moreover, in his view, open-ended questions are more useful for capturing the knowledge and values of a community, while frameworks based on principles or criteria may not be relevant in a particular community context.

When viewed against Fung's (2006) 'Scope of Participation' dimension of participation, these broadly inclusive visioning and scoping events reflect a mixture of three different shades of the less restrictive categories: diffuse public sphere, open/self-selected, and open with targeted

recruitment. While no one was excluded from attending the events, the consultants purposefully selected the locations with the aim to attract as many people as possible. Because the process was not designed to encourage deliberation, negotiation and consensus over a particular set of ideas, this approach sits somewhere between the express preferences and develop preferences categories of the 'Modes of Communication' spectrum, and somewhere between the communicative influence and advice/consult levels of the 'Extent of Authority' spectrum.

The next step in the plan development process involved a smaller number of lay and professional stakeholders, approximately 75 people, who were invited to participate in Action Groups. According to one consultant, a Citizen's Advisory Group was consulted about which people would be best to invite to participate in this phase. They wanted to target members of the community who were knowledgeable about the local context, well respected and connected, and could be engaged over the long term.

The Action Group participants were divided according to six community systems: built environment, culture, economic, governance, natural environment, and social. These systems were chosen, in part, based on feedback received during the first round of visioning and scoping. According to one planner, during this first round of visioning Cochrane's Western aesthetic, small town look and feel and ranchland preservation emerged as very important to the community and so it was decided that there should be a built environment systems group. One consultant expressed that the systems emphasis was influenced by his previous strategic planning experiences, which taught him a lot about what works. He had developed a preference for the systems frame by the time that he was hired for the Cochrane SSP initiative.

One of the consultants expressed that he wanted to ensure that the Action Group community-scoping process was designed in such a way to incorporate an understanding of how Cochrane's community systems are interconnected. This translated into how the participants were distributed among the systems-based Action Groups. For example, if one participant had expert knowledge in the Bow River, he or she was placed in the governance group or the economic group, as opposed to the natural environment group, in order to encourage an interdisciplinary composition of stakeholders. The aim was to encourage people with different expertise to talk to each other and so expose the interconnections between various systems and concerns.

Each group was asked to identify existing assets (things that are already working in the community), review key trends (understanding issues, assets and historical forces that have shaped Cochrane), and develop descriptions of success (what the community will look like if the vision for the future is achieved) as well as the current reality (a portrayal of the starting point). Two additional tasks included the creation of community targets and identification of actions to achieve the vision. This stage of the process took six months and it formed the basis for thirteen different 'Pathways for the Future', which included a description of success, a description of the current reality, and a set of targets.

This second round of community scoping reflects a more restrictive approach than the first. With respect to Fung's (2006) 'Scope of Participation' dimension, it clearly demonstrates a mix of the professional and lay stakeholders categories, which sit in the middle of the spectrum of most open to most restrictive approaches. It is interesting to note, however, that the Action Group method sits at the stronger end of Fung's 'Mode of Communication' and 'Extent of Authority'

dimensions. With respect to the former, the participants were given the opportunity to do more that just listen and express preferences. According to the interviewees, the process inspired much discussion about community issues, the current situation and future success. With respect to the latter dimension, the consultants put the plan formulation stage directly into the hands of the stakeholders, which shows a concern for Fung's co-governance and direct authority categories. Again, the interviews revealed that this was a deliberate design choice rooted in the planning team's desire to engender a sense of community ownership over the plan.

More research is required to determine if any learning and change occurred in both approaches. At this point it seems reasonable to assert that because the first round was not purposefully designed to foster reflection and learning about sustainability issues and the assumptions that underpin them, it would have generated a low level of learning. But because the Action Group phase reflects the stronger ends of Fung's (2006) Mode of Communication and Extent of Authority dimensions, the process may have stimulated higher levels of learning and change. Indeed, at this early stage in the research it seems reasonable to assert that, at best, a second order of learning may have occurred, as opposed to transformative learning because, similar to the first round of visioning and scoping, the process was not deliberately structured to expose the assumptions, beliefs, values, etc., that underpin Cochrane's sustainability issues and assets.

Here, it is important to note that both rounds of community scoping could have covered a comprehensive set of generic SSP concerns. When viewed through the local government-specific SSP concerns framework, however, it became clear that the results of Cochrane's scoping step are similar to the results of most local SSP initiatives in that the three most frequently expressed concerns were related to Gibson et al.'s (2005) livelihood sufficiency, democratic governance, and resource maintenance criteria. The most common livelihood concerns were for adequate services to keep up with population growth, especially local transit and a transit connection to Calgary; more local medical services, affordable housing, and more local opportunities to pursue recreational and arts activities. On the same note, residents expressed a desire for more support for the community food bank and local businesses and a more diverse range of shopping opportunities.

The interviews revealed that water conservation emerged as a primary concern under Gibson et al.'s (2005) resource maintenance and efficiency criterion. This is not surprising, given the vital role that the Bow River plays in providing drinking water to over 1.2 million people (35% of Alberta's population) residing within the Upper Bow River Basin – the most highly populated river basin in Alberta (Bow River Basic Council, 2010). The Bow River begins in Bow Lake, a small lake nestled high in the mountains of Western Alberta, and then it drops over 1,000 metres as it flows in a southeasterly direction through Banff National Park. It continues eastward through the foothills and across the prairies until it joins with Oldman River. The meeting of these two rivers creates the South Saskatchewan River, a tributary of the Saskatchewan-Nelson River system that eventually flows out to Hudson Bay and then on to the Arctic and Atlantic Oceans. Rapid population growth and development pressures within the Calgary Census Metropolitan Area threaten the quantity and quality of the Upper Bow River Basin, in which the Town of Cochrane is situated:

"Over the last century, large working ranches and wilderness have been transformed into rapidly expanding residential areas and multiple use lands. The once wild, free flowing Upper Bow River has become the province's most controlled river with numerous dams and water diversions. Although the Upper Bow River basin covers about 2% of the province, almost 1 in 3 Albertans live here. This makes our home the most densely populated river basin in Alberta, with less water available per person than in any other river basin in the province" (ALCES Group, 2010, p. 1).

The communities that rely on the Bow River must be sensitive to its seasonal, annual, and long-term ebbs and flows, as well as the interconnected environmental factors that contribute to its discharge patterns, notably climate change and the links between land use, groundwater and surface water quantity and quality (Bow River Basic Council, 2010). In Alberta, a licence application system has long governed the use of surface water and groundwater (Christensen & Droitsch, 2008). Due to concerns about water shortages, the Alberta government has recently placed a moratorium on new water licence applications in Southern Alberta, forcing municipalities within the Upper Bow River Basin to establish strict water conservation policies. Beyond Cochrane, this moratorium has sparked contentious water diversion proposals. For example, in 2007 a dispute erupted over a proposed pipeline development that would pipe water 200 km from the Red Deer River Basin to Calgary. The proposal was abandoned due to community opposition, but it indicates where Alberta's water future might be headed (Christensen & Droitsch, 2008).

Cochrane's local water conservation initiatives began in earnest in the early 1990s, with the Town's Water Conservation Measures Bylaw. So, the Town has had roughly 15 years of experience in educating, communicating, monitoring and enforcing water conservation measures. The Town's Water Conservation Strategy reflects this experience in that it contains many programs and projects for water conservation. Among other seasonal programs, the Town hires staff during the summer months to visit residents to discuss water conservation and distribute water conservation kits. Conservation is further encouraged through the use of meters, which are connected to every home and building that draws from the municipal water supply. The more water you use, the more you pay (Town of Cochrane, 2008b). These and other water conservation programs and projects have met with much success in Cochrane. For example, in 2004 the community's per capita water use was 204 litres/person/day. By December 2008, this number had fallen to 150 litres/person/day – a reduction of 27 per cent (Town of Cochrane, 2009). The Sustainability Plan asks citizens to do even better in that it includes a target to reduce consumption by 15% from 2008 levels by 2029.

The interviews also revealed that the community's built environmental concerns centred primarily on the Town's western heritage and this is where a care for aesthetics and a sense of place emerged as important. One consultant in this case noted that the decision to include a built environment systems Action Group was based on the desire expressed by many residents for preserving the Town's western look, small town feel and historic ranchlands. On the one hand, then, many residents wanted to ensure that commercial, industrial and residential development should recognize Cochrane's unique ranching history through, for example, adherence to western heritage design guidelines and policies that protect the Town's rangelands. On the other hand,

growth and development pressures threaten to erode this heritage, especially given the increasing need to designate rangelands for residential purposes. One consultant in this case noted that some long-time residents resent 'smart growth' development standards because compact, high-density design contradicts the spacious, wide-open spirit of ranching that once characterized the Town. One rancher, for example, complained that the streets in the historic downtown core are now too narrow to accommodate his tractor.

Resilience concerns were expressed in the general desire for more diverse transportation, shopping and employment options, as well as a more diverse local economy. Other resilience concerns were expressed where there was overlap between sustainability and resilience criteria. For example, the issue of civic engagement, described above, relates to both Gibson et al.'s (2005) democratic civility criterion and Walker and Salt's (2012) social capital and overlap in governance criteria. But no attention was devoted to the multi-scale resilience dynamics of community systems, notably with respect to identifying slow controlling variables, potential thresholds, and multiple equilibrium states. Moreover, resilience concepts were not part of an overall effort to transform community systems.

Practical implementation and social change considerations were addressed in a general way in the Plan, notably in the 'key parameters' established for the implementation framework: be inclusive, build on existing assets, continuously learn, improve and adjust, build positive relationships, grow the capacity of the community, empower the community and build community ownership, and employ a systems approach. Additionally, two of the open-ended questions posed to the general public were clearly geared towards societal change: What changes would you most like to see? How can you help make this happen? These broad questions could potentially cover many important institutional and practical implementation and social change matters. Indeed, the public's response revealed a concern for the regulative dimension of societal change (e.g., lobbying the Town Council for policy change, changing building code bylaws), as well as some practical enactment needs, including political leadership, community ownership, and the need to develop community capacity. But the scoping step did not cover the institutional constraints, enablers, and practical needs associated with operationalizing the Plan's targets.

According to one consultant and one planer, education backgrounds and general uncertainty about the plan formulation process underpin the reason why implementation and social change matters were not purposefully incorporated in the plan formulation stage. With respect to education, a few interviewees reported that planners now have a good understanding of how to create and prioritize strategic goals in the plan development stage. But their knowledge base ends at the point where they have to translate these goals into actions that can be implemented in a particular community context. This lack of understanding may reflect a gap in knowledge transfer around how people are implementing strategic sustainability plans. Indeed, according to one interviewee, practitioners have not been ignoring implementation; they are just trying to figure out how to do it. Furthermore, one interviewee expressed that the conventional plan development process hinders early implementation planning in that it is difficult to anticipate implementation needs until the goals, strategies, policies, etc. have been created. Thus, practitioners cannot know precisely what is needed ahead of time.

Interviewees reported that a three-day implementation event was held after the Plan was created. The event, which was called the 'Cochrane Sustainability Boot Camp', aimed to share knowledge about leading-edge sustainability planning methodologies and give participants the opportunity to apply this knowledge in developing recommendations for the implementation of the Cochrane Sustainability Plan. The Plan was thus conceived as an active case study. The cost for the Boot Camp was $350 per person and it attracted 45 participants from all over Alberta, British Columbia and Saskatchewan (see Haugen, 2009). A citizens' group, called 'Sustainability Partners Uniting Resources' (SPUR) emerged from the Boot Camp experience. The group aims to oversee implementation by, among other activities, establishing partnerships with community organizations (see Cochrane Sustainability, 2014).

Today, Cochrane's SSP initiative has over 40 Sustainability Champions, local businesses or organizations that have committed to the Plan's Vision and Pathways to the Future (see Cochrane Sustainability, 2014b). But one interviewee, a resident who was involved throughout the entire planning processes, expressed his concern that the initiative has lost its momentum within the broader community. The original enthusiasm for the Plan has diminished significantly; SPUR no longer has funding from the Town and the group has lost the volunteer support of some community champions. In residents who really want to push for change have become discouraged by the overall loss of support and enthusiasm for the Plan. He expressed a desire to invite the consultants back for a Version 2.0 of the Cochrane Sustainability Plan, as their support and expertise were major contributing factors to its initial success.

8.2 Town of Huntsville Unity Plan

The Town of Huntsville is the northernmost town in the District of Muskoka, Ontario and it is one of six municipalities in the District. It lies within the Lake Muskoka watershed, a primarily forested area with many intact wetlands and picturesque outcroppings of the Canadian Shield. With a population of approximately 19,056, Huntsville is the largest urban centre in the region, serving as a commercial and business hub to the northern part of the Muskoka region, as well as the neighbouring District of Perry Sound to the northwest and the County of Haliburton to the east.

The Town's Official Plan describes Huntsville as a 'community of communities', with the urban community in the 'town proper', the lake communities where many cottagers reside during the summers, and the smaller settlements and rural communities where many year-round citizens live. Despite their differences, all of them have evolved with a close connection to the lakes, wetlands and forested landscapes of the Town (Town of Huntsville, 2010). Because Huntsville is located in Muskoka cottage country, just two hours north of Toronto and not too far from other communities in the Greater Toronto Area, Huntsville has become a choice summer and year-round vacation spot for thousands of southern Ontarians and international visitors who wish to escape the hustle and bustle of city life.

Historically, Huntsville played a major role in the days of the fur trade. Prior to and during this time, the Anishinaabe Ojibwe people inhabited the region with many permanent settlements. In 1950, however, they signed the Robinson Treaty and so their lands were surrendered in return for

a cash payment and annuity (Pryke, 2010). By the early 1880s, the Town was known as a logging town. Soon after, a railway line was routed through the Town and industrial expansion began in full force: "Mills were established and markets were found for enormous stands of white pine, which dominated the forests" (Rice, 1964). From the late 1880s to the end of the 20th century, Huntsville was a 'working town', with a gristmill, shingle mill, woolen mill, brickyard, and a broom handle factory, among other industrial ventures. During this period, forests were clear-cut, the soil was washed away by erosion, and the Muskoka River was badly polluted by chemical waste (Davis, 2011). Over time, however, widespread changes in the economy, manufacturing processes, and technology led to a shift in Huntsville's local economy, from an industrial-based one to one that is much more centred on tourism and the region's rich natural capital. Today, other sources of local economic growth include construction, retail, service, real estate, and public sector opportunities (Davis, 2011).

Huntsville's rich natural capital, which provides the backbone for its tourism-based economy; its mix of seasonal and permanent residents, industrial legacy, present role as a commercial centre, and location in the heart of Muskoka cottage country give to the Town a particular set of sustainability issues and opportunities, which have been the focus of the Town's long-range planning initiatives.

In 2009, the Town received a grant from the Federation of Canadian Municipalities to prepare the Unity Plan, an ICSP initiative. According to one interviewee, the undertaking was perceived by Council as a way to ensure Huntsville's eligibility for Federal Gas Tax funding. But the Plan expresses a genuine interest to do things differently and other interviewees expressed that the broader community perceived the initiative as one that could address a wide range of community sustainability issues. According to one planner in this case, the community had long been ready and willing to tackle the sustainability question and this is, in part, due to the tensions between the need to protect the local environment, the livelihood concerns of many permanent residents, and development interests driven primarily by the tourism-based economy. The desire to do things differently was partially rooted in their former 'Green Plan' undertaking, out of which the ICSP initiative grew, which focused more narrowly on protecting Huntsville's environment. According to the interviewees in this case, the Green Plan was the driver that got the ICSP started. But it did not include the other 'pillars' of sustainability, namely the economic and social pillars. Thus, the ICSP initiative was perceived as one that could address a more comprehensive set of community sustainability issues.

The Plan begins by setting out some sustainability principles (see Box 10, below).

Box 10 Huntsville Unity Plan Sustainability Principles

- Provide a long-term guide for this community that balances economic, social and environmental needs.
- Promote a good quality of life for everyone in the community.
- Achieve a strong and resilient economy and thriving social environment.
- Protect and restore biodiversity and natural ecosystems. Provide this community with the necessary tools to be good stewards of the environment.
- Build upon positive characteristics of this community including its human and cultural values, history and its natural and economic systems.
- Foster participation and enable a collaborative effort to work toward a common, sustainable future.
- Enable continual improvement of the sustainability plan through ongoing monitoring of plan performance and community needs, and through good governance.

(Town of Huntsville, 2010b, p. 2)

A community-specific definition of sustainability is then provided:

> "The community understands that for Huntsville, sustainability is about protecting and valuing the natural environment - not using natural resources faster than they can be replenished; recognizing and acknowledging that there are limits to growth and development; recognizing that communities must prepare for climate change; retaining Huntsville's small rural Town feel; ensuring the community can foster its thriving arts and cultural community; recognizing and celebrating its strong sense of belonging and history; and ensuring there are economic opportunities to attract and retain youth while balancing the needs of all our residents, visitors and businesses" (Town of Huntsville, 2010b, p. 2).

This definition is unusual because it emphasizes the need to respect limits and it seems to be underpinned by a desire to cover a range of stakeholder concerns (environmental, social, cultural, and economic). However, the depiction of these as considerations to balance suggests that the interpretation of sustainability is underpinned by the notion of weighing trade-offs as opposed to recognizing the interdependencies and seeking to integrate cross-pillar initiatives for mutually supporting gains.

The plan formulation process began with a community forum in which participants were given the opportunity to have small group discussions structured around four open-ended questions:

- What do you love about Huntsville today?
- What do you want Huntsville to become in the future?
- What are the challenges to getting there?
- What do we need to take advantage of to get there?

In answering these questions, the participants were guided by twelve sustainability themes or urban planning categories: Transportation, Social Well-Being, Community Engagement and Education, Municipal Operations, Critical Needs (air, water, food, and energy), Land Use Planning, Healthcare, Affordable Housing, Energy, Economic Development, Recreation, and

Environmental Protection. During this stage, questionnaires were also available online, at the Town Office, the Public Library, and at various community events. The input gathered from these methods informed the vision statement, sustainability principles, and twelve sustainability goals: Environmental Protection, Municipal Operations and Infrastructure, Energy Conservation, Transportation, Land Use Planning, Social Well Being, Healthcare, Recreation, Arts, Culture and Heritage, Economic Development, Affordable Housing, and Education.

Soon after, a second community forum was held in order to present the draft vision statement, draft goals, and create strategic directions and actions for the goals. Participants were asked to join one of three group discussions, which were structured around three sustainability pillars: environment, economic, and social. Each participant was given time to discuss all three pillars. The following questions were asked at each of the three stations:

- What actions can the community or the Town take to move these goals forward?
- Are there any goals missing?
- What do we need to do to achieve this vision?
- Do you have any comments on this vision statement?

The community forums were open to all and so they reflect the least restrictive end of Fung's (2006) 'Scope of Participation' spectrum, where participants are self-selected. In both forum events there were small group discussions that may have encouraged participants to discuss issues, develop preferences, and possibly learn and have a change of heart about one thing or another; however, more research is required to determine the extent to which these things transpired. Here, it is important to consider whether the forums were purposefully designed to facilitate learning. The Plan's description of the forums does not express such an intention. Nor do the questions that structured the discussions indicate a desire to encourage a critical examination of the assumptions, values, beliefs, etc., that underpin problems of unsustainability. Without additional research, then, the analysis suggests that, though the forums were open to all and thus potentially inclusive, and though they encouraged discussion and thus possibly learning, they were primarily oriented towards an express preferences 'Mode of Communication'; a communicative or advisory 'Extent of Authority'; and a first order level of learning and change.

The interviews, however, revealed that there was some intentional education done around what sustainability should mean, especially in terms of recognizing the interconnections within and between social, economic and ecological dimensions of the concept. At the outset of the first forum, the consultants described a metaphor of a three-legged stool with one leg missing in order to emphasize the importance of thinking about Huntsville in terms of an integrated set of social, economic and ecological systems. One interviewee noted that this stool metaphor helped him to think beyond his own economic concerns, to recognize that there are many points of view in a community, and to try to understand different perspectives. However, he also expressed some frustration that not all of the participants adopted this kind of multi-pillar thinking. He was referring to the 'green' voices at the table, which, in his opinion, were much more narrowly focused on protecting the environment from economic development pressures.

One planner in this case asserted that the consultants made most of the key decisions with respect to the design of the public engagement process. One key factor that influenced their decision

making around the public participation events was timing. The Unity Plan initiative was launched just before a municipal election because for political reasons it was important to have a plan in place before the end of the council term. As this planner explained, this meant that the process was more rushed than it would have been otherwise. Additionally, as the consultants noted, the faster processes, which took approximately eight months, had to accommodate the planning that the City was doing for the upcoming G8 Summit in Huntsville. They wanted to have a draft ready by G8. The consultants also wanted to engage the seasonal community so they designed the events around the summer influx as well. These factors did not influence the process design, however. Rather, practically speaking, what these factors amounted to was that the engagement events occurred more closely together in time than they would have otherwise.

With respect to process design, the consultants stated that they were guided by their company philosophy – 'listen, understand, relate, and advance', which favours broadly inclusive, multi-stakeholder roundtable approaches. They also have a collaborative planning framework that they use in every community. With respect to inclusiveness, one important insight that emerged from the interviews was that the consultants wanted to ensure that the workshops would cover social, economic, and environmental dimensions of sustainability, as opposed to just environmental ones. This meant ensuring that the process would engage a wider range of people than usual – beyond just the 'green' voices. There was a concerted effort, then, to reach out to stakeholders from all sectors of the Town. In fact, one interviewee felt that the 'green' crowd dominated the original Green Plan process and so he welcomed the broader Unity Plan focus, which attracted a more diverse range of stakeholders.

The open-ended questions that framed the community forums could have covered all of the generic concerns of SSP. The analysis of the participants' responses, however, revealed that, similar to most of the SSP initiatives in this study, the most frequently expressed concerns were related to Gibson et al.'s (2005) 'Livelihood Sufficiency and Opportunity' criterion. Most of these pertained to local economic sufficiency matters including, among others, Huntsville's hidden poverty issue and seasonal economy, the need for living wages for all, job opportunities, affordable housing, opportunities for all demographics, a desire for new uses for development charge revenues, and a busy main street despite small and big box stores. There was much overlap between these local livelihood sufficiency matters and intra- and intergenerational ones, notably with respect to the need for living wages, affordable housing, opportunities for all demographics, and Huntsville's hidden poverty issue. Other livelihood concerns were related to public health issues (e.g., good hospital and doctors, healthy active lifestyle); recreation (e.g., lots of places for kids to play, excellent sports facilities, community centre); and arts and educational opportunities.

Also numerous were 'Resource Maintenance and Efficiency' concerns including, among others, the size of the town (not too big, not too small), a desire for smart growth, clean energy, more bike lanes and trails, and to get people out of their cars; the need to curb sprawl, encourage green industry, and improvements in waste collection; and the idea to close the main street to vehicles on weekends. There was much overlap between these concerns and 'Social-Ecological System Integrity' and 'Social-Ecological Civility and Democratic Governance' issues, which were also numerous. The former included, among others, a desire to value Huntsville's natural systems, identify threats to the natural environment, protect air and water quality, protect the shoreline,

preserve and expand green space, view the natural environment as an umbrella for other community systems, and for less chlorine in the drinking water. The latter included a desire for open, inclusive and transparent communications, local control over local concerns (i.e., Huntsville being in charge of Huntsville – not the District), a balanced consideration of competing interests, interactions with other model communities, and support for grassroots organizations.

The least expressed concerns were related to Gibson et al.'s (2005) 'Precaution and Adaptation' criterion. Here, a desire surfaced to promote Huntsville as an innovative green place to live. Additionally, social-ecological resilience issues were not expressed in a direct way. Nor were resilience concepts used to identify strategies for social change. However, some resilience concerns were covered implicitly, in connection with Gibson et al.'s sustainability criteria. For example, a desire for a tolerant and diverse community emerged, which is related the resilience-based notion of diversity. And many of the matters that surfaced in relation to Gibson et al.'s 'Democratic Civility' criterion overlapped with the social capital emphasis in Walker and Salt's (2012) resilience criteria.

Consistent with the analysis, the interviews revealed that local economic livelihood sufficiency issues featured as very important to the community. These issues are linked to how different residents use the space and what they expect from the Town. As one planner in this case put it, Huntsville is an interesting social phenomenon in that there is a visibly uneven distribution of wealth among the population. Huntsville has people who sell firewood for a living and then they have people who are multi millionaires. According to him, dealing with this spectrum of interests has been a challenge because, on the one hand, many wealthy seasonal residents from the city want big-city services and entertainment opportunities, while many long-time residents do not care much for these luxuries; they come into town only to do their groceries and banking. For many permanent residents, it is more important to have meaningful local job opportunities that allow them to make a living wage in the place where they live.

The level of concern that emerged for affordable housing surprised one interviewee. Through participating in the forums he learned that there are many permanent residents in Huntsville who are living paycheck-to-paycheck and housing is not inexpensive. Many permanent residents are earning minimum wage at service or retail jobs, many of which are seasonal in nature, so it is difficult for these permanent residents to make ends meet throughout the year.

In this case, the links between livelihood sufficiency and social-ecological system integrity issues are especially poignant in that the Town's economy and social fabric are built around the natural landscape. At one end of Huntsville's demographic spectrum, there are many long-time residents who live off the land in one way or another and depend on seasonal employment opportunities. At the other end, there are wealthy families who come to Huntsville during the summers to live in lakefront cottages. Both types of residents want different things from the Town or the land. Huntsville has a vested interest in protecting the integrity of the natural environment because it is integral to its identity and it is a major factor that lures the seasonal population and drives the seasonal economy, including summer employment opportunities and the cottage construction industry. But, many summertime residents want to have something to do on a rainy day; many permanent residents want more local job opportunities; and the

construction industry and many local businesses have a vested interest in tourism-based residential and commercial development. Thus, there is much pressure for more growth in the business sector, more restaurants and cafés, more shopping opportunities, more recreational opportunities for youth, and more arts and cultural events.

Again, in Huntsville's case the community-scoping step did not extend around the systemic constraints and enablers associated with enacting specific sustainability goals. Like many other initiatives in this study, however, specific actions were created to flesh out the goals and strategies. These actions attended to many regulative (e.g., enforcement of codes and standards), normative (e.g., be a model for other communities) and cognitive (e.g., be cognizant of how the environment impacts human health) dimensions of institutional design, as well as some governance (e.g., work with MNR and MWC to identify/inventory habitat corridors), natural (e.g., preserve and protect wetlands) and built (e.g., increase publicly owned open-space trails) environment concerns.

Huntsville's implementation plan makes this initiative unusual with respect to early implementation planning. Developed during the plan formulation stage, it explains how the actions would be enacted. For example, a list of potential community partners/organizations evidences some concern for implementation from a broader governance perspective. More specifically, leadership needs were addressed by the idea to create six Community Implementation Teams, a Unity Plan Implementation Committee, an internal Sustainability Coordinator, and an internal Sustainability Director. The Teams would be comprised of twelve people, representing Town staff, community members and community organizations. Each team would be assigned to a different sustainability theme: environment, transportation and land use planning, arts and culture, economic development, municipal operations, and recreation and health. They would meet three times per term and their job would be to push implementation forward on priority actions. The Implementation Committee would be a Committee of Council comprised of officials, citizens from the Teams, and staff, and it would provide additional direction and guidance regarding Unity Plan initiatives. The Committee would work with the Implementation Teams and provide recommendations to Council based, in part, on their input. The Sustainability Coordinator would provide administrative and research support to the Teams and Committee, and an internal Sustainability Director would be responsible for overall progress towards the Plan's goals. Financial considerations were also foreseen during the Plan formulation stage in that the Plan provides a list of potential funding sources and expenses that should be included in the annual budget. These include, among others, the salary for the new Sustainability Coordinator, budget requirements for the Implementation Committee, materials and supplies, community events, and annual progress reporting.

This is not an ideal representative case in which community scoping was used in an in-depth way to identify the practical needs associated with enacting specific goals. It did, however, delve into more detail than others with respect to the governance, administrative and financial needs categories. According to the interviewees, the reason why implementation concerns were so important can be attributed to a 'mindset' or attitude that many of the participants brought to the table. No one wanted a report that would sit on a shelf. One planner expressed that from the outset he wanted to ensure that the plan would be implemented and so informal conversations about implementation planning were held with the consultants from the very beginning of the

process. The consultants were hired, in part, because of their approach to and knowledge about governance structures. Plus, this planner pushed for much financial support for implementation. According to him, because the Unity Plan was meant to be a corporate-level plan, the entire corporate budget for the Town of Huntsville should be dedicated to it.

The interviewees were also asked about why the notions of social change and implementation planning are so often neglected during the plan development stage. According to one planner in this case, there is a trend in urban planning to dream of great things to do and not dedicate enough time to figuring out how to accomplish them. Additionally, in his opinion, it is far easier for politicians to commit to the process leading up to the creation of a plan than it is to commit to implementation. This is because the election cycle does not promote long-term leadership and visionary thinking. Rather, it promotes short-term promises. Thus, in this planner's view, getting elected and reelected on a bold vision is difficult.

Furthermore, according to the consultants in this case, at the time when the Unity Plan was undertaken there was not a lot of thinking and knowledge about implementation and thus it was normal not to incorporate enactment matters into the planning process. Moreover, implementing a community-based SSP is different from implementing an organization-wide sustainability plan in that is raises questions about how far outside the normal realm of municipal authority the plan could go. An organization-wide plan has a more focused implementation path than a community-wide plan, which may be far more complex in terms of operationalization. Moreover, as one planner noted, at the time many planners did not have a lot of experience in doing community-based SSP specifically. Thus, there was a general confusion around tiering or the degree of authority that a sustainability plan should have relative to other corporate-level plans.

Through conversations with previous clients and other communities that had undertaken various types of strategic planning, the consultants were well aware of these implementation issues and they were intent on raising the bar on practice in this regard. They knew from experience that plans do not get implemented unless someone was put in charge and made accountable. This is partly why they devoted so much attention to governance and administrative structural matters during the plan development process.

Today, the original six Implementation Teams that were created have been disbanded. According to one citizen who participated in the planning process, the Teams were effective with respect to their capacity to tackle the easy, 'low-hanging fruit' actions. But as time went on, the Teams found that they were moving ahead with many longer-term actions without making much progress. The volunteers were burning out. Additionally, there was so much overlap in the more complex sustainability goals that the Teams, which were organized according to different urban planning categories, found that they could no longer function as independent groups. There was a need for cross-Team communication and coordination and the municipality did not have the resources to facilitate this. The solution, then, was to shift to a project-based implementation approach, where members of the community with an interest in one or another sustainability goal can propose a project to the Sustainability Committee, develop an action plan, gather volunteer support, and then pursue the project to completion.

8.3 My Prince George Integrated Community Sustainability Plan

The City of Prince George is widely known as British Columbia's northern capital. It is one of four municipal governments and seven electoral areas that comprise the Regional District of Fraser-Fort George. It is situated approximately 800km north of Vancouver, in the Northern Interior sub-region, at the confluence of the Fraser and Nechako Rivers – the traditional lands of the Lheidli T'enneh First Nation. The word 'Lheidli' means, "where the two rivers flow together", and 'T'enneh' means, "the People". The Fraser and Nechako rivers cut a wide valley through the Nechako Plateau, forming a natural 'bowl' in which Prince George has grown. Evidently, the vistas surrounding this location are something to be admired:

> "Far to the east and on the skyline are the Rocky Mountains, the big ridge that separates the Interior Plateau from the Interior Plains of Alberta…To the southeast is the northern end of the Cariboo Mountains, highlands that rise to form the rugged peaks of the Quesnel Lake region. The gently-rolling expanse of the Interior Plateau stretches as far as the eye can see" (Turner et al., 2005).

In the early 1800s, the area comprised part of the North West Company fur trade region and during that time, Simon Fraser, a fur trader who was hired to expand the company's operations beyond the Rockies, called the future townsite Fort George, after King George III of England. The Fort operated as a trading post until the Cariboo Gold Rush of the 1860s. Settlement in the area was negligible, however, until the early 1900s, when it was decided that Fort George should become a station site for the Grand Trunk Pacific Railway, and a small sawmill operation was established nearby along the Fraser River. From the 1930s to the 1950s, roughly 300-500 people lived in the area, making a living through farming, trapping, logging and mining (UNBC, 2002). The traditional territory of the Lheidli T'enneh First Nation, which stretches over 4.3 million hectares, includes the historic Fort George townsite. Prior to European arrival and during the fur trade period, the Lheidli T'enneh lived at the intersection of the Fraser and Nechako Rivers. But land use conflicts with the Grand Trunk Railway eventually resulted in their relocation to a reserve in a nearby village. By 1914, the majority of the Lheidi T'enneh had left the Fort George area.

The Fort was incorporated as a City in 1915, and its name was then changed to Prince George. During the early 1950s, a booming forest industry attracted many newcomers from the Prairies and so by the early 1980s Prince George had become a major manufacturing, supply, government and education centre for Northern British Columbia. Today, the City has a population of approximately 71,974 (Statistics Canada, 2011). The economy is still driven partly by the forestry sector. But over the past decade this sector has been devastated by the Mountain Pine Beetle epidemic and raw log exports, the effects of which have been exacerbated by warmer winters and summers. British Columbia forestry statistics illustrate the devastating effects of these. In 2006, approximately 16,000 people were employed in the forestry sector, but by 2010 that number had dwindled to just over 9,000 (Prince George Economic Development Corporation, 2012). It seems that the City has remained resilient in the face of these hardships, however. According to the City's *Community Economic Profile*, Prince George has evolved from having mainly a forest-based economy to having a more diverse economic base. This is at least partly due to its position as the service and supply hub for communities across Northern British

Columbia (Prince George Economic Development Corporation, 2012).

As one interviewee noted, Prince George's *My PG Integrated Community Sustainability Plan* (ICSP) was the first community sustainability plan for the City. The City, however, had other sustainability-based strategic initiatives in place, notably climate change adaptation and mitigation plans. The ICSP undertaking was thus perceived as an opportunity to situate all of their environmental and infrastructure concerns under one umbrella. Prince George was also motivated by the prospect of receiving funding from the Federal Gas Tax Agreement for its enormous infrastructure deficit. Historically, Prince George has had a low rate of population growth and so its infrastructure financing has not relied on new residential development. Moreover, Prince George's residential development has tended to be low density around the periphery of the City, in part because the Town centre is situated in within the 'bowl' area, which receives most of the adverse air quality impacts from nearby pulp mills and the City's 'Dangerous Goods' transportation route, which runs straight through the downtown. This situation has discouraged higher density development within the bowl. According to one interviewee who participated in the initiative, these built and natural environmental concerns were the main impetus for pursuing the ICSP undertaking.

The Plan presents a community-specific expression of the concept of sustainability:

> "Sustainability recognizes that we rely on the environment, so we need to protect and restore it in order to thrive and survive. It recognizes that to thrive means to provide for our human needs and maintain a high quality of life for everyone. It also recognizes that economic development is important in order to achieve these goals" (City of Prince George, 2010, p. 6).

The Plan consists of two parts. Part One is a stand-alone document that contains the sustainability goals (social, economic, and environmental) and examples of associated actions (e.g., new policies, programs, and projects). Part Two contains ten 'Strategic Directions' that describe how the goals will be achieved. Five of the Strategic Directions are process oriented in that they describe *how* the community will achieve the goals:

- Build broad cultural change over time,
- Facilitate and encourage action that supports long-term sustainability,
- Lead the way, and engage strategically,
- Manage limited resources wisely, and
- Collaborate effectively for change.

The other Strategic Directions relate more to *what* the community will do:

- Strengthen downtown and neighbourhood centres and protect valuable open space,
- Support sustainable resource use through green infrastructure and buildings,
- Reconnect to nature and local culture,
- Build on our assets to strengthen our community, and
- Encourage growth that is beneficial to the environment and the community.

Each strategic direction is described in terms of how it will be pursued, including necessary actions and responsible actors.

The interviews revealed that the plan formulation process was hailed as the most inclusive and innovative community engagement process undertaken by the City to date. Prior to hiring the consultants, the planning team undertook research about how to engage the community and how to organize the information gathered. One planner who was interviewed expressed that he wanted to figure out how to capture the information, the final form that the information should take in the Plan, and thus which questions should be asked and how. He was motivated by a desire to ensure that the community would feel truly heard. He was also eager to try new methods through the ICSP initiative, especially with respect to community engagement. When asked about his willingness to try new approaches to practice, he expressed a sense of pride in being the type of planner who likes to challenge existing processes in order to keep moving forward. Plus, over the years, he had developed a reputation among City staff and Council for being the type of planner who could successfully take on difficult projects. Thus, when the ICSP process was introduced, he had already established a strong relationship of trust with the Council.

The plan development process consisted of an initial visioning stage in which many residents contributed through answering surveys about their goals and priorities for the future. Rather than holding centralized and traditional engagement events, the consultants took the surveys to places where people would gather, including baseball games, craft fairs, art galleries and any other community event they could attend. Workbooks were also created that could be downloaded or accessed at City Hall. Citizens were encouraged to hold 'Kitchen Table' talks, which were self-facilitated group discussions guided by the workbooks (City of Prince George, 2010b). The workbook responses could be uploaded or dropped off at City Hall. This grassroots approach required community champions, partners from City staff, and leading Prince George organizations who could spread the word and help support broader engagement in the project by facilitating meetings. Special attention was given to three key audiences: Lheidli T'enneh Nation and other First Nations, youth, and residents who are difficult to reach (e.g. busy working families, homeless people) (City of Prince George, 2010c). The results of this phase formed the basis for the goals, which are set out in Part One of the Plan.

The community-scoping step was subsequently undertaken and it involved an online 'Trends and Uncertainties Survey', interviews with community leaders and experts, and a one-day future scenarios workshop. Similar to Cochrane's initiative, key City Staff, representatives from important community organizations and individuals with expertise in four broad areas of sustainability (environment, social, economic and land use) were invited to participate in the scenarios workshop, while members of the general public could request to participate. The participants were asked to brainstorm different 'external factors' that could affect Prince George, select the two most critical factors around which uncertainty is highest, and then create four reasonably plausible future scenarios based on them. According to one consultant who was interviewed, a secondary purpose of the scenario planning was to reshape how people think and encourage them to question their assumptions about what the future could look like. The input from the visioning and community-scoping steps provided the basis for the action strategies, which were finalized by the Project Team (consultants, staff and citizens).

Similar to Cochrane's approach, the scenario workshop reflects the more restrictive end of Fung's (2006) 'Scope of Participation' dimension. But it sits at the stronger end of Fung's 'Mode of Communication' and 'Extent of Authority' dimensions. Clearly, the participants were given the opportunity to do more that just listen and express preferences. According to the interviewees, the process inspired much discussion about community issues, the current situation and potential future conditions. By asking the participants to choose the most important external factors and then create potential future scenarios consultants put the plan formulation stage directly into the hands of the stakeholders, revealing a concern for Fung's co-governance and direct authority categories. However, a greater level of co-governance would have been fostered had the scenario workshop been open to all. Again, the interviews revealed that this was a deliberate design choice rooted in the planning team's desire to engender a sense of community ownership over the plan. One planner expressed that he insisted on inviting key members of the community, specifically representatives from local workers' unions, whose participation was vital to the plan's success.

Because the scenarios workshop was collaborative, because it encouraged thinking differently about the future, and because it reflects the stronger end of Fung's (2006) communication and authority dimensions, higher levels of learning may have occurred. Similar to the other initiatives, however, more research is required to determine the extent to which participants did learn, reflect and perhaps have a change in attitude towards various matters. At this early stage, it seems reasonable to assert that because the scenario workshop purposefully encouraged critical thinking about plausible future conditions, it most likely inspired thinking about 'doing things better' and 'seeing things differently'. It is important to note, however, that more research is required to determine whether any learning about doing things better and seeing things differently represent progress towards sustainability.

It is important to note that the focus of the workshops on external factors and scenarios represents a resilience-based approach to community scoping in two key ways. First, the emphasis on alternative future scenarios implies an interest in identifying alternative states of equilibrium. Second, the emphasis on external factors relates to the slow moving or controlling variables that drive systems towards critical thresholds, cascading effects and regime changes. Indeed, many resilience concerns are evident in the four future scenarios that were developed based on the following two most critical external factors: 'Climate Change' and 'Cooperation versus Conflict'. For example, the first scenario – 'Weathering the Storm' – depicts a future in which there is high climate change impacts and high cooperation between citizens and organizations:

> "Sea level rise and droughts have led to mass migration and an increase in diseases that strain resources. Worldwide loss of biodiversity stresses natural systems. However, a global effort is underway to adapt to climate change. Catastrophes have led to growing cooperation, which leads to successful adaptation to climate impacts. The public have accepted lower standards of living in order to face climate related challenges. Education and communication facilitates global consciousness." (City of Prince George, 2010, p. 72).

Here, rising sea levels, precipitation rates, and biodiversity loss are perceived as driving variables that push Prince George and other communities into a different state of being. Fortunately, this state of being is positive in that it includes a high level of cooperation among citizens and decision makers, as well as a shift in mindset towards a global consciousness. In this scenario, then, communities are able to successfully adapt to the impacts of climate change.

In contrast, the third future scenario – 'Overwhelmed by Global Shifts' – portrays a future characterized by high climate change impacts and low cooperation or high conflict:

> "Developing countries strengthen their economies through education and a focus on technological development. By contrast, North America has lost the ability to fund universities and loses prominence. Plagued by climate change impacts, North America has taken on a fortress mentality, hoarding food and pushing for the production of dirty and expensive fuel. Many citizens lose their homes to sea level rise, others lose family to severe weather storms. Massive migration to the interior causes conflict over food resources" (City of Prince George, 2010, p. 72).

In this scenario, the major driver is perceived to be a global-scale shift in economic power, underpinned by an upward flow of positive effects in developing countries. In this future, cooperation is perceived to be the key point on which the resilience of North American communities hinges. Without it, it seems that we will shift into a regime characterized by extreme protectionism and mass migrations, which, in turn, entrain a cascade of negative effects (e.g., conflicts over food and other resources). A negative type of resilience is implicit in this scenario's depiction of North America's stubborn reliance on fossil fuels.

The interviews revealed that the scenario method was chosen because the planning team wanted the plan to look ahead 50 years, and they wanted to find a way to make that long-term timeframe relevant to the community. Thus, the main methodological question for them was, "How do we develop realistic strategies to achieve that long-term timescale?" They wanted a long-term planning method that would allow them to make good decisions in the face of uncertainty. They decided upon the Global Business Network's scenario method because, in their opinion, it represents is a fairly well proven approach. The Global Business Network has published instructions for practitioners on how to undertake this scenario method (Ogilvy & Schwartz, 2004). It recommends brainstorming external factors and trends for five general categories that might influence the performance of a business organization: social, technological, economic, environmental, and political. The team felt that they could easily adapt this approach to Prince George's community sustainability planning focus.

The external factors that emerged from the workshop were organized according to the Global Business Network's five general categories (social, technological, economic, environmental, and political). When examined through the analytical framework, it became clear that these external factors cover more resilience concerns than any other SSP initiative included in this study. For example, similar to the future scenarios, many of the external factors imply a concern for identifying slow moving variables, critical thresholds, and alternate equilibrium states (e.g., aging population, shifts in political power, shifts in regional economy, increasing inequity). Other factors relate to the maintenance of community resilience in that they reflect a concern for

diversity (e.g., integration of cultural groups, diversified local economy), modularity (e.g., self-reliant local food system), social capital (e.g., cooperation), and innovation (e.g., use of communications technology).

The analysis also revealed that the external factors covered all of Gibson et al.'s (2005) sustainability concerns, albeit not to the same degree. Similar to most of the SSP initiatives, livelihood sufficiency concerns were primary, and these included a concern for the needs of an aging population, Prince George's high crime rate, rising health care and energy costs, the need for a northern regional service center, and a desire for downtown revitalization, among others. Civility and democratic governance matters were close behind sufficiency concerns in frequency, and they included a concern for the effects of foreign powers controlling Canada, a concern for religious fundamentalism, the importance of cooperation and partnerships, the need for volunteerism and strong leadership, and a concern for rising conflict over vital natural resources. The thirsd-most frequently heard concerns were related to Gibson et al.'s 'resource maintenance and efficiency' and 'social-ecological integrity' criteria. The former included a desire for more compact development, better access to major transportation routes, reduced waste, and a zero waste movement, among others. The latter included a concern for air quality, water quality, loss of biodiversity, the need to protect forests, and a desire to develop a culture of environmental stewardship, among others.

Like most of the SSP initiatives included in this study, intra- and intergenerational equity and precaution and adaptation concerns were expressed least frequently. But they were expressed in the external factors exercise in this case, and so Prince George's ICSP initiative is different from most SSP initiatives in this regard. The intra- and intergenerational equity concerns included a desire to reduce poverty and inequity in the City, and address the disparity in literacy rates between First Nation and non-First Nation communities. With respect to precaution and adaptation, there was a desire to see an appropriate technology movement in Prince George.

While the analysis revealed the frequency in which various concerns were expressed, the interviews revealed which concerns were felt most intensely. Indeed, the information provided by the interviewees somewhat contradicts the analysis in this regard in that, according to the citizens and planners who were interviewed, Prince George's air quality, high crime rate, and sense of identity emerged as most important.

Prince George has gained a reputation for having poor air quality, primarily because of the pulp mills, which are located in the vicinity of the bowl area. As one interviewee explained, air quality was a key election issue in 2008 and so it translated into the ICSP because of timing. In fact, the ICSP process emerged just as some residents were making the case for a direct link between Prince George's air quality, asthma and cancer rates. According to one interviewee, the sense of identity issue is intricately linked with Prince George's air quality problem. For example, when people enter the bowl, they mention the sulphur stench as well as how far you can see into the air. The sense of identify concern, then, has emerged in response to the need for an identity that goes beyond Prince George's reputation for bad air. Prince George's transition from a boom and bust forestry Town to a City with a more diversified economy forms part of the context around which this concern has emerged. As one interviewee explained, it has been a very important issue to many residents because it relates back to their desire to grow – to attract new

long-term residents to the City. Moreover, it has been a difficult issue to remedy because of the history of Prince George's built environment. The railway came first and so the town grew up around the railway site. The pulp mills came soon after the railway and so, over the years, the City's physical infrastructure system was built to accommodate these important features, whose locations are now very difficult to change.

As another interviewee explained, the identity issue is rooted in a negative image of the City that has emerged around Prince George's air quality and crime issues. Apparently, some people from Vancouver call Prince George the 'armpit of BC'. When Prince George first boomed it was because of the pulp mills within the city limits along the Fraser and Nechako Rivers, so the smell flowed downstream. When pulp mills were first built the environmental impacts were enormous. Over the years, the smell has been mitigated but the bad air legacy remains. Prince George's reputation for crime has been written about in Maclean's Magazine. Like any city, there are certain areas where there is a lot of crime. But because Prince George is a relatively small City, the per capita crime rate has been perceived as high. A 2011 CBC news article expresses the dismay that was felt by some members of Council when Maclean's named Prince George the most dangerous city in Canada (CBC, 2011). According to this article, the City is known for its gang activity and its location along a stretch of Highway 16, BC's infamous 'Highway of Tears', where several women have gone missing.

The concerns for inter- and intragenerational equity, mentioned above, emerged partly in connection with the crime issue. As one interviewee explained, the Council wanted to correct the City's negative image by making sure that all members of the community, especially marginalized groups, had equal access to City services and opportunities to participate in decision making. Here, the basic assumption was that the City's crime rate would fall if the interests of its marginalized communities were better addressed.

The analysis revealed that the scoping step did not investigate the actions and strategies in light of their practical implementation requirements and the institutional factors that might impede and/or enable their successful achievement. Nor were resilience concepts used in such a way to identify critical points of intervention. Many of the actions that were developed, however, relate to institutional design in their consideration of supportive policies, plans and programmes (e.g., adjust regulations and incentives to make the growth strategy, green buildings, local food production, and conservation economically attractive), shifts in mindset (e.g., change perceptions of the safety of downtown), and normative changes (e.g., encourage corporate social responsibility, philanthropy, and volunteerism by recognition and reward). They also cover some implementation matters in that they expressed the need to create new relationships and organizations, financial mechanisms, and they identified the actors needed to achieve each action. But general terms ('city', 'partners', and 'citizens') were used to identify the actors, as opposed to naming specific people, departments and organizations.

When asked why implementation concerns were considered in this way, one consultant expressed that during the early stages of the project the team looked at what other cities in Canada had done with respect to how sustainability plans have been structured. They were excited by Montreal's planning process, which challenged major organizations to take on specific sustainability goals, and the City rewarded those organizations that took up the challenge

by incorporating their logos into the Plan. The team did not want the Plan to sit on the shelf so they were interested in Montreal's model. Hence, the detailed action planning was based on Montreal's example. Other interviews, however, revealed that the detailed action elements of the Plan did not get a high level of support from Council. This was, in part, because Council was kept at arms length throughout the process. The Council was happy to support the overall planning process, but they did not give deep support for implementing it. One particularly controversial action area was related to growth management, specifically the goal to significantly reduce the conversion of Greenfields for new residential development.

When asked why social change and implementation considerations have generally not been considered in the plan development stage, one consultant expressed that perhaps a problem of perception underlies this prevailing practice. SSP initiatives have generally been conceived as a process for creating lists of things to do as opposed to how to do them. Thus, they generally do not provide a framework for implementation that covers enactment and social change matters. In his opinion, 2/3 of the Prince George ICSP process and at least 1/4 of the budget could have been spent on creating a shared understanding of *why* the Plan is needed, creating shared values among different stakeholders, getting community and Council 'buy-in', establishing specific roles and responsibilities, identifying funding mechanisms, and developing a framework for collaboration. Moreover, in his opinion, it is much easier to create a list of things to do than it is to get serious about putting the resources behind various actions.

Similarly, the one Planner expressed that more often than not the plan development process does not include the people who should be responsible for implementation. Thus, his approach to Prince George's ICSP process was to ensure that certain key individuals were included. He specifically mentioned the importance of including representative from the workers' unions whose support has been integral to other strategic planning initiatives. Additionally, in his opinion the norm in municipal government is that the amount of resources available to maintain current structures and processes is barely enough. In many cases, no one has the job of figuring out how to do things better. Rather, the focus is on doing the things that are needed on a day-to-day basis in the same way that it was done before, using the same tools that have been passed on through time. Over time, an organizational culture is created that maintains a type of single-task mentality among the staff. In his opinion, this is why the notion of change is so often resisted in a local government context.

The three case stories revealed a range of socioeconomic, built and natural contextual factors that reflect the institutional settings within which local government SSP must unfold. In section 8.4 below, I provide the results of my analysis of the case stories using concepts from institutional theory. Then, in Chapter Nine I discuss the findings in more detail.

8.4 The Contextual Underpinnings of Practice

Table 33 below lists the contextual factors that were expressed by the interviewees in response to the questions about why certain choices were made in the design of the community-scoping step in each initiative. Each contextual factor can be explained by one or more concept from the New Institutionalism, as shown in the table.

Table 33 Factors/Institutions that Directly Shaped Community Scoping

Case	Contextual Factor	Type of Institution
Town of Cochrane	Western built environment aesthetic	Normative (building codes), cognitive (shared sense of place)
	Community built environment concerns in response to rapid population growth	Cognitive (shared sense of place, shared concerns)
	Planning Team's previous planning experiences and education	Cognitive (shared mental models), normative (informal norms in educational systems)
	Planning Team's goal to rebuild the trust that was lost between citizens and council	Cognitive (shared mental model was lost), normative (trust is valued in long-term planning), logic of appropriateness, agency
	Planning Team's aim to improve upon Town's previous record of public participation	Logic of appropriateness, logic of instrumentality, agency, normative (broad public participation is valued in SSP)
	Planning Team's consideration of collective local knowledge about sustainability planning	Logic of appropriateness, logic of instrumentality, agency, cognitive (shared understanding of sustainability planning)
	Planning Team's goal to reveal interconnections within and between local issues	Logic of appropriateness, logic of instrumentality, agency, normative (SSP norm to consider interconnections)
	Planning Team's aim to give direct control to citizens over creation of the plan	Logic of appropriateness, logic of instrumentality, agency, normative (SSP ideal to give control to citizens)
Town of Huntsville	Planning Team's previous planning experiences and education	Cognitive (shared mental models), normative (informal norms in educational systems)
	Attitude of Planning Team and citizens: they did not want the plan to sit on the shelf.	Cognitive (shared attitude)
	Upcoming municipal election	Regulative (legislated election cycle)
	Consulting Team's company philosophy on public participation	Normative (planning norm and value), logic of instrumentality
	Consulting Team's company collaborative planning framework	Normative (planning norm and value), logic of instrumentality
	Huntsville's seasonal population	Normative (seasonal patterns of population fluctuations)
	Consulting Team's goal to design an inclusive process	Logic of appropriateness, logic of

		instrumentality, agency, normative (SSP planning value)
	Consulting Team's aim to cover all pillars of sustainability, e.g., use of the three-legged stool, systems metaphor	Logic of appropriateness, logic of instrumentality, agency, normative (SSP standard)
	Planning Team's approach to implementation planning	Logic of appropriateness, agency
	The G8 summit	Not covered by New Institutional concepts
	Consulting Team's research into other municipalities' approaches to strategic planning	Diffusion
City of Prince George	Planning Team's previous planning experiences and education	Cognitive (shared mental models), normative (informal norms in educational systems)
	Attitude of Planning Team and citizens: they did not want the plan to sit on the shelf.	Cognitive (shared attitude)
	Planning Team's use the Global Business Network scenario framework	Normative (particular prescriptions for process), agency
	Planning Team's aim to ensure that the community felt heard	Logic of appropriateness, agency, normative (planning norm and value)
	Planning Team's goal to engender a sense of ownership over the plan	Logic of appropriateness, agency, normative (planning norm and value)
	Planning Team's use of external forces scenarios	Logic of appropriateness, agency
	Planner's relationship of trust with Council	Agency
	Planner's attitude about trying new things and taking on challenging projects	Agency, cognitive (planner's identity)
	Preparatory research undertaken by planning team	Diffusion

As Table 33 shows, a similar range of institutional constraints shaped the community-scoping step in each case. Cognitive and normative institutions and the logic of appropriateness seem to have had the greatest impact on the actors' choices. Additionally, the notion of agency could be used to explain many of their decisions. Many contextual factors could be explained by more than one concept from the New Institutionalism. This is, in part, because the analysis used ideas from the three varieties of New Institutional thought as opposed to just one school. Another reason for this variety and overlap is that I chose to identify, when appropriate, the type of institution that influenced community scoping as well as the institutional dynamic. I discuss the implications of this approach in more detail in Chapter Ten.

Table 34 below lists the contextual factors and associated concepts from the New Institutionalism that can explain why implementation and social change concerns are so often

ignored in the plan formulation stage of planning. The interviewees expressed these contextual factors in response to the questions about implementation and social change. Table 34 lists all of the factors that emerged from the interviews collectively.

Table 34 Factors/Institutions that May Underpin Lack of Implementation Planning

Contextual Factor	Type of Institution
Educational background and professional work experiences	Cognitive (shared mental models), normative (informal norms in educational systems)
The tendency to dream of things to do and not dedicate time to figuring out how to accomplish them	Normative (established norm in urban planning)
The tendency not to include people needed for implementation in the plan formulation stage	Normative (established norm in rational linear planning model)
Municipal budgeting norms	Normative (established norms in municipal budgeting processes)
Municipal administrative process norms	Normative (established processes in day-to-day operations)
Short term election cycle	Regulative (legislated four-year election cycle)
Single-task mentality of municipal government employees	Cognitive (shared mental model)
General uncertainty about how to do implementation planning	Uncertainty, bounded rationality
Uncertainty with respect to the appropriate scope of authority of community sustainability planning initiatives	Uncertainty, bounded rationality

Scott's (2001) cognitive and normative pillars seem to have had the greatest impact on the actors' choices, revealing the influence of shared norms and understandings. In Chapter Nine I describe how these concepts played out in the cases.

Table 35 below lists the contextual factors and associated concepts from the New Institutionalism that can explain the community concerns that were expressed by the interviewees in response to the questions about significant community issues.

Table 35 Significant Community Concerns and Associated Institutions

Case	Community Concern	Type of Institution
Town of Cochrane	Preserve Western heritage, Western aesthetic and small town feel	Normative (shared values), cognitive (shared sense of place)
	Water conservation and the Bow River	Normative (shared values)
	Rapid population growth	Normative (shared values), cognitive (shared sense of place)
	Big city services	Normative (shared values), cognitive (shared sense of place), logic of instrumentality (personal interests)
Town of Huntsville	Integrity of natural environment	Normative (shared values), cognitive (shared sense of place), logic of instrumentality (tourism-based economy rests on integrity of natural environment)
	Hidden poverty	Normative (shared values), cognitive (shared sense of place)
	Local economic development	Normative (shared values), cognitive (shared sense of place), logic of instrumentality (personal interests)
City of Prince George	Air quality	Normative (shared values), cognitive (shared sense of place)
	City image (sense of identity)	Normative (shared values), cognitive (shared sense of place)
	High crime rate	Normative (shared values), cognitive (shared sense of place)
	Poverty	Normative (shared values), cognitive (shared sense of place)

Overall, the analysis revealed that the most useful ideas from the New Institutionalism were Scott's (2001) regulative, normative and cognitive types of institutions, the logics of appropriateness and instrumentality, agency, uncertainty, bounded rationality and diffusion. In Chapter Nine, I explain how these concepts played out in the cases as well as the implications of the results for institutional theory and community-scoping practice.

8.5 Summary

This chapter presented the results of the following three case studies in which I investigated the contextual underpinnings of prevailing community-scoping practice: the Town of Cochrane's Sustainability Plan initiative from Alberta, the Town of Huntsville's Unity Plan undertaking from Ontario, and the City of Prince George's Integrated Community Sustainability Plan from British Columbia.

Because these three cases were included in the in-depth analysis of applied community-scoping frameworks (see Chapters Five and Six), I provided a detailed description of the results for each case. This was done to give the reader a deeper understanding of the community-scoping methods that were used. Interviews with key informants focused on why the planning teams made particular choices in the design of the community-scoping step as well as which community concerns emerged as most important. These interviews were coded and analysed using concepts from the New Institutionalism.

The interviews revealed that a similar set of contextual actors influenced each undertaking. In each case, however, they played out differently, revealing three distinct experiences and community contexts. Each case generated some unique insights about why certain decisions were made with respect to the methods used in the community-scoping step as well as why implementation and social change considerations have generally not been addressed in the plan development stage. Concepts from the New Institutionalism helped to explain the institutional roots of prevailing community-scoping practices.

8.5.1 Summary of Community-Scoping Methods Used in Each Case

In the Cochrane case, the initial scoping exercise was structured around four open-ended questions, which were posed to citizens in popular gathering places around the Town. The planning team also distributed visioning toolkits and postcards so that individuals could host a visioning session at home. Similarly, in the Prince George case the first scoping step included surveys and discussion workbooks that were available online and distributed in popular venues. When examined against the Democracy Cube framework, it was found that these processes reflected the least restrictive categories of the 'Scope of Participation' dimension; the express preferences and develop preferences categories of the 'Mode of Communication' dimension; the communicative influence and advice/consult levels of the 'Extent of Authority' spectrum; and a low level of learning and change. While no one was excluded from attending the events and filling out the surveys and discussion workbooks, the respective planning teams targeted the locations with the aim to encourage as many people as possible to participate, as opposed to hosting an open event. With respect to the other dimensions of the Cube (mode of communication, extent of authority, levels of learning and change), the findings can be attributed to the fact that the initial scoping processes were not purposefully designed to encourage deliberation and learning about a particular set of sustainability matters.

In the Cochrane case, the second community-scoping step involved a group of approximately 75 invited members of the community who were divided into six community-system Action Groups. The groups were asked to identify community issues and trends as well as develop descriptions

of success and current reality. Similarly, in the Prince George case the second scoping step was a scenario workshop attended by invited City staff and representatives from key community organizations. Members of the general public could request to participate. Participants were asked to identify 'external factors' that could affect Prince George, select the two most critical factors, and then create four reasonably plausible future scenarios based on these critical factors. When examined against the Democracy Cube framework, it was revealed that these processes reflected the most restrictive end of Fung's (2006) 'Scope of Participation' dimension. But they encouraged discussions and deliberation and gave citizens direct control over parts of the plans. Thus, they fell along the stronger end of the 'Mode of Communication' (deliberate and negotiate), 'Extent of Authority' (co-govern and direct authority), and 'Level of Learning and Change' (second and third levels) dimensions, respectively. A greater level of co-governance, learning and change, however, would have been fostered had the Action Groups and scenario workshop been open to all. Additionally, more research is required to determine whether the learning that occurred exemplifies the type of learning needed for progress towards sustainability.

In the Huntsville case, two community forums were undertaken, which open to all and framed by open-ended questions. In the first forum, the questions were structured around urban planning categories and sustainability pillars framed the second set of questions. Both processes reflected the least restrictive end of Fung's (2006) 'Scope of Participation' spectrum, where participants are self-selected. In both forum events there were small group discussions that may have encouraged participants to discuss issues, develop preferences, and possibly learn and have a change of heart. But the forums were not purposefully designed to facilitate learning and change in that the open-ended questions did not encourage a critical examination of the assumptions, values, etc., that underpin sustainability problems. Without additional research, then, the analysis suggested that, though the forums were open to all and thus potentially inclusive, and though they encouraged discussion and thus possibly learning, they were primarily oriented towards an 'express preferences' mode of communication; a 'communicative' or 'advisory' extent of authority; and a 'first order' level of learning and change.

In all three cases, the scoping step did not purposefully extend around social change and practical implementation considerations. However, each plan addressed implementation matters in its own way. Huntsville's case was atypical with respect to the range of practical implementation concerns addressed in the plan formulation stage because it provided a list of potential community partners/organizations, which evidenced some concern for implementation from a broader governance perspective. More specifically, leadership needs were addressed by the idea to create six Community Implementation Teams, a Unity Plan Implementation Committee, an internal Sustainability Coordinator, and an internal Sustainability Director. The Plan also provided a list of potential funding sources and expenses that should be included in the annual budget.

8.5.2 Summary of Contextual Factors that Influenced Each Case

The community-scoping methods that were used in each case were influenced by a range of contextual factors, as expressed by the interviewees. In the Cochrane case, the choices that the planning team made were influenced by their aim to address the community's built environment concerns, rebuild trust between citizens and council, and improve upon the Town's record of

public participation. Also influential were previous professional experiences and education, sensitivity to local knowledge and the interconnections within and between local issues, and the planning team's aspiration to give direct control to citizens over the creation of the plan.

In the Huntsville case, the G8 summit, upcoming municipal election and seasonal population affected the timing of the plan formulation stage, including the community-scoping events. The consulting team's research into other municipalities' approaches to strategic planning and the attitude of the citizens and the planning team shaped the atypically strong approach to implementation planning. Similar to the Cochrane case, other influential factors included the planning team's previous planning experiences and education, the consulting company's collaborative planning philosophy and framework, and the team's desire to design an inclusive process that covered all pillars of sustainability.

In the Prince George case, a planner who took pride in his relationship of trust with council and willingness to try new approaches led the plan formulation process. This planner's preparatory research influenced the community-scoping methods that were used. Similar to the Huntsville and Cochrane cases, the planning team wanted to ensure that the community felt heard and acquired a sense of ownership over the plan. Previous planning experiences and education, the use of the Global Business Network scenario framework and external forces scenarios, which emphasized the links within and between social-ecological systems, emerged as important influential factors in this case. Like the Huntsville case, the citizens did not want the plan to sit on the shelf and this attitude underpinned the approach to implementation planning.

The interviewees expressed the following contextual factors with respect to why implementation planning is often ignored in the plan formulation stage:

- Educational background and professional work experiences,
- The tendency to dream of things to do and not dedicate time to figuring out how to accomplish them,
- The tendency not to include people needed for implementation in the plan formulation stage,
- Municipal budgeting norms,
- Municipal administrative process norms,
- Short term election cycle,
- Single-task mentality of municipal government employees,
- General uncertainty about how to do implementation planning, and
- Uncertainty with respect to the appropriate scope of authority of community sustainability planning initiatives.

Similar to the majority of the community-scoping processes, the most frequently expressed community worries could be categorized as livelihood sufficiency concerns. But the interviews revealed the community issues that were felt most intensely. In the Cochrane case, these place-specific concerns were preservation of Western heritage, the Western aesthetic and small town feel; water conservation and the Bow River, rapid population growth, and big city services. In the Huntsville case, the most significant local matters were integrity of the natural environment, the Town's hidden poverty issue, and local economic development. In the Prince George case,

pressing worries included air quality, city image, the high crime rate and poverty.

8.5.3 Understanding the Contextual Underpinnings of Practice

The contextual factors that influenced each case could be expressed in terms of the institutions that they represent. The contextual factors were coded using concepts from the New Institutionalism. Tables 33, 34, and 35, above, listed these contextual factors and associated concepts from institutional theory. The following ideas proved to be most useful in terms of their ability to explain the contextual underpinnings of community-scoping practice as well as why certain community concerns emerged as most important:

- Logics of appropriateness and instrumentality,
- Agency,
- Scott's (2001) regulative, normative and cognitive types of institutions,
- Bounded rationality (including uncertainty), and
- Diffusion.

In Chapter Nine, I discuss how these concepts played out in the cases.

Up to this point, this dissertation has concentrated on describing the results of the basic data collection step, in-depth analysis of applied community-scoping frameworks and case studies. These findings begin to shed light on big questions about the extent to which we have been planning for societal change towards sustainability in local government SSP. Chapter Nine uses the concepts from institutional theory listed above to discuss the findings in terms of what they suggest about why practice is the way it is.

Chapter Nine – Discussion of Case Study Results

As mentioned in Chapter Eight, the institutional analysis of the cases revealed that the most useful ideas from the New Institutionalism were Scott's (2001) types of institutions (regulative, normative and cognitive), the logics of appropriateness and instrumentality, agency, uncertainty, bounded rationality and diffusion. The sub-sections that follow describe what these concepts tell us about why community-scoping practice is the way it is. I end the chapter with a discussion of the efficacy of the New Institutionalism.

9.1 Logics of Appropriateness and Instrumentality

The reason why particular community-scoping contents and processes were used in each case could be attributed partly to the respective planning teams' sense of what is right and good for the local context and sustainability planning. In different ways, all three cases exhibited this 'logic of appropriateness'. For example, in the Prince George undertaking, the scenario method was chosen because the planning team felt that it best suited the long-term planning timeframe that was adopted. This logic also undergirded the planning team's aim to ensure that the community would feel heard and develop a sense of ownership over the plan. In the Huntsville case, this logic underpinned the planning team's desire for an inclusive planning process, both in terms of broad public participation and consideration of sustainability pillars or systems. In the Cochrane case, the community-led Action Group process was influenced by the planning team's aspiration to rebuild the trust that had been lost between certain members of the community and the Council as well as their aim to improve upon the Town's previous attempts to achieve broad public participation in planning initiatives. The choice to let Action Groups formulate part of the plan was rooted in the team's wish to engender a sense of ownership over it. Finally, the choice to use a systems-based framework was rooted in the consultants' aim to expose the connections between different dimensions of sustainability, which relates to the notion of integrative thinking.

It is interesting to note that in the Cochrane and Huntsville cases, the notions of broad public participation, community ownership, and integrative thinking were evident in the respective consulting team's company branding, as expressed by the text and images on their websites. Through the interviews it was discovered that, in Huntsville's case, the consultants' approach to the community-scoping process was underpinned by their company philosophy: listen, understand, relate, and advance. These ideas relate back to some normative principles that guide their work: collaboration, meaningful engagement, integration and community ownership, among others. The interviews did not investigate the links between the interviewees' responses and their respective corporate identities. Nonetheless, it seems reasonable to deduce that the consultants may have been expressing the logic of instrumentality in that, understandably, it was in their financial and political interests to highlight ideas consistent with their company identities.

Moreover, since all three cases were ICSP initiatives, the attention that was given to these features of planning revealed some concern for the requirements of the Federal Gas Tax Agreements. Among other things, these Agreements explicitly emphasize the need for municipalities to plan for 'sustainable infrastructure' that aids in their economic, social, environmental, and cultural development (e.g., Infrastructure Canada, 2006). Ontario's

Agreement states that municipalities will be required to demonstrate that the municipality has "…integrated social, cultural, environmental and economic sustainability objectives in community planning; collaborated with other municipalities where appropriate to achieve sustainability objectives; and engaged residents in determining a long-term vision for the municipality" (Infrastructure Canada, 2005). While the Agreements vary from province to province, the notions of broad public participation, community ownership and integrative thinking are part of the deal across Canada. By addressing these requirements the planning teams were fulfilling their funding Agreements.

While the logics of appropriateness and instrumentality help to explain why particular decisions were made, they do not directly address the contextual factors that influenced their behaviour. A closer look at my points, above, about Cochrane's case illustrates this conceptual gap. In the Cochrane case the loss of trust issue was critical because it influenced the relationship between the community, the new Mayor, and the new Council, and it cast a shadow over the SSP process in that the consultants were aware that they were launching a sustainability planning initiative during a time when some deep wounds were still fresh. This loss of trust was one place-specific condition that directly influenced the planning Team's decision making about process design. Similarly, the Town's previous record of public engagement, the notion of community ownership, and the integrated nature of the concept of sustainability are factors that directly influenced the planning Team's content and process design choices. The respective planning team's sense of what is right and good and in their best interests, however, do not directly address these important factors. Clearly, other concepts are needed.

9.2 Agency

Decisions about community-scoping contents and processes may also be partially explained by the notion of agency. The effects of agency were perhaps most evident in the Prince George and Huntsville cases. In Prince George case, one planner who had a strong relationship of trust with the Council liked to take on challenging projects and push the envelope with respect to doing things differently. In the Huntsville case, one planner hired the consultants because of their knowledge of governance frameworks. And the consultants' attitude towards implementation was instrumental in the approach that was taken. In this case, then, the agency concept can be used to explain how the consultants used their knowledge about prevailing implementation planning practice in order to take a stronger-than-usual approach. The notion of agency thus emphasizes the ability of actors to maintain and change prevailing municipal SSP practices.

Like the logics of appropriateness and instrumentality concepts, however, the agency idea does not directly attend to the contextual factors that shaped the community-scoping step. Rather, it situates them under the umbrella of agency. While it is true that actors ultimately made the decisions, and so actors provided the mechanism through which contextual factors shaped practice, the actual factors that influenced the actors remain unaccounted for. Needed are some concepts that can explain such things as trust, a concern for broad public participation, community ownership, and integrative thinking.

9.3 SSP-Specific Norms

Because the contextual factors emerged from the case studies, it seems reasonable to assert that some of them are peculiar to local government SSP and other types of long-term planning. The above examples of the actors' logics of appropriateness, instrumentality and agency could be deconstructed to reveal a set of local government SSP-specific normative institutions that played out in all of the cases. For example, trust among stakeholders is critical in SSP because SSP is essentially about implementing goals that require long-term monitoring and adjustment over time. Success necessitates a sense of confidence that actors will behave responsibly and do their part to enact the goals. A concern for broad public participation is central to SSP for obvious reasons, many of which have been mentioned; a concerted effort is needed to make progress towards sustainability goals and so questions about how to inspire broad participation are paramount in SSP initiatives. Similarly, the need for community ownership is integral to the achievement of sustainability goals. The integrative and comprehensive nature of sustainability is fundamental to the concept and so practitioners and citizens must contend with it in one way or another.

As Scott (2001) has explained, norms represent our conceptions of how things *should* be done: "Normative systems define goals or objectives...but also designate the appropriate ways to pursue them" (Scott, 1995, p. 37-38). These contextual factors thus reflect the respective planning teams' perceived normative prerequisites for good local government SSP. In accommodating these norms in the design of the community-scoping step, the planning teams demonstrated their perceived importance to SSP contents and processes.

9.4 Shared Mental Models and Collective Understandings

Established, shared mental models and collective understandings may also shape practice. In Cochrane, the long-established Western aesthetic for the built environment and the built environment concerns that emerged in response to Cochrane's rapid population growth reflect a shared sense of place and a shared desire to preserve Cochrane's small town, Western look and feel. These cognitive factors inspired the planning team to include a built environment system Action Group in community scoping. In Huntsville and Prince George, the attitude of the respective planning teams and citizens to ensure that the plans would not sit on the shelf evidences a shared attitude about sustainability planning and a shared intent to implement sustainability goals. One planner in Prince George had a particularly strong sense of identity as a planner who likes to try new things and take on challenging projects. This planner also expressed that a shared mental model – a single task mentality – among municipal employees may underpin the prevailing practice to ignore social change and implementation matters in the plan formulation stage of planning.

It is interesting to note that, because the community-scoping methods that were used in the three cases were not unusual relative to the methods that were used in the other initiatives in this study, the SSP-specific norms that were found may indicate a widely shared understanding of how community-scoping *should* be undertaken as well as the valued qualities of SSP more broadly. Though the Prince George and Cochrane cases were more deliberative than most, the findings of the basic information collection step revealed that, generally speaking, practitioners have been

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using inclusive methods and/or multiple methods with varying degrees of inclusiveness. The basic information collection step also showed that the notion of integration was, at a minimum, expressed in one way or another in all of the plans in this study. More research is required to investigate the nuances among the initiatives with respect to the particular set of norms that appears to be collective. However, at this early stage it seems reasonable to assert that the norms that shaped the practitioners' choices are rooted in some well-established shared ways of thinking about good sustainability planning.

On a more collective level, the shared norms of broad public participation, community ownership, and integrative thinking reflect the embeddedness of the sustainability discourse, which has for decades emphasized broadly democratic, collective and integrated approaches to decision making, among other ideals. In institutional terms, the shared concern for these norms reflects a systems worldview. But this begs more questions about how this worldview is playing out on the ground; SSP practitioners may not interpret these norms in the way that deep green sustainability theorists would interpret them. Notwithstanding these questions, it seems reasonable to assert that these norms have become firmly entrenched in local government SSP. Though they may play out differently from case to case, the fact that they emerged as common in this study evidences the extent to which they have become embedded in local government SSP in Canada.

9.5 Bounded Rationality

Embedded norms, shared mental models and worldviews constrain and enable actors' behaviour. This phenomenon is an effect of bounded rationality or the ability (or inability) of actors to make decisions within the constraints of existing institutional arrangements. This effect was perhaps best demonstrated by the fact that the shared SSP-specific norms (broad public participation, community ownership, integrative thinking) did not lead to a concern for social change and effective implementation in the design of community-scoping processes.

More research is required to better understand the practitioners' understandings of these norms. At this stage in the research it seems that their conceptualizations were bound by some deeper, perhaps taken-for-granted, shared understandings of what they should imply for the plan formulation process. These embedded normative features of SSP structured the actors' thinking about social change and implementation planning. The respective planning Team's interpretation of broad public participation, community ownership and integrative thinking were enclosed within a preoccupation with the plan formulation environment or, in other words, with the creation of sustainability visions, goals and strategies in a public administrative, gas tax-funded planning context.

This is not to say that the planning teams did not think about implementation during the plan development stage. Nor do I mean to imply that they did not invite certain stakeholders to the table in order to build capacity for enactment. Indeed, as I have mentioned, previously, Huntsville's case was exemplary with respect to the detail provided about implementation. In each of the cases, however, the community-scoping step did not extend around social change and implementation matters in a precise and systematic way to indicate a set of norms in thinking

about these things. Indeed, if we were to expand our interpretation of these norms to include a concern for social change and implementation, they would have greater implications for practice. Thus, while all three cases expressed a concern for these things at least in terms of plan contents and community-scoping contents, they were not well translated into *processes*.

Here, it is interesting to note that this finding about the respective planning team's conceptualizations of these norms is consistent with the conclusions of Kennedy et al.'s (2007) and Markvart and Gibson's (2011) respective evaluations of best-known SSP frameworks, which I summarized in Chapter Two. These studies assert that, among other things, most frameworks do not give enough direction on how to do integrative planning, they do not address precisely who should have responsibility over implementation, and they embrace a linear model of plan formulation and enactment phases – more evidence of the entrenched nature of our understandings of the process implications of broad participation, community ownership and integrative thinking.

9.6 Uncertainty

The interviews with a planner from the Cochrane case and a consultant from the Huntsville case revealed that the notion of uncertainty may partly underpin the reason why implementation and social change concerns are so often ignored in community scoping in the plan formulation stage. These interviewees expressed three ways in which uncertainty might influence implementation planning. First, it is difficult for practitioners to foresee the goals that will emerge from the visioning and scoping steps and, thus, it is difficult to anticipate implementation and social chance matters. This uncertainty is rooted in a more pervasive trend to view the plan formulation process in a linear way – cut off from enactment. Secondly, there may be a general lack of clarity about the level and extent of authority that a sustainability plan should have in a municipal planning context where there is a diverse range of strategies, policies and regulations whose scope and extent of authority overlap in complex ways. This is an issue related to uncertainty surrounding tiering and it stems from confusion around the correct or most efficient administrative approach by which practitioners should coordinate the implementation of sustainability goals with goals from other related plans in other departments. Finally, uncertainty about long-term sustainability goals may make it difficult for politicians to commit to implementation because they inherently dislike the unknown. Their priority is to gain and maintain the support of their constituents, which certain sustainability goals might jeopardize, and thus it is much easier for members of Council to support the development of sustainability goals than it is to support implementing them.

9.7 Other Normative, Cognitive, and Regulative Influences

The interviews revealed a range of factors that influenced the respective planning teams' choices with regards to incorporating social change and implementation matters in the community-scoping process. Some factors that were common across the case studies were educational backgrounds and professional experience, which relate to the knowledge and skills that practitioners and citizens bring to SSP initiatives. When deconstructed, they expose some

culturally embedded norms surrounding how SSP *should* be done and, more specifically, the range of concerns that should be incorporated in the plan formulation stage. Scott's (2001) normative and cognitive pillars are useful here in that they link the established norms of urban planning practice with the shared mental models or cognitive scripts that practitioners carry into practice. In a municipal SSP context, these shared mental models influence the way in which practitioners approach the design of SSP and community-scoping contents and processes, among other things.

Because systems of education and professional experience reflect the wider cultural context within which they are situated, the mental models that practitioners carry into the world mirror these cultures, which are comprised of many different laws, standards, beliefs, assumptions, structures and processes, etc., that bear on thinking and practice. The tendency to ignore social change and implementation concerns is rooted in systems of education and planning traditions that do not train practitioners to consider these things. Because educational systems and planning paradigms are culturally embedded, this tendency can also attributed to widespread trends in thinking and practice including, to name a few, our collective knowledge about how to plan for societal change, organizational mandates, our interpretations of the roles that municipal governments and planners should play in leading societal change, and the legislative frameworks surrounding local government powers and responsibilities. Municipal SSP practitioners pull from an available stock of knowledge that is comprised of and influenced by all of these things.

One planner in the Huntsville case and the one consultant in the Prince George case stated that the social change and implementation planning issue is underpinned, in part, by a widespread trend to conceive of strategic planning as a means to dream of things to do as opposed to how to do them. Here, again, we find evidence of shared mental models, embedded norms surrounding how SSP *should* be done, and perhaps even uncertainty with respect to how to plan for successful enactment and social change.

The short-term election cycle, municipal organizational cultures, and municipal budgeting priorities, which were identified by interviewees from the Huntsville and Prince George cases as important impediments to social change and implementation planning, evidence some regulative, normative, and cognitive institutional influences. The short-term municipal election cycle has been enshrined across Canada in Local Government Acts or Municipal Elections Acts, depending on the province. As one planner in the Huntsville case explained, this mandatory cycle constrains the ability of local politicians to rest their platforms on long-term visions. Essentially, then, it discourages political support for long-term planning for social change towards sustainability.

The short-term election cycle may also shape politicians' identities. One planner from the Huntsville case expressed that, in his thirty years of experience, he has learned that there are three types of politicians: the 'curmudgeon' who is against everything, the 'pothole' who agrees with everything, and the 'visionary leader' who has a long-term vision and the courage to lead the community towards his/her vision. There are very few visionary leaders because most politicians will not risk their seats on long-term promises, and so the political cycle encourages curmudgeon and pothole politicians who typically rest their platforms on promises that can be fulfilled over the short term.

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Similarly, organizational cultures reflect shared mental models with respect to established day-to-day operational structures and processes, and these things underpin attitudes towards organizational change. Municipal budgeting priorities represent institutionalized organizational norms, values and taken-for-granted organizational processes. Macro-level factors such as, namely, Western capitalism and associated models of economic growth, underpin these things.

9.8 Diffusion

In the Prince George case the concept of diffusion was demonstrated in two different ways. One planner expressed that his research into how other municipalities have been undertaking SSP informed the planning team's decision making around process design. Notably, they informed the planner's choice to use surveys. Similarly, one consultant stated that the team's approach to implementation planning, notably the actions that were created, was influenced by his research into how other municipalities have been approaching implementation planning. Specifically, the consultants were inspired by Montreal's approach. New institutional theorists use the concept of diffusion to explain how certain norms, values, beliefs, structures and processes, etc., spread through societies and so institutionalize certain ways of thinking and practice over time (see Powell & DiMaggio, 1991; Scott, 2001; Streeck & Thelen, 2005).

9.9 Built and Natural Environmental Influences

In the Cochrane and Huntsville cases, a range of built and natural contextual factors directly influenced the design of community-scoping contents and processes. In the Cochrane case, the general concern to preserve the Western aesthetic and protect the Town's range lands from sprawl prompted the planning team to include a built environment systems Action Group in the scoping step. In the Huntsville case, the G8 summit event and annual influx of summer cottagers influenced the timing of the community engagement events. Furthermore, as I previously summarized, in all three cases an intertwined set of built and natural environmental factors underpinned the sustainability concerns that were elicited from the public.

As shown in Table 35, these contextual factors could be perceived as shared norms or values as well as things that reflect a shared sense of place or a shared desire for the future. In the Cochrane case, for example, water conservation is rooted in a basic need for water and, by extension, a shared valuation of the Bow River as a vital source of drinking water. In the Huntsville case, the hidden poverty issue and desire for local economic development reflect some collective values and a shared sense of how they would like Huntsville to grow. Here, the logic of instrumentality may also underpin the desire for economic well-being. Similarly, the air quality, city image, high crime rate, and poverty issues in the Prince George case are rooted in some shared values and a shared sense of how Prince George should evolve.

Again, however, concepts from the New Institutionalism do not attend directly to these built and ecological contextual factors. Rather, they must be perceives as norms or different kinds of logics as opposed to factors that bear on human behaviour. I address this issue in more detail in sub-section 9.10 below.

9.10 Efficacy of the New Institutionalism

The case stories unearthed a range of socioeconomic, built and natural environmental factors that influenced community-scoping practice. Concepts from the New Institutionalism were used to better understand them. In this study, the concepts that were most useful were the logics of appropriateness and instrumentality, agency, the bounded rationality and uncertainty, Scott's (2001) three pillars of institutions, and diffusion. Only Scott's pillars, however, were able to directly address the contextual factors that influenced actors' choices in community-scoping methods. Specifically, Scott's pillars covered them by labeling them as 'regulative', 'normative', or 'cognitive' institutions. In this study, normative and cognitive rules emerged most frequently in that many contextual factors were perceived as embedded planning norms, shared understandings, and taken-for-granted identities or roles for practitioners and municipal governments. The logic of appropriateness was also prominent.

As a package, the key strength of the concepts was that they were able to explain the systemic or institutional roots and effects of the real-life contextual factors that influenced the design of the community-scoping step. Through an institutional lens, for example, actors' educational backgrounds were perceived as the outcomes of systems that are enmeshed within culturally embedded, shared understandings about how things should be done and the roles that practitioners and municipal governments should play in planning for social change. A better understanding of the institutional roots of influential contextual factors can illuminate why certain approaches to practice are so widespread, why they persist, and what we should adjust in order for practice to evolve in a particular way.

The institutional lens, however, was less capable of explaining these built and natural environmental circumstances. The Bow River, for example, was a factor that influenced Cochrane's sustainability planning initiative in that water conservation emerged as a major community concern and, as I explained, a host of local and provincial laws and policies accompany the use of the Bow River. Through an institutional lens, the Bow River was perceived as a norm or a thing that humans value because of its use to humans, or simply because the citizens of Cochrane must value it due to legislative restrictions on water use. The River was not interpreted as something that in itself constrains and enables human behaviour, or something that lives according to a set of natural environmental structures and processes that influence human behaviour. Similarly, in Prince George, the issue of the built environment in the 'Bowl' emerged as a key concern because it affects the City's air quality. Through an institutional lens, the public's concerns about the built environment must be understood as something that people value. Alternatively, it could be viewed as an effect of an arrangement of norms in urban planning. But the built environment in the Bowl is in itself something that constrains and enables human behaviour and it has its own set of structures and processes that impact human health and the environment. In these examples, then, the institutional frame cuts us off conceptually from understanding the direct effects and the dynamics of built and natural systems on human systems and vice versa.

The direct influence of built and natural environmental circumstances exposes the limits of New Institutional theory to explain how built and ecological factors shape human behaviour, decision-making structures and processes, and whole societies. But this begs more questions about the

alternative. If we do not interpret them through a New Institutional lens, how should we interpret them? I discuss this question in more detail in Chapter Ten. First, I turn to a summary of this chapter.

9.11 Summary

The logics of appropriateness and instrumentality, agency, Scott's (2001) regulative, normative and cognitive types of institutions, bounded rationality and diffusion were most useful in this study in terms of their ability to explain the contextual underpinnings of community scoping practice. In the paragraphs that follow I summarize the key points with respect to what these concepts revealed about why practice is the way it is as well as the efficacy of the New Institutionalism as a conceptual lens.

The reason why particular community-scoping contents and processes were used in each case could be attributed partly to the respective planning teams' sense of what is right and good for the local context and sustainability planning more broadly. This 'logic of appropriateness' explained the common concern for broad public participation, community ownership and integrative thinking in the design of the community-scoping step. In the Cochrane and Huntsville cases, these ideas were evident in the respective consulting teams' company branding. Thus, it was reasonable to deduce that the consultants may have been expressing the 'logic of instrumentality' in that it was in their financial and political interests to highlight ideas consistent with their company profiles. Moreover, since all three cases were Integrated Community Sustainability Plan initiatives, the attention that was given to these features of planning revealed some concern for the requirements of the Federal Gas Tax Agreements.

Decisions about community-scoping contents and processes could be partially explained by the notion of agency. The direct effects of agency were perhaps most evident in the Prince George and Huntsville cases. In the Prince George case, one planner who had a strong relationship of trust with the Council liked to take on challenging projects and push the envelope with respect to doing things differently. In the Huntsville case, the agency concept elucidated how the consultants used their knowledge about prevailing practice in order to take a stronger-than-usual approach to implementation planning. The agency concept emphasized the vital role that practitioners can play in municipal SSP to raise the bar on practice, but other concepts were needed that attended more directly to the contextual factors that influenced the community-scoping step.

In all three cases, the contextual factors that were elaborated by the logics of appropriateness, instrumentality and the notion of agency could be deconstructed to reveal a set of local government SSP-specific norms that constrained the planning teams' choices. For example, the concern for broad public participation, which emerged in al three cases, is central to SSP for obvious reasons, many of which have been mentioned. Similarly, the need for community ownership is integral to the achievement of sustainability goals. The integrative and comprehensive nature of sustainability is fundamental to the concept and so practitioners and citizens must contend with it in one way or another in SSP. These contextual factors reflected the respective planning teams' perceived normative prerequisites for good local government SSP.

In Cochrane, the long-established Western aesthetic for the built environment reflected a shared sense of place, which inspired the planning team to include a built environment system Action Group in community scoping. In Huntsville, the attitude of the planning team and citizens to ensure that the plan would not sit on the shelf evidenced a shared attitude about sustainability planning. One planner in Prince George expressed that a shared mental model – a single task mentality – among municipal employees may underpin the prevailing practice to ignore social change and implementation matters in the plan formulation stage of planning.

Because the community-scoping methods that were used in the three cases were similar to the methods that were used in the other initiatives in this study, the SSP-specific norms (broad public participation, community ownership and integrative thinking) that were found may indicate a widely shared understanding of how community-scoping *should* be undertaken as well as the valued qualities of SSP more broadly. On a more collective level, these shared norms reflect the embeddedness of the sustainability discourse, which has for decades emphasized broadly democratic, collective and integrated approaches to decision making, among other ideals. Though they may play out differently from case to case, this study begins to evidence the extent to which they have become embedded in local government SSP in Canada.

The effect of 'bounded rationality' was perhaps best demonstrated by the fact that the SSP-specific norms (broad public participation, community ownership, integrative thinking) that influenced the practitioners in each case did not lead to a concern for social change and effective implementation matters in the design of the community-scoping step. The respective planning teams' interpretation of broad public participation, community ownership and integrative thinking seemed to be enclosed within a preoccupation with the plan formulation environment. Indeed, if we were to expand our interpretation of these norms to include a concern for social change and implementation, they would have greater implications for practice. The bounded rationality concept helped to explain why certain practices prevail and why actors may not be able to imagine alternatives.

The interviews revealed that uncertainty might partly underpin the reason why implementation and social change concerns are so often ignored in community scoping in the plan formulation stage. It may be difficult for practitioners to foresee the goals that will emerge from the visioning and scoping steps and, thus, it is difficult to anticipate implementation and social chance matters. This uncertainty is rooted in a more pervasive trend to view the plan formulation process in a linear way – cut off from enactment. Secondly, there may be a general lack of clarity about the level and extent of authority that a sustainability plan should have in a municipal planning context where there is a diverse range of interconnected strategies, policies and regulations. Finally, uncertainty about long-term sustainability goals may make it difficult for politicians to commit to implementation because they inherently dislike the unknown.

The interviews revealed a range of factors that influenced the respective planning teams' choices with regards to incorporating social change and implementation matters in the community-scoping step. Some factors that were common across the case studies included educational backgrounds and professional experience. Because educational backgrounds and professional experiences reflect cultural contexts, the tendency to ignore social change and implementation

matters in community scoping can be attributed to entrenched trends in thinking and practice including, to name a few, our collective knowledge about how to plan for societal change, organizational mandates, our interpretations of the roles that municipal governments and planners should play in leading societal change, and the legislative frameworks surrounding local government powers and responsibilities. Municipal SSP practitioners pull from an available stock of knowledge that is comprised of and influenced by all of these things.

The short-term election cycle, municipal organizational cultures, and municipal budgeting priorities, which were identified by interviewees from the Huntsville and Prince George cases as important impediments to social change and implementation planning, evidence some regulative, normative, and cognitive institutional influences. The short-term municipal election cycle has been enshrined across Canada in Local Government Acts or Municipal Elections Acts, depending on the province. As one planner in the Huntsville case explained, this mandatory cycle constrains the ability of local politicians to rest their platforms on long-term visions. It may also shape politicians' identities, as expressed by one planner from the Huntsville case. In his opinion, there are very few visionary leaders because most politicians will not risk their seats on long-term promises, and so the political cycle encourages curmudgeon and pothole politicians who typically rest their platforms on promises that can be fulfilled over the short term.

Similarly, organizational cultures reflect shared mental models with respect to established day-to-day operational structures and processes, and these things underpin attitudes towards organizational change. Municipal budgeting priorities represent institutionalized organizational norms, values and taken-for-granted organizational processes. Macro-level factors such as, namely, Western capitalism and associated models of economic growth, underpin these things.

In the Huntsville and Prince George cases the methods were informed by the planning teams' research into how other municipalities have been undertaking strategic planning and SSP, respectively. Similarly, one consultant from the Prince George case stated that the team's approach to implementation planning, notably the actions that were created, was influenced by his research into how other municipalities have been approaching implementation planning. New institutional theorists have used the concept of diffusion to explain how certain norms, values, beliefs, etc., spread through societies and so institutionalize certain ways of thinking and practice over time (see Powell & DiMaggio, 1991; Scott, 2001; Streeck & Thelen, 2005).

In the Cochrane case, the general concern to preserve the Western aesthetic and protect the Town's historic ranchlands from urban development prompted the planning team to include a built environment systems Action Group in the scoping step. In the Huntsville case, the G8 summit event and annual influx of summer cottagers influenced the timing of the community engagement events. Additionally, in all three cases an intertwined set of built and natural environmental factors underpinned the sustainability concerns that were elicited from the public. These contextual factors could be perceived as things that actors value and so Scott's (2001) normative pillar could be used to explain them. Scott's regulative and cognitive categories were also helpful in that a particular set of laws and shared identities or beliefs may have influenced the public's built and natural environmental concerns.

As a package, the key strength of the concepts was that they were able to explain the systemic or

institutional roots and effects of the real-life contextual factors that influenced the design of the community-scoping step. A better understanding of the institutional roots of influential contextual factors can illuminate why certain approaches to practice are so widespread, why they persist, and what we should adjust in order for practice to evolve in a particular way. The institutional lens, however, was less capable of explaining built and natural environmental circumstances. For example, through an institutional lens the Bow River was not interpreted as something that in itself constrains and enables human behaviour, or something that lives according to a set of natural environmental structures and processes that influence human behaviour. In this way, the institutional frame cuts us off conceptually from understanding the direct effects of built and natural systems on human systems and vice versa.

The direct influence of built and natural environmental circumstances exposes the limits of New Institutional theory to explain how built and ecological factors shape human behaviour, decision-making structures and processes, and whole societies. But this begs more questions about the alternative. If we do not interpret them through a New Institutional lens, how should we interpret them? I discuss this question in more detail in Chapter Ten.

Chapter Ten – Implications of the Findings for Theory and Practice

The findings have implications for theory building about local government SSP, the bodies of literature that formed the analytical framework, and community-scoping and local government SSP practice. Below, I discuss these implications, in turn, beginning with the big picture contributions to theorizing about planning for societal change towards sustainability.

10.1 Planning for Societal Change Towards Sustainability

When interpreted as a whole, the findings evidence the socially constructed, contested nature of planning for societal change towards sustainability; the content and process components of this kind of planning are open to interpretation and these interpretations are, in turn, shaped by personal-to-global-level circumstances. The findings imply that entrenched norms in local government SSP are especially significant in framing our interpretations – in forming and maintaining prevailing approaches to practice. Culturally embedded worldviews, collective understandings and the legislative framework that governs municipal government planning in Canada buttress these norms.

In this study, the shift from a mechanistic to a systems worldview underpinned the findings about how we have been practicing integrative thinking and defining community sustainability. Some key collective norms included taken for granted understandings about the roles that citizens, planners and municipal governments should play in local government SSP, shared understandings about the purpose of community-scoping, and a lack of understanding about how to translate such integral notions as integrative thinking into planning processes. Actors carry these worldviews and norms through a process of diffusion across organizations and so they become entrenched over time (see Scott, 2001 and Campbell, 2004). As the Huntsville and Prince George cases showed, shifts in practice or practice that breaks the mold may emerge when actors gain an awareness of the shortcomings of certain trends, when there is a shared mindset to raise the bar, and when there are actors (in leadership roles) who are innovative in spirit and courageous enough to try new things.

From the standpoint of 'procedural sustainability' (Robinson, 2004), common and atypical approaches to practice constitute the social process of figuring out what planning for social change towards sustainability should mean and entail. But this is not to say that our interpretations do not matter. Indeed, this study suggests that our conceptualizations are central to the nature of the trajectory of progress towards sustainability. For example, this study found that the vast majority of community-scoping frameworks used open-ended questions oriented primarily towards an investigation of the plan formulation environment. It also found that practitioner understandings of broad public participation and collective ownership did not translate into a concern for learning and the plan implementation environment. These examples evidence the link between our interpretations of practice and the frameworks that we use as well as the connection between our understandings of community context and the frameworks through which we view it.

If our interpretations matter, then we must question them, and we must carefully choose our contents and processes in SSP in any context. But this raises questions about which and whose standards should form the basis of our critiques and choices. This study adopted a set of ideas that constitute a particular approach to understanding what SSP should mean and entail and, by extension, a particular view of community context. Like any other framework, it could be evaluated against any number of ideals that reflect a stronger or weaker interpretation of SSP. Moreover, the ties between interpretations, concepts and practice beg questions about outcomes and, more specifically, whether one or another framework would really make a difference on the ground, considering the myriad factors that might facilitate or hinder plan formulation and implementation processes regardless of the framework used.

This study increases our understanding of the conceptual basis for theory building about local government SSP and SSP more generally: it should be comprehensive of the constituent components of practice (sustainability, collaboration, social change and effective practice); it should attend to the core concerns of planning for social change towards sustainability; it should consider how the content and process components of practice devote attention to both plan formulation and implementation environments; it should include a focus on the links between contents, processes and outcomes; and it should consider the institutional and environmental underpinnings of practice. This study did not set out to investigate the links between contents, processes and outcomes; however, as I mentioned, above, it underscores the need for this kind of research.

10.2 Sustainability Assessment

As I mentioned in Chapter One, this study contributes to sustainability assessment scholarship in two key ways. First, it contributes to our understanding of how sustainability, resilience, social change and practical implementation concerns can be combined in analyses. Second, it enriches our comprehension of the implications of sustainability assessment contents and processes for local government SSP.

This thesis found that there is much complementarity and overlap between Gibson et al.'s (2005) generic sustainability decision criteria and resilience concepts (Walker & Salt, 2012). The major contribution of resilience theory to sustainability assessment is that resilience scholars have elucidated in greater detail the features of resilient systems and they have developed useful concepts to explain the interactions of complex social-ecological systems. Secondly, the social change and implementation additions ameliorated a general tendency in the sustainability assessment literature to ignore the societal change and practical implementation considerations that accompany the outcomes of decision making. Devoting early and greater attention to social change and implementation matters appropriately extends the focus of assessment and planning around both plan formulation and enactment environments.

These lessons have implications primarily for scholars who would combine sustainability, resilience, social change and implementation considerations in analyses. Beyond these scholars, the findings imply that combining these matters should be considered on a case-by-base basis, depending on the purpose of the evaluations. The general lesson for all scholars is that a

comprehensive set of core concerns of planning for social change towards sustainability should cover the essentials of sustainability or the fundamental properties of sustainable systems, the attributes and multi-scale dynamics of resilient ones, and they should devote attention to the real-life social change and implementation implications that accompany sustainability goals.

The limitations of the local government-specific SSP criteria to attend directly to aesthetic, spiritual and sense of place matters imply that sustainability assessment scholars need to dedicate more attention to how these matters relate to sustainability theory and our prescriptions for sustainable societies. Similarly, the limitations of the criteria with respect to their ability to reveal the intensity versus the frequency of specific community issues suggests that scholars should incorporate a mechanism in their criteria-based analyses to address intensity.

Furthermore, the prescriptions of sustainability assessment scholars have significant consequences for conventional community scoping and local government SSP contents and processes. When used to evaluate the wider plan formulation process within which the community-scoping step is nested as well as the content component of community scoping frameworks, the core concerns of local government SSP revealed important gaps in our thinking about what municipal SSP should mean and entail. Specifically, they revealed that practitioners have tended to use open-ended questions that miss critical matters related to integration (especially in the way that we understand sustainability matters as well as the aim to contribute positive, mutually reinforcing benefits to all areas of sustainability at once), inter- and intra-generational equity, precaution and adaptation, and multi-scale dynamics. The implications of these gaps for practice will be discussed later. Here, the main point is that using the local government-specific concerns of SSP would impose a more proactive, comprehensive and integrated, criteria-led approach that challenges our thinking about what municipal SSP should require as well as how we should translate these requirements into decision-making processes and organizational and societal structures and processes more broadly.

Sustainability assessment scholars' prescriptions for processes are just as significant as their prescriptions for contents. If conventional community-scoping processes were fused with scholars' prescriptions for sustainability assessment processes, community scoping would extend throughout the SSP cycle and, as such, it would be used for different purposes at different points in the cycle. The research revealed that sustainability assessment and community-scoping processes are fundamentally compatible in that both are essentially investigative, both aim to be broadly inclusive of the public, and both seek to ensure progress towards sustainability. Existing, key areas of overlap include that both require a community-based evaluation of the plan formulation environment, and both seek to ensure that the results of the evaluations inform planning. Sustainability assessment processes, however, are underpinned by a primary concern to identify the impacts of alternative options for the design of undertakings, while conventional community-scoping processes have been strictly oriented towards understanding current community conditions. Moreover, in sustainability assessment the evaluation of the plan formulation environment would inform mitigation and enhancement measures and other recommendations for the design of proposed undertakings, while in municipal SSP they would provide the basis for sustainability visions, goals, actions and strategies.

Thus, the key point of departure between sustainability assessment and community-scoping processes is that the former (ideally) entrain a deep concern for alternatives and trade-offs and the distribution of adverse and beneficial impacts, while the latter is currently primarily oriented towards creating one coherent vision and accompanying goals, actions and strategies for community development, without much consideration for alternatives, trade-offs and the distribution of impacts and benefits. This is not to say that it would be entirely impractical to broaden the scope of community scoping. Indeed, since municipal SSP is fundamentally about envisioning the trajectory of community development, it seems reasonable to assert that the adverse and beneficial impacts of alternatives should inform the way forward – at both strategic and project levels.

This last point about the impacts of alternative visions, goals, etc., for community development brings to the fore shortcomings in practice related to the accompanying need for attention to social change and implementation processes. As I have mentioned previously, both sustainability assessment and community scoping practice are chiefly preoccupied with the plan formulation environment. But planning for social change towards sustainability necessitates a consideration of both formulation and enactment environments – in the early stages of planning. Here is where additional contents and processes related to identifying systemic constraints, enablers and practical implementation matters are needed in both sustainability assessment and community-scoping practice.

More research is needed to investigate the precise practical constraints that would accompany an extended view of community scoping. The findings of this study suggest that, even though marrying assessment and scoping contents and processes seems desirable on a conceptual level, it would take more time, financial and specialized expertise, which municipal governments may not have.

10.3 Social-Ecological Resilience Theory

The main contribution of the findings to resilience theory is that, considering the overlap in sustainability assessment and resilience scholarship, resilience concepts offer a more detailed explanation of the nested, multi-scale dynamics of social-ecological systems, which inevitably influence the way in which sustainability goals are pursued. Resilience scholars would benefit from more exchange with sustainability assessment scholars and sustainability theorists more broadly in order to elucidate the social justice prerequisites for resilient social-ecological systems.

Similarly, resilience scholars lend to institutional theory some useful concepts that elucidate the multi-scale, cyclical behaviour of institutional systems. Institutional theorists, however, have devoted much more attention to the socioeconomic dimension of institutional arrangements, and this has included some elaboration on the nested, hierarchical structure of human-made rules (see Lowndes, 2001, 2005; North, 1990; Pierson, 2004). More research is required to explore the areas of convergence between resilience theory and the New Institutionalism in order to expand our understanding of the usefulness of resilience concepts to institutional theory and vice versa.

10.4 Collaborative Planning

The research contributes to our understanding of the strengths and limitations of frameworks that scholars have developed to interpret the design of decision-making processes. Collaborative planning scholars have tended to neglect the dimension of social change and the accompanying need for transformative learning in their typologies of decision-making processes. I responded to this limitation by expanding on Fung's (2006) Democracy Cube in order to incorporate Sterling's (2010-11) levels of learning and change, which attend to the transformative learning component of planning for societal change towards sustainability. The key strengths and limitations of this approach were discussed earlier.

The findings also begin to reveal a connection between (a) the contents and processes that comprise the community scoping frameworks, (b) the contextual factors that constitute a particular place, and (c) the range of generic concerns initially covered by the frameworks, as well as the range of context-specific concerns that emerged from application of the frameworks.

With respect to the generic concerns that were initially covered by the frameworks, the results revealed that the frameworks comprised of questionnaires or surveys that were structured around predetermined response options tended to address either a selective or narrow range of generic SSP concerns. This is because the concerns covered by the predetermined response options were limited by the concepts embodied by the response options. One exemplary illustration of this link was provided by Prince Rupert's community planning initiative, where the community scoping framework was structured around a predetermined set of "quality of life" statements to which participants could respond with either "agree" or "disagree" response options. As previously mentioned, Prince Rupert's approach covered primarily Gibson's (2005) 'livelihood sufficiency and opportunity' criterion.

Conversely, the scoping frameworks that were comprised of open-ended questions and round table discussions tended to initially cover a wide range of generic SSP matters. This is because the open-ended questions were more flexible with respect to the range of concerns around which they might extend. Evidence of this link was provided by Prince George's ICSP initiative, whose scoping framework consisted of open-ended scenario planning around the 'external factors' that may affect the City. As previously described, Prince George's framework covered a comprehensive range of generic sustainability (and resilience) concerns, and a good range of social change and implementation matters.

Furthermore, the frameworks that were comprised of open-ended questions and round table workshop processes tended to elicit more context-specific responses from the public, as shown in Table 29. In contrast, the feedback that emerged from application of frameworks that used predetermined response options tended to reflect the predetermined response options. This evidences a connection between the contents and processes of community scoping frameworks and the range of concerns elicited from the public through application.

Somewhat puzzlingly, however, the results also showed that a similar range of local government-specific SSP concerns tended to emerge through application of both types of community-scoping frameworks. For example, as I previously described in Chapter Six, the three most frequently

expressed sustainability concerns, regardless of the scoping framework applied, were related to Gibson's (2005) generic 'livelihood sufficiency and opportunity', 'resource maintenance and efficiency', and 'social-ecological civility and democratic governance' criteria. Thus, with respect to the range of concerns covered in application, it seemed not to matter to a great extent whether open-ended questions or predetermined response options were used. Rather, the main implication of using either an open-ended or predetermined approach seems to be that the former is much more capable of eliciting context-specific concerns from the public, while the latter is restricted by the contents of the predetermine response options.

This puzzling finding implies that community contexts play a significant role in determining the range of concerns covered in the community scoping step – perhaps as large a role as methodological choices related to contents and processes. But the findings also suggest that scoping frameworks influence the range of community concerns covered. If frameworks matter, then it is conceivable that different approaches to community scoping would be more or less effective with respect to how context is considered for various purposes. With respect to the content and process components of community-scoping frameworks, this implies that the conceptual orientations and public participation methods used make a difference. In effect, they embody a particular worldview, which influences practitioners' and citizens' interpretations of community context. Thus, community context could be understood in myriad ways. But questions linger about the nexus between the contents and processes that comprise community-scoping frameworks and the range of place-specific concerns that exist independently of these frameworks. Could it be that community context can only be perceived through the conceptual frameworks that we adopt to view it?

All this is to say that the findings indicate that both community-scoping frameworks and community contexts matter with respect to the outcomes of the community-scoping step. Thus, the content and process components of community scoping methods are critically important because they influence how community context is interpreted and used in decision making. More research is required to better understand how they work together to influence our understanding of community context and planning outcomes.

10.5 The New Institutionalism

The New Institutionalism represents a relatively new approach to analysis in the field of urban planning: "…the literature on the new institutionalism is bursting in economics, political science, and other social sciences, and has been doing so for more than a decade and yet it counts only a handful of planning academics among its adherents" (Verma, 2007, p.1). This study demonstrates the usefulness of New Institutional thought in analyses of municipal SSP practice. Specifically, it reveals the utility of using core concepts from the three varieties of New Institutional theory to examine *how* SSP practitioners have been planning for social change and to peel away the surface of actors' choices to reveal the institutional determinants of practice or, in other words, *why* particular approaches to practice persist. These two questions (how and why) pertain to two different uses of the New Institutionalism: the former is prescriptive while the later is descriptive or analytical. Below, I discuss the implications of the findings related to these two uses for the theory.

The findings of this study suggest that it is useful to combine insights from the three varieties of institutional thought. In this study, it generated a deeper understanding in that it revealed the effects of the logics of instrumentality and appropriateness, which have conventionally been associated with the rational choice and sociological varieties, respectively. And it devoted attention to all three kinds of institutions, regulative, normative and cognitive, which have tended to be emphasized by rational choice, historical and sociological New Institutionalists in a disciplinary way. Thus, practitioners' choices were viewed as undergirded by financial interests as well as formal systems of laws and informal values, beliefs and worldviews – as opposed to just one or the other. Moreover, in using a combined approach, the research showed that the logics and formal and informal rules that influenced practitioners' choices are not to be perceived as empirically isolated phenomenon. Rather, a range of institutions and logics may underpin a single choice, and this generates a deeper understanding of the systemic effects of institutional systems.

Scott's (2001) normative and cognitive dimensions, however, appeared to be most relevant in this study, and this suggests that the sociological and historical varieties of New Institutional thought may have the most utility in studies that investigate the contextual underpinnings of trends in planning practice. More research is needed in this regard; however, this view has been echoed by planning scholars elsewhere. Healey (2007), for example, has asserted that the sociological school is especially insightful in examinations of how planning practice is institutionally situated and how practice may contribute to transformative change agendas: "A critical element for the analysis of transformation processes is some conception of the interplay between deeper, embedded cultural practices and the conscious and visible world of routine and strategic interactions" (p. 67).

The limited ability of New Institutional theory to provide a framework for understanding built and natural contextual factors points to the need for a complex social-ecological systems approach to institutional analysis. Here is perhaps where the greatest potential lies for resilience theory to contribute to institutional theory. A fused perception of social-ecological systems, however, raises questions about how institutional theorists should explain the direct effects of built and ecological dimensions of socioeconomic systems. Institutional analysis has begun to penetrate research fields that espouse a complex systems understanding of the world. Resilience scholars, for example, have used concepts from the New Institutionalism to explain the interactions between ecological and institutional systems (e.g., Ferguson et al., 2013; Hinkel et al., 2014). This study points to the need for exchange in the other direction, where complex systems and resilience scholarship lend to New Institutional theory a greater concern for the interconnected nature of social and ecological worlds. As I have already noted, notable institutional theorists (North, 1990; Lowndes, 2001; Pierson, 2004) have acknowledged the nested, hierarchical nature of institutions but they have tended to ignore the built and ecological dimensions of institutional emergence, persistence, change and human-institutional relationships.

More research is required to explore the implications of a complex social-ecological systems approach to institutional analysis. A holistic understanding of institutional systems as unavoidably linked with ecological and built ones would be basic. But one question that comes to the fore is whether a complex systems view would bestow on ecological and built contextual factors the attributes and dynamics that it has bestowed on human-made rules of the game.

Would a complex social-ecological systems approach to institutional theory permit scholars to speak of natural and built rules of the game too? If so, how would this change the way that we study and understand institutional phenomena?

10.6 Local Government SSP

This study enriches our understanding of where current municipal SSP practice rests relative to a representative set of generic and local-government specific SSP matters. Significant findings include that our commitment to sustainability has been primarily focused on present-generation livelihood sufficiency considerations that reflect what citizens want; open-ended questions and sustainability pillars or urban planning categories offer a community oriented approach to defining sustainability issues and assets but they miss important SSP concern. Areas for improvement in practice were revealed, especially with respect to early consideration of social change constraints and enablers and practical implementation needs. The findings about the contextual or institutional underpinnings of practice generated valuable insights about how we might refine local government SSP practice. I discuss these insights in more detail in section 10.7, below.

10.7 Implications for Practice

This study demonstrated that community-scoping frameworks matter. They influence the range of factors covered in analysis, they direct how community context is interpreted and used, and they reflect different interpretations of the purpose of municipal SSP and the appropriate role of practitioners, the public, and governments in planning for societal change towards sustainability. When interpreted together, the findings of this dissertation begin to portray an optimal generic community-scoping framework, providing broadly applicable insights but needing specification and perhaps significant restructuring for particular applications.

Clearly, at this juncture there is a need for community-scoping frameworks that cut to the heart of the institutional underpinnings of prevailing (insufficient) approaches to practice. Most desirable, then, are frameworks that are structured around an ecological or systems view of the world, where practitioners and local governments are given leadership roles, where the public is given direct authority and responsibility over creating and operationalizing sustainability goals, and where the aim of municipal SSP and community scoping is to develop practical strategies for social change that cover an integrated and comprehensive set of sustainability (and resilience) goals that represent the most positive trajectory of community development and which are supported by adequate organizational and community governance structures and processes.

This is an iconoclastic vision, the practical implications of which will be discussed later. First, in sub-sections 10.7.1 to 10.7.2 below I discuss the contents and processes for exemplary community-scoping practice in local government SSP.

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10.7.1 Implications for Contents

Given the theoretical basis of this study, the ideal community-scoping framework should reflect a merged sustainability assessment-SSP model underpinned by the aspirations of a net positive interpretation of sustainability, a strong collaborative approach and a dual concern for plan formulation and enactment environments that covers important social change and practical implementation matters during the plan formulation stage. Three main implications for community-scoping contents emerge from this model. The first relates to the approach that community-scoping frameworks should take to investigate the plan creation environment. The second relates to the examination of alternatives and trade-offs, and the third relates to the approach that community-scoping frameworks should take to investigate the plan enactment environment.

The findings clearly evidenced the limitations of the predominant open-ended approach to community-scoping organized around sustainability pillars or urban planning categories. While the open-ended questions performed better (relative to predetermined response options) with respect to the range of generic and context-specific concerns covered in community scoping, they tended to miss important local government-specific SSP considerations, notably inter- and intra-generational equity, precaution and adaptation and resilience matters. Moreover, the pillars and urban planning categories did not encourage integrative thinking.

As described in Chapter Three, sustainability assessment scholars prescribe a proactive, integrated, criteria-led approach to analysis in order to ensure that undertakings contribute net positive benefits to all areas of sustainability concern. The interviews, however, revealed a resistance to this approach in that it was perceived to be too cumbersome and inflexible, and communities may not have the required knowledge to understand particular criteria. Moreover, communities may not be able to see the interconnections within and between community issues without some opportunities to learn about them, and practitioners may not have the knowledge and skills to translate the notion of integration into processes.

When the findings are interpreted together, they suggest that a hybrid, open-ended-criteria-led approach would best ensure that all areas of planning for social change towards sustainability would be covered in the investigation of the plan creation environment. The specification of these questions and criteria would support the requirement for integration and comprehensive coverage.

With respect to the second implication, alternatives and trade-offs, the results showed that none of the SSP initiatives undertook an examination of these through community scoping. The need for community scoping to extend around alternatives and trade-offs has important consequences for processes, discussed in 10.7.2, below. The significance of these for contents is that community-scoping frameworks should be oriented towards examining alternative trajectories for community development in all interrelated areas of urban planning, and comparatively evaluating them in order to choose the most positive ones – the ones that would contribute most positively to societal change towards sustainability. This should uncover many trade-offs related to the distribution of the costs and benefits of the options, among other consequences, which should influence our choices.

The third implication relates to an idea that I have emphasized throughout the dissertation: community-scoping frameworks should extend around both plan creation and enactment environments in order to help to bridge the gap between these phases. Building on the hybrid approach mentioned, above, the ideal would be to use open-ended questions guided by a concern to identify the institutional, built and ecological constraints and enablers and practical implementation needs associated with implementation. The overall aim would be to develop detailed strategies for societal change towards sustainability.

In sub-section 10.7.2 below I discuss the implications for community-scoping processes.

10.7.2 Implications for Processes

The main process implications of a community-scoping framework structured around a merged sustainability assessment-SSP model and core concerns of planning for social change towards sustainability relate primarily to when, how and how often the public should be included in decision making as well as the extended focus on both plan formulation and implementation environments.

With respect to the former, the findings suggest that community-scoping frameworks should be intentionally designed to facilitate transformative learning, engender shared ownership, make use of public, private and civil systems of governance, and encourage collective responsibility over plan formulation and implementation stages. More research is needed to better understand the ties between process design and these outcomes. Fung (2003, 2006) has asserted that deliberative processes that educate citizens and give them the opportunity to identify, discuss and decide on options allow citizens to develop preferences and question their assumptions. In local government SSP, this would translate into an aim to inspire a critical examination of the institutional underpinnings of current community conditions as well as the institutional arrangements needed for a sustainable trajectory of community development.

The requirement to wrap community scoping around both plan creation and enactment environments translates into a need to attend to who is at the decision-making table. Specifically, we need to ensure that the stakeholders who were involved in identifying the initial set of sustainability goals or development trajectories include those stakeholders whose support is needed to implement them. This means that we need multiple rounds of public participation that give stakeholders the opportunity to develop an initial set of goals or development trajectories, evaluate the alternatives and trade-offs, and investigate the plan enactment environment. Different modes of participation and communication may be most appropriate for these. For example, the initial event(s) should be open and diffuse while the latter should be more targeted.

This approach to community scoping has broader implications for the entire SSP cycle. Specifically, it would require:

- An initial preparation phase,
- An investigation of the plan creation environment,
- Creation of visions and goals,
- An evaluation of alternatives and trade-offs,

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- Revision of visions and goals,
- An investigation of the plan enactment environment,
- Revision of goals and creation of enactment strategies,
- Finalization of an initial set of goals and accompanying enactment strategies, and
- Plans for monitoring and revisions.

The approach to public participation should be to ensure more or less inclusive and targeted participation throughout the cycle, while keeping one eye on the governance and institutional arrangements needed for successful implementation.

10.7.3 Application Constraints

The findings suggest that this approach to community scoping and municipal SSP would be resisted for many reasons, not the least of which are culturally-embedded norms related to our interpretations of the roles that practitioners and local governments should play in SSP, as well as practical concerns related to skills and expertise, budgeting and timeframes. More research is required in this regard. At this early stage, it is apparent that this approach would not just affect conventional SSP contents and processes. Indeed, funding programmes and Requests for Proposals would need to adopt a renewed focus on planning for social change, and consultancies and municipal governments would need to invest in planning for transformative learning and creating organizational and community capacity for long-term enactment – as opposed to merely creating a plan.

Secondly, this approach to community-scoping and municipal SSP necessitates a shift in our thinking about strategic planning. Strictly defined, the purpose of strategic planning is to set out big-picture goals for the future of an organization and these goals should guide all levels of decision-making (see Goodstein et al., 1993; Mintzberg & Lampel, 1999; Poister & Streib, 2005). But the contents and processes that I set out seek to establish strong ties between plan formulation and enactment stages by considering social change and implementation planning realities early in the plan formulation stage. In establishing these ties, this model helps to bridge the gap between strategic- and project-level decision making stages, organizational structures and processes, and responsible actors. This is consistent with sustainability theory in that many sustainability commentators have argued that horizontal and vertical integration are vital for sustainability-based problem solving (see Gibson et al., 2005; Bina, 2007). Horizontal integration refers to how we attend to social, economic and ecological issues, same-level departments, and different sectors in decision making, while vertical integration refers to how we attend to various scales of influence in decision making (see Arts et al., 2005). In an organizational setting, vertical integration would replace hierarchical structures and processes with broadly participative ones that foster strong relationships between and among different levels of authority. For this reason, it may be resisted by actors who are accustomed to well-established hierarchical modes of decision making. This dissertation thus underscores the need for further research into the practical organizational barriers to the community-scoping framework that I propose.

Furthermore, the research indicated that practical tools are needed to translate the core concerns of local government SSP into easy-to-understand concepts. Additionally, there is a need for tools

that translate the notion of integrated decision making into *processes*, especially with respect to how decision-making should contribute multiple, mutually reinforcing positive benefits to community well being. Indeed, more research is needed to develop these tools for practitioners. One critical question that remains in this regard is, "How can practitioners take an integrated approach to developing strategies for societal change towards sustainability – while accommodating the hierarchical and departmentalized structures and processes of municipal government organizations and governance systems more broadly?"

Still, broader societal constraints would impede the ideal community-scoping framework that I present. If we are to take local government SSP seriously, then a fundamental shift must occur in the roles that practitioners, citizens and local governments play in planning for sustainable societal change. This shift would inevitably entrain the need for institutional reform at all levels of government and in associated organizations that support municipal planning; expanded powers for local governments and citizens and a strong culture of civic engagement at the local level represent just a few prerequisites. More research is required to identify the precise systemic changes that would be required to institutionalize such an approach to community scoping and local government SSP in Canada.

10.8 Summary

When interpreted as a whole, the findings evidenced the socially constructed, contested nature of planning for societal change towards sustainability; the content and process components of this kind of planning are open to interpretation and these interpretations are, in turn, shaped by personal-to-global-level contextual factors. From the standpoint of 'procedural sustainability' (Robinson, 2004), common and atypical approaches to practice constitute the social process of figuring out what planning for social change towards sustainability should mean and entail. The findings implied that entrenched norms in local government SSP are especially significant in forming and maintaining prevailing approaches to practice. Culturally embedded worldviews, collective understandings and the legislative framework that governs municipal government planning in Canada buttress these norms. This study exposed the link between the community-scoping frameworks we use and our interpretations of practice as well as the connection between our understandings of community context and the frameworks through which we view it.

This study enriched our understanding of the conceptual basis for theory building about local government SSP and SSP more generally: it should be comprehensive of the constituent components of practice (sustainability, collaboration, social change and effective practice); it should attend to the core concerns of planning for social change towards sustainability; it should consider how the content and process components of practice devote attention to both plan formulation and implementation environments; it should include a focus on the links between contents, processes and outcomes; and it should consider the institutional and environmental underpinnings of practice.

Two key lessons emerged from the creation of a set of generic concerns of SSP. First, the research found that there is much complementarity and overlap between Gibson's generic sustainability decision criteria and resilience concepts. The major contribution of resilience

theory to sustainability assessment is that resilience scholars have elucidated in greater detail the features of resilient systems and they have developed useful concepts to explain the interactions of complex social-ecological systems. Second, the social change and implementation additions ameliorated a general tendency in the sustainability assessment literature to ignore the societal change and practical implementation considerations that accompany the outcomes of decision making. Devoting early and greater attention to social change and implementation matters appropriately extends the focus of assessment and planning around both plan formulation and enactment environments.

The prescriptions of sustainability assessment scholars have significant consequences for conventional community scoping and local government SSP contents and processes. Using the local government-specific concerns of SSP would impose a more proactive, comprehensive and integrated, criteria-led approach. If conventional community-scoping processes were fused with sustainability assessment scholars' prescriptions for processes, community scoping would extend throughout the SSP cycle and greater attention would be devoted to alternatives and trade-offs.

Both sustainability assessment and community-scoping practice, however, have been chiefly preoccupied with the plan formulation environment. Because planning for social change towards sustainability necessitates a consideration of both formulation and enactment environments in the early stages of planning, additional contents and processes are needed in both sustainability assessment and community-scoping practice to identify systemic constraints, enablers and practical implementation matters. More research is needed to investigate the precise practical constraints that would accompany an extended view of community scoping.

The limitations of the local government-specific SSP criteria to attend directly to aesthetic, spiritual and sense of place matters implied that sustainability assessment scholars need to dedicate more attention to how these matters relate to sustainability theory and our prescriptions for sustainable societies. Similarly, the limitations of the criteria with respect to their ability to reveal the intensity verses the frequency of specific community issues suggested that scholars should incorporate a mechanism in their criteria-based analyses to address intensity.

Resilience concepts offered a more detailed explanation of the nested, multi-scale dynamics of social-ecological systems, which inevitably influence the way in which sustainability goals are pursued. Resilience scholars, however, could benefit from more exchange with sustainability assessment scholars and sustainability theorists more broadly in order to elucidate the social justice prerequisites for resilient social-ecological systems. Similarly, resilience scholars lend to institutional theory some useful concepts that elucidate the multi-scale, cyclical behaviour of institutional systems. Institutional theorists, however, have devoted much more attention to the socioeconomic dimension of institutional arrangements. More research is required to explore the areas of overlap between resilience theory and the New Institutionalism in order to expand our understanding of the usefulness of resilience concepts to institutional theory and vice versa.

Collaborative planning scholars have tended to neglect the dimension of social change and the accompanying need for transformative learning in their typologies of decision-making processes. I responded to this limitation by expanding on Fung's (2006) Democracy Cube in order to incorporate Sterling's (2010-11) levels of learning and change, which attend to the

transformative learning component of planning for societal change towards sustainability. The findings also revealed a connection between (a) the contents and processes that comprise the community scoping frameworks, (b) the contextual factors that constitute a particular place, and (c) the range of generic concerns initially covered by the frameworks, as well as the range of context-specific concerns that emerged from application of the frameworks. Thus, both community-scoping frameworks and community contexts matter with respect to the outcomes of the community-scoping step. This means that the content and process components of community scoping methods are critically important because they influence how community context is interpreted and used in decision making.

This study demonstrated the usefulness of New Institutional thought in analyses of municipal SSP practice. Specifically, it reveals the utility of using core concepts from the three varieties of New Institutional theory to examine *how* SSP practitioners have been planning for social change and to peel away the surface of actors' choices to reveal the institutional determinants of practice or, in other words, *why* particular approaches to practice persist. In using a combined approach, the research showed that the logic and formal and informal rules that influenced practitioners' choices are not to be perceived as empirically isolated phenomena. Rather, a range of institutions and logics may underpin a single choice. Scott's (2001) normative and cognitive dimensions appeared to be most relevant in this study, and this suggested that the sociological and historical varieties of New Institutional thought may have the most utility in studies that investigate the contextual underpinnings of trends in planning practice. The limited ability of New Institutional theory to provide a framework for understanding built and natural contextual factors points to the need for a complex social-ecological systems approach to institutional analysis. Here is perhaps where the greatest potential lies for resilience theory to contribute to institutional theory.

This study enriched our understanding of where current municipal SSP practice rests relative to a representative set of generic and local-government specific SSP matters. Additionally, areas for improvement in practice were revealed, especially with respect to early consideration of social change constraints and enablers and practical implementation needs. The findings about the contextual or institutional underpinnings of practice generated valuable insights about how we might refine local government SSP practice.

At this juncture there is a need for community-scoping frameworks that cut to the heart of the institutional underpinnings of prevailing (insufficient) approaches to practice. Most desirable, then, are frameworks that are structured around an ecological or systems view of the world, where practitioners and local governments are given leadership roles, where the public is given direct authority and responsibility over creating and operationalizing sustainability goals, and where the aim of municipal SSP and community scoping is to develop practical strategies for social change that cover an integrated and comprehensive set of sustainability (and resilience) goals that represent the most positive trajectory of community development and which are supported by adequate organizational and community governance structures and processes.

The ideal community-scoping framework should reflect a merged sustainability assessment-SSP model underpinned by the aspirations of a net positive interpretation of sustainability, a strong collaborative approach and a dual concern for plan formulation and enactment environments that covers important social change and practical implementation matters during the plan formulation

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stage. A hybrid, open-ended-criteria-led approach would best ensure that all areas of planning for social change towards sustainability, including alternatives and trade-offs, would be covered. The specification of these questions and criteria would support the requirement for integration and comprehensive coverage. Moreover, community-scoping frameworks should be intentionally designed to facilitate transformative learning, engender shared ownership, make use of public, private and civil systems of governance, and encourage collective responsibility over plan formulation and implementation stages.

This approach to community scoping and municipal SSP would not just affect conventional municipal SSP contents and processes. Indeed, funding programmes and Requests for Proposals would need to adopt a renewed focus on planning for social change, and consultancies and municipal governments would need to invest in inspiring transformative learning and creating organizational and community capacity for long-term enactment – as opposed to merely creating a plan. Moreover, it would necessitate a reconceptualization of strategic planning to include a greater emphasis on establishing firm ties between plan formulation and enactment in the plan formulation phase. If we are to take local government SSP seriously, then a fundamental shift must occur in the roles that practitioners, citizens and local governments play in planning for sustainable societal change. This shift would inevitably entrain the need for institutional reform at all levels of government and in associated organizations that support municipal planning; expanded powers for local governments and citizens and a strong culture of civic engagement at the local level represent just a few prerequisites. More research is required to identify the precise systemic changes that would be required to institutionalize such an approach to community scoping and local government SSP in Canada.

Chapter Eleven – Conclusions

In this dissertation, I investigated the condition of local government SSP in Canada as well as the contextual factors that have shaped prevailing practices. The analysis focused on the frameworks (or contents and processes) that practitioners have been applying in the community-scoping step in the plan formulation stage.

For this purpose I developed an analytical framework that integrates concepts and insights from five fields of study that attend to the constituent components of strategic planning for societal change towards sustainability: sustainability assessment (e.g., Gibson et al., 2005), social-ecological resilience theory (e.g., Gunderson and Holling, 2002), the New Institutionalism (e.g., Hall and Taylor, 1996), collaborative planning theory (e.g., Healey, 2006), and local government SSP practice (e.g., Doppelt, 2003).

The integrated framework that emerged from the literature represents the general concerns of SSP in any context. Gibson et al.'s (2005) generic decision criteria were used as the foundation. The original criteria, however, were adjusted in order to give more direct attention to the institutional dimensions of SSP, learning and institutional change, and the practical needs associated with implementing SSP goals. The adapted set of generic concerns were specified and teased apart in order to evaluate different aspects of the community-scoping step and ensure that appropriate consideration was devoted to local-government specific SSP matters, including multi-scale systems dynamics, social change constraints and enablers, practical implementation needs and process design.

The analysis concentrated on the following content and process aspects of community scoping in 65 municipal SSP initiatives that were selected from across Canada:

- The wider plan formulation process within which the community-scoping step was nested, relative to best practice principles for the plan creation process;
- The generic SSP concerns initially covered by the community-scoping frameworks, relative to the general concerns of SSP;
- The place-specific issues that were elicited from the public through community scoping, relative to the local government-specific SSP concerns; and
- The processes that were used to include the public in the community-scoping step, relative to Fung's (2006) Democracy Cube and Sterling's (2010-11) levels of learning and change.

The plans were read and basic information was collected in order to assess the wider plan formulation process relative to best practice principles for plan creation processes. An in-depth analysis of the applied community-scoping frameworks was undertaken in order to investigate the generic SSP concerns initially covered, the place-specific issues that emerged, and the processes that were used to include the public in the community-scoping step. Then, three case studies were undertaken in order to enrich our understanding of why practice is the way it is. Concepts from institutional theory were used to elucidate the contextual factors that shaped the community-scoping step.

In the sections that follow I summarize what the findings tell us about the condition of local government SSP as well as the efficacy of the analytical framework, the implications of the findings for theory and practice, and needed research directions.

11.1 What is the Condition of Local Government SSP in Canada?

Four valuable findings about the condition of local government SSP emerged from the basic information collection step.

First, the results showed that communities have been committing to the concept of sustainability as an overarching idea; however, the predominant interpretation of the concept conforms to the prevailing capitalist model of economic growth and development. Although these results evidenced a much-needed resource conservation and efficiency culture at the local level in Canada, there is clearly room for improvement towards deeper green, net positive approaches that aim to fundamentally change our relationship with the natural world, values and worldviews. Second, in contrast to the best practice principles for SSP processes, practitioners have been adopting high-level guides without demonstrating how they were used. Indeed, none of the initiatives applied a set of criteria to structure the community-scoping step. Third, there is clearly a widespread uncertainty with respect to how to do integrative planning and, by extension, a need for practical tools that help practitioners to translate the notion of integrative planning for sustainability into processes that integrate the social, economic and ecological dimensions of sustainability. Finally, the findings implied that there is a shared understanding among practitioners with respect to the steps in the plan creation stage of municipal SSP and how community scoping should be undertaken. The majority of the SSP undertakings did not clearly adopt a best-known municipal SSP framework. Rather, most initiatives followed three basic process steps in the plan development stage: visioning and community scoping, development of goals (or targets, strategies and/or policies), and some consideration of implementation and monitoring.

The results of the in-depth analysis of community-scoping frameworks revealed a prevalent use of open-ended questions and sustainability pillars or urban planning categories as opposed to decision criteria to structure the community-scoping step. The findings showed that an open-ended approach that gives shared responsibility to the public over deciding what sustainability planning should mean may be more effective with respect to covering a more diverse range of community-specific sustainability matters. But the results also showed that the open-ended questions tended to miss critical local government-specific SSP concerns in application. Indeed, the overall lack of attention that was given to community-specific resilience, inter- and intragenerational equity and precaution and adaptation concerns highlighted the limitations of the open-ended approach in terms its ability to cover a comprehensive set of local government-specific SSP concerns. It also revealed the inadequacy of the sustainability pillars and/or urban planning categories to encourage thinking about all interrelated areas of sustainability concern.

The results of the analysis of community-specific concerns that were elicited from the public exposed a dominant vision and a less noticeable, minority vision for community development. The former projected a business-as-usual, consumption- and growth-based community

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development trajectory, supported by an efficiency-based model of resource maintenance and a mitigative approach to social-ecological system integrity problems. It almost completely ignored the distributive dimensions of socioeconomic systems. In contrast, the minority vision included a concern for the distributive dimension of socioeconomic systems; it questioned the power of corporations and our dependence on global markets and fossil fuels; it underscored the limits of municipal capacities to raise funds for the maintenance and provision of public infrastructure and services; it acknowledged slow controlling variables, critical thresholds, and alternative states of equilibrium; and it emphasized the notions of living locally, zero waste, slowing the pace of growth, limiting growth, and long-range integrated planning.

Generally, the community-scoping frameworks were not clearly underpinned by an intention to shift community systems towards sustainability goals. In the vast majority if municipal SSP initiatives, the community-scoping step did not extend around an investigation of the place-specific constraints, enablers and practical needs associated with societal change and enactment. Indeed, the majority of the initiatives did not apply a strong collaborative approach framed by an intention to facilitate paradigm change.

11.2 Understanding the Contextual Underpinnings of Practice

When interpreted as a whole, the findings evidenced the socially constructed nature of figuring out what local government SSP should mean and entail. Robinson's (2004) notion of procedural sustainability helped to explain the dominant and minority visions for sustainable community development that emerged. Indeed, in this regard the findings uncovered a large-scale tension between a dominant mechanistic worldview, with its assumptions about the nature of human beings, the natural world, and appropriate socioeconomic structures and processes; and an emerging ecological worldview, which entrains a deeper green sense of the links between human-ecological relationships, well being, and societal systems (see Gibson, 1975; Merchant, 1980; Capra, 1982, 1986; Dobson, 2000). On the whole, the results depicted a dominant mechanistic approach to public sector SSP in which there is an embedded relationship of power between the public, officials and administrators; where members of the public are viewed as 'customers' as opposed to 'citizens' (see Vigoda, 2002) or 'consumers' as opposed to 'exerters' (see Gibson, 1975); and where practitioners embrace the role of the facilitator as opposed to agent of change (see Healey, 2007). The results about integrative planning delineated the point at which practitioners are situated in the evolution of their understanding about the conceptual and practical process-related implications of an integrated (or ecological) view of the world. They also portrayed the extent to which the (hierarchical and departmentalized) organizational structures and process associated with the mechanistic worldview are institutionalized at the local level.

Concepts from institutional theory revealed that prevailing approaches to community-scoping practice are underpinned by actors' sense of what is right and good for the local context and sustainability planning more broadly as well as their socioeconomic interests in adhering to some well-established norms in local government SSP, namely broad public participation, community ownership and integrative thinking in the design of the community-scoping step. Indeed, since all three cases were Integrated Community Sustainability Plan initiatives, the attention that was

given to these features of planning revealed some concern for the requirements of the Federal Gas Tax Agreements. These shared norms also reflect the embeddedness of the sustainability discourse, which has for decades emphasized broadly democratic, collective and integrated approaches to decision making, among other ideals. Though they may play out differently from case to case, this study begins to evidence the extent to which they have become embedded in local government SSP in Canada. This process of institutionalization can be explained by the concept of diffusion (see Scott, 2001; Campbell, 2004).

The effect of 'bounded rationality' explained why practitioners' interpretations of these norms did not lead to a concern for social change and effective implementation matters in the design of the community-scoping step. Indeed, the respective planning teams' interpretation of broad public participation, community ownership and integrative thinking were enclosed within a preoccupation with the plan formulation environment. Additionally, it was found that actors' uncertainty might partly underpin the reason why implementation and social change concerns are so often ignored in community scoping in the plan formulation stage. In contrast to bounded rationality and uncertainty, however, the notion of agency depicted the vital role that practitioners can play to raise the bar on practice and perhaps create new norms.

Other factors that influenced the respective planning teams' choices were educational backgrounds and professional experiences, which reflect entrenched norms in thinking and practice including, to name a few, our collective knowledge about how to plan for societal change, interpretations of the roles that municipal governments and practitioners should play in SSP, and the legislative frameworks surrounding local government powers and responsibilities.

In the Cochrane case, the general concern to preserve the Western aesthetic and protect the Town's historic ranchlands from urban development prompted the planning team to include a built environment systems Action Group in the scoping step. In the Huntsville case, the G8 summit event and annual influx of summer cottagers influenced the timing of the community engagement events. Additionally, in all three cases an intertwined set of built and natural environmental factors underpinned the sustainability concerns that were elicited from the public. These contextual factors could be perceived as things that actors value and so Scott's (2001) normative pillar could be used to explain them. Scott's regulative and cognitive categories were also helpful in that a particular set of laws and shared identities or beliefs may have influenced the public's built and natural environmental concerns. Concepts from institutional theory, however, were unable to address the direct effects of these contextual factors.

11.3 Efficacy of the Analytical Framework Used to Evaluate Community-Scoping

When interpreted as a whole, the analytical framework was able to illuminate prevalent and atypical approaches to thinking and practice. The findings that emerged provided fertile ground for further deconstruction in order to expose our interpretations of the constituent components of SSP as well as the potential trajectory of community development. In this way the analytical framework helped to answer big questions about where we are going and how we are getting there – both collectively and on a case-by-case basis. Additionally, in exposing predominant approaches it effectively revealed where we need to go from here in terms of the aspects of

practice that should be improved.

The integrated framework is flexible in that it can be parsed in order to evaluate different aspects of community scoping. Thus, it can be used as an integrated whole or part(s) of it can be used independently for a particular study. The local government-specific concerns of SSP were able to identify the most frequently expressed concerns as well as the overlap with other sustainability matters; however, they could not reveal the intensity of the context-specific concerns that emerged from the public. Additionally, the integrated nature of the sustainability (and resilience) criteria raised important questions about to how we should analyse the context-specific concerns that were elicited from the public, which were most often organized according to discrete urban planning categories or sustainability pillars. Finally, the criteria were also limited in their ability to capture place-specific matters related to built and natural aesthetics and spirituality.

The Fung's (2006) Democracy Cube with Sterling's (2010-11) levels of learning and change framework increased our understanding of the general quality of the public participation processes used in community scoping. One particularly relevant finding that emerged was about the predominant view of the public as clients or consumers as opposed to active citizens or exerters who should be given direct authority over matters of community development. This view underpinned trends in process design with respect to the degree to which they encouraged deliberation, critical reflection and transformative learning. The adapted Democracy Cube framework, however, was simplistic in its spectrum-style depiction of scope of participation, mode of communication, extent of authority, and level of learning and change. At times, the difference between the various levels on the spectra was fuzzy. Notwithstanding this limitation, the Democracy Cube was able to expose the disassociation between levels of the spectra; open processes did not necessarily correlate with greater deliberation, direct authority and learning.

11.4 Efficacy of the New Institutionalism

As a package, the key strength of the concepts from institutional theory was that they were able to explain the systemic or institutional roots and effects of the real-life contextual factors that influenced the design of the community-scoping step. A better understanding of the institutional underpinnings of influential contextual factors can illuminate why certain approaches to practice are so widespread, why they persist, and what we should adjust in order for practice to evolve in a particular way. The institutional lens, however, was less capable of explaining built and natural environmental circumstances. In this way, the institutional frame cuts us off conceptually from understanding the direct effects of built and natural systems on human systems and vice versa.

The direct influence of built and natural environmental circumstances in this study exposed the limits of New Institutional theory to explain how these factors shape human behaviour, decision-making structures and processes, and whole societies, and it raised important questions about they should be interpreted through an institutional lens.

11.5 Contributions to Theory

This study enriched our understanding of the conceptual basis for theory building about local government SSP and SSP more generally: it should be comprehensive of the constituent components of SSP (sustainability, collaboration, social change and effective practice); it should attend to the core concerns of planning for social change towards sustainability; it should consider how the content and process components of practice devote attention to both plan formulation and implementation environments; it should include a focus on the links between contents, processes and outcomes; and it should consider the institutional and environmental underpinnings of practice.

This thesis also contributed to each field of research that comprised the analytical framework. With respect to the sustainability assessment literature, the research found that sustainability assessment scholars have tended to neglect the institutional dimensions of sustainability-based decision making, while local government SSP scholars have underscored the shaping effects of institutions and the roadblocks they impose. The adjustments that were made to Gibson et al.'s (2005) initial generic decision criteria in order to devote appropriate attention to social change and implementation matters evidenced the need in the sustainability assessment literature to dedicate more attention to the enactment environment and the institutional implications of sustainability goals.

The limitations of the local government-specific SSP criteria to attend directly to aesthetic, spiritual and sense of place matters implied that sustainability assessment scholars need to dedicate more attention to how these matters relate to sustainability theory and our visions and prescriptions for sustainable societies. Similarly, the limitations of the criteria with respect to their ability to reveal the intensity verses the frequency of specific-community sustainability issues suggested that scholars should incorporate a mechanism in their criteria-based analyses to address intensity.

Furthermore, the research found that prescriptions of sustainability assessment scholars have significant consequences for conventional community scoping and local government SSP contents and processes. Using the local government-specific concerns of SSP would impose a more proactive, comprehensive and integrated, criteria-led approach. If conventional community-scoping processes were fused with sustainability assessment scholars' prescriptions for processes, community scoping would extend throughout the SSP cycle and greater attention would be devoted to alternatives and trade-offs. Because planning for social change towards sustainability necessitates a consideration of both formulation and enactment environments in the early stages of planning, additional contents and processes are needed in both sustainability assessment and community-scoping practice to identify systemic constraints, enablers and practical implementation matters.

With regards to social-ecological resilience theory, this study found that there is much complementarity and overlap between Gibson et al.'s (2005) generic sustainability decision criteria and resilience concepts (Walker & Salt, 2012). The major contribution of resilience theory to sustainability assessment is that resilience scholars have elucidated in greater detail the features of resilient systems and they have developed useful concepts to explain the interactions

of complex social-ecological systems (see Gunderson & Holling, 2002). But the research found that resilience scholars would benefit from more exchange with sustainability assessment scholars and institutional theorists to elucidate the social justice prerequisites for resilient social-ecological systems and the socioeconomic dimensions of institutional systems, respectively.

With respect to the collaborative planning literature, this study found that scholars have tended to neglect the dimension of social change and the accompanying need for transformative learning in their typologies of decision-making processes. I responded to this limitation by expanding on Fung's (2006) Democracy Cube in order to incorporate Sterling's (2010-11) levels of learning and change. The findings also revealed a connection between (a) the contents and processes that comprise the community scoping frameworks, (b) the contextual factors that constitute a particular place, and (c) the range of generic concerns initially covered by the frameworks, as well as the range of context-specific concerns that emerged from application of the frameworks. This finding clearly demonstrated that both community-scoping frameworks and community contexts matter with respect to the outcomes of the community-scoping step. This finding is significant given the need in the collaborative planning scholarship to better understand how contextual factors affect decision-making processes and decision outcomes.

With regards to institutional theory, this study demonstrated the usefulness of New Institutional thought in analyses of municipal SSP practice. Specifically, it showed the utility of using core concepts from the three varieties of New Institutional theory to examine *how* SSP practitioners have been planning for social change and to peel away the surface of actors' choices to reveal the institutional determinants of practice. In using a combined approach, the research showed that the logics and formal and informal rules that influenced practitioners' choices are not to be perceived as empirically isolated phenomenon. Rather, a range of institutions and logics may underpin a single choice. Scott's (2001) normative and cognitive dimensions appeared to be most relevant in this study, and this suggested that the sociological and historical varieties of New Institutional thought may have the most utility in studies that investigate the contextual underpinnings of trends in planning practice. The limited ability of New Institutional theory to provide a framework for understanding built and natural contextual factors points to the need for a complex social-ecological systems approach to institutional analysis. Here is perhaps where the greatest potential lies for resilience theory to contribute to institutional theory.

With respect to the scholarly and practitioner research on local government SSP, this study enriched our understanding of where current municipal SSP practice rests relative to a representative set of generic and local-government specific SSP matters. Additionally, areas for improvement in practice were revealed, especially with respect to early consideration of social change constraints and enablers and practical implementation needs. The findings about the contextual or institutional underpinnings of practice generated valuable insights about how we might refine local government SSP practice.

11.6 Contributions to Practice

At this juncture there is a need for community-scoping frameworks that cut to the heart of the institutional underpinnings of prevailing (insufficient) approaches to practice. Most desirable,

then, are frameworks that are structured around an ecological or systems view of the world, where practitioners and local governments are given leadership roles, where the public is given direct authority and responsibility over creating and operationalizing sustainability goals, and where the aim of municipal SSP and community scoping is to develop practical strategies for social change that cover an integrated and comprehensive set of sustainability (and resilience) goals that represent the most positive trajectory of community development and which are supported by adequate organizational and community governance structures and processes.

The ideal community-scoping framework should reflect a merged sustainability assessment-SSP model underpinned by the aspirations of a net positive interpretation of sustainability, a strong collaborative approach and a dual concern for plan formulation and enactment environments that covers important social change and practical implementation matters during the plan formulation stage. A hybrid, open-ended-criteria-led approach would best ensure that all areas of planning for social change towards sustainability, including alternatives and trade-offs, would be covered. The specification of these questions and criteria would support the requirement for integration and comprehensive coverage. Moreover, community-scoping frameworks should be intentionally designed to facilitate transformative learning, engender shared ownership, make use of public, private and civil systems of governance, and encourage collective responsibility over plan formulation and implementation stages.

This approach to community scoping and municipal SSP would not just affect conventional municipal SSP contents and processes. Indeed, funding programmes and Requests for Proposals would need to adopt a renewed focus on planning for social change, and consultancies and municipal governments would need to invest in inspiring transformative learning and creating organizational and community capacity for long-term enactment – as opposed to merely creating a plan. Moreover, it would necessitate a reconceptualization of strategic planning to include a greater emphasis on establishing firm ties between plan formulation and enactment in the plan formulation phase. If we are to take local government SSP seriously, then a fundamental shift must occur in the roles that practitioners, citizens and local governments play in planning for sustainable societal change. This shift would inevitably entrain the need for institutional reform at all levels of government and in associated organizations that support municipal planning; expanded powers for local governments and citizens and a strong culture of civic engagement at the local level represent just a few prerequisites.

11.7 Future Research Directions

11.7.1 Procedural Implications of the Practical Scoping Framework

As I have mentioned throughout this thesis, scholars can use the interdisciplinary analytical framework that I developed to investigate SSP initiatives. SSP practitioners can use the framework to structure the scoping step in SSP undertakings in any context. The conceptual foundations of the framework are clear: scoping for SSP should be comprehensive of the core generic concerns of planning for social change towards sustainability, considering plan formulation and implementation environments, and employing decision-making processes that are designed to encourage transformative learning and social change.

Less clear, however, are the real-life implications of the practical scoping framework for conventional strategic planning processes in public and private sector organizations. I have already described some of the implications for processes in sub-section 10.7.2, above. The key innovation proposed in this dissertation – to incorporate a concern for plan formulation and implementation environments in the plan creation stage of SSP – begs questions about what the initial plan should look like and the additional process steps required in the plan creation stage.

In this dissertation, I emphasized that SSP should be a process for creating a plan that sets out strategies for social change towards sustainability – as opposed to merely high-level sustainability visions and goals for the future. I argued that the scoping step in SSP should help to bridge the gap between plan development and implementation stages by investigating the systemic constraints, opportunities and practical needs that accompany the enactment of sustainability goals – in the plan formulation stage of planning.

This conceptualization of SSP and scoping is consistent with Poister's (2010) vision for the future of strategic planning in public organizations. Poister asserts that strategic planning should aim to investigate driving forces as well as the feasibility and consequences of alternatives. And it should be more tightly linked with operational or strategic management processes. But more research is required to better understand the precise structural and procedural implications of my proposed approach to SSP and scoping in the public sector. Strategic planning research undertaken by scholars in the field of public administration (e.g., Bryson, 2004; Kelman, 2009; Poister, 2010) would help to illuminate some of these implications. In depth interviews with local government planners in a range of municipal government contexts would also be useful in this regard.

11.7.2 The Conceptual Basis of Scoping Frameworks

The scoping step in SSP presents an opportunity for scholars and practitioners to experiment with different conceptual-analytical frameworks for investigating context factors. This dissertation rests on a representative set of core concerns of planning for social change towards sustainability. But different frameworks could be used for different analytical and planning purposes. One pertinent alternative highlighted in this study stems from social-ecological resilience theory and would aim to investigate the transformative potential and/or adaptive capacity of a community. Both of these qualities are required for transitions towards sustainability (Gunderson & Holling, 2002; Walker & Salt, 2012).

Viewing community context through the lens of transitions, transformative potential and/or adaptive capacity would require that SSP scholars and practitioners devote attention to a different but nonetheless equally relevant suite of matters than those emphasized in this study. As such, the idea to investigate the transformative potential and/or adaptive capacity of a place through scoping represents an area for further research that could inform how planning practitioners go about planning for social change towards sustainability. In this regard scholars should focus on (a) illuminating the strengths and limitations of resilience theory with respect to its understanding of transformative potential and adaptive capacity, (b) delineating which aspects of a community and/or organization comprise and influence transformative potential and adaptive capacity, and (c) developing and applying suitable frameworks in analysis and planning.

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11.7.3 The Role of Planning Practitioners

The widespread use of open-ended questions in community scoping implies that SSP practitioners have set aside an expert-led, top-down approach in order to allow citizens to decide which concerns are most important to them. But the findings of the analysis revealed that important sustainability, social change and implementation matters were overlooked when SSP practitioners used open-ended questions to structure the community-scoping step. This suggests that planning for social change towards sustainability requires some specialized knowledge about the core concerns of this kind of planning, and SSP practitioners should take on a leadership role in order ensure that these concerns are addressed.

Additional research is required to better understand the implications of these findings for collaborative planning theory and practice. At the heart of collaborative planning is an aspiration to give power and responsibility over matters of public concern to citizens, using broadly inclusive decision-making processes that engender inter-subjective understanding and transcend manipulation by experts and elite players (Habermas, 1981; Dryzek, 1987; Innes, 1995; Forester, 1999; Smith, 2003; Eckersley, 2004; Peterman, 2004; Healey, 2006). Theoretically speaking, then, SSP practitioners should be neutral facilitators. At first glance, it would seem that the findings of this study contradict this aspiration: if SSP practitioners should be able to express their expertise and take on a leadership role, what does this imply for the collaborative component of SSP and collaborative planning theory more broadly?

Upon closer inspection, the findings of this study may not depart dramatically from the central aspirations of collaborative planning. Planning practitioners inevitably influence planning processes; they make decisions about which members of the community should be invited to the table, how the public should be invited, how the public should participate, and the extent to which the public's input should influence decision making, among other things. This study primarily suggests that SSP practitioners should allow their expertise to influence the design of the scoping frameworks and decision-making processes used, and they should lead the public in order to cover all important matters. It does not imply that they should participate as active citizens in the decision-making process.

Collaborative planning scholars have devoted some attention to questions about the roles that planners should play in collaborative decision making (see Forester, 1999; Vigoda, 2002; Peterman, 2004; Healey, 2006). Allmendinger and Tweder-Jones (2002), however, assert that these questions have generally not been adequately addressed. Scholars should devote attention to questions about (a) the extent to which the need for specific expertise and leadership in SSP confronts and conforms to the tenets of collaborative planning theory and (b) whether collaborative planning processes should be designed differently in different planning contexts.

11.7.4 Tools for Integrative Planning in Local Government SSP

This study underscored the general need among local government SSP practitioners for practical tools that can help to translate the notion of integrative thinking into decision-making processes. Sustainability scholars have devoted much attention to explaining the implications of integrative thinking for conventional public administrative structures and processes (e.g., Paehlke &

Torgerson, 2005; Gibson et al., 2005; Gibson, 2006). But much less attention has gone into creating practical tools for integrative planning that practitioners can use in a local government context. In this regard, there is a need for research that (a) illuminates what an ideal proactive approach to integrative planning in local government SSP would look like, (b) investigates the approaches that are currently in use by local government SSP practitioners to do integrative planning, (c) investigates the mechanisms that are currently in use in municipal governments to coordinate the creation and implementation of various strategic goals within and across departments, (d) identifies how SSP practitioners might rely on these mechanisms in the creation and implementation of SSP goals, and (e) translates this understanding into conceptual tools that SSP practitioners can use in the plan formulation stage of planning.

11.7.5 Institutional Theory and Social-Ecological Resilience Theory

This study revealed that there is some redundant and/or useful overlap between institutional theory and social-ecological resilience theory in terms of how scholars have attended to the dynamics of social-ecological change. Where institutional theorists have been helpful in elucidating the socioeconomic underpinnings of social change, resilience theorists have developed useful concepts that illuminate the multi-scale dynamics of complex social-ecological systems.

Institutional theorists, however, have acknowledged the nested, multi-scale nature in which institutions are arranged (e.g., North, 1990; Pierson, 2000, 2004; Immergut, 2008), while resilience theorists have been criticized for ignoring the social dimensions of social-ecological systems dynamics (see Hornborg, 2009). It would seem, then, that institutional theorist would have much to offer resilience theory with respect to elucidating how socioeconomic systems change and resist change. But a better understanding of the areas of overlap, convergence and divergence between social-ecological resilience theory and the New Institutionalism is required to illuminate more precisely how insights from the New Institutionalism could enrich social-ecological resilience theory in this regard.

Furthermore, there is much potential to integrate concepts from the three main varieties of institutional thought with social-ecological resilience theory into the basis of a practical framework for social change planning. Again, for this purpose more attention should be devoted to identifying the areas of overlap, convergence and divergence between the theories. For example, institutional theorists and resilience theorists have used the notions of path dependency and critical thresholds in analyses, albeit in different ways (e.g., North, 1990; Pierson, 2000, 2004; Carpenter, 2003; Streeck & Thelen, 2005). And scholars from each field have developed and applied different conceptualizations of change: resilience theorists have tended to rely on the adaptive cycle metaphor to explain the dynamics of social-ecological change, while institutional theorists have debated over three models of institutional change described earlier. One notable ontological difference between these fields of inquiry is that resilience theorists have embraced a complex systems view of the world in which social and ecological systems are fused, while the New Institutionalism is rooted in the social and political theories of Marx, Durkheim and Weber.

Indeed, there is much potential for exchange between the three main varieties of New Institutional thought and social-ecological resilience theory. When combined, concepts and insights from these theories could provide more comprehensive analytical frameworks as well as

practical tools for planning for social change. Future research should concentrate broadly on areas of convergence, divergence and overlap with respect to their respective theoretical bases. More specifically, attention should be devoted to questions about how concepts and insights from these two fields of study might be combined in order to enrich our comprehension of why and how change occurs in complex systems.

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Appendix A – Sixty-Five SSPs Selected for Study

This appendix lists the 65 SSPs that met the selection criteria for inclusion in the study.

Alberta (10 SSPs)
1. City of Calgary Imagine Calgary Plan for Long Range Urban Sustainability, 2006
2. City of Camrose Integrated Community Sustainability Plan, 2010
3. City of Fort Saskatchewan Community Sustainability Plan, 2009
4. City of Lethbridge Integrated Community Sustainability Plan, 2010
5. City of Spruce Grove Your Bright Future Municipal Development Plan, 2010
6. County of Lethbridge Integrated Community Sustainability Plan, 2009
7. Municipal District of Foothills No. 31 Municipal Development Plan, 2010
8. Municipality of Wood Buffalo Integrated Community Sustainability Plan, 2010
9. Strathcona County Municipal Development Plan, 2007
10. Town of Cochrane Sustainability Plan, 2009

British Columbia (20 SSPs)
1. City of Colwood Official Community Plan, 2008
2. City of Coquitlam Official Community Plan, 2002
3. City of Dawson Creek Official Community Plan, 2010
4. City of Fort St. John Today & Tomorrow Strategic Plan, 2010
5. City of Kamloops Sustainable Kamloops Plan, 2009
6. City of Nanaimo Official Community Plan, 2008
7. City of Penticton Official Community Plan, 2002
8. City of Port Coquitlam Official Community Plan, 2005
9. City of Powell River Official Community Plan, 2005
10. City of Prince George Integrated Community Sustainability Plan, 2010
11. City of Prince Rupert Quality of Life Official Community Plan, 2010
12. City of Surrey Sustainability Charter, 2007
13. City of Terrace 2050: Our Strategy for Sustainability, 2009
14. City of Williams Lake Imagine Our Future Integrated Community Sustainability Plan, 2010
15. District of Delta Official Community Plan, 2005
16. District of Mission Official Community Plan, 2008
17. District of Saanich, Sustainable Saanich Official Community Plan, 2008
18. District of Sooke Sustainable Development Strategy, 2008
19. District of Sooke Official Community Plan, 2010
20. District of Squamish Official Community Plan, 2008

New Brunswick (3 SSPs)
1. City of Dieppe Five-Year Green Plan, 2007
2. City of Saint John Our Saint John Integrated Community Sustainability Plan, 2008
3. Town of Rothesay Municipal Plan, 2010

Newfoundland and Labrador (3 SSPs)
1. City of Mount Pearl Integrated Community Sustainability Plan, 2010
2. City of St. John's Integrated Community Sustainability Plan, 2010

3. Town of Gander Integrated Community Sustainability Plan, 2010

Northwest Territories (2 SSPs)
1. City of Yellowknife Community Based Strategic Plan, 2010
2. City of Yellowknife Smart Growth Development Plan, 2010

Nova Scotia (6 SSPs)
1. Cape Breton Regional Municipality Integrated Community Sustainability Plan, 2010
2. Municipality of Chester Integrated Community Sustainability Plan, 2009
3. Municipality of the District of Lunenburg Integrated Community Sustainability Plan, 2010
4. Municipality of West Hants Integrated Community Sustainability Plan, 2010
5. Region of Queens Municipality Municipal Planning Strategy, 2009
6. Town of Truro Community Sustainability Plan, 2010

Ontario (15 SSPs)
1. City of Brampton Official Plan, 2006
2. City of Greater Sudbury Official Plan, 2006
3. City of Guelph Strategic Plan, 2007
4. City of Kenora Offiical Plan, 2010
5. City of Kingston Sustainable Kingston Plan, 2010
6. City of Ottawa Official Plan, 2003
7. City of Thunder Bay Community Environmental Action Plan, 2008
8. City of Toronto Clean, Green and Healthy: A Plan for an Environmentally Sustainable Toronto, 2000
9. City of Vaughan Green Directions Integrated Community Sustainability Plan, 2009
10. County of Norfolk Official Plan, 2008
11. Town of Bracebridge Community-Based Strategic Plan, 2008
12. Town of Collingwood Sustainable Community Plan, 2008
13. Town of East Gwillimbury Official Plan, 2010
14. Town of Huntsville Unity Plan, 2010
15. Town of Newmarket Official Plan, 2006

Prince Edward Island (3 SSPs)
1. City of Charlottetown Integrated Community Sustainability Plan, 2010
2. City of Charlottetown Official Plan, 2005
3. City of Summerside Official Plan, 2006

Yukon (3 SSPs)
1. City of Whitehorse Integrated Community Sustainability Plan, 2007
2. City of Whitehorse Official Community Plan, 2010
3. City of Whitehorse Strategic Sustainability Plan, 2009

Appendix B – Tables Used in the In-Depth Analysis

In Chapter Five I described how the integrated analytical framework was parsed in order to analyse different aspects of community scoping. In this Appendix, I provide the tables that were used in each analysis.

Generic SSP Concerns Initially Covered

Province/Territory: Name of local government SSP initiative:			
Summary of community-scoping framework contents: Contents (e.g., use of open-ended questions, predetermined response options, sustainability pillars, urban planning categories, etc.):			
Generic SSP concerns	**Yes**	**No**	**Notes**
Socio-ecological system integrity			
Livelihood sufficiency and opportunity			
Intragenerational equity			
Resource maintenance and efficiency			
Socio-ecological civility and democratic governance			
Societal change			
Precaution, adaptation, and innovation			
Immediate and long-term integration			
Effective Implementation			
Controlling variables			
Thresholds			
Alternative equilibrium states			

Local Government-Specific SSP Concerns Elicited From Public

Province/Territory: Name of local government SSP initiative:										
S-e sys. int.	Liv. suff.	Intra eq.	Inter eq.	Res. maint. & eff.	S-e civ. & dem. gov.	Prec, adapt. & inn.	Imm. & long-term int.	Contr. varbls.	Thlds	Alt. Equ. Sts.

These above categories correspond with the following criteria adapted from Gibson et al.'s (2005) original set: social-ecological system integrity, livelihood sufficiency and opportunity, intragenerational equity, intergenerational equity, resource maintenance and efficiency, social-ecological civility and democratic governance, precaution, adaptation and innovation, and immediate and long-term integration. Note that I did not include the social change and effective implementation criteria in this analysis because they were considered in my investigation of the local government-specific SSP implementation needs, constraints and enablers that were elicited from the public through application of the community-scoping frameworks, as shown below.

Local Government-Specific Social Change Concerns Elicited From Public

Province/Territory: Name of local government SSP initiative:		
Regulative	Normative	Cognitive

Agency	Logic of App.	Logic of Instr.	Bounded Rationality	Path Depend.	Reneg. & Reint.	Diffusion	Resilience concepts

Local Government-Specific Social Implementation Considerations Elicited From Public

Province/Territory: Name of local government SSP initiative:				
Financial	Political	Administrative	Governance	Planning Process

Processes Used to Include the Public in Community Scoping

Province/Territory: Name of local government SSP initiative:		
Fung's cube categories and Bateson's levels of learning	**Which category or categories are relevant in this initiative?**	**Notes**
Scope of participation: Open, self selected Randomly selected Professional stakeholders Expert Administrators		
Mode of communication: Express preferences Develop preferences Aggregate and bargain Deliberate and negotiate		
Extent of authority: Individual education Communicative influence Advise/consult Co-govern Direct authority		
Level of learning and change: First order learning and change Second order learning and change Third order learning and change		

Appendix C – Data From Basic Information Collection

Table 36 Definition of Sustainability

Province	Name of Plan	Brundtland Definition	Brundtland & Plan-Specific	Plan-Specific Definition	Used as Noun or Adjective
AB	City of Calgary Imagine Calgary Plan for Long Range Urban Sustainability		Yes		
	City of Camrose ICSP	Yes			
	City of Fort Saskatchewan Community Sustainability Plan		Yes		
	City of Lethbridge ICSP	Yes			
	City of Spruce Grove Your Bright Future MDP			Yes	
	County of Lethbridge ICSP	Yes			
	Municipal District of Foothills No. 31 MDP	Yes			
	Municipality of Wood Buffalo ICSP	Yes			
	Strathcona County MDP	Yes			
	Town of Cochrane Sustainability Plan	Yes			
BC	City of Colwood OCP	Yes			
	City of Coquitlam OCP	Yes			
	City of Dawson Creek OCP			Yes	
	City of Fort St. John Today & Tomorrow Strategic Plan				Yes
	City of Kamloops Sustainable Kamloops Plan	Yes			
	City of Nanaimo OCP		Yes		
	City of Penticton OCP		Yes		
	City of Port Coquitlam OCP	Yes			
	City of Powell River OCP	Yes			
	City of Prince George ICSP			Yes	
	City of Prince Rupert Quality of Life OCP			Yes	
	City of Surrey Sustainability Charter		Yes		

	City of Terrace 2050: Our Strategy for Sustainability			Yes	
	City of Williams Lake Imagine Our Future ICSP			Yes	
	District of Delta OCP				Yes
	District of Mission OCP	Yes			
	District of Saanich, Sustainable Saanich OCP	Yes			
	District of Sooke Sustainable Development Strategy				Yes
	District of Sooke OCP	Yes			
	District of Squamish OCP				Yes
NB	City of Dieppe Five-Year Green Plan	Yes			
	City of Saint John Our Saint John ICSP		Yes		
	Town of Rothesay Municipal Plan	Yes			
NL	City of Mount Pearl ICSP		Yes		
	City of St. John's ICSP				Yes
	Town of Gander ICSP			Yes	
NT	City of Yellowknife CBSP				Yes
	City of Yellowknife Smart Growth Development Plan			Yes	
NS	Cape Breton RM ICSP	Yes			
	Municipality of Chester ICSP				Yes
	Municipality of the District of Lunenburg ICSP	Yes			
	Municipality of West Hants ICSP				Yes
	Region of Queens Municipality Municipal Planning Strategy		Yes		
	Town of Truro Community Sustainability Plan		Yes		
ON	City of Brampton OP			Yes	
	City of Greater Sudbury OP		Yes		
	City of Guelph Strategic Plan				Yes
	City of Kenora OP				Yes
	City of Kingston Sustainable Kingston Plan		Yes		

	City of Ottawa OP		Yes		
	City of Thunder Bay Community Environmental Action Plan			Yes	
	City of Toronto Clean, Green and Healthy: A Plan for an Environmentally Sustainable Toronto		Yes		
	City of Vaughan Green Directions ICSP			Yes	
	County of Norfolk OP				Yes
	Town of Bracebridge Community-Based Strategic Plan	Yes			
	Town of Collingwood Sustainable Community Plan		Yes		
	Town of East Gwillimbury OP		Yes		
	Town of Huntsville Unity Plan		Yes		
	Town of Newmarket OP		Yes		
PEI	City of Charlottetown ICSP	Yes			
	City of Charlottetown OP			Yes	
	City of Summerside OP			Yes	
YT	City of Whitehorse ICSP				Yes
	City of Whitehorse OP				Yes
	City of Whitehorse Strategic Sustainability Plan			Yes	
TOTAL		**21**	**17**	**14**	**13**

Table 37 Application of Sustainability Principles

Province	Name of Plan	Vision	Goals, Objectives, Policies	Principles
AB	City of Calgary Imagine Calgary Plan for Long Range Urban Sustainability	Yes		Melbourne Principles
	City of Camrose ICSP			The Natural Step Principles
	City of Fort Saskatchewan Community Sustainability Plan		Yes	
	City of Lethbridge ICSP	Yes	Yes	Created Own
	City of Spruce Grove Your Bright Future MDP			Created Own
	County of Lethbridge ICSP	Yes		
	Municipal District of Foothills No. 31 MDP	Yes		Created Own
	Municipality of Wood Buffalo ICSP			Created Own
	Strathcona County MDP	Yes		The Natural Step Principles
	Town of Cochrane Sustainability Plan		Yes	
BC	City of Colwood OCP	Yes	Yes	
	City of Coquitlam OCP		Yes	
	City of Dawson Creek OCP	Yes	Yes	
	City of Fort St. John Today & Tomorrow Strategic Plan	Yes	Yes	
	City of Kamloops Sustainable Kamloops Plan	Yes		Created Own
	City of Nanaimo OCP		Yes	Created Own
	City of Penticton OCP			CMHC Principles of Sustainable Communities
	City of Port Coquitlam OCP	Yes	Yes	
	City of Powell River OCP	Yes		CMHC Principles of Sustainable Communities
	City of Prince George ICSP	Yes	Yes	
	City of Prince Rupert Quality of Life OCP			Created Own
	City of Surrey Sustainability Charter	Yes		Created Own
	City of Terrace 2050: Our Strategy for Sustainability	Yes	Yes	

	City of Williams Lake Imagine Our Future ICSP			Created Own
	District of Delta OCP		Yes	
	District of Mission OCP	Yes	Yes	
	District of Saanich, Sustainable Saanich OCP	Yes		Created Own
	District of Sooke Sustainable Development Strategy	Yes	Yes	
	District of Sooke OCP	Yes		Created Own
	District of Squamish OCP	Yes		Created Own
NB	City of Dieppe Five-Year Green Plan	Yes	Yes	Created Own
	City of Saint John Our Saint John ICSP	Yes		Melbourne Principles
	Town of Rothesay Municipal Plan			Created Own
NL	City of Mount Pearl ICSP	Yes	Yes	
	City of St. John's ICSP	Yes	Yes	
	Town of Gander ICSP		Yes	Created Own
NT	City of Yellowknife CBSP	Yes		
	City of Yellowknife Smart Growth Development Plan			Created Own
NS	Cape Breton RM ICSP	Yes	Yes	
	Municipality of Chester ICSP	Yes		
	Municipality of the District of Lunenburg ICSP	Yes		Created Own
	Municipality of West Hants ICSP	Yes	Yes	
	Region of Queens Municipality Municipal Planning Strategy	Yes	Yes	
	Town of Truro Community Sustainability Plan	Yes	Yes	
ON	City of Brampton OP	Yes	Yes	Created Own
	City of Greater Sudbury OP	Yes		Created Own
	City of Guelph Strategic Plan	Yes		
	City of Kenora OP	Yes	Yes	Created Own
	City of Kingston Sustainable Kingston Plan	Yes	Yes	Created Own
	City of Ottawa OP		Yes	Created Own

	City of Thunder Bay Community Environmental Action Plan			Melbourne Principles
	City of Toronto Clean, Green and Healthy: A Plan for an Environmentally Sustainable Toronto	Yes	Yes	Created Own
	City of Vaughan Green Directions ICSP	Yes		Created Own
	County of Norfolk OP		Yes	Created Own
	Town of Bracebridge Community-Based Strategic Plan	Yes	Yes	
	Town of Collingwood Sustainable Community Plan			Created Own
	Town of East Gwillimbury OP	Yes	Yes	
	Town of Huntsville Unity Plan	Yes	Yes	Created Own
	Town of Newmarket OP	Yes	Yes	
PEI	City of Charlottetown ICSP	Yes		Created Own
	City of Charlottetown OP	Yes	Yes	
	City of Summerside OP		Yes	
YT	City of Whitehorse ICSP			Created Own
	City of Whitehorse OP			Created Own
	City of Whitehorse Strategic Sustainability Plan	Yes	Yes	Created Own
TOTAL		**53**		**38 (31 created their own)**

Table 38 Integrative Thinking

Province	Name of Plan	Acknowledged Integrative Thinking	Demonstrated Integrative Thinking
AB	City of Calgary Imagine Calgary Plan for Long Range Urban Sustainability	Yes	
	City of Camrose ICSP	Yes	
	City of Fort Saskatchewan Community Sustainability Plan	Yes	
	City of Lethbridge ICSP	Yes	
	City of Spruce Grove Your Bright Future MDP	Yes	
	County of Lethbridge ICSP	Yes	
	Municipal District of Foothills No. 31 MDP	Yes	
	Municipality of Wood Buffalo ICSP	Yes	
	Strathcona County MDP	Yes	
	Town of Cochrane Sustainability Plan	Yes	Yes
BC	City of Colwood OCP	Yes	
	City of Coquitlam OCP	Yes	
	City of Dawson Creek OCP	Yes	
	City of Fort St. John Today & Tomorrow Strategic Plan	Yes	
	City of Kamloops Sustainable Kamloops Plan	Yes	
	City of Nanaimo OCP	Yes	
	City of Penticton OCP	Yes	
	City of Port Coquitlam OCP	Yes	
	City of Powell River OCP	Yes	
	City of Prince George ICSP	Yes	Yes
	City of Prince Rupert Quality of Life OCP	Yes	
	City of Surrey Sustainability Charter	Yes	Yes
	City of Terrace 2050: Our Strategy for Sustainability	Yes	Yes
	City of Williams Lake Imagine Our Future ICSP	Yes	
	District of Delta OCP	Yes	
	District of Mission OCP	Yes	
	District of Saanich, Sustainable Saanich OCP	Yes	
	District of Sooke Sustainable Development Strategy	Yes	
	District of Sooke OCP	Yes	
	District of Squamish OCP	Yes	
NB	City of Dieppe Five-Year Green Plan	Yes	
	City of Saint John Our Saint John ICSP	Yes	
	Town of Rothesay Municipal Plan	Yes	
NL	City of Mount Pearl ICSP	Yes	Yes
	City of St. John's ICSP	Yes	
	Town of Gander ICSP	Yes	
NT	City of Yellowknife CBSP	Yes	
	City of Yellowknife Smart Growth Development Plan	Yes	Yes
NS	Cape Breton RM ICSP	Yes	
	Municipality of Chester ICSP	Yes	
	Municipality of the District of Lunenburg ICSP	Yes	
	Municipality of West Hants ICSP	Yes	
	Region of Queens Municipality Municipal Planning Strategy	Yes	
	Town of Truro Community Sustainability Plan	Yes	
ON	City of Brampton OP	Yes	
	City of Greater Sudbury OP	Yes	
	City of Guelph Strategic Plan	Yes	
	City of Kenora OP	Yes	
	City of Kingston Sustainable Kingston Plan	Yes	
	City of Ottawa OP	Yes	
	City of Thunder Bay Community Environmental Action Plan	Yes	
	City of Toronto Clean, Green and Healthy: A Plan for an Environmentally Sustainable Toronto	Yes	
	City of Vaughan Green Directions ICSP	Yes	
	County of Norfolk OP	Yes	
	Town of Bracebridge Community-Based Strategic Plan	Yes	
	Town of Collingwood Sustainable Community Plan	Yes	

	Town of East Gwillimbury OP	Yes	
	Town of Huntsville Unity Plan	Yes	
	Town of Newmarket OP	Yes	
PEI	City of Charlottetown ICSP	Yes	
	City of Charlottetown OP	Yes	
	City of Summerside OP	Yes	
YT	City of Whitehorse ICSP	Yes	
	City of Whitehorse OP	Yes	
	City of Whitehorse Strategic Sustainability Plan	Yes	
TOTAL		**65**	**6**

Table 39 Public Participation Methods

Province	Name of Plan	Participation Methods Used	How did feedback influence plan?
AB	City of Calgary Imagine Calgary Plan for Long Range Urban Sustainability	Round table discussions, working groups, public meetings, online questions, visioning sessions	Unclear
	City of Camrose ICSP	Consultation sessions, focus groups, meetings, surveys	Informed vision, actions
	City of Fort Saskatchewan Community Sustainability Plan	Workshops, surveys, open house	Informed priority list and actions list
	City of Lethbridge ICSP	Future scenario exercises, ideas fair, committee meetings	Informed development of vision, principles, goals, policies and actions
	City of Spruce Grove Your Bright Future MDP	Community visioning, open house, workshops, online survey, session with youth, public hearings on drafts, website input	Informed vision, policies, planning principles
	County of Lethbridge ICSP	Questionnaires, working group sessions	Informed vision, themes, actions
	Municipal District of Foothills No. 31 MDP	Public consultations	Unclear
	Municipality of Wood Buffalo ICSP	Workshop, open houses, questionnaires, website feedback, discussion papers, draft presentations	Informed sustainability statement, vision, goals
	Strathcona County MDP	Workshop, open houses, questionnaires, website feedback, discussion papers, public input on draft	Unclear
	Town of Cochrane Sustainability Plan	Public meetings, action groups	Descriptions of success, pathways for the future based on working group sessions
BC	City of Colwood OCP	Futures forum, workshops, open houses, focus groups, public hearing	Unclear
	City of Coquitlam OCP	Unclear, required by law	Unclear
	City of Dawson Creek OCP	Open houses, public hearing	Unclear
	City of Fort St. John Today & Tomorrow Strategic Plan	Visioning exercises, surveys, planning session with senior staff, priority goals defined with city council	Informed vision, values, mission, goals
	City of Kamloops Sustainable Kamloops Plan	Public forum, web input, survey	Public input led to the sustainability components that structure the plan/provide the planning framework
	City of Nanaimo OCP	Consultation, public workshop, web survey, presentations, community displays	Informed plan goals
	City of Penticton OCP	Focus group, info meetings, survey, open house	Informed vision, growth management concepts, principles, policies
	City of Port Coquitlam OCP	Unclear, required by law	Unclear
	City of Powell River OCP	Public meetings	Vision, goals
	City of Prince George ICSP	Survey, workshops, presentations, open house, web questionnaire, review meetings	Informed vision, goals, strategies, actions
	City of Prince Rupert Quality of Life OCP	Community consultations, discussion paper, public dialogues, telephone survey, community meetings, FN outreach	Informed vision, quality of life indicators, strategies
	City of Surrey Sustainability Charter	Questionnaires, working sessions, discussions, sustainability fair	Informed vision and goals
	City of Terrace 2050: Our Strategy for Sustainability	Community visioning	Informed goals
	City of Williams Lake Imagine Our Future ICSP	Booths, kitchen table conversations at home, hot spot conversations at public gatherings, community partner café, tour of community, multimedia workshops for youth, meetings with community groups	Informed declaration, strategic priority areas, goals, objectives, transition strategies
	District of Delta OCP	Community consultation	Unclear
	District of Mission OCP	Open houses, workshops, website input, newsletters, questionnaire	Informed policies
	District of Saanich, Sustainable Saanich OCP	Unclear, required by law	Informed policies
	District of Sooke Sustainable Development Strategy	Community consultations	Informed vision, priorities, core strategies
	District of Sooke OCP	Survey, coffee houses, appetizer nights, seniors' events, public displays, open houses, community BBQ	Informed vision, goals, objectives, policies

	District of Squamish OCP	Consultations, survey, website, online survey, open houses, public workshop, public hearing	Informed vision, objectives, priorities
NB	City of Dieppe Five-Year Green Plan	Public consultations, public review of draft plan	Informed recommendations and actions
	City of Saint John ICSP	Public consultations, workshops	Guided vision, goals, actions
	Town of Rothesay Municipal Plan	Open houses, questionnaires, website info	Unclear
NL	City of Mount Pearl ICSP	Visioning workshop, meetings with public, open house, online survey, presentation of draft	Informed vision and goals
	City of St. John's ICSP	Neighbourhood meetings, public meetings, public hearing	Unclear
	Town of Gander ICSP	Visioning session, online survey, workshop, public meeting	Informed goals and actions
NT	City of Yellowknife CBSP	Interviews, on-line input, visioning sessions, survey	Informed themes, goals, objectives, actions
	City of Yellowknife Smart Growth Development Plan	Questionnaire, focus group surveys, focus group sessions, public consultations	Inform policies and future development
NS	Cape Breton RM ICSP	Focus groups, blog site, survey, kiosk, town hall meetings, rural focus group, symposium, open house, visioning session	Informed vision, goals, objectives, actions
	Municipality of Chester ICSP	Community consultations, web info program, interviews, public meetings	Unclear
	Municipality of the District of Lunenburg ICSP	Consultation sessions, subject-specific public discussions, charrette	Informed strategic goals
	Municipality of West Hants ICSP	Workshops, sessions with seniors, sessions with students, public feedback on plan	Informed vision
	Region of Queens Municipality Municipal Planning Strategy	Information sessions, website info, newsletter, public meetings in six geographic areas	Informed vision and goals
	Town of Truro Community Sustainability Plan	Survey, public gatherings, interviews, Fire Hall sessions, mapping exercise	Informed vision and goals
ON	City of Brampton OP	Public consultations	Unclear
	City of Greater Sudbury OP	Public consultations	Unclear
	City of Guelph Strategic Plan	Focus groups, telephone interviews, youth surveys, review periods	Informed strategic directions
	City of Kenora OP	Public meetings	Unclear
	City of Kingston Sustainable Kingston Plan	Community charrette, surveys, community conversations, sustainability summit	Informed goals
	City of Ottawa OP	Public consultations	Unclear
	City of Thunder Bay Community Environmental Action Plan	Working groups, open houses, presentations to public, online feedback form	Informed goals and objectives
	City of Toronto Clean, Green and Healthy Plan	Workshops, working groups	Unclear
	City of Vaughan Green Directions ICSP	Citizen consultations, speaker series, visioning, public meetings	Informed vision and complete community definition
	County of Norfolk OP	Community forums, information sessions, public meetings	Informed sustainability principles
	Town of Bracebridge CBSP	Focus groups, open house, interviews, online surveys	Informed objectives and goals
	Town of Collingwood Sustainable Community Plan	Workshops, interviews, visioning, public review	Informed planning framework, goals, actions
	Town of East Gwillimbury OP	Public consultations	Unclear
	Town of Huntsville Unity Plan	Community conversation series, presentations, display booths, Facebook blog	Informed, vision, principles, goals, strategies, actions
	Town of Newmarket OP	Public consultations	Unclear
PEI	City of Charlottetown ICSP	Public visioning, stakeholder meetings, information session	Informed visions, goals, actions
	City of Charlottetown OP	Public consultations	Informed vision, goals, objectives, policies
	City of Summerside OP	Survey, public consultations	Informed visions, long-term goals, policies
YT	City of Whitehorse ICSP	Interviews, workshop, visioning session, open house	Informed vision and values
	City of Whitehorse OP	Workshop, open house, online questionnaire	Informed policies
	City of Whitehorse SSP	Four-day charrette, visioning exercises	Informed principles
		TOTAL	**47/65 plans were clear about how public feedback informed the plan**

Table 40 Social Change Considerations

Province	Name of Plan	Social Change Agenda Was Implicit	Social Change Agenda Was More Explicit
AB	City of Calgary Imagine Calgary Plan for Long Range Urban Sustainability	X	
	City of Lethbridge ICSP	X	
	County of Lethbridge ICSP		X
	Strathcona County MDP	X	
	Town of Cochrane Sustainability Plan		X
	City of Camrose ICSP	X	
	City of Fort Saskatchewan Community Sustainability Plan	X	
	City of Spruce Grove Your Bright Future MDP	X	
	Municipal District of Foothills No. 31 MDP	X	
	Municipality of Wood Buffalo ICSP	X	
BC	City of Colwood OCP	X	
	City of Dawson Creek OCP	X	
	City of Kamloops Sustainable Kamloops Plan	X	
	City of Nanaimo OCP	X	
	City of Penticton OCP	X	
	City of Port Coquitlam OCP	X	
	District of Delta OCP	X	
	District of Saanich, Sustainable Saanich OCP	X	
	District of Squamish OCP	X	
	City of Coquitlam OCP	X	
	City of Fort St. John Today & Tomorrow Strategic Plan	X	
	City of Surrey Sustainability Charter	X	
	District of Sooke Sustainable Development Strategy	X	
	District of Sooke OCP	X	
	City of Powell River OCP	X	
	City of Prince George ICSP	X	
	City of Prince Rupert Quality of Life OCP	X	
	City of Terrace 2050: Our Strategy for Sustainability	X	
	City of Williams Lake Imagine Our Future ICSP		X
	District of Mission OCP	X	
NB	Town of Rothesay Municipal Plan	X	
	City of Dieppe Five-Year Green Plan	X	
	City of Saint John Our Saint John ICSP	X	
NL	City of St. John's ICSP	X	
	City of Mount Pearl ICSP	X	
	Town of Gander ICSP	X	
NT	City of Yellowknife CBSP	X	
	City of Yellowknife Smart Growth Development Plan	X	
NS	Municipality of Chester ICSP	X	
	Region of Queens Municipality Municipal Planning Strategy	X	
	Cape Breton RM ICSP	X	
	Municipality of the District of Lunenburg ICSP	X	
	Municipality of West Hants ICSP	X	
	Town of Truro Community Sustainability Plan	X	
ON	City of Brampton OP	X	
	City of Greater Sudbury OP	X	
	City of Guelph Strategic Plan	X	
	City of Kenora OP	X	
	City of Ottawa OP	X	
	County of Norfolk OP	X	
	Town of East Gwillimbury OP	X	
	Town of Newmarket OP	X	
	Town of Collingwood Sustainable Community Plan	X	
	City of Thunder Bay Community Environmental Action Plan	X	
	City of Toronto Clean, Green and Healthy Plan	X	
	City of Kingston Sustainable Kingston Plan	X	
	City of Vaughan Green Directions ICSP	X	
	Town of Bracebridge Community-Based Strategic Plan	X	
	Town of Huntsville Unity Plan	X	
PEI	City of Summerside OP	X	
	City of Charlottetown ICSP	X	

	City of Charlottetown OP	X	
YT	City of Whitehorse OP	X	
	City of Whitehorse Strategic Sustainability Plan	X	
	City of Whitehorse ICSP	X	
	TOTAL	**62**	**3**

Table 41 Implementation Considerations Data

Province	Name of Plan	Imp. Considered Y/N?	Description of Implementation Concerns	Weak-to-Strongest Categories
AB	City of Calgary Imagine Calgary Plan for Long Range Urban Sustainability	Y	Actions set out	Average/strong
	City of Lethbridge ICSP	Y	Actions set out	Average/strong
	County of Lethbridge ICSP	Y	Actions set out	Average/strong
	Strathcona County MDP	Y	Actions set out	Average/strong
	Town of Cochrane Sustainability Plan	Y	Targets, implementation framework	Average/strong
	City of Camrose ICSP	Y	Actions and timeframe	Stronger
	City of Fort Saskatchewan Community Sustainability Plan	Y	Actions, responsible actors, timeframe, budget, status	Stronger
	City of Spruce Grove Your Bright Future MDP	Y	Actions, responsible actors, timeframe	Stronger
	Municipal District of Foothills No. 31 MDP	Y	Actions and timeframe	Stronger
	Municipality of Wood Buffalo ICSP	Y	Actions and responsible actors	Stronger
BC	City of Colwood OCP	Y	Brief description only	Weakest
	City of Dawson Creek OCP	Y	Implementation tools described	Weakest
	City of Kamloops Sustainable Kamloops Plan	Y	Brief description only	Weakest
	City of Nanaimo OCP	Y	Implementation tools described	Weakest
	City of Penticton OCP	Y	Implementation tools described	Weakest
	City of Port Coquitlam OCP	Y	Implementation tools described	Weakest
	District of Delta OCP	Y	Implementation tools described	Weakest
	District of Saanich, Sustainable Saanich OCP	Y	Implementation tools described	Weakest
	District of Squamish OCP	Y	Implementation tools described	Weakest
	City of Coquitlam OCP	Y	Actions set out	Average/strong
	City of Fort St. John Today & Tomorrow Strategic Plan	Y	Actions set out	Average/strong
	City of Surrey Sustainability Charter	Y	Actions set out	Average/strong
	District of Sooke Sustainable Development Strategy	Y	Actions set out	Average/strong
	District of Sooke OCP	Y	Actions set out	Average/strong
	City of Powell River OCP	Y	Actions, timeframe, responsible actors	Stronger
	City of Prince George ICSP	Y	Actions, general timeframe, responsible actors	Stronger
	City of Prince Rupert Quality of Life OCP	Y	Actions, responsible actors	Stronger
	City of Terrace 2050: Our Strategy for Sustainability	Y	Actions, timeframe, responsible actors	Stronger
	City of Williams Lake Imagine Our Future ICSP	Y	Actions set out, responsible actors	Stronger
	District of Mission OCP	Y	Actions, timeframe, responsible actors, tools	Stronger
NB	Town of Rothesay Municipal Plan	Y	Implementation tools described	Weakest
	City of Dieppe Five-Year Green Plan	Y	Actions, budgeting, responsible actors	Stronger
	City of Saint John Our Saint John ICSP	Y	Actions, responsible actors	Stronger
NL	City of St. John's ICSP	Y	Brief description only	Weakest
	City of Mount Pearl ICSP	Y	Actions, timeframe, budget, responsible actors	Stronger
	Town of Gander ICSP	Y	Actions and timeframe	Stronger
NT	City of Yellowknife CBSP	Y	Actions set out	Average/strong
	City of Yellowknife Smart Growth Development Plan	Y	Actions, timeframe, budget, responsible actors	Stronger
NS	Municipality of Chester ICSP	Y	Brief description only	Weakest

	Region of Queens Municipality Municipal Planning Strategy	Y	Implementation tools described	Weakest
	Cape Breton RM ICSP	Y	Actions set out	Average/strong
	Municipality of the District of Lunenburg ICSP	Y	Actions, timeframe, budget	Stronger
	Municipality of West Hants ICSP	Y	Actions, timeframe, responsible actors	Stronger
	Town of Truro Community Sustainability Plan	Y	Actions, budget, responsible actors, internal processes	Stronger
ON	City of Brampton OP	Y	Implementation tools described	Weakest
	City of Greater Sudbury OP	Y	Implementation tools described	Weakest
	City of Guelph Strategic Plan	Y	Brief description only	Weakest
	City of Kenora OP	Y	Implementation tools described	Weakest
	City of Ottawa OP	Y	Implementation tools described	Weakest
	County of Norfolk OP	Y	Implementation tools described	Weakest
	Town of East Gwillimbury OP	Y	Implementation tools described	Weakest
	Town of Newmarket OP	Y	Implementation tools described	Weakest
	Town of Collingwood Sustainable Community Plan	Y	Actions set out	Average/strong
	City of Thunder Bay Community Environmental Action Plan	Y	Actions set out	Average/strong
	City of Toronto Clean, Green and Healthy: A Plan for an Environmentally Sustainable Toronto	Y	Actions set out	Average/strong
	City of Kingston Sustainable Kingston Plan	Y	Actions, responsible actors, proposed governance model	Strongest
	City of Vaughan Green Directions ICSP	Y	Actions, budget, timeframe, responsible actor	Stronger
	Town of Bracebridge Community-Based Strategic Plan	Y	Actions, timeframe, responsible actors	Stronger
	Town of Huntsville Unity Plan	Y	Actions, implementation framework: responsible actors, budget, administrative structures	Strongest
PEI	City of Summerside OP	Y	Implementation tools described	Weakest
	City of Charlottetown ICSP	Y	Actions, timeframe, responsible actors	Stronger
	City of Charlottetown OP	Y	Actions, timeframe, budget, responsible actors	Stronger
YT	City of Whitehorse OP	Y	Implementation tools described	Weakest
	City of Whitehorse Strategic Sustainability Plan	Y	Brief description only	Weakest
	City of Whitehorse ICSP	Y	Actions, budget, timeframe	Stronger

Appendix D – Data From In-Depth Analysis of Community-Scoping Step

Table 42 Excerpt (A) from Analysis of Generic SSP Concerns Initially Covered

Province/Territory: BC
Name of local government SSP initiative: Prince George ICSP

Summary of community-scoping framework contents:
Open-ended questions, external factors scenario workshops, use of sustainability pillars to organize external factors

Generic SSP concerns	Yes	No	Notes
Socio-ecological system integrity	x		Comprehensive coverage of generic SSP concerns.
Livelihood sufficiency and opportunity	x		
Intragenerational equity	x		
Resource maintenance and efficiency	x		
Socio-ecological civility and democratic governance	x		
Societal change	x		
Precaution, adaptation, and innovation	x		
Immediate and long-term integration	x		
Effective Implementation	x		
Controlling variables	x		
Thresholds	x		
Alternative equilibrium states	x		

Table 43 Excerpt (B) From Analysis of Generic SSP Concerns Initially Covered

Province/Territory: ON
Name of local government SSP initiative: Collingwood Sustainable Community Plan

Summary of community-scoping framework contents:
-At the Nottawasaga Quest workshops, participants discussed their preferences related to questions about: Housing Density, Housing Location, Job Density, Job Location, Agricultural Land, Roads verses Transit, Transportation Policy, Energy and Air Quality, Water and Waste. Predetermined response options.
-Through a set of action planning workshops, key ideas were discussed and participants provided comments and suggestions on actions that could be made in the Nottawasaga Region to move towards sustainability (and achieving the preferred scenario) around the following key themes: Reducing our Urban Footprint (Land Use), Improving How We Get Around, Minimizing Resource Use (Energy, Water and Waste), Strengthening Our Economy, Enhancing our Arts, Cultural, Heritage and Recreation Opportunities, Reinforcing the Importance of our Community's Social Framework. Predetermined response options.

Generic SSP concerns	Yes	No	Notes
Socio-ecological system integrity	x		Selective coverage (mostly generic sustainability, no resilience, no social change and implementation).
Livelihood sufficiency and opportunity	x		
Intragenerational equity	x		
Resource maintenance and efficiency	x		
Socio-ecological civility and democratic governance	x		
Societal change		x	
Precaution, adaptation, and innovation	x		
Immediate and long-term integration		x	
Effective Implementation		x	
Controlling variables		x	
Thresholds		x	
Alternative equilibrium states		x	

Table 44 Excerpt (C) From Analysis of Generic SSP Concerns Initially Covered

Province/Territory: ON
Name of local government SSP initiative: Prince Rupert Quality of Life Community Plan

Summary of community-scoping framework contents:
-Random community survey was structured around quality of life attributes. Respondents could rate the importance of predetermined statements; agree or disagree with statements in order to identify assets and issues.
-Community consultations process was held to define issues and quality of life indicators: Quality of life dimensions were used. The dimensions were broken down into more detailed statements. For each statement, respondents were asked the extent to which they agreed or disagreed that Prince Rupert reflected that statement. Secondly, respondents were asked to indicate the degree of importance of the statement. For example, for the dimension relating to "neighbourliness", respondents were asked the extent to which they agreed or disagreed with the statement that "I know my neighbours". And they were asked the degree to which "knowing my neighbours" is important or unimportant. Areas functioning well were identified. Issues needing to be addressed were identified.
-Quality of life indicators were organized according to urban planning categories: (healthy community, working and shopping, traveling and mobility, infrastructure, etc.)

Generic SSP concerns	Yes	No	Notes
Socio-ecological system integrity	x		-Narrow coverage (livelihood sufficiency concerns were dominant) -Criteria did not attend well to sense of place and spiritual matters.
Livelihood sufficiency and opportunity	x		
Intragenerational equity			
Resource maintenance and efficiency	x		
Socio-ecological civility and democratic governance			
Societal change			
Precaution, adaptation, and innovation			
Immediate and long-term integration			
Effective Implementation			
Controlling variables			
Thresholds			
Alternative equilibrium states			

Table 45 Excerpt (A) from Analysis of Community-Specific Sustainability Concerns

*Note that this analysis also considered resilience concerns, as described in Chapter Five

Province/Territory: BC
Name of local government SSP initiative: Prince George ICSP

S-e sys. int.	Liv. suff.	Intra eq.	Inter eq.	Res. maint. & eff.	S-e civ. & dem. gov.	Prec, adapt. & inn.	Imm. & long-term int.	Contr. varbls.	Thlds	Alt. Equ. Sts.
-zero waste mvmnt -water, food security, energy dominate world markets -degradation of air, land, water -lower envtl standrds -consumers use less or more stuff -climate induced migration	-rapidly shifting regional economy -loss of local knowledge and low-tech skills -need for local food -climate induced migration -rising costs of energy, transportation -degradation of social services -localization -water, food security, energy dominate world markets -degradation of air, land, water -global instability -consumers use less or more stuff -zero waste movement -fall in US economy –civil unrest	-rapidly shifting regional economy -loss of local knowledge and low-tech skills -need for local food -rising costs of energy, transportation -degradation of social services -localization -water, food security, energy dominate world markets -degradation of air, land, water -global instability -consumers use less/more stuff -zero waste movement	-rapidly shifting regional economy -loss of local knowledge and low-tech skills -need for local food -rising costs of energy, transportation -degradation of social services - localization -water, food security, energy dominate world markets -degradation of air, land, water -global instability -consumers use less/more stuff -zero waste movement	-zero waste movement -water, food security, energy dominate world markets -degradation of air, land, water -lower envtl standrds -consumers use less/more stuff	-loss of local knowledge and low-tech skills -climate induced migration -sust dev becomes conflict btw countries -degradation of social services -localization - water, food security, energy dominate world markets -degradation of air, land, water -global instability -political partisanship -fall in US economy –civil unrest	-more long-term thinking	-more long-term thinking	-climate induced migration -climate change -global instability - economic disparity -power of corporations -sea levels rise -commodification of water -immigration pressure -global economic changes -aging pop -modest pop growth -risk of flooding -growing fiscal pressure on govts and households	-shifts in power -shifting regional economy due to climate change, -globalizatn -mass migration -sea levels rise	-use of scenarios -shifting power relationshipss -shifting economies

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Table 46 Excerpt (B) from Analysis of Community-Specific Sustainability Concerns

Province/Territory: AB
Name of local government SSP initiative: Town of Cochrane Sustainability Plan

S-e sys. int.	Liv. suff.	Intra eq.	Inter eq.	Res. maint. & eff.	S-e civ. & dem. gov.	Prec, adapt. & inn.	Imm. & long-term int.	Contr. varbls.	Thlds	Alt. Equ. Sts.
-uncontrolled growth, sprawl -evtl responsibility -clean air -clearn water -rural perspective -natural envt (open spaces) -natural beauty -proximity to mountains -great path system -resist big box stores -population cap -reduce auto use -compact dev - integrated approach to planning -protect ranchlands and historic ranches	-uncontrolled growth, sprawl -evtl responsibility -safety -clean air -clearn water -sports programs -other rec programs -education opps -easy access to Calgary -unique local shops -accessibility to services -great path system -resist big box stores -population cap -transit system with link to Calgary -compact dev -self sufficiency vs. reliance on Calgary -more diverse local employment opps - integrated	-uncontrolled growth, sprawl -evtl responsibility -safety -clean air -clearn water -education opps -accessibility to services -great path system -resist big box stores -population cap -transit system with link to Calgary -compact dev -self sufficiency vs. reliant on Calgary -more diverse local employment opps -integrated approach to planning -affordable housing -rapid rail to Calgary -maintain affordability of	-uncontrolled growth, sprawl -evtl responsibility -safety -clean air -clearn water -education opps -accessibility to services -great path system -resist big box stores -population cap -transit system with link to Calgary -compact dev -self sufficiency vs. reliant on Calgary -more diverse local employment opps -integrated approach to planning -affordable housing -rapid rail to Calgary -maintain affordability of	-uncontrolled growth, sprawl -need a growth cap -evtl responsibility -clean air -clearn water -great path system -need greenspace in all new devs -resist big box stores -improved traffic flow -population cap -clean up domtar site asap -reduce automobile use -transit system with link to Calgary -compact dev -integrated approach to planning -rapid rail to Calgary -let growth occur (stores,	-uncontrolled growth, sprawl -need a growth cap -strength of comm -safety -clean air -clearn water -progressive community -education opps -responsive council -accessibility to services -comm events -friendliness of comm -lots of churches -population cap -partnerships with rural land owners -lack of support for ranch owners -compact dev -integrated approach to planning	-uncontrolled growth, sprawl -evtl responsibility -clean air -clearn water -progressive community				

	approach to planning -afford-able housing -more shopping opps -rapid rail to Calgary -need a community centre -maintain afford-ability of life for young people -let growth occur (stores, business, town expan-sion)	life for young people	life for young people	business, town expansio n)						

Table 47 Excerpt (C) from Analysis of Community-Specific Sustainability Concerns

Province/Territory: ON
Name of local government SSP initiative: Huntsville Unity Plan

S-e sys. int.	Liv. suff.	Intra eq.	Inter eq.	Res. maint. & eff.	S-e civ. & dem. gov.	Prec, adapt. & inn.	Imm. & long-term int.	Contr. varbls.	Thlds	Alt. Equ. Sts.
-size of Town is big enough and small enough - want to sustain air and water quality -open to alts -trails -smart growth -protect shoreline -inclusive for all -green energy -imp-roved waste collection -natural envt as over-arching umbrella -econ-omic focus wins -sust-ainability pla	-seasonal jobs -all of the art every-where - want to sustain air and water quality -main street alive -wond-erful hospital and doctors -theatre -open to alts -places for kids to play -trails -sports facilities -educ-ation opps -comm centre -healthy lifestyle -acces-siblity -safety -protect shoreline -inclusive for all -green energy -pros-perous living for diverse groups -green job opps -living wages for all -lots of small business -reduce poverty	-seasonal jobs -want to sustain air and water quality -main street alive -wond-erful hospital and doctors -open to alts -trails -educ-ation opps -acces-sibility -safety -protect shoreline -inclusive for all -green energy -pros-perous living for diverse groups -green job opps -living wages for all -reduce poverty -natural envt as over-arching umbrella -econ-omic focus wins -sust-ainability plan	-seasonal jobs -want to sustain air and water quality -main street alive -wond-erful hospital and doctors -open to alts -trails -educ-ation opps -acces-sibility -safety -protect shoreline -inclusive for all -pros-perous living for diverse groups -green job opps -living wages for all -reduce poverty -natural envt as over-arching umbrella -econ-omic focus wins -sust-ainability plan	-size of Town is big enough and small enough -want to sustain air and water quality -open to alts -trails -smart growth -protect shortline -inclusive for all -trail connectio ns -green energy -use four-stroke engines -imp-roved waste collection -natural envt as overarchi ng umbrella -ecoomic focus wins -sust-ainability plan	-size of Town is big enough and small enough -want to sustain air and water quality -comm spirit -open to alts -educ-ation opps -comm centre -inclusive for all -pros-perous living for diverse groups -Hunts-ville in charge of Hunts-ville -natural envt as over-arching umbrella -need buy in -pride of own-ership -unified goals -shift attitudes -econ-omic focus wins -partner-ships -core comm values -open com-municatn -educ-	-econ-omic focus wins -sust-ainability plan	-sust-ainability plan			

	-natural envt as overarchi ng umbrella -econ- omic focus wins -sust- ainability plan				ation and aware- ness -enforced regula- tions -sust- ainability plan				

Table 48 Excerpt (D) from Analysis of Community-Specific Sustainability Concerns

Province/Territory: NS
Name of local government SSP initiative: Lunenburg MD ICSP

S-e sys. int.	Liv. suff.	Intra eq.	Inter eq.	Res. maint. & eff.	S-e civ. & dem. gov.	Prec, adapt. & inn.	Imm. & long-term int.	Contr. varbls.	Thlds	Alt. Equ. Sts.
-air pollution -water quality -harvesting of natural resources -climate change adaptatin -preservation of natural envt -protection of resource land, esp agricultural land -recognize links btw clean water and local agriculture -coastal conservtn efforts	-need more cultural and rec spaces -need range of housing types -volunteer fire services -costs of regional recycling center -deteriorating infrastructure -strong local economy -barriers to entry of small-scale agriculture operation -impact to youth who want to stay -conflicts when land value for subdivisions is greater than continued farming -availability of public transit options -conflict btw cost of goods and local self-sufficiency -need more skills training opps	-need range of housing types -costs of regional recycling center -deteriorating infrastructure -strong local economy -barriers to entry of small-scale agriculture operation -availability of public transit options -conflict btw cost of goods and local self-sufficiency -need more skills training opps -public access to the coastline is important for coastal comms	-need range of housing types -costs of regional recycling center -deteriorating infrastructure -strong local economy -barriers to entry of small-scale agriculture operation -availability of public transit options -conflict btw cost of goods and local self-sufficiency -need more skills training opps -public access to the coastline is important for coastal comms	-unsustainable consumption -costs of recycling and waste management -support bicycling options -reduce reliance on cars -adopt green energy options -reduce energy impacts in new bldngs -improve existing waste mgnt -recognze connection btw local econ dev and infra dev -better transit from smaller communities to employment hubs -need more transportation opps -road condition in rural comms is sub-standrd	-govt must take visible leadership role -need better understanding of sust -govt shld better educate public regarding their decisions -get diff age groups involved in local activities -need more govt advocacy -eliminate duplication of efforts -use a regional perspective instead					

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	-public access to the coastline is important for coastal comms									

Table 49 Excerpt (E) from Analysis of Community-Specific Sustainability Concerns

Province/Territory: NL
Name of local government SSP initiative: Town of Gander ICSP

S-e sys. int.	Liv. suff.	Intra eq.	Inter eq.	Res. maint. & eff.	S-e civ. & dem. gov.	Prec, adapt. & inn.	Imm. & long-term int.	Contr. varbls.	Thlds	Alt. Equ. Sts.
-use of pesticides -emis-sions from airport -protect Gander Lake -green-space -water-shed manage-ment -litter	-acces-sible transport -improve recreation prgms for all ages -debt to service level -mun buildings to meet needs -adequate solid waste disposal system -arts and culture events and opportuni-ties -need for new cultural events and venues -need for new sports hall -need for econ diversity	-acces-sible transport -debt to service level -need for econ diversity	-acces-sible transport -debt to service level -adequate solid waste disposal system -need for econ diversity	-enhance envtl conservat ion -waste and energy consumpt n -expand and improve recycling prgrms -encourag e composti ng -meet requirem ents to operate water supply system -suf-ficient water and sewer infra -improve sewage treatment	-enhance envtl education -partner w other mun-icipalities -govt capacity -mun-icipal plan up to date -have enough staff to meet opera-tional needs of municip -does council keep at hand adopted rules of procedure					

Table 50 Excerpt (F) from Analysis of Community-Specific Sustainability Concerns

Province/Territory: NT
Name of local government SSP initiative: City of Yellowknife CBSP

S-e sys. int.	Liv. suff.	Intra eq.	Inter eq.	Res. maint. & eff.	S-e civ. & dem. gov.	Prec, adapt. & inn.	Imm. & long-term int.	Contr. varbls.	Thlds	Alt. Equ. Sts.
-control litter -preserve natural areas and lakes -growth impacts on envt	-quality of mun services -transp infra -promote tourism -more pop growth to improve quality of life -acces-siblty of facilities -prox-imity to nature -more growth to improve mun tax base -con-venient transport options -enc-ourage econ opps –local business prom-otion -housing costs -high home resale values -career opps -rec-reation opps -boom and bust economy due to nat res extraction based economy	-quality of mun services -accom-modate different needs -rising housing costs -acces-siblty of facilities -more growth to improve mun tax base -con-venient transport options -enc-ourage econ opps –local business prom-otion -housing costs -high home resale values -career opps -boom and bust economy due to nat res extraction based economy	-quality of mun services -acces-siblty of facilities -more growth to improve mun tax base -rising housing costs -acces-siblty of facilities -con-venient transport options -enc-ourage econ opps –local business prom-otion -housing costs -high home resale values -career opps -boom and bust economy due to nat res extraction based economy	-control litter -compact growth -growth that takes advan-tage of existing infra -can walk every-where -con-venient transport options	-com-municate with residents -need more pub-private partner-ships -build rel. w FNs -further interact-ions w. external agencies -admin. capacity					