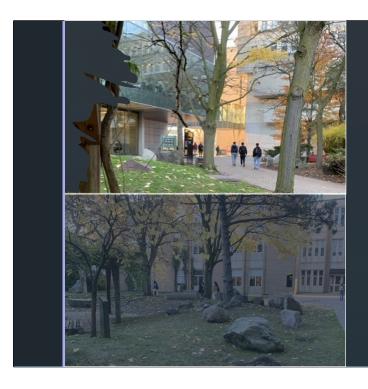


Hello and welcome to our presentation!



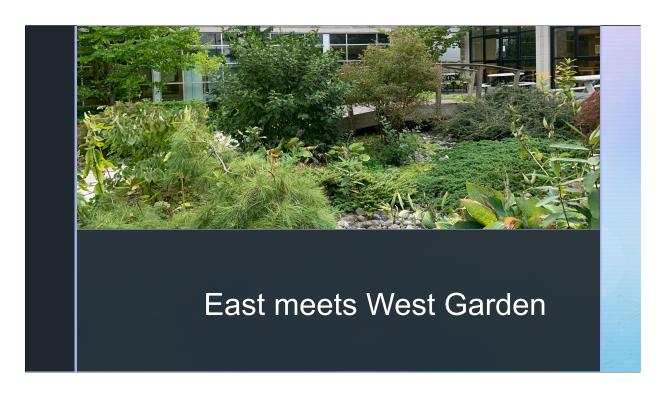
### Introduction

- Welcome to the University of Waterloo Campus!
- We will look at opportunities for parents to expand their children's language acquisition on campus in a fun, and playful way

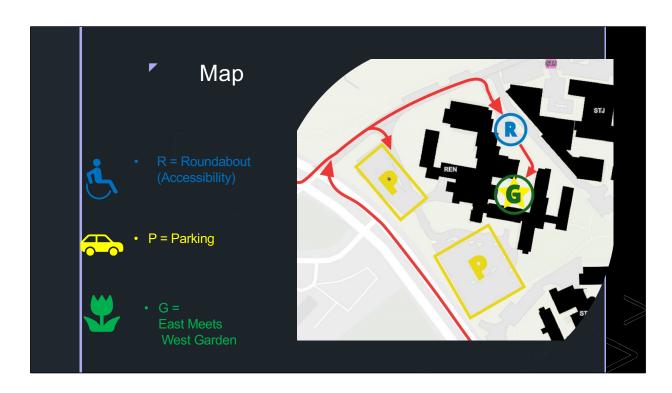
Welcome to the University of Waterloo Campus! We will look at opportunities for parents to expand their child's language acquisition on campus in a fun, and playful way at various stages of the lifespan. This will offer an economically accessible and enjoyable experience for all parents and their children to participate in together during their free time.

# For Toddler Aged Children

We've created activities for this specific age group (1-3 years old) around two chosen locations that helps promote opportunities for parents to expand their child's language retention. By immersing children in this environment, it creates plenty of opportunities for fun and communication.



This is East meets West Graden! Kids are going to feel like they have been transported into a different world. This garden is symbolic of cultural diversity as it has plants from all over the world! It has a beautiful pathway which is a perfect place to take a stroll or even relax with your family.

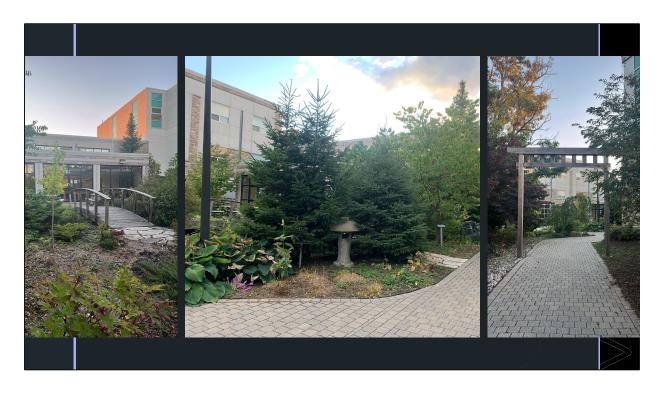


### Map:

R = roundabout for parents who need to be closer to the garden -> accessibility P = parking to minimize amount of distance parents and children need to travel (includes handicap parking)

G = garden -> showing clear path from roundabout how to get to garden

Bathrooms are located in Renison College as well as family bathrooms which include changing stations. Cafeteria and vending machines are available in the college too. The meal hours are from 7:30 am to 7:00 pm. All the pathways at the garden are stroller and wheelchair accessible. This location is closed off from the roads, allowing more freedom for toddlers and parents to immerse themselves in the East Meets West Garden without any worries.



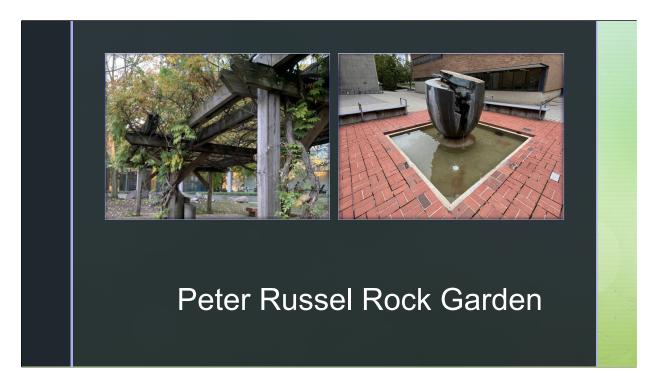
Pictures



### Pretend Play

- Opportunities to explore the garden with the toddler
- Encourage their train of thought
- Helps develop emotional and communicative skills

The East meets West garden's theme is encountering surprises as you explore- a mystical element. This spot is a great way to introduce talk through activities such as pretend play. This location creates a whimsical feel and hence is a perfect place to get children's imaginative wheels running. In this unique setting, children can use the unique landscape of the garden to imagine all sorts of things like; a bird feeder that turns into a crazy castle, huge plants and trees that create a whimsical environment, sticks that can be imagined as magic wands and so on... A parent could encourage the child's imagination by asking questions like, "what does your magical wand do?".



This is the Peter Russell Rock Garden! This space is a beautiful, scenic outdoors space in the middle of campus which makes it great for children to roam through freely. We believe that this space on campus is one of the most beautiful and rich spaces for children because of its unlimited opportunities for pretend play as well as all it's proximity to amenities on campus such as cafes, food courts and public washrooms.

### The fountain

The first area of exploration is the centerpiece, the water fountain. I remember my first time seeing it when I was very young and I thought it looked very interesting. With a pump mechanism that is not visible to the viewer, this fountain pours water down the sides in a seemingly impossible manner; this object has the potential to be a great facilitator of conversation between the parent and the child.

A very probable scenario between parent and child upon first seeing this fountain is that the child is going to be curious as to how it functions. This conversation opens up almost endless possibilities for different types of talk. The child could ask a simple question "How does it work?" This gives the parent the opportunity to explain how the object works, including the inner mechanisms of the fountain and how they

function. By engaging in these conversations, this builds vocabulary sophistication. This area provides parents and their children with the opportunity to have a thoughtful discussion with plenty of learning opportunities.

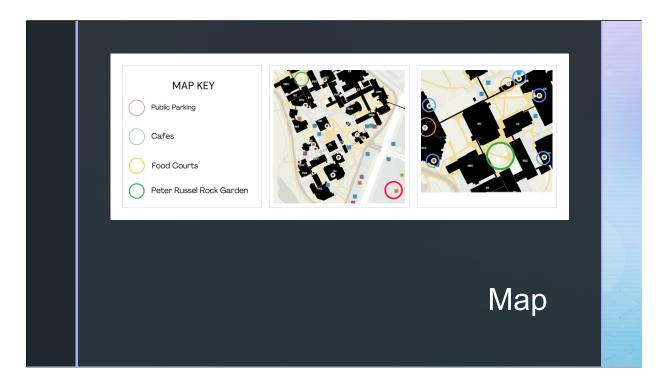
### Nature Trail and Canopy Area

Another feature of this area is the path. This path follows a simple route that is lined with trees, rocks, various plants and depending on the season; lots of bugs. With so many things to touch and see, there are plenty of opportunities for a meaningful conversation when walking this path. When following the path this is a great opportunity to engage in pretend play. The parent can make a game out of it, like there is an ogre hiding in the trees and the goal is to find him. If the child picks up a plant along the trail, the parent could say "Oh wow! It looks like you picked up a dandelion" and then also pick up a dandelion so they can examine them together. This area is quite vast for a toddler and it could be a lot to process; because of this the parent should prompt their child when they can by asking them what they see, what the different surfaces feel like, if they see any bugs, what colours things are and so on.

This path also has many other features that make for an interesting walk with your toddler. Down near the bottom of the trail you will find a tall wooden canopy that is covered in twisting vines. Around this area there are also plenty of rock structures and sculptures that have interesting shapes and textures. With all of these different structures to explore this is sure to create the opportunity for plenty of different words to be learned. In this area the parent could ask the child what they feel and what they see; Around the cylindrical sculpture they could say "what does this feel like?", "what shapes are these?", "how tall are these?", "how do you think they made this?" And so on...



We understand that this is a sensory rich area and children at this age may feel overwhelmed. To provide them with some guidance, there is a 'can you find it' sheet that we recommend. This sheet shows six things that can all be found in within the boundaries of the rock garden, the children can cross off items one by one until they find them all!

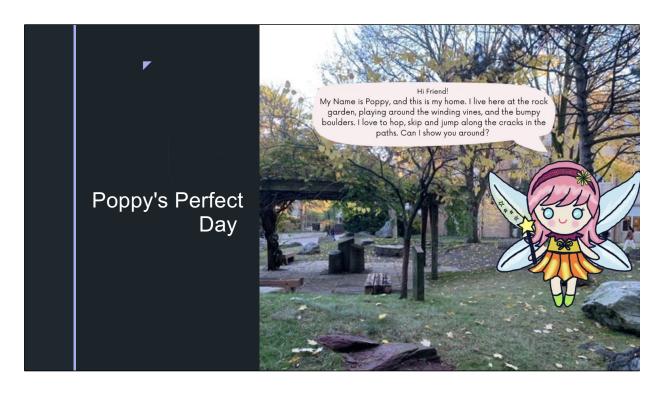


If driving to the location, we recommend parking in the C lot. It is \$5 to park there for the full day. The Peter Russel Rock Garden is circled by green; Cafes are circled in blue; food courts are circled in orange. Also, there are restrooms in every surrounding building.

# For Preschool Aged Children

We have created 6-page short story to exhibit different spaces within the Peter Russel Rock Garden

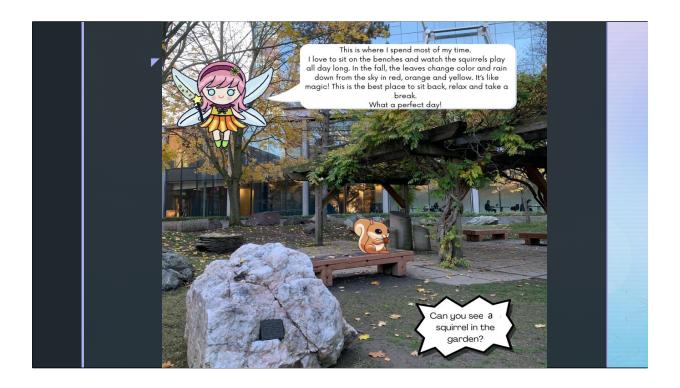
This story is about a fairy named Poppy. Poppy lives within the rock garden and wants to show you all of her favorite spots and things to do such as running, having races, making art and having lunch. The story demonstrates different activities for your child to engage in within the space. Also, the child can use their imagination based on elements within the story, and get creative through pretend play. We thought that this could be turned into a PDF and be hyperlinked to a page on the universities website for accessibility; this way you could read the story on a tablet or phone remotely.



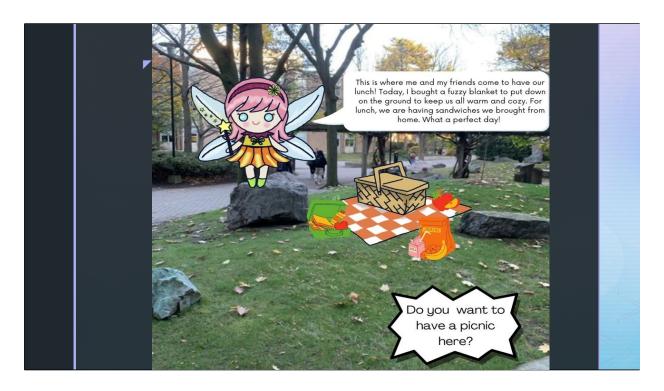
The story that we provide the parents is designed to provide a fun and interactive experience for the children when exploring the rock garden. It is important to note how crucial it is for the parent to be involved in their child's learning and language. Through the use of a story, we attempt to create an opportunity for the parent to engage in different forms of decontextualized language with their child. These forms of language include discussions about future events, explanations, definitions, past events, open-ended questions, scripts and connections (Leech & Rowe, 2021).

In relation to our story these types of language can be used in a wide variety of manners such as: "Have you ever felt like the fairy did in the story?", "What would you like to do next time we are here?", "How did these trees get so tall?", "Where are we going next?", and "These trees look like the ones we have in our backyard". These types of conversations are important to have since they are correlated to many different aspects of developmental well-being. When parents use decontextualized language with their children it creates deeper and longer conversations, this is because decontextualized language forces the speaker to use inferential and reasoning skills to maintain the conversation (Leech & Rowe, 2021). With longer conversations also comes more frequent use of turn-taking within the dialogue which is highly predictive of concurrent and later brain and behavioural development in

children (Leech & Rowe, 2021).



Conceptual inputs as described by Rowe et al. are conversations that involve topics such as function and meaning, these are most likely going to arise in a conversation about anything the children encounter at the rock garden. Because of its unique structures and design, the children will want to explore and play around all areas of the garden; this will prompt the use of many different words within many different conversations. Children will have many questions and ideas of their own that they can share; all of these provide the opportunity for interactive input. This area provides a setting that has all levels of material for children; This location can create simple conversations about colours and shapes all the way to advanced discussions about geology, this area can accommodate children of all academic levels.



Story sharing between parents and their children is very beneficial to a child's language and emotional development (Aram et al., 2013). During the story parents will most likely elaborate parts of the story to their children. These elaborations could include references to the plot, themes, the mental states of characters, mental causality and relating characters to previous mental states. When parents elaborate more frequently on socio-cognitive themes in stories it builds children's emotional and social understanding (Aram et al., 2013).



On the fourth page of our story book, we introduce a racing game prompt. While the children are not explicitly told to have a racing game of their own, we think that hearing the story of the fairy and her friends having fun racing will prompt the children to do the same. This slide does not only encourage the development of gross motor skills, but it also facilitates parent child reminiscing.

Whether the children decide to play a game here or not it provides the opportunity for reminiscing to occur between the parent and the child. Our fairy asks the question "can you think of a time when you went as fast as us". By incorporating this question into the story, we prompt a conversation between the parent and the child where they reminisce on past events. Engaging in this type of talk teaches children to coordinate past states of the self with present states and also coordinates the past self with others (Nelson & Fivush, 2019). Activities like this aid the child's ability to understand thoughts, beliefs, desires, and emotions that create behaviours (Nelson & Fivush, 2019). It also helps children understand that emotional states vary across time and situations and helps them extend their subjective perspective on lived experience (Nelson & Fivush, 2019).



The rock garden is a special area of campus in that it provides a space that is rich in sensory inputs. There are plenty of unique looking rocks, trees, sculptures and plants. This area is the perfect place to help a child build a rich vocabulary. By exposing the children to an area such as this it provides the parents with the opportunity to converse with them at length using a vast array of different words.

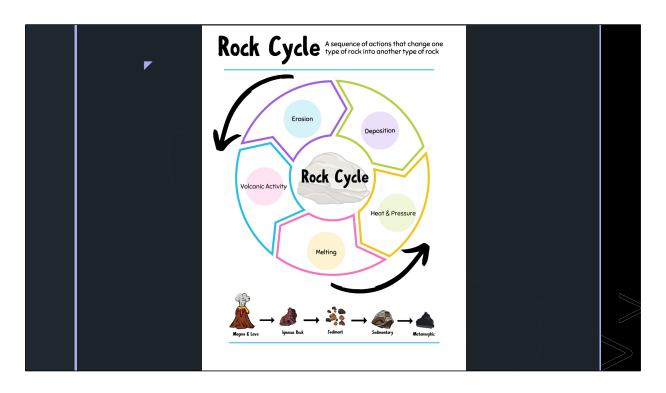
When parents engage in frequent conversations with their children it aids their ability to process language on-line and increases their oral language skills (Rowe & Snow, 2020). This is a benefit of the rock garden since it provides plenty of opportunity for many types of conversations. The benefits of a sophisticated vocabulary extends even farther beyond a child's oral language skills (Nelson et al., 2010). Exposing children to these types of environments and conversations is important since the promote emotion recognition and social competence (Nelson et al., 2010).



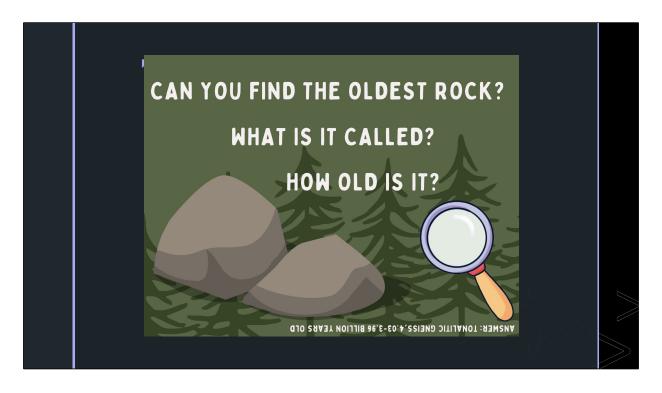
In general, the story and the walk through the Peter Russel rock garden aim to help build a child's vocabulary and help their language development excel. While language development is the goal of these activities, the benefits of high linguistic skills are beneficial to a child in many ways; it helps their emotion recognition and their emotion processing (Aram et al., 2013).

Language skills also help develop a child's social competence (Snow, 2016). Through the learning of language and story reading a child is taught how to understand complex mental states (Aram et al., 2013), and activities like visiting the Peter Russel rock garden give children an appropriate challenge to help develop their cognitive skills (Rowe & Snow, 2020).

## For Elementary School Children



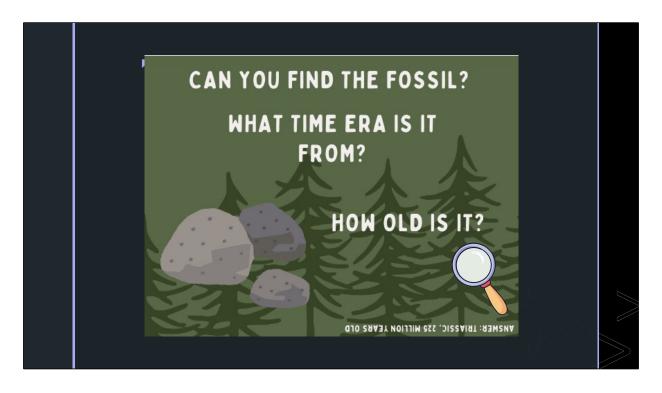
The opening activity for the rock garden is a sheet that simplifies the rock cycle. This interactive book is a great way to introduce the children to the theme of our main activity which is all about rocks. Sheets such as these are a great tool to use as an icebreaker activity that gets the children asking questions and excited to learn. During this activity parents can talk all about how rocks are formed and the different types of rocks that can be created from the rock cycle. These conversations are a great way to introduce children to the area.



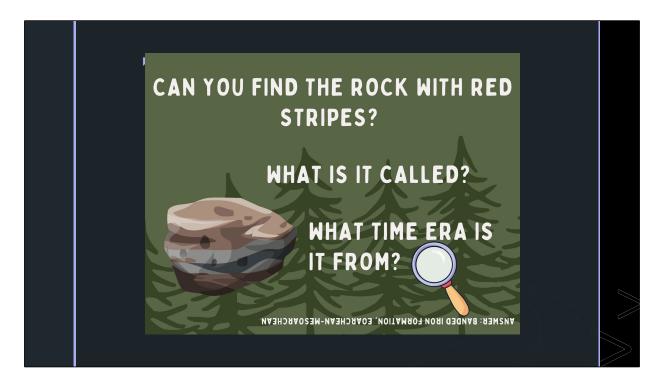
Our main activity will take them all through the rock garden while also asking thought provoking questions. On this first page of the activity, we attempt to encourage explanatory talk, this can be done through the parent explaining how a rock could "live" so long to more scientific explanations of rock formation. Explanatory talk is also co-constructed, this means that there is equal contribution to the conversation from the parent and the child. This co-construction plays into conversational turns as well. In general, explanatory talk provides many opportunities for sophisticated vocabulary usage (Snow & Beals, 2009). The parent could use the question "How old is the oldest rock" to refer to past events that have formed that rock.



The rock garden is much like a museum with each rock and sculpture being put on display along a guided path that children can explore at their own pace. The rock garden is perfect for providing an environment that gives parents plenty of opportunities to name different objects to children. In reference to the third page of our activity, a parent could name the type of rock they are looking for as well as the surrounding features of the rock garden. In the most general sense, activities like these help children and their parents engage in conversation, both casual and learning directed. Both of these interactions are beneficial to a child's development as casual conversations help children learn boarder ways of thinking from those interactions and scientific discussions help children learn different ways of knowing (Callanan, 2012).



On page four of our activity sheet and on almost every other page as well, we provide the child and the parent with various questions such as: "how old is the rock" and "what time period is it from". This is done to both provoke question asking from children and to give the parents an opportunity to answer as well. Creating an activity such as this is perfect for children this age as they primarily ask questions that are information seeking (Kurkul, 2017). Children love to ask questions and the rock garden is a place that prompts many questions. Coupling the interactive environment of the rock garden with this activity creates a wonderful cooperative experience between a parent and their child.



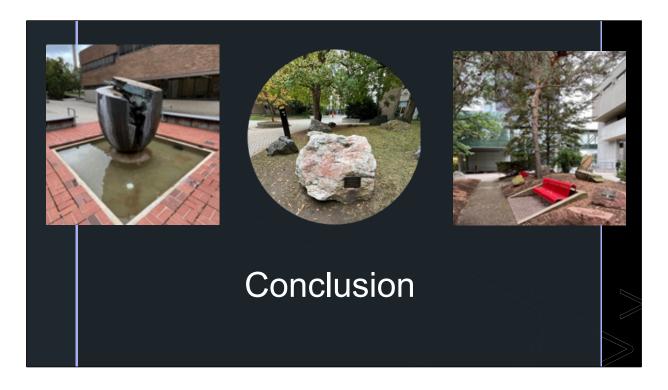
The activities and location we have chosen are aimed to create a situation where the child learns not only information but also ways of thinking from these interactions. The rock garden will elicit conversations about the natural world allowing children to bring their prior knowledge to the learning experience. In this location, parents could say something like "This is a 3,000 year old rock!" while making a personal connection and saying "This rock is even older than your grandparents!" This not only references the concept of age, but can also spark further questions.

| PICK ANY ROCK IN THE GARDEN         |  |
|-------------------------------------|--|
| DRAW A DETAILED PICTURE OF IT BELOW |  |
|                                     |  |
| DESCRIBE YOUR ROCK                  |  |
| 2.<br>3.                            |  |
|                                     |  |

Communication between the child and parent is conducive to learning, especially if parents are prompting the child's questions. Children are more likely to make contributions when they are part of an active conversation, where their input is necessary for the continuation of the interaction. The rock garden is simply a catalyst for this type of situation, providing a natural place where young-minded queries may flourish.



In general the rock garden is a space where children can have fun while also learning. The rock garden combined with our activity prompts all kinds of different types of talk, to help promote the development of new language skills all the way to emotion processing within a fun and interactive environment.



The rock garden is one of the many locations on campus that we encourage parents to come to with their children to promote language development. The university campus provides a safe space for parents and their children to explore. There are plenty of amenities, the campus is easy to navigate and there are lots of places to park as well. Visiting the University of Waterloo campus is a convenient and cost-effective outing for parents and their children.

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