

Ergonomic Assessment

Letter Bags

Concern Details

Task Description:

Letters are sorted by employees into plastic mail bags. There is no indication on how many letters should go into each bag. Employees fill the bags until they are full. Weights of the bags range from 10 – 20 kg. When the bags are full, they are lifted off the hooks which are at a vertical height of 89 cm and a horizontal reach of 28-48 cm to unhook bag. The horizontal reach to when lifting the bag is ~ 30 cm.

Evaluation:

To enable 75th percentile females lift the mail bags safely, the maximum acceptable weight of for the letter bags is lift is 15 kg [1].

Summary:

Lifting the mail bags is a cause for concern and places the worker at increased risk of injury.

Countermeasures

It is recommended to ensure the mail bags weights do not exceed the 15 kg. In order to accomplish this, weight scales would need to be placed under each bag, and once the weight reaches 15 kg, the worker would stop filling the bag.

References

- (1) Snook, S.H. and Cirello, V.M. (1991). "The design of manual handling tasks: Revised tables for maximum acceptable weights and forces." *Ergonomics* 34(9): 1197-1213.

