

February 19, 2015

Final Report on the Joint and Independent Ergonomic Study of the MLOCR

Human Factors North Inc. (HFN), contracted by CUPW and CPC to conduct an ergonomic review of the multi-line optical character reader (MLOCR), submitted its report to the parties at the December 3, 2014 meeting of the National Joint Health & Safety Committee (NJHSC). The final report contains a number of reviews (estimated frequency of sweeping the stackers, estimated range of joint motion, Rapid Upper Limb Assessment (RULA), JACK analysis). With these reviews, HFN ergonomists drew major conclusions from the ergonomic and engineering review of the operation of the MLOCR. These conclusions deal with physical concerns related to the feeding and sweeping tasks, the manner by which work procedures adopted by MLOCR operators can impact musculoskeletal disorder (MSD) risk, as well as the fact that the dimensions of the sweeping stackers do not meet ergonomic design criteria (with respect to the 5th and 95th percentile stature), and that the organization of MLOCR work can impact MSD risk in terms of physical and psychosocial stressors.

These conclusions are not surprising. Upon reading the report and, more specifically, Appendix "A," we can see the problems experienced by MLOCR operators. The 566 surveys filled out in the three work locations under review (Winnipeg, Montreal and Toronto South Central) provide clear and significant data.

- It's worth noting that nearly 89% of respondents expressed concerns about health and safety issues associated with MLOCR work.
- Based on data collected using an outline of the human body, 90% of respondents reported discomfort and pain when working at the MLOCR.
- More than 56% of individuals had been experiencing these problems for more than three months.
- The body parts where pain was experienced were the lower limbs, i.e. the lower back (85%) and knees and feet (59% each). For the upper limbs, discomfort affected the shoulders (83%), elbows (57%), wrists (55%) and upper back (49%).
- Operators found the sweeping work to be the most difficult (66%), compared to 32% for the feeding work.
- Regarding the sweeping work, more than 50% of respondents considered their physical discomfort to be caused by the height of the stackers.

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- As for the feeding work, 61% of respondents had trouble keeping up with the machine's pace and speed.
- Finally, with respect to the suggestions made for improving health and safety around MLOCR work, nearly 40% of respondents wanted improvements in the shift schedule, the rotation of operators, and the machine's pace and performance (productivity).

HFN ergonomists reviewed 270 work injuries reports (195 MSD-related) involving the MLOCR since its implementation. They analyzed the data collected in the surveys and observed 28 volunteers from the three offices. Finally, they proposed solutions to improve MLOCR working conditions. These 26 recommendations were prioritized. They deal with:

- MLOCR dimensions;
- work posture;
- MLOCR manual handling;
- work procedures;
- organization of work and psychosocial stressors;
- work practices;
- work station design (feeding and sweeping)
- machinery, equipment and tools.

At a meeting held on December 3, 2014, the Union asked whether the Corporation would implement the recommendations contained in HFN's report. **The Corporation agreed to implement all recommendations.** The NJHSC will be responsible for overseeing implementation of these recommendations. CUPW insisted on the urgency of the situation, stating that since the MLOCR was introduced in March 2010, our members have been experiencing pain and discomfort on a daily basis.

The Union would like to thank the brothers and sisters in these three locations for their participation, both with the surveys and during workplace observations conducted by the ergonomists. Because of your knowledge of the workplace and your involvement, all workers across the country will benefit from the improvements made to MLOCR work. CUPW will ensure that the Corporation implements all recommendations as quickly as possible.

More information on the recommendation will be sent out soon.

In Solidarity,



Serge Champoux
National Union Representative
Health and Safety

