ABSTRACT

PT Lotus Indah Textile Industries is a textile company which produce yarn as their main product and woven fabric. Most of production processes in this company use automatic equipments, only small part of them done manually, especially in packing department. In this department, most work is Manual Material Handling work. This cause low back pain complaint case around worker. Manual Material Handling is activity to transfer load manually in specific time. This activity still chosen because of high flexibility, low cost, and easy application. But Manual Material Handling can be followed by a risk if applied at inadequate working condition, unsupported equipment and wrong working procedures. This research conducted by giving questioners around workers in packing department to collect information about any complaints along their work day. The questioner result then collected and computed using analytical method to calculate Lifting index value.

From the calculation performed, it can be concluded that Lifting Index value > 3. This provoke over exertion, which cause exaggerate muscle tension. To overcome this, besides proposing right working procedure, we plan to modify existing roller conveyor.

With this modification, Lifting Index value decreased, which in return, worker complaint can be expected to decrease because their reduced work load. Besides, this modification can reduce operational cost because products can be straightly stacked to warehouse without forklift.

Keyword: Manual Material Handling, Lifting Index, Worker complaint