

Ergonomic Analysis of Manual Activities Among Dairy Farm Workers: A Literature Review



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Abstract Agriculture and dairy farming work involves several work related health issues. The work related health problems are more prominent in developing countries like India. Among these health issues, the most critical are musculoskeletal disorders (MSDs) which are most widespread to an epidemic extent. The research aims to scientifically examine the most significant hazardous factors causing MSDs and propose the possible ergonomic solutions. The literature was searched from different databases using different search criteria. The review was restricted to physical health issues among dairy farm workers developed due to heavy load and repetitive tasks in awkward posture. Literature reveal that MSDs creates more prolonged effect on the workforce of developing countries compared to developed counties because of the acquaintance to mechanized dairy operations in developed countries. Dairy farming includes different manual and repetitive activities like milking, feeding cattle, manure cleaning and medical operations. Continuous repetitive activities in uncomfortable postures such as bending, kneeling as well as the use of inappropriate tool design results in the emergence of different MSDs including lower back problems. Prevalence of MSDs and lower back problems was found to be significant which needs a proper ergonomic intervention. The safety and health measures in agriculture and dairy farming business need a global reformulation to enhance awareness on injuries arising and chronic MSDs.

Keywords Dairy farming · Musculoskeletal disorders · Manual material handling · ergonomic intervention

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