

A Study on Determining the Physical Workload of the Forest Harvesting and Nursery-Afforestation Workers

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ABSTRACT This study examines the physical workload, isometric strength and body composition values of workers working in the forestry industry. Researches in 10 different test areas in total were carried out, including 31 workers of forest harvesting and 30 workers of forest nursery-afforestation in The Regional Directorate of Forestry, Artvin (RDF). As the result of the workload measurement conducted on the workers, the physiological workload (%HRR) of harvesting and nursery-afforestation workers was found as 40.9 percent and 32.4 percent on average, respectively. This finding leads to the conclusion that nursery-afforestation workers can be classified as "light-work" workers, whereas harvesting workers must be classified as "medium-weight work" workers. Heartbeat rates for both worker groups during resting (HR_{rest}) were almost identical; however, the heartbeat rates while at work (HR_{max}) were found to be higher in harvesting workers than in nursery-afforestation workers, which suggests that harvesting workers are more challenged at some periods of their work activity.