Energy Balance of Farm Labourers

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KEY WORDS Energy Intake. Energy Cost and Expenditure. Farm Labourers.

ABSTRACT The present study was conducted to find out the energy cost values of different farm and personal activities using 'caltrac' and energy balance of 50 male farm labourers of Agriculture Research Sub Station, Sumerpur, Rajasthan Agricultural University, Bikaner. An interview schedule was developed to collect information about the labourers. Food intake and activity pattern were recorded for three consecutive days by recall method. The daily activity pattern of labourers revealed that they were moderate worker. Energy cost values of farm activities ranged from 21.6 Kcal/15 minutes for removal of seeds from fruits to 51.3 Kcal/15 minutes for bunding. On personal activities energy expenditure ranged from 17.7 Kcal/15 minutes for sitting to 91.4 Kcal/15 minutes for cycling. The mean energy expenditure was 2463 Kcal/day with a mean energy intake of 2085 Kcal/day showing a negative balance of 378 Kcal/day. Energy intake and total energy expenditure was almost same among the labourers of different categories of nutritional status, while energy expenditure on BMR increased significantly with increase in the state of nutritional status by BMI. Findings suggest that labourers will be able to maintain their energy balance and consequently their nutritional status by increasing their energy intake and reducing energy expenditure by the use of labour saving agricultural implements.

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