

## **Effect of Flaxseed Supplementation on Nutrient Adequacy and Iron Status of Coronary Heart Disease Patients**

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**KEYWORDS** Energy. Protein. Fat. Vitamins. Hematological Profile. Hemopoiesis

**ABSTRACT** Sixty at risk of coronary heart disease subjects in the age group of 40-60 years were selected from Punjab Agricultural University, Ludhiana. The subjects were equally divided into three groups i.e. E<sub>1</sub>, E<sub>2</sub> and C respectively. Flaxseed in powdered form was supplemented at the levels of 5 and 10 g to E<sub>1</sub> and E<sub>2</sub> groups respectively for a period of two months, while C group was not supplemented. The effects of flaxseed powder were studied on nutrient and hematological profile of the subjects. After the supplementation, significant ( $p < 0.05$ ) decrease in the energy intake was reported in E<sub>2</sub> group while protein intake significantly ( $p < 0.05$ ) increased in E<sub>2</sub> group and total fat intake reduced significantly ( $p < 0.05$ ) in all three groups. Decrease in energy intake could be due to flaxseed supplementation which is good source of soluble fibre thus gives feeling of fullness and reduced the food intake which ultimately decreased the energy intake. The mean intake of vitamin B<sub>2</sub>, B<sub>3</sub> and vitamin C decreased in all the three groups, though it was non-significant. Further, an increase in haemoglobin was reported in experimental groups which could be due to presence of protein, copper, folic acid and vitamin B<sub>6</sub> in flaxseed which helped in hemopoiesis and thus improved iron status.