SUMMARY

The present study entitled 'A Cross-sectional Study of growth and development in Himachali Rajput females aged 6 to 17 years' has been conducted with a view to describing the pattern and trends in physical growth of Rajput females.

The cross-sectional sample consists of 610 Rajput females in the Kula Valley, ranging in age from 6 to 17 years. The subjects included in the present study are homogeneous regarding sex, geographic location, ethnic stock and socio-economic status. In all 21 anthropometric measurements have been taken on each individual. The anthropometric data on each subject includes ten linear, six circumferential and five skinfold measurements. Information regarding puberal status has also been included.

Statistical methods have been employed to interpret data in numerical terms. Age changes in body proportions have also been observed by calculating 19 indices.

1) Mean growth curves indicate that there is a general increase in body dimensions in Rajput girls with increase in age.

ii) Growth curves for stature, sitting height, trunk height, upper extremity length, lower extremity length and hip circumference show a regular
increase at all age levels. However, growth is rapid between 11 to 13 years. Curves for biacromial breadth, bicipital breadth and chest breadth exhibit a slow but regular increase from 6 to 17 years.

iii) Relative body dimensions of Rajput females depict a considerable change in body form from childhood to adulthood. In general, their body becomes narrower in relation to body breadth; upper and lower extremities grow longer in relation to stature and sitting height and lower extremities grow longer in relation to upper extremities.

iv) The curves for log transformed skinfolds show a fluctuating pattern of growth in years before puberty. The increase becomes rapid during puberty and continues throughout the adolescent phase.

v) The pubescent girls, from 12 to 14 years are considerably heavier, taller and have broader build than the non-pubescent girls of the same age.

vi) Rajput girls from Kulu are shorter and lighter at all growth stages when compared with Rajput
girls of Rajasthan, Rajasthani females of Bikaner and Punjabi girls. However, they show close similarities in growth trends when compared with ICMR values.

vii) The body size and developmental status of Rajput girls has also been compared with American, British, Japanese, Chinese and Jamaican girls of African Origin. Rajput girls are considerably shorter and lighter than American, British, Jamaican and Southern Chinese girls at all stages of growth. However, they show close similarities with Japanese girls regarding body size in younger age groups.