

# Comparison of the subnasal prognathism from the skulls amongst the males and females of Haryana and adjoining states

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## SUBNASAL PROGNATHISM

It is designated as absent, small, medium and large comparing with standardized casts.

## INTRODUCTION

Much attention has been paid to the variations of the shape and size of the human skull and efforts have been made to associate these variations with certain differences, which characterize different races. It is a matter of common experience that in dealing with crania of different racial types. An impression of racial affinity and differences may often be introduced. Skeletal non-metric variables are widely used for such studies. Among the earlier workers there are some of them who worked on non-metric traits to study human cranial morphology. Later the genetic factors and the usefulness of non-metric traits in population studies were conducted by other workers. Manzi et al suggested that these non-metric traits play a significant role in origins and diversification of the anatomically modern human populations (*Homo sapiens sapiens*). In spite of the similarities exhibited on superficial morphological or physical characteristics on various ethnic groups in India, there are considerable numbers of variations observed among the Indians. The current investigations on the human crania that were recovered from various geographical zones of North India will focus on the degree of prominence of subnasal prognathism in Haryana state predominantly.

## MATERIAL AND METHODS

For the present study of shape of external auditory meatus of 150 complete skulls (115 males, 35 females) and equal number of mandibles were used. These bones were retrieved and available in the department of Anatomy, Pt. B.D. Sharma PGIMS Rohtak. Skulls showing obvious pathological deformities were excluded from the study. The age to which these skulls belonged was noted from records, whenever possible and all the skulls were around 40-50 years age at the time of death. Subnasal prognathism of the crania were measured from one system of sexing and population affinity proposed by Larnach, Freedman and Macintosh. According to this system traits were studied by comparing them with standardized casts and sketches and were considered small, medium and large. These standardized casts and sketches are fairly neutral.

Table 1 : Subnasal Prognathism (%)

	Total Series	Females n=36	Males n=114
Absent	6.6	5.5	7.01
Slight	29.33	22.2	31.57
Medium	46.66	27.7	52.63
Large	17.33	44.4	8.77

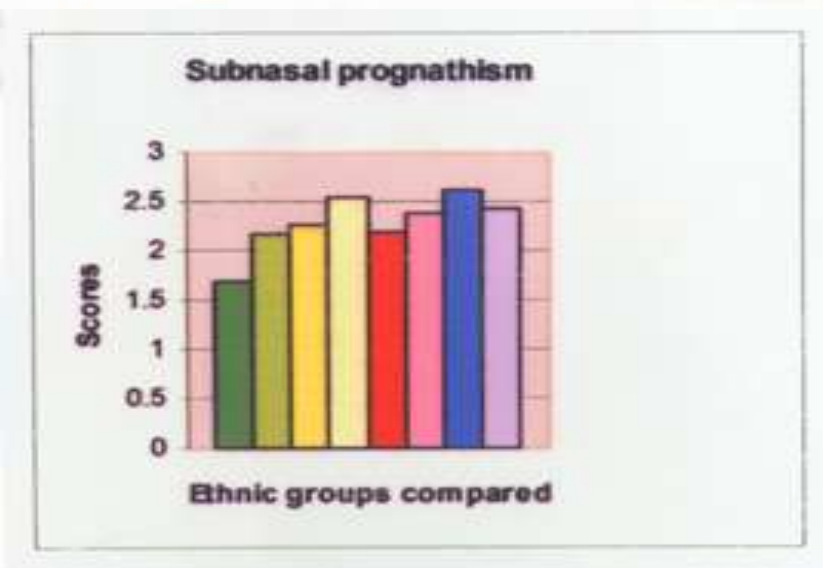
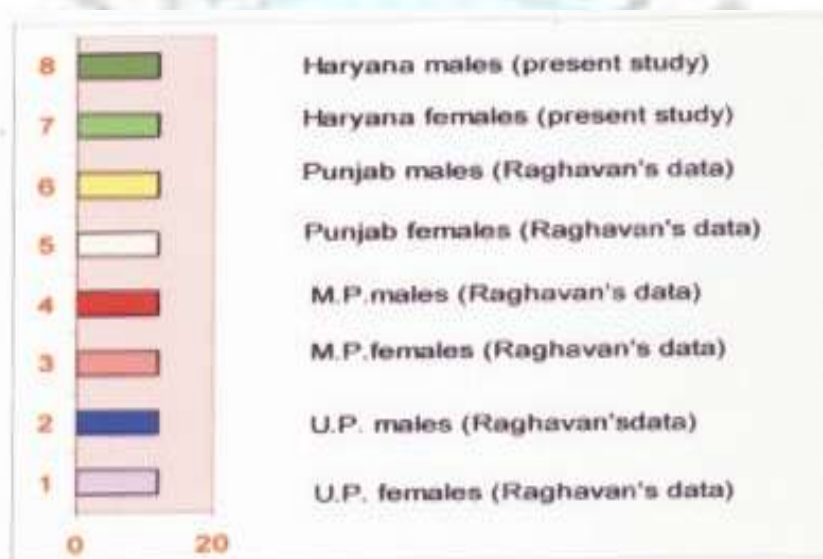
Table 1 shows grades of subnasal prognathism in two sexes in Haryanvi crania.

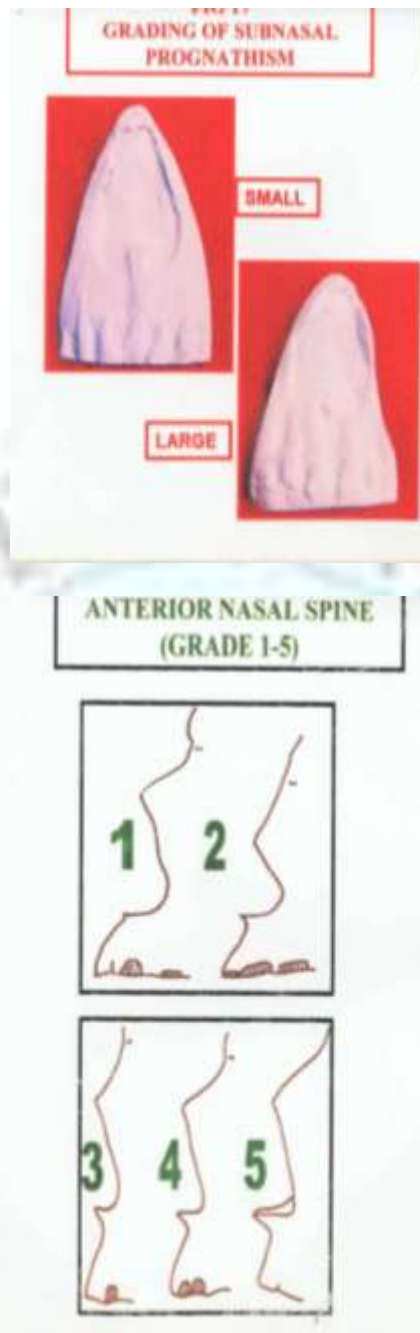
Table 2 : Prognathism in four ethnic groups (Haryana, Punjab, U.P., M.P.)

	Haryana		Punjab		Uttar Pradesh		Madhya Pradesh	
	Males	Females	Males	Females	Males	Females	Males	Females
Subnasal prognathism	1.70	2.16	2.27	2.54	2.20	2.37	2.62	2.42

**Colour scheme in four ethnic groups :**

1. Light blue – UP Females ( Raghavan's data )
2. Dark Blue- UP Males (Raghavan's data )
3. Light Pink – MP Females (Raghavan's data )
4. Red -- MP Males (Raghavan's data )
5. White-- Punjab Females (Raghavan's data )
6. Yellow- Punjab Males ( Raghvan's data )
7. Light Green – Haryana Females ( present study )
8. Dark Green- Haryana Males ( present study )





### **CONCLUSION**

Slight to medium type of prognathism was seen in Haryanvi males while large prognathism was seen in maximum number of cases in females of this region.

### **REFERENCES**

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