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This is a quarterly journal dealing with articles and research findings in various social sciences, developmental strategies and other co-related matters emphasising the problems of the Scheduled Castes and Scheduled Tribes. It also publishes reviews of books pertaining to the aforementioned subjects.

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Contributions based on Anthropology, Demography, Economics, Human Geography, Museology, Planning and Sociology with particular reference to Scheduled Castes and Scheduled Tribes are invited. The articles should be type-written in double space on one side of half foolscap paper. Invariably two copies of the articles should be sent. The contributors should also not forget to send their bio-data in a separate sheet alongwith the article and its brief synopsis. No remuneration is paid to the contributors. Only twenty-five off-prints of the articles are supplied. Two copies of the books should be sent for purpose of review.

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The Birhor



N. Patnaik

Introduction

Many tribes of India depend upon hunting and food gathering for their subsistence. The means of livelihood is such that these hunting communities are invariably nomadic. Some of them have very little contact with any other communities while some others are in contact to some extent and have developed a symbiotic relationship with them. The Birhors, a nomadic tribal community of northern Orissa, fall to the category of such a hunting and food gathering group which has reciprocal economic relations with their neighbouring peasants.

The main concentration of the Birhors is in Bihar where their population was 3,464 as enumerated in the 1971 Census. Their number in Orissa during the same Census period was 98.

It may be noted that the local people identify the Birhors in various ways. In the district of Kalahandi and Sundargarh they are called as Mankidi whereas in Mayurbhanj and Sambalpur districts they go by the name Mankirdia. In fact, both the Mankirdia and the Mankidi are one and the same and they both are none but the Birhors. But in the 1971 Census the Birhor, the Mankidi and the Mankirdia have been enumerated separately because they have been enlisted as separate tribal groups in the list of Scheduled Tribes of Orissa. Taken together the Birhors including the Mankidis and Mankirdias numbered 1,307- persons in 1971 Census.

Their distribution in different districts of the State according to 1971 Census is given in the Table 1.

TABLE 1

Distribution of Birhors

Sl. No.	Name of the district	Total population
(1)	(2)	(3)
1	Sambalpur	.. 241
2	Sundargarh	.. 221
3	Keonjhar	.. 104
4	Mayurbhanj	.. 486
5	Balasore	.. 41
6	Balangir	.. 23
7	Koraput	.. 22
8	Cuttack	.. 4
9	Kalahandi	.. 154
10	Ganjam	.. 11
	Total	.. 1,307

The reason for calling Birhors as Mankidi or Mankirdia is that they are skilled in catching monkeys. When the monkeys create havoc

in the rural areas and destroy crops, fruits and vegetables, the local people employ the Birhors to catch and kill them. The Birhors belong to the Austro-Asiatic language group and according to their mother tongue the Birhor means men (Hor) of the forest (Bir). They are dark skinned, short statured, long headed, wavyhaired and broad nosed people.

There are two types of Birhors—the Uthul, i. e. nomadic Birhors and the Jagi, i. e. settled Birhors. It is to the nomadic section of the tribe that our attention is directed in this report. The Birhors move from place to place in different groups in a specified area within the State.

Each group comprises on an average 10 to 15 households. Some of the households may be related to one another by blood and others by marriage. A Birhor camp is called Tanda, which is generally set up in a place close to the forest and near some market centre and peasant village.

Material Culture

The Birhors distinguish three seasons in a year; rainy season, winter season and summer season. The change of place is frequent in summer season than in other two seasons. In fact, the Birhors stick to a place where they set up their *Tanda* and stay for all the four months

A list of the places where the Birhors of our observed group generally set up their *Tanda* in different seasons is given in Table 2.

in the rainy season (June to September). Their *Tandas* located in a place which is very close to a market centre and also to the mountain ranges covered with thick forest. With the destruction of the forests, it is becoming very difficult now a days to find such a place. Under such circumstances nearness to the market centre is given more preference to that of the forest while selecting a place for setting up the *Tanda*.

In winter season the Birhors feel the need for changing the camp two or three times. But such changes are more frequent in the summer season because of shortage of food supply in a particular place. The barks of *Siali* creepers which is the main forest produce to which their subsistence and livelihood is intimately attached are available in plenty in rainy season and therefore shifting of *Tanda* is not necessary in this season.

The situation in the summer season is different. In this season the forest growth is affected by the hot sun and forest fire. Moreover, the wanton destruction of the forest by some tribal communities who practise shifting cultivation and by the non-tribal people who gather fuel-wood from the forest make it difficult for the Birhors to get the required amount of bark in one place and therefore they are forced to change their camp two or three times.

TABLE 2

Seasonal change of locations of Tanda

Sl. No.	Name of the place of Tanda	District	Season
(1)	(2)	(3)	(4)
1	Nilgiri	Balasore	Rainy
2	Kendumundi	Mayurbhanj	Rainy
3	Melana	Keonjhar	Rainy
4	Satkosia	Mayurbhanj	Winter
5	Dhokota	Keonjhar	Winter
6	Gudabhanga	Mayurbhanj	Winter
7	Dongadiha	Mayurbhanj	Winter
8	Hathikocha	Keonjhar	Winter
9	Nadinocha	Keonjhar	Winter

Sl. No.	Name of the place of Tanda	District	Season
(1)	(2)	(3)	(4)
10	Marichapal	Keonjhar	Winter
11	Tamaka	Keonjhar	Summer
12	Kaliapani	Cuttack	Summer
13	Angul	Dhenkanal	Summer
14	Daitari	Keonjhar	Summer
15	Nandara	Keonjhar	Summer
16	Patalikota	Keonjhar	Summer
17	Harichandappur	Keonjhar	Summer
18	Janghira	Keonjhar	Summer
19	Jaikeshi	Keonjhar	Summer

The Birhors make their huts in leaves. A hut which is called 'Kumbha' is conical in shape having an oval shaped base covering in circumference about 50 feet living space inside. The height of the *Kumbha* at the centre is 5 feet.

There is an entrance in the middle on the long side of the hut which is three feet in breadth. The *Kumbha* is divided into three compartments. On the right side of the entrance is a space set apart for the Kitchen. During rains when cooking is not possible outdoors the foods are cooked at this place. The central part is used for sleeping. On its left side there is a place which is used for storing things. In the rear portion of the hut, the goat-pen is present on the right side and the fowl-pen is present on the left side. The pet-dog of the family finds its place either in the sleeping portion or in the rear end of the hut according to its convenience. A door called *Bagdir* made of twigs woven in leaves is used to close the entrance when the family members are out on hunting and gathering in the forest.

The *Kumbha* is made of saplings thatched with twigs having leaves. A wooden beam supported by two forked wooden poles which are stuck to the ground holds the frame of the *Kumbha* in position. Rafters are laid on either side of the beam are covered with twigs with leaves. Wooden splits one inside and the other

outside the *Kumbha* are tied to each other by means of *Siali* barks to keep the rafters intact. The hut is thatched very skillfully to make it rainproof.

A household has its own *Kumbha* in which parents and children sleep at night. In addition to individual *Kumbhas* there are two other types of *Kumbhas* in every Birhor *Tanda*. One *Kumbha* known as *Dhingala* is used by the unmarried boys for sleeping at night and the other *Kumbha* known as *Kudi Ada* is for the unmarried girls.

The *Tanda* is heterogeneous in clan composition and each clan has a small hut of its own set apart as the Shrine of the clan deity. The clan members offer food and worship the deity in this place.

As the Birhors lead a nomadic style of life they keep their household belongings to the minimum so that they can move from place to place conveniently. The Table 3 gives a list of their household articles, domesticated animals, processed products and miscellaneous items of objects which were found in a *Tanda* during our field work. This inventory concerns five Birhor households of a *Tanda* which was located at Kendumundi, a multi-caste village 17 Kms. away from Karanjia on the Karanjia-Thakurmunda road in Mayurbhanj district.

TABLE 3

Inventory of household belongings

Name of the item	Guni Mankirdia	Ram Das Mankirdia	Akala Mankirdia	Kailas Mankirdia	Kasia Mankirdia	Total
(1)	(2)	(3)	(4)	(5)	(6)	(7)
<i>Food-stuffs</i>						
Rice ..	2 Kgs.	1 Kg.	3 Kgs.	2 Kgs.	3 Kgs.	11 Kgs.
Oil ..	100 Gms.	50 Gms.	200 Gms.	100 Gms.	250 Gms.	700 Gms.
Maize ..	..	..	..	..	1 Kg.	1 Kg.
Spices ..	Rs. 2	Re. 1	Rs. 3	Rs. 2	Rs. 3	Rs. 11
Dried monkey meat	1 Kg.	..	2 Kgs.	—	1 Kg.	4 Kgs.
<i>Processed Products</i>						
Rope ..	20 Mtrs.	..	..	10 Mtrs.	20 Mtrs.	50 Mtrs.
Broom ..	1	1	..	..	1	3 Nos.
Sling ..	2	1	1	1	2	7 Nos.
Halter ..	1	2	1	3	2	9 Nos.
Mat ..	1	2	2	2	6	13 Nos.
Net (Monkey-catcher)	1	1	2	1	1	6 Nos.
Net (Squirrel-catcher)	1	1	..	1	1	4 Nos.
<i>Adornments</i>						
Ornament ..	1 Pair ear-ring (rolled gold)	..	1 Necklace (rolled gold)	..	..	..
Talcum powder	1 Pkt. (50 Gms.)	—	1 Pkt. (50 Gms.)	..	..	2 Pkts. (100 Gms.)
Clothes (in pieces)	6	6	8	6	7	33 Pieces
Comb ..	..	1	..	..	1	2 Nos.
<i>Animals and Birds</i>						
Goat ..	1	8	2	3	4	18 Nos.
Poultry ..	..	1	2	..	4	7 Nos.
Dog ..	..	..	2	1	1	4 Nos.

Name of the item (1)	Guni Mankirdia (2)	Ram Das Mankirdia (3)	Akala Mankirdia (4)	Kailas Mankirdia (5)	Kasia Mankirdia (6)	Total (7)
<i>Utensils</i>						
Cooking Vessels (big).	2	1	2	3	2	10 Nos.
Cooking Vessels (small)	2	2	2	..	1	7 Nos.
Aluminium utensils.	..	3	3	4	4	14 Nos.
Bell bowl	..	..	..	..	2	2 Nos.
<i>Tools and weapons</i>						
Knife	2	2	1	1	1	7 Nos.
Axe	2	4	2	2	2	12 Nos.
Wooden flattened stick.	3	2	..	..	4	9 Nos.
Vegetable cutter	..	..	..	..	1	1 No.
<i>Miscellaneous</i>						
Ladle made of coconut shell.	..	1	..	..	..	1 No.
Bamboo (big) basket.	2	3	2	2	4	13 Nos.
Monkey hide	2	1	..	..	2	5 Nos.
<i>Bamboo (Small)</i>						
Basket	1	1	..	1	3	6 Nos.
Bottle	4	3	..	2	1	10 Nos.
Bag	1	..	..	..	1	2 Nos.
<i>Container</i>						
Made of net	1	..	1	1	..	3 Nos.
Snail shell	20	..	..	..	..	20 Nos.
Peacock tail	1	..	..	..	2	3 Nos.
<i>Low wooden</i>						
Stool	1	..	..	..	2	3 Nos.
Fuel	5 Kgs.	..	10 Kgs.	..	5 Kgs.	20 Kgs.
Lamp (earthen)	1	1	..	1	1	4 Nos.
Bolster	1	..	..	..	5	6 Nos.
Bamboo yoke	1	2	1	1	2	7 Nos.
Grain measuring pot.	..	1	..	..	2	3 Nos.
Sac	..	..	1	1	1	3 Nos.
Musical Instrument.	..	..	3	..	3	6 Nos.

Name of the item	Guni Mankirdia	Ram Das Mankirdia	Akala Mankirdia	Kailas Mankirdia	Kasia Mankirdia	Total
(1)	(2)	(3)	(4)	(5)	(6)	(7)
Water container...	3	...	2	..	2	7 Nos.
Halter meant for goat.	1	8	2	..	4	15 Nos.
Umbrella (cloth)	1	..	..	1 No.
Glass	1	..	..	1 No.
Bamboo stick	1	..	..	1 No.
Torch	1	..	..	1 No.
Spoon	2	..	2	4 Nos.
Leaf cups and plates.	2	..	10	12 Nos.
Plate (Aluminium)	1	5	6 Nos.
Match box	1 Pkt.	1 Pkt.
Herbal medicines	1 Boxful	1 Boxful

Economic life

The main occupation of the Birhors is the making of ropes out of the bark of Siali creepers (Lama Bayer), which are used for different purposes. A list of the types of ropes and cost per unit and the manner of use is given in Table 4.

TABLE 4
Outurn of ropes made by Birhors

Sl. No.	Local term	Birhor term	Cost per unit	Use	Daily outurn
(1)	(2)	(3)	(4)	(5)	(6)
1. <i>Sika</i> (Sling)	..	<i>Sikur</i>	Rs. 5.00 per pair.	Attached to carrying pole for carrying things on shoulder.	2 pairs per head.
2. <i>Pagha</i>	..	<i>Pagha</i>	Rs. 1.00 per piece.	Rope for tethering cattle ..	20 pieces per head.
3. <i>Barkai</i> (Rope for drawing water).	..	<i>Barehi</i>	Rs. 4.00 per piece.	Used for drawing water by means of water pots from wells.	10 pieces per two persons.
4. <i>Pandachhati</i> (Halter for buffalo)	(Halter	<i>Kadadogha</i>	Rs. 5.00 per two pieces.	Rope in which buffaloes are tethered.	8 to 10 pieces per head.
5. <i>Chhelipagha</i> (Halter for goat).	(Halter	<i>Meromloda</i>	5 paise per piece.	For tying goats	.. 20 pieces per head.
6. <i>Jaunli</i>	..	<i>Dhaunri</i> ..	Rs. 2.00 per four pairs.	For tying cattle at the time of harvest.	10 to 12 pieces per head.

The Birhors also make small baskets (Tupa) out of the *Siali* bark which are used for pressing oil seeds. Except the baskets and the ropes used for tying the buffaloes which cannot be prepared by women, all other types of ropes are made by both men and women. One load of *Siali* barks is sufficient to turn out ropes and baskets worth Rs. 20 and a person can exhaust a single load of barks in two days. On an average a Birhor turns out finished products of barks, worth Rs. 10 to Rs. 12 per day.

The animals and birds which the Birhors are fond of keeping at home are goats and chickens. They keep these animals and birds to sell in the market for cash and to offer them to their deities on ritual occasions.

The Birhors are skilled monkey catchers. They use nets made of *Siali* creepers for catching monkeys. They eat the flesh of the monkey and sell the skin for cash. Use of turmeric in the preparation of curry out of monkey's flesh is a taboo among the Birhors. It is believed that the use of turmeric will make them unsuccessful in their monkey hunting. Sometimes they catch birds with the help of snares, and squirrels, hares and deer with the help of traps and nets. The birds and animals caught are generally disposed of in the neighbouring villages or at the market place for cash.

Many Birhors know how to do the weeding, transplanting and harvesting of paddy and find employment in agricultural labour during such operations. In many places they earn substantial amount of money from this sources. Sometimes they collect roots and tubers, fruits and flowers from the forest for consumption purposes. But

there are other types of forest products such as resin which they collect for selling to the local people for cash. They also catch mongoose and peacock and sell them to the local people who like to keep them as pet animals and birds.

The staple food of the Birhors is rice. With the sale proceeds of ropes and forest produce they buy their weekly requirements of rice, corn, millet and other things from the market. They collect various types of green leaves from the nearby places and mushrooms and various types of fruits such as *Kendu*, Jack-fruit and Mango from the forest for their own consumption. Whenever time permits during their trip to forest for collection of barks, they dig out roots and tubers and also collect honey which supplement their principal cereal diet.

In many places cocoons are available in forest and the Birhors are well acquainted with these places. The cocoons add to the income of the Birhors in the form of cash which they use for buying clothes.

Although the Birhors tap different sources for their livelihood they run deficit of their food supply almost every year. During the scarce period they eat mango kernels which are preserved at home for use in such difficult times.

The weekly budget of a Birhor family may throw more light on their living conditions. For this purpose the weekly income and expenditure of the family of Sandu Mankirdia stationed at Kendumundi is given below. The budget relates to the period from 19th to 25th August, 1984. The family of Sandu Mankirdia comprises his old mother, brother and brother's wife and his daughter.

The income of the week was drawn from the following sources—

1. Sale of bark products—

(a) <i>Tuppa</i>	..	4 Jhala (12 pieces)	..	Rs. 20.00
(b) <i>Sika</i>	..	3 Pairs	..	Rs. 15.00
(c) <i>Pagha</i>	..	4 Pieces	..	Rs. 4.00
(d) <i>Pandachhati</i>	..	3 Pairs	..	Rs. 15.00
(e) <i>Chhelipagha</i>	..	4 Pieces	..	Rs. 2.00

2. Income from wage earned by sandu's daughter—9 *pailas* of paddy .. Rs. 11.25

3. Saving from previous week .. Rs. 12.00

Total .. Rs. 79.25

Items of expenditure are as follows—

1. Food stuffs	..	Rs. 20.00
Rice 6½ Kg.	..	Rs. 0.50
Dal	..	Rs. 2.00
Brinjal	..	Rs. 0.50
Potato	..	Rs. 0.25
Onion	..	Rs. 0.50
Spices	..	Rs. 0.25
Salt	..	Rs. 0.50
Mustard oil	..	Rs. 10.00
2. Drink	..	Rs. 2.00
3. Items of fried-food and mutton curry taken with wine	..	Rs. 1.25
4. Tiffin	..	Rs. 13.00
5. Clothes and ornaments	..	Rs. 0.50
6. Tobacco	..	Rs. 0.40
7. Kerosene	..	Rs. 51.75

	Total ..	Rs. 51.75

The Birhors do not have any staple income from week to week. The maximum amount of weekly income is of the order of Rs. 60 and the minimum Rs. 20. A Birhor family having five members like that of Sandu Mankirdia needs at least 7 Kgs. of rice per week which costs Rs. 20 to Rs. 25. This means that when the weekly income is limited to Rs. 20 to Rs. 25 the Birhors purchase rice much less in quantity than what is required per week in order to buy other items which are badly needed in daily life.

Among the Birhors a man needs three pieces of cloths annually for his use. One piece is worn, another piece is used for covering the body and in case the cloth which is worn gets wet it is replaced by the third piece which is kept at home. A piece of cloth costs Rs. 12 to Rs. 15 and a man needs about Rs. 40 annually towards the cost of his cloths. In case of a woman she needs only two pieces in a year which costs Rs. 60. The male folks have now started wearing shirts and the female folks petticoats and blouses which increase the expenses of the Birhors on clothing. A woman wears bangles and hair-pins to keep the tassel in position in the hair bun.

The Birhors use different types of oil for different purposes such as cocoanut oil used in the body and also for dressing hair, mustard oil for cooking food and *Mohua* oil (Tola) for lighting lamps. The Birhors are conversant with the techniques of extracting oil from *Kusum* and *Mohua* seeds by using wooden oil press. The process of extraction is that they break the seeds in to small pieces and boil them. Thereafter the boiled powdered seeds are kept in small baskets. Two fully filled in baskets are kept one upon the other and both are kept between the two planks of wood which comprises the oil press. One end of these two planks is tied tightly and inserted into a groove made for this purpose in a tree and the other end of the lower plank is kept to rest on a big piece of stone above the ground and the filled-in oil-seeds baskets are pressed by lowering the upper plank so as to tightly press the baskets until the oil comes out.

One end of these two planks is tied tightly and inserted into a groove made for this purpose in a tree and the other end of the lower planks is kept to rest on a big piece of stone above the ground and the filled-in oil-seed baskets are pressed by lowering the upper plank so as

to tightly press the baskets until the oil comes out. The oil which is extracted from the seeds is collected in an earthen pot which is kept below on the ground.

The Birhors use earthen vessels for cooking food. They also use earthen pitchers for storing water. They buy these earthen vessels from the weekly market from the potters on payment of cash. A big earthen pot costs Rs. 3 and an earthen pitcher costs Rs. 1.50. A household needs two pitchers and two or three earthen pots. They go on using these vessels until they break. Generally, two earthen pitchers and two to three earthen pots which are required in the minimum in a Birhor family having four to five members, last for three to four months. During the transit from one *Tanda* to the other the belongings which are carried by them to the new camp include the earthen vessels.

Aluminium pots and pans are in use in all the Birhor households. One bowl, one plate and two to three cups constitute the aluminium vessels in a Birhor family. Leaf cups are still common in all the Birhor households for taking cooked food. Brass pots and plates are almost conspicuous by their absence among them. Inventory of household articles in a Birhor *Tanda* located at Kendumundi shows that there were only two brass plates found in the whole of that *Tanda*.

Bamboo baskets are needed to store things at home. The Birhors get the baskets at the weekly market from the basket makers on payment in cash. A basket of minimum size costs Rs. 2 and two baskets of this size last for a year or so. The Birhors use mats for sleeping. Palm leaves are used for weaving the mats which is the work of the women.

The Birhors of Kendumundi *Tanda* don't know the use of bow and arrow and therefore do not have them. The only weapon which has multipurpose use is axe. Local blacksmiths supply these axes and an axe costs about Rs. 5 and lasts for about five to seven years. It is sharpened periodically by the local blacksmiths on the market-day and each time it costs 50 paise per sharpening. In some houses people have knives. A knife costs Re. 1 and is used for peeling of the bark from the *Siali* creepers.

Cloth umbrella is a new household item which may be found in one or two households in a *Tanda*. For instance, there were only two

such umbrellas found in two households out of a total of nine households which comprise the Birhor *Tanda* at Kendumundi. The people use country lamp fed with kerosene in all the households. But a few of them use lantern. The inventory shows that there were two lanterns in the *Tanda* at Kendumundi. The lantern requires kerosene worth 50 paise per night whereas the house can be lighted for two nights with a country lamp at the same costs.

The Birhors have neither mortar and pestle nor country husking lever. Whenever they get the wages in paddy, they dry it at home and thereafter take it to some house in the nearby village to get it husked.

Our observation of the economic life of the Birhors shows that they lead a life which is full of hazards and hardships and below the level of subsistence. Even though they live from hand to mouth they appear to be very joyful and contented. Almost in every evening both the boys and girls join together and spend time in singing and dancing in accompaniment of music from flute and drum.

Social Organisation and Social Control

The family which is the smallest social unit among the Birhors is invariably of nuclear type. It comprises father, mother and unmarried children. In some cases either the widow mother or the widower father lives with their married son in his family. The grown-up sons and daughters work for the family with their parents until they are married. But they sleep at night in their respective dormitories.

The next higher social unit is clan which regulates marriage. Clan is exogamous and any sexual union within the clan is incestuous. Our study of the Birhor *Tanda* located at Kendumundi shows that it was composed of the following five clans.

1. Singhkili
2. Hembrum
3. Nagpuria
4. Majhi and
5. Sikria

As the *Tanda* is multi clan in composition, interclan marriage within the *Tanda* is in vogue among the Birhors. The genealogy which was collected from different households of this *Tanda*

shows that the male members have brought their wives from several *Tandas* such as Dhardhara and Mahuldia of Mayurbhanj district, Nilgiri of Balasore district, Dhudaram and Ghatgaon of Keonjhar district, Kaliapani and Tamka of Cuttack district and Kamakhya Nagar of Dhenkanal district. Cross cousin marriage is not practised among the Birhors. But marriage of Sororate and Levirate type are in vogue.

Whenever the people of a *Tanda* want to shift to a new place all the households of the *Tanda* move en bloc and set up their *Tanda* there. Before the huts are constructed, a ritual is performed by sacrificing two goats and five chickens and offering prayers to ancestors. A man can leave his parent *Tanda* at will and join a new *Tanda* elsewhere. There will be none to obstruct him from leaving the old *Tanda* and joining the new one. He is also at liberty to return to his parent *Tanda* at will where he will be received by the inmates of the *Tanda* cordially. It is the practice that the new comer offers drink to the people of the *Tanda* and to the *Tanda* headman for their acceptance of his coming and living with them in the *Tanda*.

There is a headman in each *Tanda* who is called *Mukhya* or Big man and this post is normally handed down from father to son. The *Tanda* headman combines with him the functions of religious headman (*Dehuri*) and in this capacity he worships the deity and associates in all the ritual performances. There is no system of any payment to the Secular-cum-Religious headman for the services rendered by him. But some times he is given wine and tiffin particularly on market days by his *Tanda* members as a gesture of fellow feeling, generosity and hospitality. It is noteworthy that harmony and friendship is maintained throughout among the households in a *Tanda*. If any conflict arises between some households, the *Tanda* headman settles such conflicts through his personal intervention and arbitration.

The Birhors follow the practice of social boycott which is called *Chindal* or Began. The person who is kept under boycott is not allowed to mix with others and all kinds of help which he was ordinarily getting from others are withdrawn. It is a sort of punishment for a correct measure to bring a deviant or any person suffering from certain ritually unclean illness back to the normal position.

The situation which invokes social boycott is incestuous sexual union between brother and sister or persons belonging to the same clan. Persons who commit such offences are kept segregated until they pay the fines levied on them by other members of his *Tanda*. Generally, the fine comprises 1 Kg. of rice, some turmeric and Rs. 10 in cash. The ritual involved for readmitting the deviant into the *Tanda* includes clean shaving of his head and giving him a clean bath.

When any person develops maggots in the sore of any part of the body, this person is also put under social boycott until the sore is headed and the above mentioned ritual is performed accompanied with a common feast in the *Tanda*. The person who was put under boycott meets the expenses of the ritual and feast.

As regards the inter-caste and inter-dining the Birhors eat cooked food in the houses of Santals and Kolhas but the reverse is not in vogue. The communities which they avoid in this respect are Muslims, Harijans and Kharias. Any breach of the commensal rules leads to social boycott and the consequence arising therefrom.

Life Cycle

The Birhor idea of life is a continuous process from birth to death through infancy, adolescence, youth marriage and old age and lastly death. He regards himself as the supreme creation of earth and has been bound by supernatural influences. The death, which brings life to an end takes him to the unseen world where a man is transformed into spirit and starts influencing the human beings of this world.

Birth

The birth of a baby is a matter of great rejoicing among the Birhors. Pregnancy is very much welcome. An important woman is considered inauspicious. A couple having children enjoy a higher status than a childless counterpart in Birhor society. The father is addressed as *Aba* and the mother as *Mai* and those who are addressed as such feel proud of themselves whereas those having none to address them as such feel depressed. When a baby is born in a Birhor household, it is believed that one of the ancestors has taken rebirth and therefore the family's fortune and well-being have come back with greater potency and vitality. Among the Birhor a male child is preferred to a female child because the latter leaves her parents after marriage and therefore is of limited economic utility.

Some of the symptoms of pregnancy are stoppage of menses, feeling of weakness and nausea. With the abdominal protuberance, the pregnancy becomes conspicuous. During pregnancy a woman observes some restrictions and is relieved from doing hard work and cooking particularly in the advanced stage. Most often she is not allowed to go outside or come in contact with dead body and move near the shrine (Sal). She is forbidden to take consecrated meat. While going out of her house she must cover herself completely with her clothes, least enemies or persons with evil eye should do her some harm.

As soon as the woman feels labour pain, an old woman of her lineage having experience in delivery is immediately called for. In difficult cases some herbal medicines are given to the pregnant woman. As soon as the child is born the old woman who was attending on her informs the husband thereafter, and it takes no time for others to know about the birth of the child. The umbilical cord of the child is cut by means of a sharp snail.

After birth, the mother and the child are considered unclean. It is interesting to note that with the birth of a child the whole *Tanda* comes under ritual pollution as does the family in which the birth took place. The whole *Tanda* is considered impure and all the rituals are suspended for the period. On the 7th day the *Dehuri* (Priest) comes and performs the ritual which is meant for the final purification of the *Tanda* members and for the preliminary purification of the new child and his parents.

On the 21st day a ritual is observed and only the kin members are invited to participate. On this day the mother is led to the nearby source of water where her women relatives smear her with turmeric paste mixed with *Mohua* oil and all the accompanying women take ritual bath there and return to her house. Coming to the house she throws the old used earthen pots and cooks in new pots which have been brought previously. The father shaves the baby with a razor. In the meantime the *Dehuri* worships the clan deity and the supreme deity *Logo Bir* and *Budhi Mai* and a black cock and a white one are sacrificed. The sacrificial meat is cooked and a small feast is arranged. On the following day a name is given to the

baby by the elderly women of the *Tanda* and another feast is arranged to feed the assembled relatives and guests.

Marriage

Marriage is considered a significant event in one's life. One cannot think of adult life without being married. The marriageable age in the case of a girl is 14 to 18 years and in the case of a boy is 20 to 25 years.

In a marriage ceremony the girl's parents meet all the expenses and the boy's parents pay the bride price which comprises Rs. 12.00 and three pieces of clothes. The guests and relatives invited to the marriage ceremony contribute according to their might.

There is no specified month in which the marriage takes place. Generally the best time for marriage is after the rains when people have some savings in hand and the guests and relatives are entertained without difficulty. Before marriage the boys and girls have to spend at least two years in their respective dormitories and there after the marriage is thought of. Most of the marriages are of arranged type in which negotiation is held between the parents of the bride and the bridegroom to settle details regarding the bride price, the date of marriage, the number of guests and relatives to be invited and the bridal feast.

The day on which the marriage takes place, the bridegroom's party consisting of bridegroom, his friends and relatives come to the bride's house. The marriage is solemnized there in the presence of the *Tanda* elders. The Bridegroom smears vermilion on the forehead of the bride which symbolises solemnization of marriage. The bride's father provide cooked food and drink to the bridegroom's party.

The family observes mortuary pollution for a period of ten days. On the tenth day, the head of the household (male member) goes to the burial ground and calls the spirit to his own hut and sets fire to the small leaf hut erected there for the spirit. An earthen lamp is kept burning and is covered under a winnowing fan in the house till he comes. As soon as the man bearing the spirit enters the house, the light under the winnowing fan goes out which indicates the entry of the spirit of the dead into the hut.

Sometimes in the mid-day all the lineage members and the pall-bearers get purified by the *Dehuri* (priest) who arranges a ritual in front of the shrine of the clan deity (*Ora bonga*) and sacrifices a cock and offers *mohua* wine and cooked food.

Thereafter, he sprinkles water all over the *Tanda* and over the lineage members. In the evening a feast is arranged and the elderly persons of the *Tanda*, lineage members and other invitees participate in the feast. After the feast is over, all the invitees give consolation to the members of the bereaved family and leave for their respective *Tandas*.

The boys and girls of both the parties dance and sing in great joy and happiness to the tune of their drums and other musical instruments. After the marriage ceremony is over, the bride and the groom with the party return to the latter's *Tanda* where the father of the groom arranges a feast for them.

Death

When the death of a person takes place in any house, other members of the house send the news to all the people of their lineage. The natural death according to the Birhors, is that which comes when a person is very old. If any person dies prior to the old age it is believed to be due to the machination of the evil spirits and sorcerers. On getting the death news the near and dear ones come to console the bereaved family and make necessary arrangements for the burial of the corpse. The women-folk smear turmeric paste on the face of the dead body and a piece of new white cloth is covered all over. A wooden frame of the type of a ladder is made and the dead body is laid on it and is carried to the burial ground (*Gachhad*) by four lineage members and other accompany them.

A trench of about six feet into three feet into five feet in dimension is dug by the relatives in the burial ground. It is dug in such a way that the head can be kept in the south-west direction.

The new white cloth is spread on the floor of the trench on which the dead body with face upward is laid. Thereafter the trench is filled up with soil. Big stones are kept on the pit so that the jackles and other animals may not dig out and eat up corpse.

After the burial is over all the pall-bearers and the accompanied members go to a place, where water is available and take bath there.

Religious beliefs and practices

The Birhors believe in many gods and goddesses. According to them some of these supernatural beings are benevolent and others malevolent who create trouble and cause illness and death. They also worship their ancestors at home on several ritual occasions. Generally, ancestor worship is practised with the purpose of enjoying good health and for being successful in hunting and collection of forest produce without meeting any accident.

Logo Bir and *Budhi mai* are the two main and supreme deities of the Birhors. It is believed that their abode lies in the thicket of Similipal hill ranges and they are worshipped in different months particularly in the months of *Aswina* (September-October) and *Pausa* (December-January). In the month of *Margasir* (November-December) the ancestors are worshipped at home and in the month of *Bhadrab* (August-September) a deity called *Karma Thakur* is worshipped. The main idea of worshipping such deities is to get their blessings for the general well-being of the people and for getting food all the time and also for achieving success in their various economic activities without falling into any accident and illness. Table 5 and Table 6 give description of different deities and the months in which they are worshipped.

Every clan has its own clan deity for which a small leaf hut is constructed in the *Tanda* and food and prayer are offered to the clan deity on all ritual occasions.



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TABLE 5

Sl. No.	Name of the deity	Direction in which deity's abode is located	Name of the worshipper	Ritual designation of the worshipper	Village to which worshipper belongs	Month in which deity is worshipped	Articles of offering	Purpose of worship	REMARKS
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)
1	<i>Logo Bir</i> (The supreme deity)	North-West direction of the village Kendumundi i. e., somewhere in the Simlipal forest.	<i>Dehuri</i> and other members of all the Bansas.	<i>Dehuri</i> as also, every head of the household.	Male members of all the <i>Taridas</i> .	November-December.	Ten cocks and two bucks are sacrificed on behalf of all the <i>Tanda</i> members.	Overall well-being.	<i>Logo Bir</i> and <i>Budhi Maj</i> are the husband and wife and others except <i>Chandi</i> are their children. They all have a society of their own. The <i>Dehuri</i> of the <i>Tanda</i> worships these deities on behalf of all people of the <i>Tanda</i> . All the family members of <i>Logo Bir</i> serve as the custodian of the <i>Birhor</i> society and provide security, food and drink to the people. They also save the people from danger and other calamities. As the people say, "we are moving in dense forest and have no permanent settlement. There is none to help us when we are in distress and in danger. You are our everything, we pray you to keep us out of danger and mishap and grant us good health and long life".

Sl. No.	Name of the deity	Direction in which deity's abode is located	Name of the worshipper	Ritual designation of the worshipper	Village to which worshipper belongs	Month in which deity is worshipped	Articles of offering	Purpose of worship	Remarks
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)
2	<i>Budhi mai</i> (Wife of Logo Bir,	N o r t h - West.	<i>Dehuri</i> and other members of all the <i>Bansas</i> .	<i>Dehuri</i> as also every head of the household.	Male members of all the <i>Tandas</i> .	November-December	Ten cocks and two bucks are sacrificed on behalf of all the <i>Tanda</i> members.		Brings good luck and good health to children.
3	<i>All Mai</i> (Daughter heir).	Ditto ..	Ditto	Ditto	Ditto	Ditto	Ditto		Overall well-being. No such specific reason worshipped as the daughter of Logo Bir and <i>Budhi mai</i> .
4	<i>Sita Mai</i> (Daughter of Logo Bir).	Ditto ..	Ditto	Ditto	Ditto	Ditto	Ditto		
5	<i>Bhandar Bir</i> (Son of Logo Bir).	Ditto ..	Ditto	Ditto	Ditto	Ditto	Ditto		Brings success in catching monkey.
6	<i>Chandj</i> (Not a member of Logo Bir family).	S o m e - where in Similipal hills.	<i>Tanda</i> priest	<i>Dehuri</i>	<i>Tanda</i>	All through the year before starting for hunting.	One white cock.		To ensure success in hunting.

TABLE 6

[Clan Deity (Ora Bonga) of the Hembrum clan]

Sl. No.	Name of the Deity	Direction in which deity's abode is located	Bansa/clan of main worshipper	Ritual designation of worshipper	Tanda to which belongs	Month in which deity is worshipped	Nature of offering	Main reasons	Remarks
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)
1	Karam bonga.	The Shrine (sal) is situated in the backside of the worshipper's Kumbhas.	Hembrum ..	Household head of each Bansa/ Clan (Males only)	Elderly members of each Tanda who belongs to Hembrum clan.	August-September	Two bucks Mohua wine, Sun-dried rice.	For curing illness particularly fever.	If someone falls ill, he promises before the Karam bonga to offer sacrifices to get rid of the illness. In an auspicious day in the month of August-September, the Dehuri worships the deity at the shrine and offers prayer and food and sacrifices animals and birds as promised earlier by the Tanda members.
2	Nasan bonga.	Resides in the same shrine.	Do.	Ditto	Ditto	Ditto	Pig (Sukuri)	For healing such diseases as fever, cough, cold, fests and giddiness.	The worship in the case of this deity is same as that of Karam bonga.
3	Rajakodin bonga.	Ditto	Do.	Ditto	Ditto	November-December	Cock (Sims)	To get rid of typhoid and malaria.	He is believed to be the supreme clan deity. Cocks are sacrificed to appease him.

N. B.—The tutelary deities are kept inside a cow-dung plastered bamboo basket in the form of small wooden sticks of different sizes covered with sal leaves.

The Birhors have fallen victims to family planning programmes. The demography of the tribe does not show any alarming increase in population which warrants limitation of Birhor population. According to the 1971 census the population of the Birhors was only 92. In such a situation there appears to be no need for the Birhors to adopt family planning practices. But it is found that many Birhors have been sterilized in order to get financial assistance. During our field work we have met with two such instances in the Kendumundi Birhor *Tanda*. Some unforeseen events and drastic consequences took place soon after they were operated upon and people attributed these mishaps to the Vasectomy to which these two Birhors were subjected. In both the cases they lost their wives within a period of three weeks from the date of operation and thereafter one of them lost all the children and the other who had two sons and one daughter lost all his sons. Both of them were young and capable of bearing children. The Birhors strongly believed that their supreme deity got angry with these two people for undergoing operation and punished them by causing death to the members of their families with the objective of leaving none to continue in the progeny. There was no escape from this divine punishment and as a result the family planning practices are dreaded in the Birhor community. One of the Vasectomized victim pathetically expressed during the interview that he was very keen to get married second time but no woman was willing to marry him because in the Birhor society barren women are looked down upon.

Strategy for Development

The Birhors lead a nomadic style of life. As the seasons change they move from one place to the other. But in all the seasons they try to have the *Tanda* very close to forest. The Similipal hill ranges, around which most of their *Tandas* are situated are vitally linked with their economic life. They collect Siali bark from the forest to make various types of ropes which are in great demand in the farming community. The transactions between the Birhors and the local peasants take place at the weekly markets, it is for this reason that they set up their *Tandas* near such market places for conveniently disposing of their finished goods and forest produce for cash income.

The Birhors are skilled monkey catchers. When there was no restriction to catch monkeys in the reserved forests they set nets in some

convenient places in the forest to catch monkeys. They eat monkey flesh and sell the monkey skin to the Scheduled Castes for cash. Some times when the monkeys create havoc in the villages and destroy crops their help is sought on payment of money to catch and kill the monkeys.

As they live close to the people who carry on agricultural practices, they have observed various agricultural operations and most of them have experience in ploughing land, showing seeds, transplanting seedlings and other types of agricultural works such as weeding, manuring and harvesting. Both men and women of their community are employed by the farmers on wage basis to help them in various agricultural operations. The income from agricultural labour is seasonal and therefore not very substantial.

The occupations which feature prominently as substantial sources of income among the Birhors are rope making which is their primary source of livelihood and goat keeping. The Birhors buy young she-goats from the weekly market at a nominal cost of Rs. 40 to Rs. 50 and raise them properly to bear kids which they sell when they attain full growth. These grown up goats are in great demand in the rural areas and therefore fetch substantial amount of money to the Birhors. Sometimes they also buy goats of one year old at Rs. 60 to Rs. 80. After rearing them for a year or so take them to market place for sale. These goats also fetch them very substantial income which varies from Rs. 140 to Rs. 160 per goat.

It is the opinion of the Birhors that they no longer want to move from place to place. Instead they are very eager to settle down permanently in some places and carry on cultivation of paddy. They have expressed that they need land, plough, bullocks and seeds for this purpose. From our discussions with them we found that they were interested in having tile roofed permanent houses in place of leaf thatched huts.

Some time back the Project Administrator of Karanjia Integrated Tribal Development Agency supplied 25 Kgs. of jute to each of the Birhor households of Kendumundi *Tanda*. They accepted the jute and manufactured ropes and sold them at the local market. Since such kind of help did not continue, the Birhors reverted to their old practice of making ropes from siali barks. They pointed out that as compared with bark-made ropes the jute-made ropes fetched them a higher price and there was no need for them to move from place to place in search of

fibres. As the help from the ITDA did not come forth on a continuing basis they had to go back to their nomadic way of life in order to get the raw materials for making bark-ropes.

The strategy that emerges from this study for the development of the Birhors is their rehabilitation in agricultural colonies which should be set up close to market places and not far from places where they set up their *Tandas* around Similipal hill ranges. Each household should be allotted adequate land with title rights over it. The beneficiaries of each colony should be provided with plough bullocks, seeds, fertilizers and any other inputs required for growing crops. The most important point in any rehabilitation is people's participation in all works concerning the settling up of the colony. Therefore the beneficiaries of each colony should be motivated for their physical and emotional involvement in clearing the land and irrigation works, digging wells, constructing

houses, building approach roads and schools. The cost of materials including labour charges should be borne by the Government and payment made daily at the end of the work and in no case contractors should be employed for any work in the colony.

The Birhors are excellent rope makers. As they would settle down in a colony permanently they may not get siali bark in sufficient quantity throughout the year. In that case jute may be supplied to them on a regular basis for making ropes. Goat rearing is another avocation in which they have gained vast experience. Each household should be provided required units of goats for rearing. These two subsidiary occupations will not only fetch them sufficient cash to meet their expenses on clothes and daily necessities but also help effectively in stabilizing their new sedentary mode of living in the colony on a permanent basis.

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Demographic dynamics in the Trans Himalayan Tribal Tract of Kinnaur : A perspective on Socio-economic Implications

S. S. Chib

Introduction

Changes in population numbers have a significant bearing on the demographic fabric as well as the socio-economic personality of an area during a given period of time. Fertility, mortality and migration are the three determinants affecting population change at a place. Birth rate and death rate statistics are faulty in India as the registration is imperfect and incomplete as well. In a region like Kinnaur suffering from physical constraints these data are still more faulty.¹ Although in view of the corrective measures recently taken, the situation has slightly improved, yet field observations reveal that some deaths in remote and isolated villages still go unrecorded with appropriate authorities. Resultantly, it is not possible to form a precise assessment of the rate of natural growth. Nor is it possible to know the exact area to area variations in this growth. On the other hand direct data on migration is also not available. Nonetheless, unlike a demographer, a geographer in his study of population is not limited to the area or aspect for which a series of reliable censuses have provided good statistical data.²

The Region

The mountainous, extra ordinarily rugged and physically isolated district of Kinnaur is located in the eastern part of Himachal Pradesh. Lying on both sides of the higher reaches of the Satluj river, Kinnaur shares its eastern boundary with Western Tibet. Mountain locked and physically secluded as the region is, it enjoys cool temperate climate but its winters

are severely cold and prolonged. Half of the region falls beyond the reach of the Monsoons and thus forms a veritable cold desert.

This polyandrous region had age long socio-economic inter-action with Tibet and thus had been an "outward looking area". However, after the Chinese invasion on India in October-November 1962, consequent upon the sealing of the northern frontier of India, Kanauras were compelled to break their age old ties with the Tibetans and to rely upon their mother country for all their socio-economic needs. Obviously Kinnaur became an "inward looking region". So as to have economically satisfied people along the international borders, the steps initiated for the socio-economic development of Kinnaur after Independence had to be strengthened, speeded and stepped up. For this purpose labourers, administrators, technocrats and others had to be immigrated in large numbers besides military and para-military forces. Resultantly once an almost "closed population region" Kinnaur became an "open population area". The facts of Kinnaur becoming an "inward looking" as well as "Open population area" are by and large responsible for importing unprecedented population growth of population in Kinnaur and the consequent socio-economic changes.

Population Growth

The study of population change in the study region has inescapably to be restricted to the years 1901—81 as the census data adjusted to the present boundaries of Kinnaur is available only for this period. However, with regard to

spatial pattern, the relevant data at village level is available only with effect from the Census enumeration of 1951. The following table shows the trend of population in Kinnaur since 1901.

TABLE 1
Population Trend in Kinnaur since 1901

Year		Males	Females	Total	Decadal variation	Per cent Decadal variation
(1)		(2)	(3)	(4)	(5)	(6)
1901	..	14,252	12,980	27,232	..	..
1911	..	14,710	13,760	28,470	+1,238	+ 4.55
1921	..	14,664	13,527	28,191	- 279	- 0.98
1931	..	15,685	14,760	30,445	+2,254	+ 8.00
1941	..	17,400	15,838	33,238	+2,793	+ 9.17
1951	..	16,654	17,821	34,475	+1,237	+ 3.72
1961	..	20,808	20,172	40,980	+6,505	+18.87
1971	..	26,407	23,428	49,835	+8,855	+21.61
1981		31,313	27,841	59,154	+9,319	+18.70

Sources—District Census Handbooks, Kinnaur, 1961, 1971 and Population Totals of Himachal Pradesh : 1981.

During the eight decades under reference, i. e., 1901—1981 the population of the district increased by 31,922, i. e., by about 117.22 per cent. All the decades, excepting 1911—21, have shown increase in population. During 1911—21 the population decreased by 279 in the region. This decrease is ascribed to the influenza epidemic³ of 1918 which had taken a heavy toll of human life particularly everywhere in India. It is surprising but true that whereas the Plague outbreaks of 1902, 1903 and 1907 caused a large number of human deaths in many other areas of present Himachal Pradesh, the region under study was beyond the reach of this deadly disease largely because of high altitude and salubrious climate⁴.

Till 1951 when this polyandrous region had not witnessed any unprecedented immigration, region had been showing nominal rate of increase for obvious reasons. This increase also included the results of gradually improving tools and techniques of Census enumeration.

The growth of population has been significantly high during 1951—81. In other words the most impressive increase in the absolute numbers has been during 1951—81, when the region added far more persons than what it did during the preceding half century.

During a period of 30 years (1951—81) the population in Kinnaur increased by 41.7 per cent. The first decade (1951—61) witnessed a growth rate of 18.87 per cent. The second (1961—71) and third (1971—81) decades showed growth rates of 21.61 per cent and 18.70 per cent respectively. Such growth rates in an inaccessible as well as polyandrous area where because of polyandry in particular the natural growth rate has always been low invite an enquiry. The unprecedented growth has, besides natural growth, largely been the result of immigration of a large labour force engaged in the construction of roads, bridges, other construction works and military as well as para-military forces to man the international

border, separating India from China. This period has been marked with four significant events in Kinnaur. The merger into the centrally administered territory of Himachal Pradesh of the former State of Rampur-Bushahr, under which the region of Kinnaur fell was closely followed by the initiation of planned development in this hitherto neglected, remote and backward region. A glance over the various phases and aspects of planned development shows that a fairly large number of required personnel immigrated to this region. Consequent upon the inability to wield from Simla and Rampur the developmental work in Kinnaur, a region with peculiarities of relief, climate, demography and society was carved out as a separate district with headquarters at Kalpa and subdivided into five tahsils on May 1st 1960. The Chinese aggression of October-November 1962, besides importing a large number of military and paramilitary personnel also accelerated the rate of economic development, directly needed for the natives on account of sensitive strategic reasons, and this way augmented the population growth. Thus the increase in population has been largely caused by factors totally different from those that operated during the earlier decades.

The decade spanning 1961—71 showed the highest growth rate. It was precisely during this decade that consequent upon Chinese aggression the rate of immigration stepped up. Earlier there was immigration but that was needed for socio-economic development alone. Once Sino-Indian relations started improving some of the forces were withdrawn and little wonder the growth rate during 1971—81 relatively came down.

Spatial Pattern

The spatial patterns that emerge on the population growth map clearly indicate that apart from the impact of natural growth, it has been the rate of immigration that has played a crucially dominant role, in the growth of population in Kinnaur. Since there is little to differentiate between the rate of natural increase in different valleys of the region, the spatial variations in the growth of population are mainly related to the impact of net immigration. Nevertheless, the zones of rapid population growth form belts along the main roads, near the district headquarters and international border.

The Central Satluj Valley and the upper part of the Upper Satluj Valley as well as the Spiti Valley contain a large number of villages that

recorded considerably higher rates of population growth. The Kalpa constellation of villages is the largest recipient of the Government servants and labour force while the upper part of the Satluj Valley and the Spiti Valley form the nearest tract to the Indo-Tibet border and thus continue to have military, I. T. B. P. and S. S. B. ⁵ posts to man the frontiers.

Socio-Economic Implications

Growth of population during the period under reference has had many socio-economic implications in terms of land, other natural resources, job opportunities, physical environment, sex ratio, matrimony, literacy, mobility, age structure and religious composition etc.

Land and other Resources

In the context of Kinnaur, where because of physical constraints only 2.16 per cent of the total area has been inhabited, the average arithmetic density of population (7.6 and 9 persons per Km.² in 1971 and 1981 respectively) reveals no significant trait. The settled area of Kinnaur comes to only 140.8 Km² and this area carries greater meaning for forming an idea of habitability and human pressure on land resources. Taking this land into consideration the average density of Kinnaur comes to 419 persons (353 in 1971) per Km.² in 1981. Even this density fails to convey the exact relation between land and man in an area where much of the land is not under cropped acreage which is predominantly agro-pastoral. It is only the nutritional density which can lay bare the pressure of man on land. The net sown area clearly stands as a reliable index of measuring the relative degree of crowding on the farm acreage. Only 9251 Km² of land of Kinnaur has been categorised as net area sown. Thus the average nutritional density of the region stands at 636 persons (539 in 1971) per Km.² of net sown area in 1981. In the case of some census villages the figure crosses one thousand. Small wonder a major share of the food requirements of Kinnaur is being met on subsidised imports.

Whereas the density figures are rising the usable area and net area sown stand static since no addition can be made there in this unique region. Thus the human pressure on land has already reached unbearable limits. Besides land, the population pressure has also adversely affected other resources like fuel, housing, energy and job opportunities ⁶. In

fact the permanent population of the region has already grown so much that Kinnaur, which has the bulk of its land in the shape of rocks, hills and mountains and its climate not congenial for agriculture for a large part of the year, cannot afford to receive any more immigrants without causing certain disturbances and dislocation in the local economy and degeneration to the physical environment. In this extremely cold region during prolonged winters, when roads are blocked and there is frequent power break down, the axe of the fuel starved people is finding more and more trees as targets. Consequently the process of soil erosion has assumed alarming proportions. Unprecedented loads of sediments are reaching the Gobind Sagar with all their implications for the people of Punjab in particular and the physical environment of the region in general.

Sex Ratio—Till 1961 the district of Kinnaur always exhibited high sex ratio (969 in 1961) as compared to India and Himachal Pradesh. After this period the sex ratio fell to 887 in 1971 and stood at 889 in 1981. It means the sex ratio has gone down appreciably. Apart from influencing many social and economic relationships, the sex composition of population has a direct bearing on rates of deaths, births and marriages. In this polyandry dominated area, extra marital relations and particularly with non-Kanaura people are highly despised. The first murder in the known history of Kinnaur which took place in 1980 was the direct result of such a relationship emanating from changed pattern of the sex ratio. And venereal diseases which were unheard of in this region have started raising their ugly heads because of this development. Trafficking in women has also stigmatised certain pockets in the vicinity of some settlements.⁷

Literacy—As a result of growing population the rate of literacy has been gradually going up since majority of the immigrants happen to be literate. Moreover, while coming in contact with the literate immigrants the Kanaura parents are gradually and slowly picking up the habit of sending their children to school. However, as happens everywhere, because of peculiar social order where women are a source of unskilled labour, the drop out rate among the female students is higher. Resultantly whereas in 1981 the male literacy was touching the figure of 50 per cent the female literacy was at 20 per cent only. Resultantly the literate Kanauras under the Scheduled Tribe Benefit Scheme obtain

white collar and other jobs outside Kinnaur. Feeling shy of the polyandrous system they have started getting married to non-Kanaura women and settling down outside Kinnaur. Such a trend is causing more hardships to the fair sex of Kinnaur where already a large number of local women are forced to lead the unmarried life of *jomos* in monasteries with all the drudgery and emptiness. Thus in terms of women emancipation the growth of population in Kinnaur has started importing misery and frustration for relatively more Kanaura women. However, on the other hand, of late, some awakened women have already raised the banner of revolt against the male dominated Kanaura Society. No wonder currently the Kanaura community is passing through a very tense and critical phase of its social history.

Religious and Caste Composition—In Kinnaur Hinduism of local shade (Lower Kinnaur) Tantric Vajreya Buddhism (Upper Kinnaur) and mixture of the two (Central Kinnaur) are the prevalent religious orders. In spite of religious differences the people of Kinnaur have lived in perfect harmony. Earlier the Buddhists were afraid of disclosing their religious identity to census enumerators even. But growing population and the resultant increasing contact with non-Kanauras brought about an awakening that Kanauras also lived in a secular democratic republic where disclosure of their true religious identity would never place them at a disadvantage with regard to job opportunities and other facilities. Happily the growth rate of Buddhists (98.15 per cent in 1971) has started showing remarkable trends.

As already stated a major share of population growth has been caused by the immigration of different categories of workers, the resultant interaction has directly and indirectly brought about awakening among the Kanauras and particularly the men. By virtue of Kinnaur being a Scheduled Tribal District all its native inhabitants should be tribal. But unfortunately the Rajput Negis who have always been dominating the socio-economic scenario of this region managed to get the *Harijans* of this district recorded as Scheduled Caste people in census enumeration. Such an arrangement gives an upper hand to the Rajputs in grabbing the tribal benefits. Nonetheless, with growing literacy the relatively awakened *Harijan* youth have started asserting their legitimate right. Thus the percentage of Scheduled Tribe population which stood at 62.60 per cent in 1961 (68.41

per cent in 1971) has risen to 89.30 per cent in 1981. Although the self asserting *Harijan* youth are an eye sore for the higher castes yet with the passage of time the *Harijans* would get themselves correctly enumerated and also enjoy the constitutional benefits for their socio-economic emancipation, notwithstanding the present tense situation.

Occupational structure

With the growth of population the occupational structure of Kinnaur has undergone a remarkable change. Till 1961 cultivation (66.5 per cent of the work force) and Household industry (15 per cent) were the major economic occupations of the people. In 1971 these occupations engaged only 62.72 per cent and 4.10 per cent of the workers. The 'Other Services' that occupied only 3.90 per cent workers in 1961 came to employ as many as 13.41 per cent of the workers. In 1981 the cultivators formed 68 per cent of the main workers (not total workers) alone. It has in a way been an improvement. Most of the cultivators earlier just engaged themselves in farming to do some job and were thus prays to disguised unemployment. Now other avenues have been opened and many people from cultivation have been withdrawn and engaged in other vocations. The occupational diversification which symbolises the emergence of socio-economic uplift has surely started revealing its imprint on the overall personality of the region.

Mobility

With growing population, general awakening, contact with other people and consciousness people who once restricted their mobility to Tibet and Rampur Lavi Fair have started moving out to other areas. Their intra regional as well as inter regional mobility have increased. For instance in 1971 whereas the rate of immigration to Kinnaur was 14 per cent that of outmigrants was 8.9 per cent and it reveals that Kanauras no longer stick to their ancestral moorings.⁸ It is a very happy development since migration apart from being a fundamental determinant of ever changing space-content and space-relations⁹ is also a very potent instrument of cultural diffusion and social integration.¹⁰ Some of the Kanauras who have been moving out, year after year, have started adopting better ways of life obtaining in places of their migration.¹¹

Conclusively it may be said that the growth of population in Kinnaur has led to many far reaching socio-economic implications. Nonetheless, it has its good as well as bad consequences. In case steps are taken to contain and check the attempts at disrupting the ecological balance, directly and implicitly, the population growth in Kinnaur is not likely to prove detrimental in foreseeable future excepting the plight of women which warrants early and urgent attention of the social workers, government and the Kanaura male society itself.

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6. *District Gazette of Kinnaur, Simla, 1971*, p. 68.
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ECONOMIC PROBLEMS OF A SLUM— A CASE STUDY

Manoranjan Acharya

Area of Study :

This study is based on nine month's field work (during 1984 and 1985) at Suka Vihar located by the side of N. H. 5 opposite Vani Vihar, the Utkal University Campus in Bhubaneswar Municipal area. The population of the slum is heterogeneous in ethnicity comprising 59 weavers (Tanti), 48 potters (Kumbhar), 28 Khandayats, 17 Oil man (Teli), 17 farming caste (Chassa), 15 carpenters (Barhai), 9 washermen (Dhoba), 9 Blacksmiths (Kamar), 8 Barbers (Bhandari), 5 Brahmins (Brahmana), 5 Panas (S.C.), 5 Kondhs (S.T.), 1 Muslim and 1 Christian households. The weavers (Rangani or Tanti) being the dominant group, control the power structure of the slum community. From among the 224 households of the slum, 79.01 per cent have left their native places to earn better income, 0.81 per cent have migrated to this place to provide better education to their children, 0.44 per cent have migrated to enjoy the benefits of city life and 15 per cent of the residents have shifted to this place due to family discontentment.

This slum is known as Suka Vihar. Sukadev Ojha, a Blacksmith (Kamar) is the first man to build his hut twenty-five years back at this lonely place. All other inhabitants came to this slum later and thus the settlement, in course of time, has been named after the first inhabitant.

Methodology

The methodology adopted by the researcher to obtain the data on the above-mentioned topic consists of collecting materials in schedules containing questions on demography, income expenditure, occupation, education, land-holding,

migration history, housing, etc. the data incorporated in this paper have been checked and rechecked through direct and indirect sources.

The researcher would first of all like to highlight the definition of the word 'slum' before going into the details about the economic problems of the slum-dwellers. Eric Patridge notes that the origin of the word 'slum', although obscure, probably comes from the word 'slumber' since slums were originally the majority-unknown back streets or alleys wrongly to be sleepy or quiet (1958:32). In other words, this sleepy locality is a highly congested area of social disorganisation. The Chamber's Dictionary defines 'slum' as a thickly populated area, inhabited by the poorest people and is considered to be low in status. This, more or less, conforms to the definition given by Eric Patridge.

Many slum studies have been made in different cities in India by various social thinkers like Gadgil (1959), Trivedi (1961), Madan (1969), Desai and Pillai (1970), Weibe (1975), Dandekar and Rath (1981) and so on. These studies have substantially contributed through the valuable discussions therein, to the understanding of the problems of poverty of the Indian slums. From among all these scholars, Madan (1969), in his study of Indian slums, emphasizes on the problems of poverty of the slum people which leads to the disorganization of their social life. But Weibe, (1975) on the other hand, analyses his slum-studies basing on the social life of the slum-dwellers. The studies made by Sen (1970) and Gadgil (1959) in Calcutta and Poona respectively are a little

more comprehensive. These studies tell much about the physical, demographic, health and crowding conditions and distributions. But the present paper is somewhat unique, in the sense that, while the above authorities have attempted to study the economic problems of a slum in macrolevel, relying on the census data and other relevant information, the researcher has attempted to make a micro-study by going into the details of the economic problems affecting the various aspects of the socio-cultural life of the slumdwellers. By this interdisciplinary and integrated approach, it has been possible

to understand the slum problems in a fuller measure.

The slum area Suka Vihar consists of 59 weaves, 48 pottes, 28 Khandayats, 17 oilmen, 17 farming castes, 15 carpenters, 9 washermen, 6 Blacksmiths, 5 Brahmins, 8 Barbers, 5 Panas, 5 Kondhs, one Muslim and one Christian households. Its 224 households are thus, of multi-ethnic character. The figures tabulated below will give an idea about the population distribution of the slum on the basis of age, sex and marital status.

Distribution of population on the basis of age, sex and marital status:

	Male	married	unmarried	Female	married	unmarried
0—14 ..	256	..	256	217	..	217
15—34 ..	162	133	29	132	107	25
35—59 ..	153	147	6	133	122	11
60 and above	37	35	2	30	27	03
Total	608	315	293	512	256	256

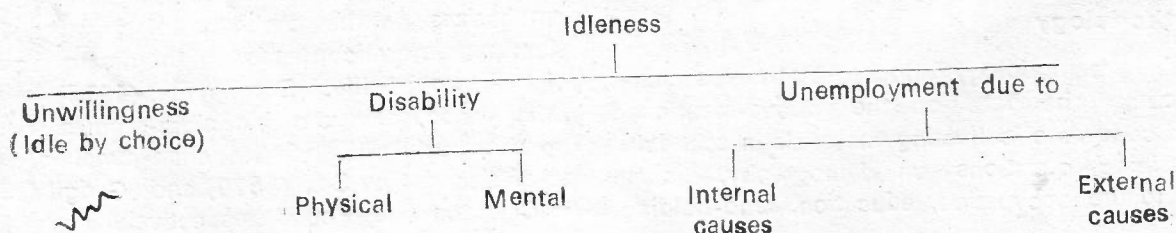
It will be seen that the total population of the slum is 1120, out of which 608 are males and 512 are females. It is further revealed from the table that the population of male children in the age group 0-14 is more than that of female children in the same age group. The age at marriage for girls is 15+ years.

Types of unemployment and Under employment :

The problem of unemployment and under employment is common to all countries and communities whether industrially advanced or backward. The causes and magnitude of such unemployment or underemployment may vary from place to place. Their definitions and practical implications in the slum in question are explained in the succeeding paragraphs.

Though the term unemployment is a complex one and as such not easily explainable, in simple

terms we may say that unemployment is said to exist when the able-bodied persons of working age of a given locality willing to work are not able to find work at the current wage levels. Under this definition people who are unfit for work due to physical or mental disability or are not willing to work, are excluded from the category of the unemployed. According to Professor Pigon, "unemployment means unemployment among the wage-earning classes and in respect of wage work only (1913—17)". Again, according to H. A. Phelps, "unemployment is involuntary idleness on the part of the workman who is able to work (1949—57)". There is therefore, excluded the idleness of those who are definitely incapacitated from wage-earning work by extreme old-age, infirmity, or temporary sickness. There is also excluded the idleness of those who are idle, not from necessity but from choice.



Underemployment

Lord Keynes has given the concept of involuntary employment for underemployment. According to him, a person is said to be under involuntary employment when he is willing to work at lower real wage than the current real wage, whether or not he is willing to accept a lower money wage. The majority of Suka Vihar slum-dwellers who are employed come under this category. Out of 90 masons, 80 work on daily payment basis. But whatever they earn daily, is lower than the current real wage, because of the surplus of labour force in the labour market in the city of Bhubaneswar. 163 daily wage labourers get partial employment or inferior jobs while they could do better jobs and earn higher wages. In case of female wage labourers, they work for the same hours as their male counterparts, while receiving lesser wage than the latter, though the Minimum Wages Act has never made any discrimination on wages on the basis of sex. Similar is the plight of the labourers under the age group of 0-15. They are made to accept lower wage instead of the real wage, because of their age. This shows that the provisions of the Minimum Wages Act are not being rigorously implemented. This calls for sharpening the edge of the machine of the law-enforcing authorities to the extent desirable.

Cases of underemployment are apparent due to surplus of labour and limitations in the scope of employment. When most of the occupations become overstaffed, the *per capita* wage, consequently, gets lowered down. Therefore, mere engagement in some productive occupation or the other does not mean the absence of unemployment. The case of slum-dwellers in Suka Vihar is not different. Although we have shown in the table a number of 300 persons

working or employed, in fact, a large section of them are not really employed, they are, rather underemployed, because very few of them are engaged permanently having a steady and continuous source of income.

G. R. Madan describes various types of unemployment as distinguished according to different causes they are: (a) Casual and seasonal unemployment, (b) Frictional and Technological unemployment, (c) Temporary unemployment, (d) Voluntary unemployment, (e) Cyclic unemployment, (f) Unemployment arising from shortage of capital, equipment or other complementary resources and (g) Involuntary unemployment and underemployment.

Distribution of employed workers of Suka Vihar according to the nature of employment.

Nature of employment	No. of persons
Permanently employed	.. 39
Temporarily employed	.. 231
Self Employed	.. 30

The above table shows that out of a total 300 persons who have got employment, only 69 persons have continuity of their jobs. Out of these 69 persons, 30 persons are self-employed either in their traditional occupations or in business, except only two persons, who have their own rickshaws to pull. The other 39 persons are either working as serviceholders in Government or private concerns or employed as masons under some contractors. The rest 231 persons include skilled, semi-skilled, unskilled labourers including masons, carpenters, menial wage labourers and rickshaw pullers. Their employment is rather unsteady and depends on the necessity and mercy of their employers. Therefore, the nature of their employment may be termed as temporary employment.

Unemployed Distribution of population of Suka Vihar according to their types of unemployment

No.	Types of Unemployment	No. of persons
1	Casual and Seasonal unemployment	.. 269
2	Frictional and Technological unemployment	.. 26
3	Temporary unemployment	.. 31
4	Voluntary unemployment	.. 7
5	Unemployment arising from shortage of capital, equipments or other complementary resources	16
6	Involuntary unemployment or underemployment	31

The above analysis shows that out of a total 280 persons of Suka Vihar who are unemployed or underemployed, 169 persons are casual and seasonally unemployed and 26 persons are unemployed due to frictional disturbance and technological advancement. 31 persons are temporarily unemployed. 7 persons are unemployed voluntarily who are not taking up any job due to unacceptability of current wage system. 16 persons are unemployed even though they have the necessary skill; because they are running without capital, equipments and other complementary resources, to utilize their skill and craftsmanship. 31 persons are forced into involuntary unemployment or underemployment. These people are partially employed or are doing inferior jobs, although they could do better jobs. This situation has arisen because most of the occupations are over-staffed and the wages consequently paid are extremely low. These types of unemployment are elaborated in the following paragraphs.

The construction labourers of Suka Vihar who are engaged at different construction sites find themselves out of job during the rainy season. They remain out of employment at least for two to three months in a year. This seasonal or casual unemployment is the most common type of unemployment found among the slum-dwellers of Suka Vihar. There is thus a floating surplus of the unemployed, technically called the "Reserve of labour".

Frictional and Technological unemployment is also marked to a considerable extent among the people of Suka Vihar. This type of unemployment is caused by the introduction of modern technology and change in the traditional industrial structure. Most of the traditional artisans and craftsmen who used to be substantially engaged in the traditional arts and crafts now find themselves out of job due to advent of modern technology and mechanization of industry. The case of Ranganis (weavers) of Suka Vihar is an exemplary case. This traditional weaving community of this slum are either doing the jobs of menial labourers or sitting without jobs because of their lacking the skill to fit into the modern textile technology.

In Suka Vihar, it is found that some persons have registered their names in the Employment Exchange of Bhubaneswar for some employment. Their educational qualifications are not high. After registration of their names at the local Employment Exchange, they appear to be waiting some salaried Government jobs, however

low those may be. Besides, there are also a few skilled or trained craftsmen who are still looking for suitable jobs. This sort of unemployment comes under the category of Temporary unemployment.

Seven unemployed persons of Suka Vihar explained that the nature of their unemployment was voluntary. They had refused employment as they considered the wages they were asked to accept too low, as compared to their skill. They always seem to be looking for better employment avenue with higher wage. This type of unemployment is, of course, shortlived in nature.

Among the slum-dwellers of this locality, it is also found that a lot of traditionally skilled craftsmen and workers are still sitting without any job or income. All their skill, knowledge and craftsmanship have remained useless without capital, equipments and other complementary resources. Further being skilled in a particular type of occupation, they are not inclined to switch over to some other non-traditional occupations, which they consider as inferior.

As regards the economic condition of the rickshaw-pullers, it may be said that they have a very modest income. This is because of the fact that all of them bring rickshaws from others on hire. They pay Rs. 4 per day as hire-charge and meet the repairing charges from their daily income. The average daily income of a rickshaw-puller of this slum is estimated to be Rs. 15 per day. Besides the hire-charge of Rs. 4, he pays Rs. 2 towards repairing charges, tea, tiffin, etc. Thus, he gets a net income of Rs. 9 per day which is meagre to run an average family of four members. A rickshaw-puller is no doubt conscious of the low income, and still he continues to be a rickshaw-puller, as this is more or less a regular source of income to him. Further, he thinks himself to be unfit for any other type of labour and thus continues to be in an economic status which is slightly better than the daily wage labourers. But the economy of both the groups is miserable, uncertain and utterly insufficient to meet the minimum basic needs of a family.

Now we come to the betel shop-keepers. They sell prepared betels, bidi, chocolates, cheap cigars, cheap tea packets etc. with a small investment of capital they try to make the maximum profit by rolling the capital

oftner. They purchase the commodities from the local shops in small quantities. As a result they neither get a good bargain in cost price nor a good margin of profit on sale. According to the betel shop-keepers themselves, they earn only 5 per cent profit in average. Further, they are compelled to sell their commodities on credit and as a result, a big slice of their small capital gets blocked and their profit is considerably reduced. They allege that sometimes even the cost price is not realised. Therefore, this particular group not only suffers economically but also incurs displeasure of the customers by repeatedly persuing them for realisation of their dues. The condition of the betel shop owners amongst the slum-dwellers is also equally unenviable.

The economic problem of the slum-dwellers categorised under H. I. G. i. e. Mason, Grocery-shop-keepers and service holders has to be delineated.

The masons either working under contractors or being independent workers, do not get employment throughout the year. The economy of this category, again rests on uncertainty and depends on the availability of building materials in the local market and availability of construction work to the local contractors. A mason, however, gets employment for about 8 months a year and his average income per day is Rs. 15. He finds difficulty in the off-season when he is thrown out of employment.

The grocery shop-keepers who run their shops with small capital, and purchase the commodities from the local market, are constrained to sell the same with a marginal profit of at least 5 per cent to 7 per cent on the cost prices. They can not afford to sell their commodities at higher rates to customers even on credit basis; and as a result, their expected profit margin is never attained so as to make this trade economically viable. Thus, they cannot accumulate money to the extent desirable for making the trade prosper gradually. The net result of all this is that their economic condition and status in society continue to be as low as before.

The service holders who had some assured source of monthly income complained that the service-income enabled them just to keep the body and the soul together and was of no help beyond that. With petty jobs be taking meagre income they never expected their

economic condition to improve. However, they felt that because of the service, bringing an assured monthly income, their creditworthiness before the local shop-keepers had improved. In the result, they could get their commodities of daily necessity from the shop-keepers on credit.

Poverty has always been a menace to human locality. Unemployment by contrast is relatively a new cause of distress. Formerly, even the poorest of the poor used to get some kind of employment in his native village where he worked directly for the commodities of his daily consumption. Then work was plentifully available. But with the increase of population and with no corresponding increase in the *per capita* availability of land, the situation has changed. Employment opportunities in the rural area have been squeezed to a considerable extent. Consequently, there is heavy exodus of the labour population from the villages to the towns in search of jobs. Most of these job seekers take to manual and menial jobs in the towns. The congregation of these people at one place give rise to slums in the towns. The slum Suka Vihar has come into being in this very process.

On interview with the slum-dwellers of Suka Vihar it is learnt that their general attitude is to serve either the Government or private organisations. But despite repeated attempts they fail to get any such jobs for their satisfaction. This grave problem of unemployment and their inability to get jobs even when they apply through Employment Exchanges, have frustrated them. The Government has announed job reservation for the down trodden and economically backward classes. But the implementation of this policy in the field, particularly by the Employment Exchange authorities does not appear to be heartening. A service holder of the slum who was about to retire from his service, said, "My son has got his name registered in the Employment Exchange since 1978 and he has been regularly renewing his registration. Only once he got an interview card, that too after the date of interview. So he could not attend the interview. He went to the Employment Exchange to represent his grievances before the Employment Exchange Officer but was denied admission. He has not yet been selected for any job in spite of regular renewals. I know people who bribe the authorities concerned there and get

jobs; but I cannot afford to do so and I do not want to do it either". This late is quite poignant and pathetic. This should be an eye-opener to all concerned including Government who should take adequate corrective measures for proper implementation of the employment policy so that the real benefit goes to the poor and the needy.

Distribution of workers and non-workers on the basis of age and sex

Age-group	Workers			Non-workers			Grand Total
	M	F	Total	M	F	Total	
0 to 14 ..	10	..	10	246	217	463	473
15 to 34 ..	120	49	169	42	83	125	294
35 to 59 ..	89	30	119	64	103	167	286
60 & above ..	2	..	2	35	30	65	67
Total ..	221	79	300	387	433	820	1,120

The above table shows that among the slum-dwellers of Suka Vihar workers and non-workers ratio is 2:5. The maximum number of working population is found in the age-group of 15 to 34 and the maximum number of non-workers are marked in the age-group of 0 to 14 and also in the age-group of 60 years and above. In this group include the young dependents, old and disabled persons.

Distribution of non-workers on the basis of broad age-group and nature of activity

Nature of activity	Age-groups								
	0—14		15—34		35—59		60 & above		
	M	F	M	F	M	F	M	F	
1. Dependent ..	..	..	..	..	..	..	..	..	..
(a) Infants ..	474	129	..	..	..	..	..	..	..
(b) Sick and Invalid ..	11	..	4	2	17	23	30	25	..
(c) Engaged in activities like gambling etc.	3	..	5	..	12	..	2	..	..
(d) No attitude for manual work.	8	..	11	10	14	165	3	..	..
(e) Unemployed ..	..	..	21	4	19	45	..	..	..
2. Household activities ..	15	60	..	67	3	60	..	5	..
3. School-going ..	35	28	1	..	..	..	..	..	..
Total ..	246	217	42	83	64	103	35	30=820	..

This table explains the non-working population on the basis of dependents, household workers and school going children according to their age-groups. Out of a total of 820 non-workers, there are 174 and 129 male and female infants respectively below the age of 14 years who are not fit enough to take up any job. There are 11 youngmen, 4 males and 2 females within the age-group of 15 to 34 years, 17 males and 23 females within the age-group of 36 to 59 years and 30 males and 25 females above 60 years of age who are sick and invalid. Besides this there are another two categories of dependents. They are the persons who are engaged in unsocial and unlawful activities like gambling, etc., and persons having negative attitude towards taking up any sort of work. Gambling, as it has been found out in Suka Vihar, is an exclusive pastime of men only. Three young boys below the age of 14, 5 men in the age-group 15 to 34, 12 men in the age-group of 35 to 59, 2 oldmen above 60 years of age are found to be indulging in gambling, which is not at all an economic activity and as such, they cannot be taken under the category of working population. Eight males in the age-group of 0 to 14 years, 32 males and 14 females in the age-group of 15 to 34 years, 32 males and 20 females in the age-group of 35 to 59 years and 3 males above 60 years of age have expressed their negative attitude towards work during the interview.

A good number of persons, mostly the female folk of the slum, are engaged in household activities like cooking the food, looking after the house and infants or attending to other domestic chores etc., 15 males and 60 females in the age-group of 0 to 14, 67 females in the age-group 15 to 34, 3 males and 60 females in the age-group of 35 to 59 and 5 females above 60 years of age are engaged in their own household activities. This shows that a major section of women population looks after the household activities.

The number of school going children presents a very low profile. Out of a total population of 1,120, the number of children below 14 years of age is 573. But only a small proportion (say around 4 per cent) are going to school. Mostly they are getting the primary education, i. e., education up to class V. Only one boy was continuing his education in the nearby High School.

Source and nature of employment

The source and nature of employment of Suka Vihar slum-dwellers are of a peculiar type because of their diversified composition. Before the immigration, most of them were occupied by the "Client and Patron" type of jobs which are otherwise known as the "Jajmani" system, within the traditional Indian agrarian set up. Being deprived of that now in the urban set up they have adhered to non-traditional jobs, both skilled and unskilled. The skill for non-traditional jobs have been acquired by some of them gradually. So the number of skilled workers is very less in comparison to unskilled workers who have come very recently. In spite of the above change in nature and source of employment, some of them still adhere to their traditional occupation. Out of 224 households, 21 households still stick of their traditional occupation.

Conclusion

On the basis of the above study the following conclusions emerged:—

- (1) Slums are created in the towns due to heavy and continuing exodus of the rural unemployed labourers to the towns seeking employment on account of dwindling of employment opportunities in the villages. In the slum in question 79.01 per cent of the slum-dwellers are of this category.
- (2) The slum-dwellers have usually taken to menial jobs as better jobs are not made available to them. Their poverty continues to be self-perpetrating generation after generation.
- (3) Due to want of adequate finance, they cannot prosper in small trading activities.
- (4) They are educationally very backward and their children are generally educated up to the class V standard.
- (5) They fail to get menial jobs in Government offices and the local Employment Exchange authorities do not appear to be sympathetic and responsive. Adequate corrective measures should be taken by the Government in this regard.
- (6) For all-round development of the urban poor in general and the slum-dwellers in particular a specific programme of the type I. R. D. P. (Integrated Rural Development Programme) and E. R. R. P. (Economic Rehabilitation of the Rural Poor) should be launched by the Government. So that the urban poor with

the help of Governmental subsidy and institutional finance could improve their lot by adopting viable economic activities suitable to their requirement and skill. This ought to be

done on an urgent basis if Government really indents not to allow the situation to deteriorate further beyond redemption.

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THE STATUS OF WOMEN AMONG THE DONGRIA KONDH

S. Routray

The Christian era of 1975 was celebrated as the International Women's Year all over the world. The International conference which was held in Mexico in June—July of 1975 was a unique event. The convention highlights various handicaps and disabilities from which the women folk suffer. It stresses the importance of ameliorating the condition of women and providing them with better facilities to play an equal and effective role in contributing to international peace. The popular UNESCO slogan was "Educate a man and you educate an individual, educate a woman and you educate a family".

The Central Government of India has adopted various measures of welfare for women, among which the revised 20 Point Programme is one. The 12th point "Equality for women" is exclusively meant for the women. Which comprises six sub-points such as:—

- * To raise the status of women.
- * To enhance awareness of the problems of women.
- * To create mass consciousness about women's right.
- * To implement a national programme of training and development.
- * To enable women to participate with equality on in socio-economic development and nation building.
- * To rouse public opinion against dowry and ensure effective implementation of anti-dowry legislation.

Besides, the Article No. 14 of Indian Constitution has provided for women's equality in the eyes of law. Article No. 15 also says that "nothing in this Article shall prevent the State from making any special provision for women".

In view of this an attempt has made to study the problems and status of women in the tribal areas of Orissa. As a first step a study was undertaken in the Dongria Kondh area of Koraput district. The centre of the study is the village 'Khambesi' of Bisama Cuttack block of Koraput district. The village in which they live is situated at about 3,000 ft. attitude, from the sea level and is located in the 'Niyamagiri' hill ranges, which lies in 19°33'N Latitude and 83°25'E Longitude. This village is located in a relatively isolated and inaccessibly area because of the natural barriers through which no road communication has developed and such situations have enabled the Dongria Kondh to retain their traditional form of economy, social organisation, ritual and belief to a great extent. The Kondh society is generally homogeneous but the scheduled caste 'Domb' live with them as neighbours. From the field investigation it is recorded that at present the Kondh population of that village is 289 out of which female population is 161 comprising 57 percentage of the total population.

This report combines empirical materials with theoretical concepts relating to various aspects of women in the Dongria Kondh society. An attempt has been made to ascertain the present status of Dongria Kondh women in the following pages.

Generally, the Dongria Kondh women wear simple dress with graceful gait and are frank and gentle in manners. They have short to medium stature with broad face, flat nose, separated eye brows with thick lips. Their body colour varies from dark to light brown with straight hairs on head.

They dress themselves with two pieces of clothes (Kapda-Ganda). One piece is wrapped around the waist with a knot in the front. The second piece hangs around the waist, one end of which passes through the arm-pits and tied at the back to cover the upper part of the body. The adult women use a small piece of cloth (langota) as an under wear. Several holes are pierced all along the ear-lobe through which rings are inserted. In the nose they wear three brass rings (Murma) one on each alare and one passing through the septum. They neatly comb (Kokuya), and use many hair clips which keep the hair tight. A tiny knife (Pipli) is used by the ladies which serves the purpose of cutting of any thing they required. The females put on bead and coin necklaces (Kekodika) in bunches. Some females of well-to-do families put on golden necklaces. Aluminium rings are put on by the young girls which they receive from the young unmarried boys (Dhangdas) as presentation. Besides this on ceremonial occasions the ladies put on clean saris and dresses with brass-wristlets (Paja) and silver anklets (Pahari-Andu) etc. All the ornaments cited above are kept in a bamboo made basket (Hakusa) by the women. The dress they put on and ornaments they use though poor in quality give us an idea about the artistic out look, of these Dongria women.

The status of women in Dongria society can be ascertained in terms of their opportunities in participating the social institutions, behaviour of the men towards them and the ideology of religious beliefs prevailing in their society of which they are a part. Their status is also directly related to their role as a mother and wife in so far as child bearing and sexual life is concerned.

The data has been collected from the village 'Khambesi' of Koraput district with population of 161 female and 128 male. Before studying the women, a census report has been made in order to find out the concentration of women in various age groups. The age range covers from 0 to 60 years having interval of 15 years.

In the social life these women enjoy a high status. They have freedom in selecting their mates. The institution like marriage and family bestow a significant status to them. The marriage is generally monogamous in nature. Polygyny is also practised by Dongria Kondh. A man may marry for a second time if his first wife is found

to be barren or if he requires additional man power for shifting cultivation. A person having three to four wives is considered rich in the society because his yield becomes more with the help of additional man power. Therefore, women help in the enhancement of the social and economic prestige of men. In the study village 11 cases of polygynous families are seen out of which one sororate case is found.

The Dongria Kondh usually marry at a late age, i. e., the boys approximately at the age of 25 and the girls after 20 years. Widow remarriage is allowed by the society and is not considered as social offence. In case of remarriage no marriage ceremony is performed. Only formal recognitions of villagers are required.

The process of marriage which they called 'Haidi' consists of a number of rituals. The village priest (Jani), assistant priest (Pujari) and the shaman (Beju) officiate in the ritual, which is supposed to bestow for a happy conjugal life of the married couple. A boy or a girl is considered to be a full fledged adult member of the society only after they get married. In case of a woman she becomes housewife by shouldering the responsibility of managing her family and looking after the members of her family. The institution of marriage binds the boy and the girl with each other to lead a conjugal life which is mutual. A Dongria Kondh girl enjoys the liberty to select her own mate. Cases of love marriage are found among them. The unmarried boys and girls try to find opportunities to meet with each other at various sites such as dormitory house (Adasbestta) the donger field, the weekly merket, in the forest, on the bank of a stream or at the foot of the hills. They develop familiarity by studying each others attitude. Then they make up their mind and finalise their choice. After that they flirt, chat and laugh together. When they feel to marry each other they inform their parents through some of their kinsman, who take initiative to perform the marriage ceremony. Sometime due to the unwillingness of the parents a boy elopes with his mate to a distant place and stay there in a relative's house. On their return their union is socially approved.

Sororate is occasionally found but no cases of levirate is found in the study village. The following exogamous clan such as Wiska, Wadaka, Kadraka, Sikoka, Jakasika, Praska, Pusika regulate the marriage.

Each clan is exogamous unit within which marriage is prohibited. The 'Niska' clan members claim to be the superior most in the hierarchy as it is taboed for them to eat beef and flesh of buffalo.

The Jani (priest) belongs to this clan. He is only entitled to worship Earth Goddess during Meriah Festival. They can establish marriage relationship with 'Sikoka', 'Wadaka' and 'Kadiaka' and 'Bengeska' as they eat snakes and insects.

The Dongrias always prefer hard working and ablebodied girls for marriage. Sometimes a girl is bargained for a higher amount of bride price and poor people cannot keep pace with the high rate of bride price demanded by the girl's parents which sometimes leads to lot of fissions or clan feuds in the society. In the study village there was a case of this type. The Kalanga Wadraka had to give a high rate of bride price in his marriage. The villagers had to fight against the brides party and a feud took place. But lastly the situation was controlled and a compromise was reached.

Divorcee in a Dongria Kondh society is also permitted to remarry. A Dongria Kondh woman has also privileges to divorce her husband if she is ill-treated by her husband repeatedly as a result of the habit of indulgence in liquor. Carelessness and irresponsibility in taking care of the family members, lack of muscularity are also reasons which may compel her to desert her husband. In that case her family has to return the bride price which they receive at the time of marriage. But incidence of divorce is rare in Khambesi. The number of male divorce is more in comparison to the female divorce. Because in most of the cases it is seen that the divorce is originated from the male side. Women in Dongria Kondh society are considered as economic asset of the family. They rise very early in the morning. First of all they grind the millet (Ragi or Suan) and then start cooking. By 6:00 A. M. they finish their cooking and all domestic works and they start towards their Donger, fields carrying food and babies at their back. There lies very less difference between males and females so far as the division of labour is considered. Women are generally non-vegetarian in nature. They take meat, dry-fish, green vegetables. Mandia is their staple food. They do not receive any pucca or kutchra foods from their domb neighbour.

They consider their status as higher than the Dombs. They donot go to any 'Domb' house, even they cannot sit on their verandah. But as wage earning labourer these women use to go with them in group for construction of roads. But there is deviation observed in the case of their children. They play and read with 'Domb's children and they also eat cooked food from the Domb's house. They do all these without the knowledge of their parents.

The males appear to be less capable and less enthusiastic in economic activities than the females. As they are shifting cultivators the help of women is indispensable to them. The women folk are very hard working and active. They also shoulder higher responsibilities of the family. Clearing the shrubs on the podu land, manuring, hoeing, dressing, reaping, winnowing the crops after harvesting etc. are exclusively done by the women folk. The women do not take part in any rituals connected with shifting cultivation. Women are forbidden to climb trees. Therefore, they collect fruits while men climb trees to pluck mango, orange and jack fruits etc. The women also weave mat, with leaves of the wild date-palm, stitch leaf cups and leaf plates at their leisure time. Both men and women work as wage earning labourer. When they go for work, they go in group. The female and male form separate groups. Previously the Dongria Kondh women did not like to work as wage earner rather they preferred to work at their Donger field. In construction and repairing of house women help men in all sorts of work except thatching which is a taboo for them. They take care of the domestic animals such as buffalo (Kodru), cow (Kodi), Goat (Adda) Pig (Paji) etc. They do all sorts of household works such as cooking, fetching water from stream, tank or well, cleaning utensils, plastering verandah and walls with cowdung.

As mother, the women are very affectionate to their children. They not only give birth but also take care of them. As mother they have more duties in socialization process. They give birth to the children, feed them and properly guide them to develop. Most of them are not aware of the sanitary habits of the health. At the time of disease they only serve their children in their indigenous way. When their children suffer from fever, cold or cough they take help of the medicine-man. For healing of fever they call for 'Puchona' which is arite performed under oath.

Here they have to go to the village 'Beju' who performs the ritual at his own house. He, with the help of two Bejunis observe the ritual. As a remuneration he receives one hen and two 'Auda' of rice.

It is also seen that most of the mothers have developed interest towards the education of their children. Generally they send their children to the Dongria Kondh Development Agency School which is located at their village. They cannot teach them at their homes.

As care taker of the family women shoulder higher responsibilities and act as the cashier of the household and they keep money and account of the family.

The religion of Dongria Kondh centres round the propitiation of Gods, spirits through some notes and sacrifices.

Dharani Penu (earth goddess) is installed in a hut in the frontyard of each village called 'Kuddi' and is represented by three elevated stores placed horizontally upon them. She is specifically worshipped during 'Bihen Lake' and Meriah festival (Meriah Laka) by 'Jani' and 'Lamba'.

The spirit possessed woman called 'Bejuni' have higher status in the society as they practise devination and cure diseases. They have to take long course of training from a competent preceptors before they become qualified practitioners. During her training period she puts on a red 'Sari' (Uchitrai Gandha) and uses two metal bells at her anklets. She puts a bundle of peacock feather (Tanya) over the head of a sufferer and at the sametime she blows and whips some incantations. The Bejuni can forecast the future events for which villegers pay respect to her. The importance of the role of Bejunis is elaborately dealt with in the ritual 'Ghanta Parab' which is described in the book 'The Kondh of Orissa', pp. 157 of Dr. N. Patnaik as follows:—

"The Ghanta Parab is observed three days in the month of Baisakh. 'Ghanta' means earthen pot and each such pot with four cakes is offered to 'Takrani Penu' along with a sacrificial animal by the vow taker who suffers from small-pox and cholera. In this festival the role of Bejuni is remarkable. The 'Pat-Bejuni' and other 'Bejunis' sit in a row, each with a winnowing fan for devination. The Pat-Bejuni draws three squares representing three Penu with sundried rice powder and piles up a heap of

rice ball in each of the three squares. There after all the Bejunis start singing in chorus and invoke three Penu while offering rice to them. After all the Penu are visualised the Bejunis along with drum beaters go-round the village and its outskirts for seven times waving a bunch of peacock feather over their heads towards the evil spirits. On the second day Pat-Bejuni sprinkls water with a mango twig from the earthen pot over their heads to purify the house from pollution and in return collects sundried rice presented to her by each house wife. On the third day as Pat-Bejuni is possessed by 'Takrani-Penu' and thereafter she behaves like Takrani. When she regains her senses the lamb is sacrificed by the Ichan Jani and blood is sprinkled over the piles of rice for three Penu. Thereafter, vow-takers sacrifice their votive animal on that altar one after the other in the 'Ghanta'. The Bejunis simply touch those 'Ghanta' in order to purify that.

When all the sacrifices are over, the Pat-Bejuni along with her team of Bejunis and drum-beaters goes in a procession to the western outskirt of the village and the villagers irrespective of age and sex roll on the ground to get touch of the feet of the Pat-Bejuni. Then the Pat-Bejuni performs a ritual at the Jatra-Kudi in a manner similar to earlier ones and sacrifice a pigeon by piercing a sharp bamboo stab through its rectum.

After this the ritual comes to an end. The vow-takers take away their respective ritualistic food and offer only the head of the animals already sacrificed to the 'Bejunis'. The Pat-Bejuni alone receives the lamb. All the Bejunis distribute rice and head of the animals equally".

Besides the abovesaid ritual, the Dongria Kondh observe 'Salongi Puja' 'Mandia Rani', 'Pidika', 'Donger Puja', 'Bihen Puja', in general and 'Meriah Puja' in particular. This year the Dongria Kondh observed the 'Nuakhia' (Marangi Laka) in a very simple manner. No communal feast or communal hunting are performed. The village *Sarapancha* (Lachamana Wadaka) and Beju-cum-medicine man (Daitari Kadraka) and many members sitting together at the village Kuddi (Sadar Ghara) had decided not to observe the festival purposely as they had not enough money and they had to visit Bhubaneswar to meet the Minister for some political issue. Irrespective of age and sex, all the Dongria Kondh as a member of society must have to

obey certain taboos like food taboos, totemic taboos, reproductive taboos and mortuary taboos, etc. to avoid mishaps. One parturient woman is required to observe certain taboos and restrictions for instance—

- (a) She must not visit the burial ground which may harm the child in the womb.
- (b) She must not go alone to any place in the evening or night so as to avoid coming under the influence of evil spirits.
- (c) At her advance stage of pregnancy she is advised not to take up hard work like carrying logs from the forest which may cause abortion or miscarriage. From the time of pregnancy, till the confinement the husband shoulders more responsibility and takes full care of his wife. It is because to the Dongrias the child is considered to be the blessing of Dharani Penu and also he considers his wife as a better-half of his life.

During the survey, 43 households were covered and fertility data were recorded. It is seen that out of 289 total population, 128 males and 161 females. The sex ratio of the study village is found to be 1,258 females per 1,000 males. Out of 161 females, the number of married female is 90. There were 4 cases of abortion, 4 cases of still birth, 31 cases of infant mortality in that village. The rate of fertility of the females is found to be very low. It is perhaps due to their usual visit to the Dormitory house where they built physical relationship with the unmarried 'dhangdas'. This data is recorded from the Ashram of Smt. Malati Biswal. This Ashram is administered by the Kasturaba Memorial Trust. The doctor had the opinion that this is one of the causes for the low fertility rate of both the husband and the wife. Some Dongria feel that the use of buffalo meat is also another factor of low fertility. But they are so much accustomed in taking buffalo meat with liquor that they cannot escape from this habit.

Barrenness is regarded as a stigma in their society. The Dongrias have no herbal medicine to use for the cure of barrenness. But they have medicine to induce complete barrenness. It, otherwise help them in family planning. For this, they believe that if seven red 'Kaincha' seeds are cut by a woman, she never conceives after that. 'Bano beta' is an effective herbal medicine

used by the Dongrias. This root is pounded and the juice is squeezed for the medicine. Oral administration of about half a cup of this juice is taken for quick and easy delivery. Three-year old castor bark, Kalara leaf and Bajramuli roots are pounded to extract juice. This mixture is orally administered which helps quick falling of placenta.

Their menopause occurs within the age of 46 to 50 years. There is medicine for those who desire earlier menopause. Equal quantity of 'Korkati' (male Kankada), 'Denjani puyou', 'Mara', 'Diseniheru' and Penkaponga Daki, roots are pounded and the extracted juice is orally administered to the woman who desires earlier menopause.

In regards to political affairs the Dongria Kondh women occupy a very low position in the society. They are not allowed to become member of the tribal councils. The posts of village headman and other officials are hereditary in male line. In the study village three tribal ladies named Bongari Kadraka, Sitari Wadaka and Singari Wadaka have registered their name in the Mahila Samiti. It is due to the constant inspiration and co-operation of Mrs. Malati Biswal, who is popularly known as 'Appa'. She is a social worker of Kasturaba Memorial Trust. In every month, each of the above said ladies get Rs. 30 as their allowance from the Government. These women are given high social prestige in the village. These women have some political awareness which help them to discuss with their husbands.

The Dongria Kondh women enjoy freedom of participation in village dance and music. They spend most of their leisure hours through gossip, merry making, music and by sewing of the traditional scarf (Gundu) sitting at the backside of the house. They present this scarf to their near and dear ones with much affection.

The Dongria Kondh women are born and brought up in the lap of nature and are educated in the traditional socialization process. Most of the women of this village are educationally very backward so far as formal education is concerned. In the study village, out of 161 females, 17 have class-III level of education, 17 have class-I level of education and the rest are illiterate. It is recorded that this year (1986) there is not a single girl enrolled the village School. They get full help and privileges through the Government Agency (D. K. D. A.). This agency is acting there since 1978 which

helps in ameliorating the condition of the Dongrias. Particularly this agency does not focus on the women.

ANNEXURE I

A census of the village is collected in order to find out the concentration of women in various age-groups. The age range covers from 0 to 60+ years, having interval of 15 years. It reveals that highest concentration of female comes in the age-group (30—44) i. e. numbering 55. Total number of female children comes to 47. Total number of married female comes to be 90. Number of old lady comes to 3. Number of female youth found to be 33. While collecting these data, interview method, observation method and genealogical method were adopted.

ANNEXURE II

A special study was undertaken to represent statistically the position of married women including unmarried girls of that society. This status has been broadly studied under five heads such as Social, Economic, Political, Religious and Educational, each having three level 'High' 'Moderate' and 'Low'.

Analysis

In economic sphere they are no doubt far below the poverty line, still then, they are divided according to their own standard in terms of acquisition of land and occupation. Those women having two to three or above 'Donger' are grouped under 'High'. Those having one to two 'Donger' come under 'Moderate' group and those having below one 'Donger' termed as 'Low'. It is seen that 120 Number (74.53%) of female out of 161 female have 'Low', 39 Number (24.22%) of female have 'Moderate' and 2 Number (1.24%) have high economic status. But according to the division of labour cent per cent of them have 'High' economic status.

In social life the division is based on the present marital status of women. Those who are married come under High, those who are widow are 'Moderate' and divorcees are given 'Low' status. It is noticed that 67 number (74.45%) of female out of 90 have 'High' social status, 20 number (22.22%) have moderate and 3 number (3.33%) have low social status. Those of un-

married female youth and female children are also socially in good position. These unmarried girls have no education at all. They only receive informal education from their parents, their Kiths and Kins. But they are given with much affection in their society. They are allowed to visit their relatives, village market and to move round with their friends in the village. They are also permitted to go to their village dormitory house, which is one of their traditional institutions.

In political life, those who are politically sensitive are termed as 'High', those who have political awareness are grouped as 'Moderate' and who have least political awareness known as 'Low'. Out of 114 females, 7 number (4.86%) of females have 'High', 15 number (13.16%) have 'Moderate' and 92 number (81.98%) of females have 'Low' political status. Here, the female children numbering 47 are excluded as they have not developed any political consciousness. In religious life the division is based on their performances and practices of rituals. Those who perform communal worship are called as 'Bejuni' and are given 'High' status, those who worship only their household deities are 'Moderate' and 65 number (40.38%) of female have 'Low' religious status.

Taking education into account all are educated up to primary level. Those who have primary education and above are termed as 'High', those who have lower primary education are termed as 'Moderate' and the rest illiterate come under 'Low'. Out of 161 female 127 number (78.89%) of females are illiterate, 34 number (21.11%) of females have lower primary education and there is not a single female found to be educated up to upper primary level of Education. The percentage of which comes to be zero (0%). To eradicate their problems we have to suggest certain measures which may help them to improve their condition. If they are provided with certain incentives through 'Angan Badi' through informal coaching by lady teacher and by showing them exhibition relating to education, they can be enlightened and encouraged and come forward in large number to study in the school.

Conclusion

From the above said analysis it is clear that though Dongria Kondh women are debarred from certain religious and managerial function, their

social status is very high. It is also established that in various aspects of social life women enjoy status and freedom such as in the choice of a husband, pre-marital sexual licence, seeking of divorce and so on. But in other few aspects such as in political sphere they get low status.

There is an urgency in helping these women through developmental administration towards gaining social, education and economic emancipation by which the inherent strength of these women can be channelized towards all round development.

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The Bhunjia of the Sonabera Plateau and Strategy for their Development

Prasanta Kumar Mohanty

According to 1981 census the Scheduled tribe population in Orissa is 595,067 i. e. 22.43 per cent of the total population of the State. There are as many as 62 categories of Scheduled tribe living in varied cultures. Now their arena is not at all separate from the non-tribal habitation. But they are unique in their culture and life style. These tribal communities form socially independent groups in contrast to their non-tribal counterparts. Due to backwardness in economy and education, they feel under-developed and automatically isolated.

Bhunja, a small tribe having a population of 7,410 (1971) found mostly in Kalahandi district of Orissa where their number exceeds 5,000. Besides Orissa, they are found distributed in its adjacent Raipur district of Madhya Pradesh. The etymological meaning of the term is "growing out of Land" and the Bhunjia think themselves are the fore-runners of those who landed on the earth first.

Russel and Hiralal have mentioned in "The Tribes and Castes of Central Provinces in India" that the Bhunjias have originated from the Union between the Gond and the Holva. But lacking any circumstantial evidence regarding the authenticity, it is very difficult to ascertain this view point. Whatsoever, there lies a lot of similarities between the Gonds and the Bhunjias, taking into account their physique, economic life, social organization and religious practices.

The Bhunjia in Kalahandi district are living in Sonabera plateau which is situated at a height of 3,000 feet up the sea-level. It lies roughly between 21°25' north to 21°30' north latitude and 82°35' east longitude. Living in the plateau, the Bhunjia regard themselves to be the autochthones of the area and form the cradle land from where their kin-members have diffused.

As per the 1971 census their population is 7,410 in Orissa. Out of which Kalahandi district tops the list i. e. 5,673 and next is Koraput district where their number is 1635.

The tribe has been divided into two main sections namely the Chukutia Bhunjia and the Chinda Bhunjia, the former represents the original section of the tribe and later, the acculturated section of the tribe. The Chukutia sections are ubiquitously found in the adjoining areas of the Sonabera plateau and the Chinda Bhunjias are found scattered in the plains with other ethnic groups.

A mythical legend focuses that at one point of time the Bhunjia of a particular area were all blood-relations and there was no group with whom to have affinal relationship. Time passed on. Once the Gonds came into that area accidentally and marriage relationship was established with them and resulted two inter-marrying groups namely, Markam and Netam.

Hence, socially the tribe is divided into two exogamous moieties, the Netam & the Markam. The former stands for *niji banshi* (the consanguineal relatives) and the later stands for *suraj banshi* (the affinal relatives).

The Bhunjia possess a fairly muscular body with dark skin colour. The stature varies from short to medium height while a few cases of tall statures are often found. They speak a dialect which is a mixture of Oriya and Chhatisgarhi.

The Bhunjia villages vary in size from as small as 7 to 10 households to as big as 50 to 60 households.

The most striking cultural land mark among the Bhunjia is their kitchen-shed which is built apart from other huts of a household, is fenced around so that no outsider can have any contact with the shed. In case by mistake any body touches any part of it, the same is immediately set on fire and razed to the ground. For that period the food is cooked in an enclosed space until a new shed is built up. The kitchen-shed is one of the sacred places and no woman during her menses is allowed to enter into it. Kitchen-shed continues to be held as a shrine.

The main and the supreme deity of the Bhunjias is Sunadei. She has imposed some restrictions on her devotees. Some of these restrictions are the use of tiles for roofing, the cots and beds for sleeping, the country husking lever for paddy husking and the use of blouse by the women.

The commensal restrictions and food taboos observed by both men and women keep them as clearly marked tribal community and help them in preserving their cultural distinctiveness and identity. They have been following these impositions so rigidly that any violation in any form will definitely bring malady and ill-harvest. One illustration here will clearly establish the fact.

That once the Forest Department decided to build an inspection Bungalow at Sonabera village with a tile roof. But the Bhunjias living there raised objection of it. But later on they had been convinced that the building did not belong to them. So they co-operated with the work and the building construction was done with the tile roof.

The Economic life of the tribe is very simple and of subsistence type. In order to maintain their subsistence they practise low land paddy cultivation and shifting cultivation in small patches. The extract from lands and the gleaning from the forest provide them just the bare minimum. Small land holding and the primitive method of cultivation retard them to prosper in the field of agriculture resulted poor economic condition day by day. So whatever food one gets from all sources is less than the required consumption. So the question of saving is out of thought.

They are in the habit of carrying on shifting cultivation which is called Bewar, a term used by the Gonds of Madhya Pradesh for such type of agricultural practice. It is a co-operative practice i. e. the labour is available to each

household without any payment. A particular piece of land is cultivated for three consecutive years after which it is kept fallow for 3 to 4 years thereafter it is again taken up for growing crops.

The Bhunjias grow Bajra (*Pennisetum typhoideum*), Janha (*Sorghum vulgare*), and cucumber in the lands around their houses which are known as hari Jami (lands). These crops are followed by mustard, maize and beans which are grown in the same bari lands.

The local varieties of paddy which they grow are Sankarai, Banskantia, Dubraja and Jalli. There are also other local varieties of paddy namely, Setka, Kuli and Bairguntha which take a period of three to four months for harvesting. High yielding varieties of paddy crops are still unknown to them.

The paddy fields are more or less open to the ravages of wild animals. Unless they take pains to keep watch over their fields and drive away the wild animals, they can hardly expect to reap a good harvest. Untimely rain and frost fall also affect the growth of the plants, which result in poor harvest. They do not have any control over the parasites weeds, insects and other pests which ruin the crops.

The study of the tribe is worthnoting from two angles. One is related to cultural conservatism of the tribe and the impositions which perpetuate continuity of traditional cultural pattern and the other relates to the searching up of a suitable strategy of the economic upliftment of the tribe. Now the anthropologists in action have not been interested in preserving the tribal communities as museum specimen for their anthropological study. Instead they are in searching up of a suitable strategy and planning for their overall development using the ethnographic knowledge collected directly from the field.

The following suggestions may help in changing the socio-economic conditions of the Bhunjia living in the plateau.

1. Input assistance of fertilisers will replace the cutting of bush and small shrubs and even rare species which are being dried, burnt and the ashes used in the field as manures.

2. Road communication is badly necessary to keep contact between the Bhunjias of the plateau and the nearest business centre i. e. Komna and Khariar. So the itinerant middle men can not take advantage over their products.

3. Road communication will help the Government and semi-Government officials to take up the villages in the plateau to implement the developmental schemes and keep touch with the follow-up actions.

4. Disease is not uncommon to them. The blind believes and the religious dogmas will not medically help to get cure a man, the diagnosis and treatment. Without finding any source of medical treatment the Bhunjias are to depend upon their supreme Goddess 'Sunadei' who acts as the custodian of their society being propitiated by worship and offerings. So a hospital of any type is necessary in the plateau. As a result the poor ignorant inhabitants will immediately get the medical treatment which will in long run help to wean them out of blind believes and religious dogmas.

5. Literacy is the weapon for the socio-economic change now. Through it people become articulative and capable of perceiving, interpreting, criticizing and finally transforming their society in an upward direction. But in the plateau the educational facilities are out of question. So proper educational facilities should be provided to the Bhunjias living in the plateau.

6. Taking the ignorance of the tribe many ill-minded non-tribal home at in farming and trading have infiltrated into the plateau to find out their fortune. The migrants are well equipped with advanced technology and are far-advanced in both crop and animal husbandry as compared to the indigenous tribals of the plateau, so to say who are still in the stage of pre-agricultural stage of development. Attempts should be made to keep away these migrants who are exploiting them knowingly and unknowingly.

The suitable measure for a global development of this communities is to declare them as a primitive tribe and the Sonabera plateau as one of the Scheduled area of the State, which will consequently bring into force the law and order of the Government there.

Keeping these above facts in view, a location specific micro-project can be established in the plateau for the allround development of the group and certainly enough these group of people can enjoy an everlasting freedom from poverty, disease and illiteracy.

IMPORTANCE OF SOME FOLK PLANT NAMES

R. D. Girach, Aminuddin
and Idris Ahmed

Introduction

Plants are used by the man from the onset of Civilisation from generation to generation as food, medicine, timber, fuel, beverages, oil, gum, fodder, dye and many other miscellaneous reasons. Large number of plants are used from birth to death for everyday requirements. They are thus required to be referred and are assigned vernacular names. Only those plants which are either not of any use or rare in the area are devoid of local names.

Folk names or local names vary from place to place; language to language and community to community depending upon the use of plant or its parts in which people are interested. As a result, sometimes one plant gets too many local names. According to Jain (1963) several hundred plants have over twenty local names. Similarly several different plants are given one and the same local name.

Many a times, folk names refer to characteristic shape, size or utility of the plant or its parts. Which may provide useful information. According to Bretting (1984) comparative studies of the common names and uses of particular plants by different human cultures are needed to confirm the seemingly strong correlation between particular human uses for plants and descriptive or functional common names.

While working among the tribals of Orissa in various districts for ethno medico botanical explorations some interesting folk names referred by local inhabitants or tribal communities in different regions were recorded in the field diary.

It was found interesting to compile the data collected for local names. An attempt has been made to analyse local names of some medicinal plants collected from different regions and

different communities during the survey tours of tribal pockets of Orissa to see how information on vernacular names of plants is useful to us.

Data collected on 53 plant names is tabulated in table 1 and 2 respectively.

Observations

Folk names of 53 medicinal plants are reported in this communication out of which 20 folk names are referred to plants depending upon their function (37.73 per cent) and 33 folk names are descriptive (62.27 per cent) Table 2.

Out of 20 folk names of functional nature, 4 names are assigned as to suggest their specific use in particular disease, 3 folk names suggest piscicidal activities of the plants, 4 names suggest their edible properties. While 9 names are referred to other uses like necklace, broom, adultrant, skin irritant or in magico religious beliefs. (Table. 1).

Table 2 indicates that 25 folk names are based on form (75.75 per cent) i. e. associated with the morphological feature of the plant. In most of the cases they are compared with particular organs of plants or animals, folk names are based on habitat (12.12 per cent) i. e. plant growing in water or near water sources, or showing xerophytic characters, while 4 folk names (12.12 per cent) indicate both habitat and form of the plant.

Hemidesmus indicus-- R. Br. is called 'Sugandhi' due to an aromatic smell in its root. The plant (root) is used in Unani system of medicine in the name of Ushba-e-Hindi. *Ichnocarpus frutescens* R. Br. (Root) was found to be similar to that of sugandhi which is sold as an adultrant of sugandhi. Its root is devoid of any aromatic smell. Thus this may help in collection of genuine drug in the field.

Discussion

Human beings have developed very strong relationship with plants. Plants known for their uses for various purposes in daily life are given local names.

Folk names some times provide a very useful information about the plant (Jain, 1963). Most of the folk names are based either on some characteristic features of the plant or they are referred due to their specific properties (Bretting 1984).

It was found that vernacular plant names given by the tribal communities of Orissa, fall into two categories i. e. functional and descriptive.

Vernacular plant names of descriptive nature may further be classified depending upon shape, colour and other morphological features of plant or their parts. Similarly vernacular plant names of functional nature may also be divided according to medicinal, piscicidal, toxic, or harmful nature and habitat. Thus confirming the views of Jain, (1963) and Bretting (1984).

Summary

Folk names of the plants are functional and descriptive in nature among the tribals of Orissa.

Carefully recorded plant names may give useful information on plants. They may serve in some cases as an important aid for quick field identification and to avoid controversy.

Acknowledgement

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TABLE I

Vernacular Names (Functional)

Locality F. B. No.	Taxon	Vernacular Name	Part	Remarks
(1)	(2)	(3)	(4)	(5)
Bhadrak (1)	<i>Cassia alata</i> L.	Jadomari	Leaf (D)	Jadoo-ringworm, Mari-to kill plant is useful in the treatment of ringworm.
Sayidabad (17)	<i>Andrographis paniculata</i> Nees.	Bhui nimbo	Plant (M)	Bhui-Herb, Nimbo-neem A herb bitter in taste like that of neem.
Elkhar (78)	<i>Nyctanthes arbor-tristis</i> L.	Har singhar	Flower (M)	Har-Necklace, Singhar-to decorate, flowers as necklace.
Geltua (85)	<i>Cleome viscosa</i> L.	Anu Sirisa	Seeds (M)	Anu-small, sirasa-sarso (Adulterant of sirisa).
Dhulsi (335)	<i>Thysanolaena maxima</i> Oklz.	Jhadu Gatcho	Inflorescence.	Jhadu-Broom Gatcho-plant Broom is made out of inflorescence.
Belghar (358)	<i>Cissus quadrangularis</i> L.	Had bhanga	Stem (D)	Had-bones, Bhanga-broken plant applied to fractured bones.
Gariapara ghar (496)	<i>Tragia involucrata</i> L.	Bichuati	Plant	Bichhu-scorpion, plant causing skin irritation like that of scorpion bite at touch.

Locality F. B. No.	Taxon	Vernacular Name	Part	Remarks
(1)	(2)	(3)	(4)	(5)
Bantia pada (978)	<i>Clerodendron siphonanthus</i> Br.	Puda nargi ..	Stem (D)	Nargi-A type of blister on the head of children plant (stem) to be tied as an amulet.
Sagara (1122)	<i>Stereospermum suaveolens</i> Dc.	Utkapali ...	Fruit (D) ..	Ut-Half, Kapali-forehead plant used to cure migraine (Adhasisi).
Badampahar (1341)	<i>Smilax macrophylla</i> Roxb.	Ramdantuni..	Stem (MRB)	Belief among the tribals that twigs of the plant was used by Lord Rama as tooth stick during Vanvas.
Durgaizharan (2033)	<i>Strychnos potatorum</i> Linn. f.	Koyeir manjho	Fruit ..	Manjh-fish, fruit used to poison fishes.
Narsingnath (2020)	<i>Mallotus philippinensis</i> Muell.	Sinduri ..	Glandular Hairs on the fruit.	Red dye from glandular hairs resembles sindur in colour.
Sonabehda (2054)	<i>Dioscorea bulbifera</i> L...	Pitta konda ..	Tuber ..	Pitta-bitter Konda-underground part (tuber, Rhizome Root, etc.) Tuber bitter in taste.
Sinapali (2079)	<i>Celsia coromandeliana</i> Wall.	Patri manjh ..	Leaf (R) ...	Patri-leaf, Manjh-fish, crushed leaves used for poisoning fishes.
Sinapalli (2080)	<i>Amaranthus spinosus</i> L.	Kanto sago ...	Plant (E) ..	Kanta-spine sago-vegetable plant having spines used as vegetable after cooking.
Mudulipada (1651)	<i>Elephantopus scaber</i> L.	Dashti gatcho	Plant ..	Dashti-evil spirit; gatcho-plant; used as magico religious belief to overcome the effect of evil spirit.
Mudulipada	<i>Casearia tomentosa</i> ..	Beni manjh ..	Fruit (P) ..	Manjh-fish; fruit powder used as fish poison.
Simlipal ..	<i>Portulaca Oleracea</i> L. ...	Dali ara ..	Plant (E) ..	Ara-vegetable; plant used as vegetable.
Mottu ..	<i>Grewia rothi</i> (Dc.) ..	Miri-chara ..	Plant (E) ..	Miri-Deer; chara-grass, grass plant relished by deer.
Paikmal	<i>Mucuna prurita</i> Hook...	Bai khujari ..	Fruit (Si.)..	Khujari-irritant or itching fruit causes itching at touch with skin.

Abbreviations used :

- D—Associated with disease
- E—Edible
- P—Piscicidal
- S—Skin Irritant
- M—Miscellaneous
- MRB—Magico-religious beliefs

TABLE 2
Vernacular names (Descriptive)

Locality (1)	Taxon (2)	Vernacular name (3)	Part (4)	Remarks (5)
Khajuripada	.. <i>Hemidesmus indicus</i> R. Br.	Sugandhi	.. Root (F) ..	Sugandh-Odour, Freshly dried root has fine odour.
Belghar	.. <i>Rubia cordifolia</i> (L) Kurz.	Rang cher	.. Root plant	Rang=colour, cher=root having coloured (redish brown) root bark.
Rani pathar	.. <i>Elephantopus scaber</i> (L) L.	Mayur chulia	.. Inflore- scence (F)	Ma y u r=p e a c o c k. c h u l i a=p e a c o c k's crown. Inflorescence resembling peacock's crown.
Gariaparaghat	.. <i>Agremone maxicana</i> L.	Nippania	.. Plant (H) ..	Nippania=with out water showing xerophytic habit of the plant.
Gariaparaghat	.. <i>Phyllanthus niruri</i> (L)	Bhui aonla	.. Plant (F) ..	Bhui=small land plant aonla-arrangement of leaves like aonla, A herb having similarity with that of Amala (E. <i>Officinalis</i> .)
Gurguria	.. <i>Combretum nanum</i> Ham.	Bhui arjun	.. Plant (F) ..	Herb having winged fruits like Arjun (T. <i>arjuna</i>).
Gurguria	.. <i>Mimosa pudica</i> (L)	Lajkoli chui mui	Leaf (F) ..	Leaves at touch close their leaflets as if feeling shy at the touch.
Santhya	.. <i>Opuntia dillenii</i> How	Nag pheni	.. Stem ** (F)	Nag=cobra, Pheni= hood. shape of stem resembling hood of cobra.
Santhya	.. <i>Euphorbia tirucalli</i> (L)	Danguli siju	.. Plant (F) ..	Danguli=pieces, Siju =hedge A hedge plant resembling joint pieces.
Paikmal	.. <i>Paederia foetida</i> (L)	Gandhali	.. Plant (F) ..	Gandh=foetid smell. Bruised leaves give foetid smell.
Bhadrak	.. <i>Martynia diandra</i>	Bagh nakha	.. Flower ** (F)	Bagh=tiger, nakh= claw. flower in bud condition resembles tiger's claw.

Locality (1)	Taxon (2)	Vernacular (3)	Part (4)	Remarks (5)
Badampahar	.. <i>Helicteres isora</i> L.	.. Murmuria	.. Fruit (F)	.. Murmuria=s p i r a lly coiled fruit.
Paikmal	... <i>Datura fastuosa</i> L.	.. Koda dudura	.. Plant (F)	.. Koda=Black, Plant having blackish stem and mibrib.
Meghasani	.. <i>Terminalia chebula</i> Retz.	Kosi daroo	.. Plant (F)	.. Daroo=tree, Kosi=harada.
Chandbali	.. <i>Manihot utilissima</i> Pahl.	Simuli konda	.. Plant (F)	.. Simuli=b o m b a x K o n d a=underground position, plant resembles like semal (<i>B. malabaricum</i>) in leaves and having tuberous root.
Khairput	.. <i>Hemidesmus indicus</i> R. Br.	Dudho leh	.. Plant (F)	.. Dudho=latex, Leh=climber. A climber having latex.
Sagara	.. <i>Phaseolus sublobatus</i> Roxb.	Banbiri	.. Seeds (M.F)	Ban=wild (Jangali) Biri=Moong. A wild relative of moong.
Junagadh	.. <i>Zizyphus oenuplia</i> Mili.	Konta koli	.. Fruit (F)	.. Konta=spines; koli=fruit. Fruit of the plant, having spines.
Malkangiri	.. <i>Gardenia latifolia</i> Aiton	Dongar kurudu	Plant (F)	.. D o n g a r=s t o n y, mountains p l a n t showing its habitat.
Gandhaman Parbat	<i>Asparagus racemosus</i> Willd.	Ishwar jata	.. Plant (F)	.. Ishwar=God, Jata=Hair (Kesh) plant resembling kesh of god.
Paikmal	.. <i>Sphaeranthus indicus</i> L.	Bhui kadam	.. Plant (F)	.. A herb resembling mini kadam (<i>Anthocephalos cadamba</i>) when in fruiting.
Sinapali	... <i>Pitheoclobium dulce</i> Benth.	Ganga tantuli	.. Plant (H. F.)	Tentuli= <i>T. indicus</i> (imli) Ganga=river, plant growing near water resources having fruit like tentuli.
Balimela	... <i>Manihot utilissima</i> Pohl.	Rasokandoj a d o	Plant (F)	.. Raso=latex, kando=tubers root Jado=Ricinus (Arend) Plant having leaves like Arand with latex and w i t h underground tuber.

Locality (1)	Taxon (2)	Vernacular (3)	Part (4)	Remarks (5)
Bhadrak	.. <i>Croton sparsiflorus</i> Morunj.	Ban mirchi	.. Plant (F) ..	Leaves similar to that of Mirich (<i>Capsicum</i>).
Tihidi	.. <i>Cuscuta reflexa</i> Roxb.	Nirmuli	.. Plant (F) ..	Nirmuli=without root A parasitic plant.
Sankasira	.. Ditto	.. Nipatta	.. Plant (F) ..	Nipatta=without leaves
Badampahar	.. <i>Loranthus</i> sp.	.. Atta Madang	.. Plant (H) ..	M a d a n g = p l a n t growing on other plant as parasite Atta= <i>Anona squamosa</i> parasitic plant growing on <i>Anona squamosa</i> .
Gurguria	.. <i>Mitragyna parviflora</i> Korth.	Gada koim	.. Plant (H. F.)	Gada=stream, koim= <i>Adina cordifolia</i> plant growing near stream having fruit like <i>Adina cordifolia</i> .
Bhanj base	.. <i>Rubus ellipticus</i> Smith	Gada toot	.. Plant (H) ..	Gada=stream; tooth plant growing around watery habitat.
Malkangiri	.. <i>Polyalthea suberosa</i> Benth.	Burhi Chamri	.. Stembark** (F).	Burhi=wrinkled, Chamri=skin (Bark) plant having wrinkled stem bark.
Phulbani	.. <i>Thespesia lampas</i> Dalz.	Bankappa	.. Plant (F.M.)	Ban=forest; Jungle Kappa=cotton tree. Wild plant resembling cotton tree (<i>Gossypium</i>). In its flowers and fruit.
Trapa ghat	.. <i>Ventilago maderaspatna</i> Goertn.	Rakta khai	.. Stembark (F).	Rakta=blood; Khai= eater strips of red blood line on the stem bark.
Gurguria	.. <i>Uraria homosa</i> Wall..	Salparni	.. Leaf* (F)..	Sal= <i>shorea robusta</i> , parni=leaf plant having leaf like sal.

F—Form of the plant

H—Habit/Habitat

*—Specific part resembling plant organ

**—Specific part resembling animal organ

Trend of growth in height and weight among the Bison-Horn Maria children of Bastar (M. P.)

Mitashree Mitra and
Alpana Verma

Preliminary accounts on the growth of heights and weights of Indian children first appeared in the early thirties of the present century. In Madhya Pradesh data on growth study are limited and such studies have been undertaken by physical anthropologists in recent years. Sharma (1970) studied growth in respect of certain anthropometric characters of the Maharashtrians of Madhya Pradesh and Mitra (1982), Mitra and Singhrol (1982) and Singhrol and Mitra (1984) also studied growth in respect of certain anthropometric characters of the Saryupari Brahmin girls and school going girls of Chhattisgarh (M. P.). The present paper deals with some aspects of growth in height and weight of Bison-Horn Maria children, which is an important scheduled tribe of Bastar district. This is the first report of any tribal population of Madhya Pradesh.

Material and Methods

According to 1981 Census, Tribes in India form 7.76 per cent of our total population. Madhya Pradesh, the largest State of the Indian Union, has also largest tribal population. Over one-fifth of the total tribal population (22.97 per cent) of the country inhabits in this State. Bastar district, situated in the South-Eastern corner of Madhya Pradesh, is the home of Gonds, the largest group among the tribals in the State and third largest group in Indian tribal population. Bison-Horn Maria constitute 12.42 per cent of total tribal population of the district.

A cross-sectional survey was undertaken on 308 boys and 272 girls of Bison-Horn Maria, an important endogamous tribal group of Bastar, ranging in age from 5 to 17 years. The whole data have been collected randomly from various

educational institutions of various villages of Bastar district. Every possible care has been taken to note the correct age of the subject. The age grouping was done according to an International convention of expressing the age at the last birthday. The techniques of taking the measurements were those of Weiner and Lourie (1969). The measurements taken were stature and body weight.

Results and Discussions

Table 1 shows the mean values for body weight of the children under study. The mean value for body weight increases continuously from 5 to 17 years. Body weight of a 5 years old normal boy is 15.40 Kgs. Bison-Horn Maria boys are heavier than the girls, at the age level 5 to 11 years. Then, by the end of 11th year, Bison-Horn Maria girls follow the rapid growth and it continues till the end of 14 years. Due to this, girls are heavier than the boys in this period of life. This is clearly marked at the end of the 13th year when the girls are about 2.5 Kgs. heavier than the boys. Soon after the 14th year, boys follow a faster growth than the girls and continue to do so thereafter, till 17 years, so that the boys are heavier by 2 to 4 Kgs. than the girls at the age level 15 to 17 years. It is observed that body weight at the age 5 is 34.22 per cent in boys and 37.21 per cent in girls of its maximum value observed at age 17.

Growth velocity shows an early spurt at age 9 in boys. The maximum velocity is observed at age 15 in boys. In boys another peak at the age of 11 years is also observed. In the case of girls, growth velocity shows three prominent

peaks at the ages of 8, 12 and 15 years. At the age of 12 years it gives the maximum value of the series.

Table-2 shows the mean value for stature of Bison-Horn Maria children. The average height of boys and girls at 5 years is 108.60 cms and 108.81 cms, respectively. The mean value of stature increase with the increase of age in both boys and girls. In the case of boys, the highest increment in stature is found at 8 years age and the next highest is at 15 years. In girls the highest increment in stature is seen at 12 years. The next highest increment is found at the age of 8 years. The initial value at age 5 is 67.89 per cent and 71.01 per cent of the final value in boys and girls respectively.

The stature of girls is more or less same as in the boys, in the early period of their life. After 11 years of age the girls outgrow the boys in stature. Soon after the 12th year the rate of growth begins falling in girls.

The growth velocity show prominent growth spurt at the age of 15 years in boys and 12 years in girls.

The analysis of the present data in terms of growth indicates that the maximum velocity of growth is observed by body weight and stature during adolescent period, i. e. at the age of 15 years in boys and 12 years in girls. Thus we find that perhaps the gonadal activity seems to play a significant role during adolescent period.

In body weight and stature the two most composite body measurements, it was observed that body weight in Bison-Horn Maria children

is more influenced by sexual dimorphism than stature. The difference can be attributed to the fact that while the stature composite lengths of the legs, trunk, neck and head only, body weight in addition to these include diameters, circumference and the upper extremity dimensions. Besides it has been well established that boys possess heavier bones than girls (Vallois, 1957; Seale, 1959). Thus body weight shows greater dimorphism than stature in two sexes. According to Tanner (1962) sex differences are mainly due to the difference in timing and intensity of their adolescent growth spurts. He wrote, "the male adolescent spurts occur later than the female". Consequently in the male, the whole body has a longer period of growth, causing a generally greater size, and also those differential growth rates which have been operating equally in both sexes to change the proportions from those of the baby to those of the adult continue to act for a longer time.

This is a first report on any tribal population of Madhya Pradesh with hopes that it will provide base line information on the growth norms of two important measures i. e. the stature and body weight. The other somatometric parameters are reserved for the later treatment.

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TABLE 1

Body weight (Kgs.)

Age (Yrs.)	Boys						Girls							
	No.	Mean+ (—)	S. E.	S. D.	C. V.	Absolute growth	Rate of growth in %	No.	Mean+ (—)	S. E.	S. D.	C. V.	Absolute growth	Rate of growth in %
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)
5	21	15.40	0.76	3.50	22.73	..	..	24	15.37	0.38	1.85	12.04	..	..
6	17	16.20	0.61	2.53	15.62	0.80	5.19	20	16.17	0.31	1.41	8.72	0.80	5.20
7	21	17.70	0.51	2.34	13.22	1.50	9.26	21	16.74	0.37	1.68	10.03	0.57	3.52
8	31	18.60	0.35	1.95	10.48	0.90	5.08	21	19.17	0.42	1.93	10.07	2.43	14.52
9	20	21.85	0.49	2.20	10.07	3.25	17.47	24	21.53	0.70	3.42	15.88	2.36	12.31
10	22	22.86	0.80	3.74	16.36	1.01	4.62	21	22.73	0.78	3.56	15.66	1.20	5.57
11	25	26.16	1.09	5.45	20.83	3.30	14.43	21	24.81	1.06	4.87	19.63	2.08	9.15
12	27	28.82	1.12	5.81	20.16	2.66	10.17	26	31.11	1.13	5.76	18.51	6.30	25.39
13	35	29.94	0.89	5.25	17.53	1.12	3.89	22	32.52	1.06	4.96	15.25	1.41	4.53
14	22	32.00	1.66	7.81	24.41	2.06	6.88	24	33.31	0.74	3.65	10.96	0.79	2.43
15	25	35.58	1.27	6.35	17.85	4.58	14.31	17	36.44	1.60	6.61	18.14	3.13	9.40
16	25	39.73	1.32	6.62	16.66	3.15	8.61	15	37.20	0.91	3.52	9.46	0.76	2.08
17	17	45.00	1.56	6.42	14.27	5.27	13.26	16	41.31	0.95	3.81	9.22	4.11	11.05

TABLE No. 2
Stature (Cms.)

Age (Yrs.)	Boys							Girls						
	No.	Mean ± (—)	S. E.	S. D.	C. V.	Absolute growth in %	Rate of growth in %	No.	Mean ± (—)	S. E.	S. D.	C. V.	Absolute growth in %	Rate of growth in %
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	(15)
5	21	108.60	1.03	4.70	4.33	..	..	24	108.81	0.92	4.49	4.13	..	..
6	17	113.20	1.38	5.67	5.01	4.60	4.23	20	113.15	1.38	6.16	5.44	5.34	3.99
7	21	116.70	1.40	6.40	5.48	3.50	3.09	21	117.55	1.77	8.13	6.92	4.40	3.89
8	31	122.80	1.06	5.90	4.80	6.10	5.23	21	124.27	1.43	6.57	5.29	6.72	5.72
9	20	128.67	1.41	6.30	4.90	5.87	4.78	24	129.23	1.38	6.79	5.25	4.96	3.99
10	22	131.60	1.53	7.20	5.47	2.92	2.28	21	131.20	1.57	7.19	5.48	1.97	1.52
11	25	136.02	1.74	8.70	6.40	4.42	3.36	21	136.00	1.96	8.98	6.60	4.80	3.66
12	27	141.64	1.62	8.43	5.95	5.62	4.13	26	144.22	1.56	7.96	5.52	8.22	6.04
13	35	146.44	1.25	7.40	5.05	4.80	3.39	22	145.57	1.21	5.67	3.89	1.35	0.94
14	22	148.97	1.98	9.27	6.22	2.53	1.73	24	147.34	1.44	7.07	4.80	1.77	1.21
15	25	154.97	1.71	8.57	5.53	6.00	4.03	17	149.21	1.48	6.09	4.08	1.87	1.27
16	25	158.58	1.52	7.61	4.80	3.61	2.33	15	152.15	1.77	6.87	4.51	2.94	1.97
17	17	159.96	2.38	9.81	6.13	1.38	0.87	16	153.22	1.89	7.58	4.95	1.07	0.70

Our Contributors

- Dr. N. Patnaik .. Director, Tribal & Harijan Research-*cum*-Training Institute, Bhubaneswar
- Dr. S. S. Chib .. Reader in Geography, Directorate Correspondence Courses, Punjab University, Chandigarh.
- Shri M. Acharya .. Lecturer in Anthropology, B. J. B. College, Bhubaneswar
- Smt. S. Routray .. Research Assistant, Tribal & Harijan Research-*cum*-Training Institute, Bhubaneswar.
- Shri P. K. Mohanty .. Lecturer in Anthropology, Dharanidhar College, Keonjhar
- Shri R. D. Girach }
Shri Aminuddin } Survey of medical plants unit, Regional Research Institute of Unani
Shri Idris Ahmed } Medicine, Bhadrak.
- Smt. Mitashree Mitra }
Smt. Alpana Verma } Department of Anthropology, Ravishankar University, Raipur