Prehistory Of The Chotanagpur Region Part 3: The Neolithic Problem And The Chalcolithic

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Abstract

The archaeology of the Chotanagpur region, as explained earlier, has been steadily giving new surprises over the years. It is time now to rethink the whole issue thoroughly in the context of influences from the entire region as well as indigenous growth and development of traditions and ways of life. First, an attempt has been made to cobble together the very patchy Neolithic record of the region and then the conclusions have been transferred to the Chalcolithic period in the region as well. This work will attempt to take into account the major sites of this period in the region. This data is analyzed through the lens of certain theoretical perspectives that may explain them. This would lead to a better understanding of the continuity of the prehistoric sites found in the Chotanagpur region. Finally, it might prove to be a means of further understanding the way prehistoric cultures have been manifesting themselves during the early historic period.

INTRODUCTION

The Chotanagpur region is a plateau area which now covers the Indian states of Jharkhand, Bihar, West Bengal, Orissa and Madhya Pradesh. It has an average elevation of about 2000 feet above sea level. The soil and other stratigraphic conditions have been discussed earlier (see Ghosh; 2008(a)).

The problem of this zone was always that the Neolithic celts found in this area were few and far between. There did not seem to be any continuity with either the confusing Palaeolithic and Mesolithic periods with its fairly large numbers of groups (see Ghosh; 2008(b)) or with the scattered starting of state systems in the latter period. Hence, though there were celts found, there was no area which had a large number of celts. Also, there was no evidence that there had been trade or the association of celts with a large cultural assemblage which could be the precursor of a state system or even that of a local chieftain.

Two possibilities could have emerged from this. Firstly, it could be that there was only a very scattered Neolithic in the region. The few celts found could also have been obtained as part of trade goods. Secondly, it was also possible that the Neolithic began in fertile areas which became hubs of agricultural activity later. As a result, signs of previous occupations were wiped out, leaving the scattered evidences found today. A look at the totality of the evidence throws out a third possibility. This possibility is inherent when one looks closely at the data of the large populations that existed in the previous periods. It seems that it might have been possible for such early groups to adopt a multiple economic system where systematic agriculture may only have been a fraction of the economy and other aspects of horticulture and other modes may have occupied a significant proportion.

Perhaps this is what Prof. D.K. Bhattacharya meant when he jokingly talked of the great Neolithic scam in undivided Bihar.

Since such communities were following multiple economies earlier, it would come as no surprise then to see them add on other abilities and economies in the Chalcolithic period. Hence, eventually, one will have to do away with terms like Palaeolithic, Mesolithic, Neolithic, Chalcolithic and Iron Age as far as communities in this region are concerned.

THE NEOLITHIC PROBLEM IN CHOTANAGPUR

Neolithic tools are mostly found in the top layer of the soil. It is possible that these implements have gradually worked their way to the top over the years. Such neolithic implements include polished or unpolished celts, small arrowheads of leaf-shaped or chisel-edged patterns, cores, flakes, stone beads, chisels, adzes, axeheads, etc.

The collections of Bodding in 1901 and 1904 were transported to Oslo by 1934 and were analyzed by F.R. Allchin in 1962 (1979) who divided the entire collection into
two – a Neolithic assemblage (2149) and a Late Stone Age assemblage (38) of a total of 2620 pieces.

Mitra (1931) notes that a celt he observed from S.C. Roy’s collection from an Asura grave in village Gora in the Khunti subdivision of Ranchi district in 1930 was called Thār-dīrī or ‘Thunder stone’ by the Kolarian people of the region. It would be dated about 15,000 to 25,000 years old. The Kolarian people believe these to have rained down on the earth from the skies by gods or semi-divine personages like Rama or Lakhshmana. These celts have a divine afflatus and kept beside a parturient woman, it aids in easy and speedy deliveries.

Mitra (1931) also notes that such celts are also called ‘Thunder stones’ among the Mongoloid tribes of Assam. The Naga tribes in the Naga hills of Assam call them ‘thunderbolts’, as mentioned by Prof. Henry Balfour in an article in Folklore in June 1929. Some call it luck-bringing, while the Lhota Nagas do not touch them. The Ao Nagas believe them to bring thunderstorms and cause houses to be struck by lightning. Balfour, in an article on the issue in Folklore of March 1930, describes such a case accurately, and the Ao Nagas believed it had been caused by a celt with a reddish streak running through it. The celt was sent to the Pitt-Rivers museum of Anthropology by J.H. Hutton and in the November gale of 1928 a large portion of the museum roof was blown off. In another Naga case, mentioned by J.H. Hutton, it was seen that there was some belief in its powers to reduce the intoxicating powers of alcohol and for cooling the tongue by licking it. There is belief in other medicinal powers associated with celts also, as mentioned by S.C. Roy, especially relating to headache, difficult urination, rheumatic or other pain in any part of the body, affections of the lungs, etc. Water with which the stone has been rubbed on another stone is an essential part of the remedy, being applied to the affected part. Perforated rock-crystal beads called rati-jara (‘night fever’) are dug out from the fields or found in ancient cinerary urns are valued as a cure for certain fevers, especially those which occur in the night.

One of the few Neolithic sites in the region has been found from Chirand which has been excavated (Narain; 1970, Vishnu Mittre; 1972). It is in Saran district of Bihar, about 8 kms. East from the district headquarters Chhapra. The flood plains of the Ganges were used for grain cultivation by the broadcast method and microlithic blades hafted onto clay or wooden sickles were used to cut the grain (Prasad; 1980). Carbonised wheat, rice, barley, lentils and legumes (mung, masur and peas) have been found at the Neolithic level.
personal communication).

Sathe and Badam (1996) have commented about the animal remains found from Senuwar in Rohtas District, Bihar. The Period IA is Neolithic (3rd millennium BC), Period IB is Neolithic-Chalcolithic (1700±120 BC, 1600±120 BC, 1500±110 BC and 1400±110 BC), Period II is Chalcolithic and Period III is NBP and Kushana. Less domestic buffalo than cattle, and after that sheep and goats are seen. Domestic buffalo and cattle were killed between 6 to 18 months while sheep/goats between 8 months to 1 year. Pigs were killed between 1-2 years of age. One upper incisor of an equid was found at Chalcolithic level. Nilgai, blackbuck, four-horned antelope, barking deer, chital or spotted deer, sambar/barasingha (Cervus sp.) show occasional hunting. Along with this there are three genera of mollusks, abundant in Neolithic-Chalcolithic period. Half of the meat eaten seems to have been cattle or buffalo. However, in spite of the rivers Kudra and Son being nearby, there were no fish remains.

Kumar and Pant (1996-97) divide the era into three stages:

Stage I: (ca. 2300 BC – 1950 BC)

It is represented by the Senuwar sub-period IA and the entire Neolithic complex of Mahagara-Koldihwa. It is based on the economy of the cultivation of only one cereal (rice) and the domestication of various animals, partly supplemented by gathering, fishing and hunting. It is compared with the tribal economy of Chotanagpur of the present day among the Santal, Munda, Oraon and Ho. A study of faunal remains of Senuwar by Badam, shows scattered animal bones (domestic/hunted or butchered), considered the property of the community with the flesh being distributed. This may have been true also for the communal ownership of domesticated animals. Cattle and sheep were domesticated at Mahagara and Senuwar. Senuwar also domesticated buffaloes and pigs. Mahagara domesticated goats and horses also. Pigs are kept by the Santals, Mundas and Oraons. A cattle pen was located at the centre of Mahagara. Eighteen huts were found but none had cattle sheds. Whether rice was cultivated in the same pattern is unknown. Contributing only marginally, rice was supplemented by the collection of wild rice, grasses (job's tear and fox's tail), wild fruits (ber, etc.), hunting of big games, particularly big ungulates, and exploitation of aquatic fauna (turtle and fish). Such egalitarian societies had no socio-economic hierarchy. Thus, pastoralism with hunting-gathering economy and rice cultivation were all present. Rice, barley, field pea, lentils and some millets were identified. There was also dwarf wheat, grass pea, kodon and vetch. It contains Red Ware, Burnished Red Ware and Burnished Grey Ware. Some Burnished Grey Ware contains post firing ochre painting on the rim. Bowls show the same identification marks as the Vindhyan Koldihwa and Mahagara Neolithic.

Stage II: (ca. 1950 BC – 1650 BC)

It is marked by the cultivation of some new cereals and pulses, like barley (Hordeum vulgare), dwarf-wheat (Triticum spaeorococcum), jowar-millet (Sorghum bicolor), finger-millet/Ragi (Eleusine coracana), lentil (Lens culinaris), field pea (Pisum arvense) and Khasari (Lathyrus sativus). It was reached by Senuwar middle level to the end of Sub Period A. Similar agricultural carbonized grains were found from Chirand and Taradih. A two crop system exists but no further changes occur in mode of habitation, pottery, stone objects, bone objects and other cultural patterns. Wheat, barley and pulses found here are similar to the Indus Valley Civilization. It is claimed here that after the decline of the Harappan cities around 2000 BC, the people moved eastwards and hence this diffusion occurred. The Belan valley seems to have missed this change, and it affected the Kaimur foot-hills of Bihar. As people settled they moved to places east and north like Taradih, Chirand, Chechar-Kutubpur and Maner. Domestication of animals and hunting and gathering continued, though agriculture became more dominant.

Stage III: (ca. 1650 BC – 1300 BC)

Copper was introduced but the economy remained Neolithic. This was seen at Senuwar Sub Period B of the Neolithic. Though no copper was found in the other places it was also seen at Chirand, Chechar-Kutubpur, Taradih and Maner. A two crop system of agriculture exists, with domestication of animals, gathering of forest produce, big game hunting, and increased fishing. New species of wheat, millet and pulses are seen here. Seeds of bhang, dhatur have been found as well as a piece of iron wood (found in north Bengal and Assam). Bigger antler implements are now used for cultivation. Though lifestyles remain the same at Senuwar after the introduction of copper, marginal increase in number and types of all things occur including beads and there is some refinement and modifications. It may also show a larger number of people and a higher standard of living. New craft activities may also have begun due to copper. The copper was from Raika mines and the single lead rod could be from Phaga area of Bhagalpur in Bihar. Most microliths
are made on bladelets.

According to Ray (2004), this stage is very widespread and the major tool types are axes, adzes, chisels, wedges, knives, choppers and heavy-duty scrapers made on altered basalt. Chipping, pecking and grinding is the method of making these tools. Microlithic tools on cherts are associated with Neoliths. There is also pot-making, with pots being crude, thick, handmade, grit tempered and ill fired, orange and reddish buff in colour. Pottery types from different areas of eastern India seem to be similar. Barudih, Chirand and Pandu Rajar Dhibi are three excavated sites dating to the Neolithic. Burnt rice at Barudih was dated to about 1,000 B.C. Other dates obtained for similar beds are in the Bangladesh formation dated to 7000-6000 years B.P. Domestication of plants and animals occur, with village communities and craft specialization, like pottery and textile. Bhattacharya (2004) makes certain relevant comments about the Neolithic in Jharkhand from 2000-1000 BC. A Neolithic is where the human population has become sedentary, has ceramics, ground and polished axes and domesticated cereals and livestock. However, he claims that in the middle Ganga valley adjoining the Chotanagpur region, there might have been a multi-‘species’ farming community growing but having interactions with metal-producing and stone-material exchanging communities in the Chotanagpur region. The Chotanagpur region, being hilly, had to recourse to multiple economies for survival while those near the river valley plains did not need to do so. As a result, over all these types of tools and metals a repeated celt-making activity remains in the region. Further, due to trade and the area being rich in resources, it did not need to shift from older economies to new ones since there was no pressure or stress upon it to do so. As populations grew, they faced stress and sections would join a local agricultural community as a slightly different ethnic group with an ability to do artisanal or other activity. Such hunting groups number 215 in the Ganga valley. Many were sucked in as labour in about 1800 to 600 BC.

The earliest use of wheat and barley in India seem to be 2500-1800 BC in the Eastern Indian region. For rice, it 1500-1800 BC in the Eastern region while it goes up to 2300 BC in the Western region. For Jowar (Sorghum) millets it is found in Central India at about 4-5th century BC to 3-6th century AD. In the Ganga plains, rice was seen at Koldihwa at 5440 ±#177; 240 BC. In Bihar, rice has been found in early historic, Iron age and the Neolithic periods (earliest to about 1300 BC). In West Bengal, it has been found up to about 1250 BC in the Chalcolithic period. In Madhya Pradesh, though, all of the major agriculturally used species are found up to 2000 BC in the Chalcolithic period. In Orissa, rice has been found in about 1500 BC in the Neolithic period (Vishnu-Mittre; 1989).

It would be useful, in this context to review the ethno-archaeological studies from the region that have led to a contribution to our understanding of the region.

THE CHALCOLITHIC

While acknowledging that some parts of India did have the requisite metals, a large number of methods for metal-working as well as the raw materials seem to have come from other areas outside the present borders of India, according to Lamberg-Karlovsky (1967). The Bihar-Orissa type of celts are the flat, shouldered types are also found in Uttar Pradesh. The Bihar-Orissa types of harpoons, anthropomorphic figurines, antennae-hilted swords and spearheads seem to have evolved from Bihar-Orissa types found from copper hoards. Tin was worked in India in ancient times from Hazaribagh district, copper from Singhbhum district and copper ore associated with nickel from Singhbhum district. Campbell, in his analysis of 27 axes from Manbhum in 1916 claimed that they were produced in closed molds and then beaten to the required thickness while still hot.

Surprisingly, V. Ball in 1869 attributes the older copper workings in Singhbhum to be done by Seraks or Jaina lay worshippers. This seems to be partly true for many areas in India. If so, then they may be dated to at least 10-13th centuries AD. A pot of money of the Puri-Kushana period were found in association near the Rakha mines. The coins were not trimmed and it could be that a mint was set up near the copper mine itself. These could thus be dated to about 6-7th centuries AD. It seems as if the copper-iron age was coeval with the Neolithic and in this region, in some way, the two were connected. It is thus probable that the copper-iron-gold mining in the region could be around 1st-2nd millennium BC (Chakrabarti; 1993).

Beads of carnelian, agate, onyx, crystal and glass are also found in association with mining localities of eastern Singhbhum. They seem to be dated to a general early historic date. Some also have palaeoliths and neoliths in association. Further, the skill of these workers has been of a very high order and they have been extremely efficient at removing copper, so much so that they resemble present standards of copper mining and smelting (Chakrabarti;
Copper celts have been found in the past (Campbell; 1916) in the low hills from Paresnath to Pokhuria in the north of Dhanbad Subdivision to the Barakar river in the North, especially from Bisuadih and in a bundle dug up about a foot below the surface in Kolber. They were also found by Cobden-Ramsay (1916) from Bhagra Pir in Mayurbhanj, where they were again about a foot below the surface on the bank exposed by the river, a total of nine or ten pieces in all. Many other celts, ornaments and other finds have been reported by Roy (1916(a), 1916(b)).

There seems to have been a preponderance of tin alloys in the Ranchi region though lead and zinc mixtures are also found. However, all of the known copper and other metal-using sites had been using scrap metal or old metal as part of their raw material. As a result, it may not be ultimately possible to trace these metals to their original sources with such ease as has been believed earlier. A variety of alloys and mixtures have been repeatedly used in various regions in India (Lahiri; 1994-1995).

According to S.P. Gupta, the Copper Hoards found in the region began from Bihar about 2,000 BC and flourished in the Jamuna-Gangetic valley between 1800-1300 BC. He shows that there is a link between the copper items found in the Bengal-Bihar zone and the U.P. zone and they should be taken up together (Gupta; 1965).

At Bahiri, the mound Chandra Hazar Danga in Birbhum district, had a Black-and-Red Ware pottery as the prominent type. It was excavated by Chakrabarti in 1981. Period I dates were 1120 – 795 BC, Period II at 810 – 410 BC and Period III at 660 ±177; 180 BC. Iron-smelting was carried out in large amounts in the Period I and II (Chakrabarti; 1993).

One of the seven dates is Chalcolithic for Hatikra in Birbhum district (about 1000 BC). The other six dates are between 325 and 990 AD (Chakrabarti; 1993).

In this stage both metal and stone elements for the making of tools are found. The metals include copper, brass, bronze and iron. There are also chipped and ground celts, flake tools and metal ornaments. Orissan sites include Pallahara, Kuanr and Kanjipani, Dhalbhumgarh, Maubhandar and Rakha mines in Jharkhand and Porihati and Dhobakacha in West Bengal. Excavated by Ray (1993) and Ray, Kundu and Bhattacharya (2000), it shows all tools made on metamorphosed basalt, with heavy-duty tools being chipped celts, wedges, saddle querns, sickles and thick knives. Flakes, blades and cores are found as blanks as well as utilized pieces, and long blades are found with sharp lateral margins and marks of use. Levalloisian, punching and pressure-flaking techniques dominated. Wastes outnumbered tools, the site being a factory site and showed inhabitation. Potsherds (red and buff coloured but not very fine in texture), burnt clay and brass ornaments were also present, with crucibles (thick, heavy and with embedded metal slag), earthen pellets for slings, and rings and bangles made on brass. The ornaments analysed showed that the alloy was prepared by simultaneous reduction of chalcopyrite and lead zinc sulphide ore over a charcoal fire, perhaps a method used earlier in the Chalcolithic period. Ray claims that the evolving of the state in the region is due to the monopoly of mining in the region and the development of metallurgy.

S. Pradhan (2000) reported three sites from the Karandi valley in Orissa. From a trial excavation in these sites Chalcolithic material was found. At Badibahal, slow wheel-turned Buff and Red Ware were found which were ill-fired and fragmentary. Layer 2 had potsherds of both handmade
and wheel-made type, both grit tempered and ill-fired and also fragmentary. In Layer 1, in association, a stone celt was found. At Bhejidihi, pottery, iron objects like chisels, nails and spearheads, stone objects like celts, microlithic chert bladelets, beads of quartz, carnelian, agate and jasper, terracotta objects like spindle whorls, toy cart wheels, hop scotches, copper ingot and bangles were found. Two periods were recognized here. Period I was Chalcolithic with bone, stone tools, copper and painted pottery. Period II was Early Iron Age represented by iron objects with Red Ware, Black Polished ware and Black-and-Red Ware. At Kurmigudi, pottery was found with fluted cores, bladelets, bone points, terracotta crucibles, hop scotch, a chopping tool, a broken piece of ring stone and a piece of antler. The author claims that Bhejidihi conforms to that of Golabai (painted pottery represented by post-firing painting in dark ochre) and Kambeswaripalli (painted pottery represented by creamy white painting on Black-and-Red Ware). At Bhejidihi, there is also black painting on Red Ware, similar to that of Period II at Pandu Rajar Dhibi. At Pandu Rajar Dhibi the Black-and-Red Ware is painted while at Bhejidihi it is unpainted.

The copper hoards seem to have a problematic relating to the difficulty of its assemblages and their dating or their attribution to any particular cultural group (Yule; 2001).

Many sites in West Bengal have also shown graduated metal working over long periods like Banesvar Danga, Bangarh, Bahiri, Bharatpur, Chandraketugarh, Dihor, Hatikra, Kankrajhor, Kotasur, Laljal, Mahisdal, Mangalkot, Pakhanna, Pandu Rajar Dhibi, Sulgi, Tamluk and Tulsipur. Chattopadhyay claims that the copper hoard objects were not always of the Chalcolithic period but there is a possibility of it having continued to a later period. The Eastern copper hoards differ typologically and technologically from the Western copper hoards. After maturity, it is possible that copper hoards from this period migrated to the Gangetic Doab. Brass articles were also exported to Thailand (Chattopadhyay; 2004).

interpretation, Man and Environment 26(2): 117-120.
CONCLUSIONS

An interlinking is thus seen with the Neolithic, Chalcolithic and the later and earlier periods in the region though they cannot be readily observed in every region from the stratigraphic data. Many of the sites were found near river areas though it is quite likely that these sites also existed in interior areas also and whose signs were erased through later settlements.

There is also evidence that these goods were transferred to other areas like Thailand and also to other areas within India. Further, the nature and behavior of the people who were storing copper in hoards is not clear nor is there any clear idea of which period they might have belonged to. As a result, it is quite possible that they might have been a behavioral characteristic of different cultural groups in the same region over a period of time.

The evidence seen here is also showing clearly that the use of certain tools or metals or other economic practices was not restricted to any one cultural group but was spread out over many different culture-bearing populations. Perhaps the laws of pragmatism prevailed.

What of regional variations? It seems that the areas which were adjoining the plains areas contributed most to the early farming settlements in the plains areas (see Maps). They became like a sort of satellite to such developing areas. The sheer magnitude and variety of the sites show that a great population grew and developed in this region over this period (see Appendices I and II). Thus interior sites developed on their own though they all had trade relations with other communities while those near the borders of the plateau region interacted most with the growing, powerful states coming up through agriculture in the plains. There was a lot of trade and interaction among these communities at this point, even to the extent of borrowing major technologies relating to agriculture. Also horticultural and other produce may have been the specialty of these ‘fringe’ communities which the initial agriculturists lacked and found to be delicacies.

One way of looking at large scale cultural borrowings of this kind would be see them as happening in larger cultural clusters creating a mega-culture. Such mega-cultures could borrow or use large-scale cultural commonalities for perhaps specific areas of social life like economy, agriculture, trade, pottery, weaponry, metallurgy, etc. These might be related to the Alfred Schutz’s stock-knowledge-at-hand for a whole area or region. Though the idea of a stock-knowledge-at hand was wrought by Alfred Schutz as referring to one cultural group, in this case the idea needs to be modified to include sections of cultures or groups of culture-bearers who combine ideas according to pragmatic reasons in order to follow a set group of practices that are relevant to the entire group. Such mega-cultures may approximate or bridge the concept used by many archaeologists as ‘traditions,’ since they are wary of using the term culture for such large-scale activities that may possibly involve multiple culture-bearing groups. I shall develop on these ideas in the next part of this exposition, where I shall show how different cultures in the region actually had similar activities.

Thus, there is a direct continuity between the cultures and traditions that existed in the Palaeolithic and Mesolithic to those that existed later. Unraveling the complexity of later migrations of other populations that came in and of the alliances formed between these communities should be the basis of any future archaeology of the region. This work is thus preliminary in setting the outlines of such a research paradigm.

References


Author Information

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