9-3-19

Displacement And Rehabilitation of Tribal In India With Special Reference to Andhra Pradesh

DR. K. MOHAN RAO

DISPLACEMENT AND REHABILITATION OF TRIBALS IN INDIA WITH SPECIAL REFERENCE TO ANDHRA PRADESH

Papers Presented in the seminar organised from 14th to 16th Feb 1990 at NISIET in Hyderabad by Tribal Cultural Research and Training Institute, Hyderabad.

Edited by :

Dr. K.Mohan Rao, M.A. Ph.D
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Seminar papers on Displacement and Rehabilitation of Tribals in India with Special reference to A.P.

First Edition - 1993

I.S.B.N. 81-85576-50-9

Rs. 225/-

Published by : Tribal Cultural Research & Training Institute, Tribal Welfare Department, A.P., Hyderabad.

Printed at : A.P. Women's Co-operative Finance Corporation Limited, A.P., Hyderabad.

Printed in India.

Editor's Note

The proceedings of the National Seminar held from 14-2-90 to 16-2-90 on Displacement and Rehabilitation of Tribals in India with special reference to A.P. are presented here classifying them into following sections.

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		(ii) Inaugural Address
		(iii) Key-Note Address
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Section E	:	(i) Summary of the Recommendations of the Seminar held at Calcutta used as reference papers in this present Seminar.
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Editor

Tribal Cultural Research and Training Institute, Hyderabad.

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FORE WORD

The forest and mountainous tracts which are traditional habitat of various tribal groups in our country are endowed with rich mineral resources and abundant flora and fauna. Most of the important and big rivers in our country originate in these rugged terrain. With the advancement of science and technology these natural resources are being increasingly harnessed for the prosperity of people and country. But in this process of exploitation of natural resources the simple tribal folk who have been living in these regions are visibly and invisibly displaced. The benefits which accrue from tapping these resources and the increase in the economic activity in the area hardly reach the 'adi' inhabitants; on the other hand it results in a negative impact invariably.

The tribal habitat was by and large devoid of sophisticated economic development activity till the era of planned development set in fast and radical changes. Several projects were launched for exploitation of water, mineral and forest resources in the tribal areas both for the development of the tribal and the areas, they inhabit, besides other schemes taken up on resource availability considerations. Thus the situation which was hither to near static has acquired a dynamic character. Inevitably this has brought in its wake, problems of adjustment and rehabilitation etc. With the increase in investment and with the widening of the range of activities the problem has become more and more complex compelling our attention to it.

Modern technological culture is penetrating into the traditional tribal system and disturbing it. With the establishment of major projects, the local tribals are largely affected and sometimes uprooted from their traditional moorings causing socio-economic problems. Besides, even some of the elementary aspects of tribal problems have not been fully appreciated so far, in relation to occuisition of property and rehabilitation. Cash compensation for lands acquired in tribal setting has a debilitating effect, as it hardly does any good to the tribal who is not good at money management. Further it results in loss of economic resource besides their customary rights, previleges and also the cash received.

Developmental activities meant to exploit the natural resources have to be necessarily given priority in national interest and at the same time programmes and policies are to be designed to benefit the local populace. The contractions which get built into this process are apparent and unless a conscious effort is made to minimise the effects of these contractions the tribal populace is bound to suffer both in the short and long run. A seminar on 'Displacement and Rehabilitation of Tribals' was organised by this Institute from 14.2.90 to 16.2.90 in Hyderabad to highlight the problems involved in displacement of tribals due to location of major and medium projects in Tribal areas and to evolve strategies for rehabilitation of displaced tribals. Eminent Anthropologists, Sociologists, Environmentalists, planners, development functionaries engaged both in Tribal Welfare and allied development sectors were invited to the seminar and experts from different parts of the country participated. All the papers presented in the seminar, Recommendations of the seminar and the Government order issued there on spelling out the policy of Rehabilitation are included in this volume.

I express my deep sense of gratitude to all participants of the seminar for their valuable contribution in the seminar.

TCR & TI,
Hyderabad.

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SEMINAR ON

DISPLACEMENT AND REHABILITATION OF TRIBALS IN INDIA WITH SPECIAL REFERENCE TO ANDHRA PRADESH

organised by Tribal Cultural Research and Training Institute, Tribal Welfare Department, Andhra Pradesh Hyderabad

INAUGURAL ADDRESS

-By Dr. *(Smt.)* Geeta Reddy, Honourable Minister for Social Welfare,
GOVERNMENT OF ANDHRA PRADESH.

Dr. B.D. Sharma, Sri Kumaraswami Reddy, Sri Changsan,
learned participants and Ladies and gentlemen,

I deem it a privilege to deliver the inaugural address to such an important seminar which is intended to discuss one of the most burning problems of the day. In this era of planned development, we are taking up various projects and these projects besides bringing prosperity to the people and the area, are also causing displacement and certain imbalances in eco system. The main thrust, therefore, in all these activities should also aim at minimizing the sufferings of oustees and they should be assisted to adjust well to changing scenario.

Today, the gathering here represents a cross section of the experienced administrators, technical experts, forestry officials, project officers of Integrated Tribal Development Agencies, Academicians,Researchers, Planners and other intellectuals. All of you have been actively engaged in either studying or planning or tackling the problem of displacement and rehabilitation of Scheduled Tribes, who are at the bottom layer of our society. The problem is not confined to one State or region. It is an ever recurring all India phenomenon in which the poor, gullible and silent tribal is the worst sufferer.

To my mind, it appears a sot of paradoxical situation prevails in tribal areas giving rise to problem333 of displacement and rehabilitation. It is generally agreed that people living in an area endowed with rich natural resources would be the most prosperous. But in the case of tribals though the area of their habitation is rich in mineral, forest, water and other natural resources, the tribal remained poor because he is neither the master of the natural resources of the area nor does he have the necessary expertise to tap these resources to his advantage. Consequently, national interest, state interest and other interests of the rich private entrepreneurs have been assuming greater importance and larger share in the exploitation of these natural resources to the detriment of the local tribal. This is evident from the fact that various hydro-electric schemes,, irrigation projects, Mining and Mineral exploitation projects besides Forest based projects like ply-wood factories, paper mills etc., have been located in tribal areas resulting in rooting out of the tribal from his native moorings and alienating him from the natural resources on which he heavily depends for his livelihood. The tribal does not enjoy any kind of monopoly

of the natural resources in his area and not even a percentage of this income from the exploitation of natural resources in his area goes to the tribal traditional institutions or the inhabitants.

My contention is that it is this paradoxical situation of having resources in tribal habitat and not owning them or receiving benefits out of them but suffering eviction with the added injury of improper rehabilitation, which is one of the reason for restiveness witnessed in tribal areas.

It is my earnest hope that participants of this seminar not only highlight the reasons for displacement but also find comprehensive solutions for proper rehabilitation. The various sub-themes proposed to be discussed in the respective sessions, spread over three days, amply cover the various facets of the problem of displacement and rehabilitation. From conceptual frame to ecological viability, the sub-themes to be discussed intend to traverse the whole gamut of displacement and rehabilitation. I will be looking forward to the outcome of these discussions. I assure you all that your recommendations will be given due consideration while drawing up of various types of projects of National, State and individual benefit and ensure rehabilitation so as to avoid hardship to the tribal.

I am glad that this Seminar is organised at a very appropriate time. We are at the fag end of VII plan and the VIII plan is already in the offing. The various State and National bodies constituted for Tribal Welfare have been spelling out their strategies for tribal development in the VIII plan. The Report of the working group on Development and welfare of Scheduled Tribes during VIII Five Year Plan made a special mention of the problem of rehabilitation of displaced tribals. The working Group felt that a "Comprehensive national policy which will provide for complete socio-economic rehabilitation of displaced tribals is very much required ... the policy must aim at ensuring a better living standard to the displaced tribal families at the relocation sites and must be backed up by a central authority under a legislation for its enforcement". I feel that the deliberations of this seminar will go a long way in evolving this comprehensive national policy which can be a guiding principle for the State Government to follow.

I am glad that the Tribal Cultural Research and Training Institute of our State is organizing this seminar of national importance in tune with its previous efforts at highlighting such problems. It had already organized seminars on themes such as primitive tribal groups and their development, forestry and tribal development etc. I hope that they will continue to provide the necessary logistic support to the State Government by ploughing back their research and training results and expertise for evolving realistic tribal development programmes.

I once again thank you all for having given me this opportunity of giving inaugural address and I once again assure you that the State Government will do all that is necessary to put into action your recommendations while formulating various rehabilitation programmes intended for displaced tribals.

JAI HIND.

Thank you all,

KEY NOTE ADDRESS

Dr. B.D. Sharma *

I am thankful to the Tribal Research Institute for giving me the opportunity of addressing this seminar which is considering one of the most vital questions which is facing the Tribal Society today particularly on the eve of the preparation of the VIII Five Year Plan. I was now briefly just discussing it with Hon'ble Minister for Social Welfare, Andhra Pradesh, the crucial importance of this question and I am happy that she has in her brief introductory speech has shown her keen interest in it by appreciating the problem in its true perspective.

The paradox is that Tribals are the people living in Forest which is rich in resources but they are called poor. I would not like to call them poor because they are not poor but deprived. If we accept that they are not poor but deprived half, the battle would have been won. Unfortunately we call them poor. Why this is so, why this deprivation, how this deprivation and what is the urgency? These are the questions which should engage our attention.

India on the eve of independence was an agricultural country. In fact in the history of human civilization also there is a phase of agricultural civilization. When there were centres of civilization of those areas which were rich agriculturally. The Indo-Gangetic plain was the centre of one such agricultural civilization because it was producing surplus. From agricultural phase, we come to industrial phase. During the agricultural phase of our civilization these hills and forests were the areas on the margin and those inhabiting the area were in the margin. In our epics also mention is made about these people who are known by various names like Nishads etc. As a people they were in the margin and as an area it was in the margin because hills and forests did not represent anything unique them. But in the new industrial world, we see some new changes. The resources which once had no value, are now valuable resources. Anything we touch here in this hall, it comes from that area. Electricity whether coal based or hydel it is from tribal areas. The raw material for steel is coming from Baladilla, a tribal area.

The problem is that the resources which have been providing sustence to the tribal people have become central source of sustence for our economy while the tribals have remained marginal. The use to which the tribal people put these resources is, according to our comprehension is wasteful. For example when the tribal cuts teak tree and uses it for his hedge, we calculate its value as Rs. 20 lakhs; but what he produces therein is jowar worth about hundred rupees. We laugh at it without understanding his economics, because money cannot be eaten, teak cannot be eaten; one can eat grains kudma etc., He does not prefer rice. If you ask a tribal as to what he prefer, rice or kudma(Local grains), he asks what is good.if taking rice, you feel hungry after one hour; if you take kudma and kutki, it will sustain you till the evening. So his logic and his paradigm is different, our logic and our paradigm is different and,

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* 1. Commissioner for SCs & STs, New Delhi.
2. Key note address recorded and transcribed

therefore, we pity him; ofcourse he has no right to pity us unfortunately. Otherwise he also pities us about the peculiarities in our culture such as dress which does not suit the climatic conditions etc.

The central problem today is that the resources which the tribal is using are now required for the modern civilization and the uses to which the tribal is putting these resources are according to our comprehension wasteful, for example, we are crying hoarse about shifting cultivation and similar livelihood practices of the tribals as wasteful.

On the top of it, what has happened is that we have superimposed on the tribal areas our own frame, our own legal and administrative frame. The tribal society by its very nature is a self-governing system where the tribal people have command over resources. Now here is a conflict between the State and the tribal which is the crux of the issue. In this context I am reminded of an incident in Nagaland. The new Naga State imposed the house tax on the rural people. The Naga elders collected together and wanted to know what this tax is about and as to who had imposed a tax on them and by what right? Because there it is a village government, and it is their government. Hence their question was as to who are these people in Kohima telling to us to pay something. They were informed now that our new Government has come and there are some officials also who have to be paid, then the tribal people said,"So what? after all money, has to come from some where. If they require money cannot they tell us? They could have sent us a message and we would have sent them the money, but what is this tax.

There is another case in Bihar. There is a movement called 'Tana Bhagat'. Their movement predates the Gandhian movement. Their logic was very simple. Their logic was that the "land belongs to God and we are God's children Who is this government which levies a tax on this land. we ar God's children and the land has been created by God and it is like mother to us". They refused to pay the tax and a penalty their lands were auctioned. After independence, when the new government took over the same question was asked once again by these people. They said that now there is an independent government. What right have they got to collect taxes. So a law has to be passed in Bihar to exempt Tana Bhagats from paying the tax on land.

The Constitution, in the V schedule, gives the Governor an extremely unusual power unparelled in any other democracy. The Governor of the State has been given the powers to declare through a notification that such and such a law does not apply to the scheduled area even though it is passed by a state legislature or parliament. The Minister present here might be shocked at this because the Assembly and the Parliament are the supreme legislative bodies. But in relation to the tribal area, the Constitution says that the Governor through a notification can change the law passed by any Central or State Legislatures. Of course, on condition that it has to be in the interest of the tribal people. The founding fathers realised that the tribal system and modern system can be antogonistic and therefore, the first basic premise of any democratic society must be that the people should not suffer because of the superimposition of laws and thoughts. Unfortunately what has happened is that the state declares that forest belongs to the State whatever may be the procedure which that may have been followed and,therefore, the tribal is an intruder into forest simply because it is declared that forest belongs to the State. A land was superimposed according to which the ownership of the land depends upon an entry

made in a document, the khasra of the Patwari and, therefore, if a person's name is not entered into the Khasra of Patwari, that person is an unauthorised occupant. If the patwari had not gone to a particular area and a village is not recorded in his book, does it mean that the person's village does not exist? And this is the logic which we have been following.

In Maharashtra, they abolished the Jagirdaris and according to the law which they passed for taking over the forest they said this is 'deemed' to be reserved forest and the people who are cultivating there, are not recognised; now everybody says they (tribals) are encroachers. So the tribal is an intruder in the forest, tribal is encroacher of the land. Some body gets his thumb impression, therefore, the tribal becomes indebted to a cooperative society and if tribal drinks, he is committing an offence and so on. In Bastar for example in the good old days the practice must have changed now. To a Gond, the Mohwa brew(This is extracted from the Mohwa flower) was like Ganga Jal. It is the first thing which is put in the mouth of a child when it is born and it is the last thing which is put in the mouth of a man when he is dead. This is the mohwa fruit not the liquor from the 'kalals' shop. Now this is something we cannot stop. Maharashtra passes a law that there is prohibition and, therefore, this tribals drinking of mohwa brew is illegal. Later on it said that the prohibition is no good because it creates all sorts of problems and therefore, you say you can drink.People in Bombay can drink,people in Hyderabad can drink and,therefore, tribal also can drink. So you have now given him freedom, but you say that no you must drink our bottled liquor but you cannot drink your own mohwa brew. So in either case, the tribal is bounded a criminal. If he protests the police man, the forest official, the revenue official, who have right to enter into his hut and arrest him under section such and such of whatever Act which he(tribal) does not know.

The point is in the tribal area,the whole tribal community has been criminalised through this superimposition. I am very categorical on this point. The Governors have not discharged their responsibilities. They have not looked into this question as to what is the dissonance between the tribal societies' and your laws. It is taken that our law to be formal and final and whatever the tribal does is wrong. This is unfortunate and this is crux of the matter. We pressure that the resources on which he subsists belong to us and, therefore, he is an intruder and, therefore, unfortunately we are talking about his rehabilitation, after dispossessing him. In my view the first act of dispossessment of the tribal people has to be rectified. Unless it is accepted that he has a right over the resource whatever may be the law. You will not be able to do justice to him.

The entire displacement in this country is being done under what is known as the Land Acquisition Act. The biggest disservice the British did to the Indian people was that they derecongnised the nature of the resources as being means of livelihood ie., the land in a village was not property. Nobody 'owned' the land, it belonged to the village and the person had a right to cultivate it. It is the general scenario in the country. I would not like to go into details, but it is generally true that the land belongs to the community,Somewhere to the tiller, somewhere to the Brahmin somewhere to the Nais, some where to the Bogis. They have also got their share, this continues even to day. The western concept of land in that it is property. So the property can be sold and purchased; the means of livelihood cannot be sold

and purchased. He has a right, only to cultivate. This system is seen in the deep tribal areas even today. If a person goes away from the village, he does not sell his land. He has right to come back again and return to the same land and cultivate it.

We will have the opportunity to discuss in our seminar the various aspects like the Directive principles of State policy, fundamental rights etc. The basic theme is in relation to land resource because we have committed to the establishment of egalitarian society and it is most egalitarian. society and it is most egalitarian. The most in egalitarian thing of the British days was the inequitous ownership of land and this concept of land being treated as a property, forest was also a property. Private forest has been taken over by the State and treated as a property. The persons who are subsisting on those resources, this concept, that it is theirs and it is a means of livelihood to them, was ignored. But after that the promulgation of the constitution we have been talking about the land to the tiller. That means the land is divested of its property right, that is why the constitutional amendment was also made that it can be acquired without paying due compensation and so on; although in this forum I would not like to go in to it, but, we consciously decided that the land shall not remain a property, Land to the tiller was the basic theme. Land to the tiller means that a person who derives his livelihood from a particular resource, his right is primary. Article 21 of the Constitution speaks about the right to live; and the right has been interpreted in our country as a right to livelihood and so on; We are talking about right to work and all those things, but a person, who is cultivating his land, he has been deriving his livelihood from that land is not taken into account, the chenchu for instance who is living in the forest, is deriving his livelihood from that forest; and this is basic human right, constitutional right is one, but there is also a basic inalienable human right. How can we deprive a person of this right by paying a compensation. Right to life and right to livelihood cannot be taken away merely by paying compensation. Unfortunately, what has happened is that this land Acquisition Act which was enacted during British days when land was deemed to be a property still continues unchanged. From a zamindar; you take away his land, he is paid compensation; but what happened to the cultivator nobody is bothered because their right was not recognised by the British, because they were interested in their imperial hold and such other matters. Now we are in a democratic society, wedded to the establishment of an egalitarian social order and therefore, right to life is a basic right in our constitution. And if right to life is a basic human right in our Constitution and if I derive my substance from any resource, that resource cannot be taken away by paying compensation. This is the first major defect of this law under which all the tribals are being displaced today. I consider this law to be unconstitutional because constitution does not recognise right to property, it is not a fundamental right. When there are two persons who are involved in a particular situation, one is a person who claims a right of property and another person who claims right of livelihood, the right of livelihood must be treated as superior to right of property. Unfortunately, this aspect in relation to our land laws policy has been missed and, therefore, my point is that land acquisition which is being done which provides for due compensation-monetary compensation is wrong, that is violative of these fundamental rights of the people not only the tribals but also others. In fact the more recent case is that of Disney Land. By acquiring 26,000 hectares of land the ordinary farmers will be deprived of their right to live. This right to life can it be extinguished, simply because somebody wants a Disney Land. This is unfortunate. Unfortunately, this point has not been agitated so far.

The second point which I would like to invite the attention of the Hon'ble Minister is this. Look at this law; (Land requisition Act) Section 4 of this Law says that a notice shall be given that his land is required for a 'public purpose'. From this phrase, can you understand what 'public purpose' is. Has it been defined anywhere? Unfortunately, it has not been defined. I have been pressing on the Union Government for a long time to kindly define what is 'Public Purpose'. In Gujarat, in Dang District, Sabadara a tourist resort was established. The land of three villagers in the tribal areas was acquired. Can you say that a tourist resort is higher public purpose than the subsistence of the tribal people living there? Is it a higher public purpose? It is that public purpose is one whatever Collector says? Whatever Minister says so does it become a public purpose?Whenever a Chief Minister says so does it become a public purpose? All this is not public purpose. And in public purpose, you can not go by arithmatics. You can not go, you see that there are 100 people who will be deprived of their means of livelihood and here are 10,000 people who will be benefited. This cannot be a national of 'Public Purpose'. This is a mistake notion which exists. Democracy is not equation of numbers. If you like to see democracy, come to the Gond area where you see one man can hold up discussions in the whole community. The whole community will not proceed unless the last man is also convinced. That is real democracy. Democracy is not 51 percent and 49 percent where 51 percent claim that they represent 100 percent. This is a ritual of democracy; and therefore, when we come to the question of public purpose, this cannot be the criterion. Unfortunately, we have not defined public purpose and, therefore, much of the action which is being taken is arbitrary. The second thing which I would like to say that the State having arrogated unto itself to define what is public purpose must proceed systematically we decide the things first. To day the process is this is a tiger project, this is an irrigation project, this is a hydel project; it is first decided in Hyderabad and New Delhi, the people likely to be affected to not forgive any where at the stage. Take the case of Narmada. That Narmada dam is being constructed and you go to the village after you have decided about project and that this is the project that is to be set up, and issue a notice under section 4 asking them 'have you got any objection'? It is a peculiar situation. You have decided that I will be drowned, you have decided that I must run away from here. You have got your PAC standing there. I saw it in Shaktinagar that at the dead of the night, at 12 o clock people being asked to shift this I have referred to in my last report. The PAC standing there and there was the blaring of loud speakers the people were asked to go 10 kms. away ; here a few tin sheds were put up for uprooting the people from their homes at 12 0 clock in the night with the PAC with their guns and all that they did not do it. Some how wisdom dawned on them. Some how I reached and intervened and asked what it is all about?. The affected persons stated "You have decided that we will be thrown out from here and then you are asking have you got any objection ?" The courts remained quite so here is a public purpose, here is a notice which has been given. Like true Hindus we have reduced the process to a ritual. Therefore, the whole process I should say some activists-social activists, must take up such issues. Unfortunately what has happened, I will give you in detail, why this is happening is because this law was enacted in 19th Century when nobody could think in terms of such big project where hundreds and hundreds of villages would be uprooted. At that point of time no such process was necessary. And after independence, we have always been in a hurry. Never had any time to do any thinking on this basic issue. For example, I am reminded of 1951. In Bihar, in 1951, the people told the Forest officials that it is not your reserved forest

which you are claiming. It was never reserved. Then the court called for final notification as per the law. They were not able to show any final notification. So the Court held that as the Dependent is not able to prove that this is a reserved forest, so the people are acquitted. 1951 to 1990, the situation remains the same. The people are being convicted for offences in that area which is supposed to be reserve forest, not with standing, the fact that in 1951, the court held that you have not been able to show that this is a reserve forest. When I was discussing, a day before yesterday in Delhi, one state Government came out with a revelation. We have now amended our law that notification in vernacular is not necessary he said. What a solution? Is this is the democratic solution. Now here if the law provides that the forest cannot be deemed to be a reserve forest unless a final notification in vernacular is there and made known to everybody. The Government has the audacity to say in 1990, in free India, that we have changed the law and you see that the notification is not necessary. To what extent this is single sided or one sidedness is there. Any way the point which I am making is that the law which authorises the acquisition of land is not constitutional because things are changed and the genesis of this as I was telling yesterday in the lecture, we have adopted a democratic constitution, but the laws which we have inherited are imperial laws. We are not having time to review those laws. My friends from the Forest will not take it a miss, I have been telling that the zamindaris have been abolished, but Sarkari zamindaris have not been abolished. After all when you put over the forests, this is a new from of Sarkari zamindaris. You should have come to have a dialogue with the people and establish a new relationship. But because it was the Government which stepped into the shoes of the British. They thought that there is nothing wrong with the Sarkari Zamindars. A private Zamindari can be abolished. I think a new relationship is to be fostered.

Now the last point in relation to this forum I would like to say is that the law, as I said , that the acquisition of land which is being made under a particular law, the spirit of their law is not being followed. The second thing is that the law itself is not in consonance with the constitutional provisions and it the new theme of our constitution after 1950. Here we are have consciously, purposely overlooked this thing because of the whole thing will get upset. And the third thing which I have to say is this that in relation to the forest area, this law even does not take the reality into account. But actually this law treats every person as an individual and you know that in the tribal areas, there are no individuals, there are no families; there are communities. The fact that the tribal community is an entity is not taken note of in this law. And therefore, when you are displacing people, you are just asking counting their heads saying that you are displaced, you are displaced. . You forget that displacing of community, displacing of individuals, there are two qualitatively different situation and, therefore, this aspect has not been taken into account. That is one. The second aspect that has not been taken into account is which is causing great harm, you must have heard about Baladila. It is a big project of iron ore supplying iron ore to Japan. Do you know that how many people have been displaced from Baladilla, you will not be able to get the official figure. The reason is simple, because in these area, you do not recognise anything which is formerly owned by the tribals. And therefore you are told that there is no displacement. If you don't recognise you see I am not displaced, I am not there. That is very simple logic and that this is this law only talks about land. This is well known that Tribal Research Institute has shown that 40 to 80%, 90% of subsistence comes from the forests and if forest is submerged,then the ecologists shout, the Forest

Department shouts but the poor tribal remains silent spectator, even though he is subsisting on that. For example, in Karnataka, Jenukurubas are displaced. The Jenu Kurubas are honey collectors. Now they were displaced, their forest is gone, their means of daily livelihood has gone and everybody is happy looking askance to see that with one stroke their livelihood is gone. Therefore, that there is big lacuna; that resource that provides subsistence is snatched away from the community, that fact is completely ignored. Now what do you do in this situation? I think the whole thing has to be checked and rechecked and reviewed. And for this I must say let the State Government, let the Governors look into this situation and see the constitutional obligation cast on the States, but the tribals not be museum pieces. Let the tribals be partners in the development and, therefore, this 'rehabilitation' word is to be discarded because rehabilitation means first the tribals have to go down and then you have to rehabilitate them. Why there should be such a situation where the tribals go down? Let the project wait for some time. Bodghat project I said that this Bodghat project has been in the news for last 30 years and today the people there are not ready to move out. You say that they are standing in the way of development. I said you should have planned well in advance how to make these people partners in the new development programme and I said most establishing factor, distilling factor is education. At this time, these people who are living deep in the forests they say that we are not prepared to go out, where do we go, what do we know and so on. You should have flooded this valley with 4000 people only, with education. Like all of us who are assembled here, they would have also felt inconvenient in the valley and would have been praying before us, saying that you take out all of us from here and then fill that valley, you have not done that. The level of literacy in that area is 2%. Now what do we expect. The people who are living of those resources, you want to take away those resources for another use. And therefore the question of displacement comes, the question of resettlement comes. Now you cannot resettle a community like that. There will just be a desert, there will just be destitutes and this is what happened through out. Take Kukayi, take Shaktinagar, whoever has been displaced, they are just destitutes and bonded labourers. We have had a workshop of bonded labourers. These are the projects which are creating bonded labourers and we are shedding tears over bonded labourers, but than you see we are not prepared to look at the process which creating the bounded labourer out of a free person.

I would sum up by saying that the whole issue in the tribal areas today is that whether by accident of history, the new value which resources have acquired must not become their enemy, I am fond of saying it is like a fond mother decorating her child with all jewellery and then leaving him in the custody of thugs and rufains. What will happen to that child? Mother nature has given these children of nature everything which you could think of and now suddenly they find themselves surrounded by all sorts of people who are interested in snatching away whatever they have. Now this is the first thing which has to be done that their right over resources, their right to life has to be recognised. And I would request that a suitable modification should be made in the law for which the Governor is amply empowered. Mind it if the Governor has not to refer anything to Central Government in relation to change of law by a notification. The second thing is that if you want to have an alternative use of these resources, treat the tribal as an equal because he is the person who has command over those resources, who lives of them but he knows nothing about it becomes of which you cannot convince him. If you cannot convince him,

try other methods. Use of force, use of law against tribal people it is again not correct. This is an unfortunate situation that there are three roles of the State one is the maintenance of law and order; second is the promotion of development; and the third is protection of weaker sections. Unfortunately when the State becomes promoter of development programmes and so on it begins to construct projects, if forgets that it has role of protector of weaker sections and so on. The State is responsible for protection of these tribal people. You cannot say that we will fight out the case in the court. This is the most ignorious situation which is there in this country that the tribal people are fighting against the State in the courts. But the State which has been given the responsibility of protecting their rights, how come you see that the State is prepared to defending the cases which are concerning their rights. This is unfortunate position. So the point which I am making is what the dialogue with the tribal people should be on terms of equality as equals. It is not a small issue. Whatever is acceptable to them only should be done, and there is no question of compensation. A method has to be found whereby the tribal people become partners in development. They should not be allowed to go back, go below. They should become partners in development and this is a challenge.

A good tribal is the displaced tribal who accepts says alright, we are grateful to you that you are removing us from these resources, you have your development programmes. You say that he is a good tribal. I would say let us change this, let us accept the tribal as a partner whether it is forestry, whether it is resources development and if in this context, the pace of change is slower, let us accept this as a price of development and you see the price being paid by the tribal people alone.

I must again thank you for this opportunity which you have given to me, I think these are the baffling thoughts but I thought that something clear, categorical has to be addressed at this time because 15% of tribal people have already been displaced and by the end of VII Five Year Plan with so much investment, these defects go on snowballing and the entire tribal population may be displaced in another 2 to 3 Five Year Plans and then you see there may be resistance from their side, that is already inside. It will be in the interest of everybody including the State, including those who are the beneficiary groups that a viable solution is found to this burning issue where the basic question is of the benefits of development rather than depriving a section of the community and then talking about their rehabilitation.

Thanking you.

HUMAN AND CULTURAL PROBLEMS OF DISPLACEMENT AND RESETTLEMENT.

N. Subba Reddy, *

All forms of development and change seem to entail some measure of displacement which in its turn calls for readjustment and resettlement. The birth of independent India itself was attended by a colossal displacement of people with the result that the constitution of our country, in its 7th Schedule, made a provision for the resettlement of persons uprooted as a consequence of partitition of the country. While the Constitution of India made a provision for partition refugees, it did not provide for project refugees. It is indeed a glaring omission considering the penchant of the makers of new India for development projects.

One can distinguish between two sets of causes for large scale displacement of people. One set of causes like natural catastrophies, wars, intercine conflicts,famines etc. Cannot be predicted or controlled. The other set of causes relating to different kinds of projects for the development of irrigation, power, mining, industry etc. are not unforeseen occurrences and hence the extent of displacement can be visualised and provided for. The founding fathers of our nation might have thought that the Governments of the States would find a suitable solution for each problem of displacement as it arises. One wishes that the expectation is realistic. But, alas, the fact facts prove it to be otherwise.

I may narrate two personal experiences of mine. One relates to a symposium I attended in Zagreb in July 1978, on the occasion of the International Congress of Anthropology. The organiser of the symposium Dr. Cernea, a Social Scientist attached to the World Bank, thoughtfully invited not only social scientists who had studied the problems of resettlement but also some administrators who were actually handling the job of resettling displaced persons. One of the sessions drew attention to the current problems of displacement the Narmada river project. There was an officer representing the Madhya Pradesh Government at the session. When the discussion centred round the tremendous problems of resettling hundreds of thousands of people from the vast areas that would be submerged, the official treated the whole matter lightly. He said in a very casual way that many tribals who were asked to leave their forest homes were volunteering to go and settle down in cities like Bhopal. He appeared to believe that the project was a god send opportunity for those people to modernise themselves.

I am mentioning this because it shows how happy an administrator could be if he can remain immune to the realities around him and does not have to know the feelings of the poor tribals who have to leave their homes. One was tempted to ask the officer whether he would consider it an opportunity if he were to be banished from India so that he could migrate to more prosperous countries in the World where his talents might perhaps find greener pastures. We have to ask ourselves whether that officer was typical or atypical of the class of bureaucrats. In any case this example shows how one party which has to deal

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with another party caught in a life and death situation could have a perception which is the very opposite of that of the latter. It is here that the role of social scientist as an honest mediator comes in.

But a social scientist can only attempt to make an administrator see the human side of the picture. But if all the training and experience of an administrator have bread only indifference and apathy, the social scientist is reduced to a helpless position. The history of displacement of human populations seems to be replete with instances where the administration either does not bother to carefully estimate the extent of displacement or wilfully choses to conceal it. For instance there are wide variations as to the figures of population displaced by various projects in the country since independence. In a project outline on this subject, Walter Fernandes refers to estimates of displaced population which range from 2 million to 20 million. In this context he quotes Vijay Paranjipye to the effect that 21.6 million people were displaced by dams alone while official figures may account only for a fraction of them. He also quotes Hansda to the effect that only 25% of the displaced persons were ever rehabilitated.

My second experience in this regard offers an explanation for the kind of unreliability of estimates and uncertainties of rehabilitation referred to in the previous para. The Government of Andhra Pradesh contemplated what is called Polavaram Multipurpose Project. The institution where I am serving has been asked by the Chief Engineer (Projects) to make a study and suggest feasible programme for the rehabilitation of the displaced persons. What was amazing was that there were no particulars in his communication regarding the dimensions of the project, the extent of area to be submerged, the villages to be affected and the population to be displaced. It seemed to me as though they approached a research institution simply because a funding agency like the World Bank insisted that a study has to be made and suitable recommendations had to be made by some social scientists as a pre-requisite for the release of funds. Then we had to write to the Chief Engineer asking for details of the surveys they had conducted and to give details of the villages that would be affected. All that we got in reply was that according to some other agency which studied the problems a certain number of villages would be submerged in certain taluks and particulars could be obtained from the Executive Engineer's off at Rajahmundry. We sent a copy of the Chief Engineers letter to the Rajahmundry office and requested for additional information if any. There was no reply from that office. This only points to an incredible state of affairs where the Engineering Department did not conduct any detailed survey of the area to be submerged and perhaps did not even determine the height of the dam and such other crucial details. If that is the Stage of things, what should happen if the height of the dam is to be altered later on the more number of villages are to be submerged than indicated at this stage. All the well meaning efforts of the social scientist can be reduced to a naught by such a cavalier attitude of administrators towards the projects.

To go into the details of the Narmada Project (including Narmada Sarovar Project in Madhya Pradesh and Sardar Sarovar Project in Gujarat), there is a raging controversy over the costs and benefits. The protagonists of the project claim that it will produce 2450 M.W. of electricity while the critics say that when the irrigation system is fully developed, the electricity produced will be only a quarter of that estimate. They cite the evaluation report of the late Secretary for Irrigation in Madhya Pradesh Government, Mr. Gupta, in their support. Also according to the calculation of the Ministry of Environ-

ment and Forests, the project has a long-term potential of producing only 523 M.W. of electricity. Regarding the content of land to be irrigated again there are wide variations in the estimates. The optimists place the estimate beyond 3,000,000 ha. .(Probe, February 1981) while the pessimists say that it can directly irrigate only 123,000 ha (Times of India, 5th October, 1988). In respect of its cost and schedule of completion, one view is that it requires Rs. 15,000 crores and 10 years to complete, while the other view is that the costs may go up by 4 times and the time taken to complete may be 30 years.

All are agreed that the Project would submerge about one lakh hectares, including rich forests, and displace about 150,000 people living in 190 villages. The Department of Environment and Forest estimated that timber loss in the forests will come to about Rs. 40,000 crores. I am not good at cost-benefit analysis in material terms, and hence I leave that alone. But what is of greater importance is the question of human costs. What is going to happen to the people who will be displaced? The most curious thing that happened was that the Ministry of Environment and Forests gave clearance for the project in April, 1987 without a through examination of resettlement programme and the proposed manner of its execution. Instead, it made a pious recommendation that studies should be conducted and suitable plans be evolved for resettlement. But when once clearance was given, can any further studies swerve the Governments from their chosen path?

The concerned State Governments are said to have worked out some schemes of resettlement. The Government of Gujarat is said to be prepared to fund resettlement even to the extent of Rs. 600 crores. Indeed a sportive offer is made that Gujarat will resettle displaced persons from any of the three States concerned. But the details of the sites identified for relocation are not available. In the state of Maharastra where the dimensions of the project and its consequences are comparatively small, it is estimated that 12,000 hectares are needed for the resettlement programme. But so far only 3,000 hectares are identified, that too in a denuded forest. It should be noted here that the State of Maharastra is perhaps one of the most progressive among the Indian States, and they were the first to enact the Resettlement of Project Displaced persons act in 1976. Still there is no guarantee that they would be able to resettle the displaced persons in any reasonably satisfactory manner.

The proposed National Test Range is another example of callous disregard on the part of *administrators for the* feelings of the people to be displaced from their ancestral homes. *Governments* should not visualise themselves as efficient packers and movers of human consignments. At Baliapal, in *Orissa, the project* of N.T.R. originally envisaged evacuation of 100,000 persons living in 130 villages. When the people organised themselves and put up stiff resistance, the Government scaled down the dimension of the project to cover 68 villages inhabited by 60,000 people. The question that comes to one's mind is why the Government originally stretched the project to cover 130 villages if it could do by *displacing* the inhabitants of 68 villages. It is again evidence of the same insolent non- challenge towards the cheap human commodity. First of all why locate such a project in a fertile and densely populated area? Any sensible government should exercise all the care so as to choose a course of action which would cause the least amount of human misery even when it becomes really unavoidable.

Social scientists interested in human welfare have an obligation to set out some guidelines on matters of this nature. It is not that we are opposed to all projects, but we have to plead for certain safeguards to protect the interests of persons who are to be displaced by the projects, so that, their suffering will not be dismissed as an inconsequential by product of the process of development. First and foremost, the details of resettlement programme should be worked out and should be shown as the first charge on the project outlay. Apart from the physical costs, there are the human costs, and no civilised society should fail to take note of them. Secondly the process of resettlement should be initiated early and proceed to work on the project proper. While figuring out the differential human costs of resettlement, one has to keep in mind the following factors: While the initial distress due to displacement is natural to all, its long range impact differs from group to group depending on their levels of socio-economic development and the related coping capacity. Here one can broadly identify three levels, viz., the tribal, the peasant and the urban.

It can be safely generalised that people of the first level (the tribal) will find the resettlement process most difficult. While those who are more advanced may have greater resource to cope with the problem. Hence I may mainly deal with the problems of resettling the uprooted tribals, not only because the difficulties of coping are greater in their case, but even in quantitative terms the number of tribes displaced by development projects happen to be much greater than other sections of the society. The Working Group on the development of Scheduled Tribes during the VII Plan period estimated that almost every development of project in India invariably resulted in the displacement of tribals, and their proportions among the uprooted ranged from 52% to 100% from project to project. While I am dealing with the problem mainly from the perspective of displaced tribals, what I say applies even in the case of other small peasants, artisans and landless labourers living in rural India.

The perceived world of the tribal is much smaller than that of an urban citizen or even an average peasant. He lives in a cloistered world of his own, whether he is a subsistence cultivator, shifting cultivator, hunter or food-gatherer. A mistaken impression may exist that the latter category of people are nomads who should not find it difficult it they are shifted to some other place. What is important to note in this context is that even bands of hunters and food-gatherers have well recognised claims to certain territory which they zealously guard and within which they live in a state of ecological balance, achieved over centuries and even millenia. It is not easy for them to eke out a living in a different kind of terrain, unless they go through a long phase of adaptation and adjustment. So also the traditional shifting cultivators who have struck a cyclical balance is a particular environment.

Like the physical world around him, the social world of the tribal is also circumscribed. His kith and kin live within a narrow radius from his home. Hence he does not possess the advantage of having his relatives and friends in distant places to help him to resettle by offering him material and moral support. Hence when the tribals are to be displaced, any administrator or agency should think in terms of community resettlement and not individual resettlement. A tribal lives as an integral part of a cohesive social world which is small in dimensions. His relations and interactions with fellow humans do not partake of purposive associations as in the case of an urban citizen. He relates himself to others in what

may be described as multiplex relations which implies that the same set of people figure as kins, neighbours, economic collaborators, religious participants, juridical and political councillors and defenders of their common territory. It is not easy for the tribals to forge sequestered relationship with a large number of persons in an impersonal setting. Hence it should be insisted that in any resettlement programme, a community of tribals who have known one another and can inter act easily with one another should be shifted together from the old habitat to a new habitat. Being in the midst of the known social world will provide them the necessary physiological cushion and inner resource to help them adjust to the new situation.

I have not made any intensive study of the processes and problems involved in the resettlement of displaced persons. But my observations of a few resettlement colonies confirm the importance of the dimension of community. Like the physical infrastructure, people need a social infrastructure, without which a group disintegrates. An illustrative case is that of a colonization scheme in the Parvatipuram Taluk of Srikakulam District. With the laudable intention of weaning away the tribals from shifting cultivation the Government brought down some tribal families from the interior region to a newly built colony where alternative means of livelihood in the form of settled cultivation was sought to be provided. One such colony was located at Jatapu Kotapadu. It had 100 newly built houses. 300 acres were set apart for reclamation, of which 100 acres were to be brought under irrigation from a nearby stream. Domestic animals were distributed as also some seeds and money. But of the 100 families that were gathered there, 49 families left the colony in the first few years itself. Since then no effort on the part of the officials could stem the trend of desertions.

The main reason for the failure of the colony was that the officers in charge of it never perceived the importance of community cohesion. The recruitment of members was done in a haphazard way. In some cases, the settlers were persons who had quarrels in their families and hence chose to leave their homes. In some other cases there were persons who contracted unorthodox marriages inviting excommunication. On the whole, the members represented desperate elements assorted from different localities. They could not evolve a community life or forge a common leadership. There was no priest in the village nor a place of worship. The people had to go their former places to conduct their rituals or to seek the help of a medicine man. The allotments of agricultural plots among different families could not proceed smoothly. There was not enough of wet land to be distributed among all the families. Corporate decisions and collective actions were not possible in the kind of medley that the colony was. So it declined and disintegrated rapidly.

If there are some people, for instance like the official of the Madhya Pradesh Government, who think that this is an argument to pamper the tribals or to keep them as museum specimens instead of forcing the pace of their change, they need to look at some examples from the urban resettlement programmes in advanced countries. There too, factors like class, community, and culture have been of undeniable importance. Harrington gives some interesting instances from urban America where some of the housing projects could not become healthy residential quarters because of what he calls bureaucratically enforced rootlessness. He cites the case of a low cost housing project where at first a

cohesive life had been built up, but the leaders of the community soon became disqualified to stay there because their income rose abov the officially prscribed limit. The rsult was that the housing colony became leaderless, and the community soon developed fissures. Some housing colonies did not attract new members because of their inter-racial character. The well known British Sociologist, Sprott mentions that when people reared in the 'intimacies of slums'were given flats in a housing estate in Shuffled, they found it difficult to adjust themselves to the impersonal formalities in the new environment. And when foremen and workers of a factory in Liverpool were put together in a housing estate built for them, good neighbourly relations could not develop as the latter resented the superior airs of the former even in residential quarters.

This should lead us to pay attention to the question of inter-relations between the host community and the new settlers. The displaced persons may not be always resettled in exclusive colonies or villages of their own. They may have to be settled some times in habitations where there are already old resident communities. Sometimes, the way of life of the immigrants may not fit into the norms and customs of the host community. D.N. Majumdar gives an example of a group of Santal families driven to live in an industrial town. A conflict arose when a Santal girl was insulted by a member of the larger community living in another part of the town. The old Santal custom had a mechanism for removal of tensions of this sort. In their tribal habitat, if a member of one village injures or insults a member of another village, the leader of the latter village sends word to the leader of the former village that their men will come on an appointed day to seek traditional reprisal. On that day they can go to the other village and beat up the offender or his relatives and break some pots and pans in their homes and return. The village at the receiving end is not supposed to resist or retaliate. Underlying this practice is the concept of collective responsibility and collective acceptance of guilt. But how can such a solution work in an urban setting where the Santals are huddled together with other communities who do not subscribe to their norms. In this particular case, when Santals in the industrial town tried to resort to their traditional mode of reprisal, they were soundly beaten up and driven back.

This may appear to be an unusual case. But it is important that any agency entrusted with resettlement work should be able to foresee possible areas of conflict between the host community and the immigrants. For instance where there is already a high man- land ratio, and the employment market is overcrowded, any further influx of people will create tensions. Other possibilities of socio-cultural conflicts should be also looked into.

The easiest and perhaps the worst way of tackling the problems of project-displaced persons is to pay them some cash compensation and drive them out into the wide, open world to swell the numbers of destitutes or to join the people struggling in the unorganised sectors in urban areas. No displaced person should be taken as properly settled unless he is provided with a resource base. If the displaced persons have been cultivators of land, they should be provided with land calculated to yield them a little more income than they were enjoying before. While this looks simple, there are some difficulties in dealing with it in the context of tribal realities. The right to land of the tribal cultivator may be customary and not legal in the strict sense of the word. If administrators insist on legal interpretation of things, it would cause immense harm to the tribal. In many of the interior villages, land settlement records may

not be there. Hence the tribal's customary sight should be respected without insisting on legal formalities. There is a tendency to think in terms of market values and to compensate a tribal on the basis of land values in his remote habitat. In the interior tribal villages, the market values of lands may be low, but the yield may provide an assured livelihood to the cultivator. But in the plains where the density of population is more land of equivalent monetary value may not yield even a fraction of the out put of the former. What is essential is that any displaced person should be able to earn better income on the resource to be provided to him in the new place. In some cases the people may not be able to produce any legal titles, but still they may be having usufructory rights to the natural resources around them like forests and water fronts. They too need to be provided with a resource base which would enable them to live a secure life. What is of crucial importance is that a person subjected to involuntary resettlement should have a say regarding the scheme of rehabilitation.

It should be noted that when people are displaced from their villages they leave behind not only their houses and lands but also some community assets like shrines, grazing grounds, forests, water resources, community halls etc. Hence when people are resettled care should be taken to provide them with all such common facilities, also making sure that there are schools and hospitals in their vicinity. The norm to be adopted in this regard is not that people should be helped to attain the same level and quality of life as before the time of their displacement but they should be given some extra benefit which would cover the human costs of uprootment. The stress and strain which the uprooted persons go through have been summed up succingly by Michael Cernea, in his communication to the Anthropology News letter of the American Anthropological Association (Vol.29, No.6, Sept. 1988): "The people affected by involuntary relocation see their livelihood taken away, their houses, lands, forests, temples and graveyards submerged, and their cultural identity threatened. The record of involuntary resettlement operations is one of the cloudiest pages in the history of induced development change". Hence to compensate for this kind of mental agony. The resettlement agencies should provide displaced persons with a more secure resource base than they have had in the old habitat.

Only the educated, the artisans and skilled workers should be settled in towns after giving them some further training and orientation. Illiterate tribals or peasants should not be driven into the towns, and they should not be forced to become destitutes or labourers in the unorganised sector facing fierce competition from the more sophisticated sections. If it is an irrigation project certain stretches of land in the command area should be compulsorily acquired for the resettlement of displaced persons. If a ratio of 1:10 is to be insisted between the area to be submerged and the area to be irrigated, at least one-tenth of the command area should be acquired for distribution among the displaced persons. The Land Acquisition Act with its emergency regulation should be put into use in this regard (and not for evicting people for the construction of the project). The land owners who benefit from the irrigation project should not grudge giving up a part of their land in return for future gains. The proportion of land to be acquired for this purpose of resettling the displaced in the command area may be determined in a progressive scale according to the size of land holdings of the residents of the area.

It has become an usual practice for administrators to promise that one person in each family to be displaced will be given a job in the project. Here the natural process of the domestic cycle as it obtains

among the tribal society is more often ignored than not. The project work may go on for years, but what is one family at the time of its commencement may become three or four families in the course of half a decade as the nuclear family is the norm among the tribes, and sons establish separate homes as soon as they are married. The project officers may say that their list does not include the new families, and it invariably leads to hardship and heart burning. Hence all the adolescents in the affected community should be registered with the rehabilitation agency for employment at the commencement of the project.

Most important is the requirement that a detailed plan of resettlement backed by financial allocations should be built into the project outlay, and it should not be treated as a later contingency. The work of resettlement should be entrusted to an autonomous body and it should not be carried out by the some agency which carried out the project work. Here one of the guidelines of the World Bank deserves to be quoted: "Longitudinal anthropological studies and past experience in many projects have shown that vesting operational responsibility for planning and executing resettlement in the agency which is specialised in, and executes, the engineering and technical works of the project, often relegates resettlement to the status of a low priority task. Therefore the guidelines recommend setting up a distinct organisational responsibility in the Project, with adequate budget and staff for implementing relocation and socio-economic re-establishment".

In the Indian context, it is mostly the revenue department that is entrusted with the work of resettlement while the engineering department looks after the project work. Not even the Social Welfare or the Tribal Welfare Departments are actively associated with the resettlement process. This pattern should change and an autonomous body consisting of members of the Social Welfare and Tribal Welfare Departments, social scientists, social workers and representatives of the displaced persons should be constituted to carry out resettlement work. This body may have an officer from the revenue department as member-secretary, and all the funds earmarked for resettlement should be kept at the disposal of this autonomous body.

BASIC DIMENSIONS OF DISPLACEMENT AND REHABILITATION OF TRIBALS: AS A MODE OF ABRIDGEMENT &LOSS OF COMMAND OVER RESOURCES

-DR.K. MOHAN RAO *

Displacement and rehabilitation of tribals is not a new item on the agenda for tribal development; though its importance has varied depending upon: (a) the perceptions of the Government and other Agencies and (b) the reaction of the tribal to it. Displacement and rehabilitation have both been so far inadequately appreciated, therefore, the consequences have been very grave. It is only after ecological considerations gained ascendancy, with utmost speed, in the recent past, that greater concern is being expressed about this centre piece of nature's scheme - the tribal. It is a sordid fact that this subject has attained greater importance only of late although it has been ubiquitous on the tribal scenario. A number of case studies have been made and the topic is now being discussed frequently in symposia and workshops and various other forums more seriously. A welcome change no doubt and thanks to this effort, the perceptions are becoming more and more clear and clear perspectives are emerging. In the present forum which is part of such an effort, it is proposed to present certain basic dimensions related to the situation of displacement and the process of rehabilitation of tribals, through this paper in furtherance of the cause of the tribals. The subject is discussed here under the following topical headings:

A. Situations of displacement:

   i) Uniqueness of each situation;
   ii) perception of the equation and the concept of compensation.

B. Process of rehabilitation:

   i) Mode and strategies;
   ii) Mode of payment and the concept of continual flow of benefit.

A. Situation of displacement:

Displacement as it is generally understood involves physical dislocation; abandoning the present work place, hearth and home, whereas it has wider ramifications. Displacement can also occur 'in situ' due to loss of command over resources.

Situations of displacement arise on account of:

(a) Large-scale influx of non-tribal population into the areas of tribal concentration as it has happened in Adilabad, Warangal, Khammam, East Godavari, West Godavari, Visakhapatnam, Vizianagaram and Srikakulam districts of Andhra Pradesh and many other areas elsewhere.

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(b) Change in the policy of the Government affecting source of livelihood and loss of command over resources as it happened for instance when the strict Forest Conservancy Laws were enacted and implemented (in the pre-independence period) in the last century and continued so far through re-drawing of boundaries from time to time.

(c) Establishment of mining and industrial projects as it happened both in the pre and post independence era.

(d) Construction of large irrigation and Hydel projects especially during the era of planning.

(e) Establishment of sanctuaries for animals and birds.

(f) Urbanization with the introduction of development programmes and institutions and the induction of non-tribal workforce.

(i) (a) Large scale influx of non-tribal population:

As the tribal areas are relatively inaceessible the density of population is very low when compared to plains areas. Even as per 1981 Census reports, the density of population in tribal areas is 125 as against 194 in the plains areas per Sq.Km. In view of modern transportation facilities, gullible nature of local tribals, the non-tribal population in scheduled areas has been increasing from decade to decade. The percentage of scheduled Tribes to total population has decreased in scheduled areas of the State from 1961 to 1971 as per census reports due to large scale immigration of non-tribals into tribal areas. This factor is also resulting in alienation of tribal land and occupation of Government lands by nontribals. The details of total population, Scheduled Tribe population, taluk- wise and district-wise for 1961 and 1971 census reports for scheduled areas are furnished in the Statement I. Inspite of operation of Land Alienation Regulation in tribal areas of Andhra region from 1917 and in Telangana region notified tribal areas from 1949, the land has been passing clandestinely from the tribals to non-tribals. As per the details furnished by project Officers/Special Deputy Collectors (Tribal Welfare) of I.T.D.As., more than 48% of land in scheduled areas is under occupation of non-tribals in nine scheduled districts. In some districts like Khammam, Warangal and Adilabad, non tribals possess more land in scheduled areas than tribals. In Warangal district, approximately seventy two percent of land is under the occupation of non-tribals. The tribals are gradually losing their command over important resources of their livelihood. The details of land under occupation of non-tribals, district wise for nine scheduled districts, are furnished in the Statement II.

Government have introduced a new scheme called Telugu Girijana Magana Samaradhana. Under this scheme, the pace of survey and settlement operations are accelerated and so far 6,65,641.00 acres were added to the existing land base under occupation of tribals in the scheduled area. The details are as follows:

Sl. No.	Scheme	Extent in acres	No.of Beneficiaries
1	2	3	4
1. TELUGU GIRIJANA MAGANA SAMARADHANA			
a) Government Land	3,39,724.85	1,13,556	
b) Surplus ceiling land	34,302.15	20,692	
c) Bhoodan land	1,250.63	220	
d) Dis-reserved forest land	1,60,610.24	—	
e) Lands inside R.F.	48,511.74	13,692	
2. LAND RESTORED UNDER L.T.R.		81,241.39	20,294
	TOTAL:	6,65,641.00	1,68,454

(i) (b) Forests:

Forest conversation on ecological consideration dominates the policy of Government today; undoubtedly, it is an imperative now, when further deterioration may lead to disastrous consequences. But one hundred years back, strict Forest Conservancy laws adversely affecting the lives of the tribals were enacted and implemented. The marginal "Concessions" allowed were more often than not nullified by nefarious activities of the lower officials and other non-tribal exploiters and the general lackadaisical approach in operationalising the Government policy. For instance, an unforeseen product of the law as it emerged in the Adilabad tribal areas of Andhra Pradesh was the imposition of certain illegal taxes on tribals for obtaining timber and grazing animals 1. Another fall out was unimaginative marking of forest boundaries cutting across human habitations leaving no place to step out of the house without infringing the law. There are and there can be many variations of these situations. It is estimated that 1,54,126.00 acres and 40,271.00 acres were under occupation of tribals prior to 1980 and after 1980 respectively in the districts of West Godavari, Srikakulam, Vizianagaram, Khammam, Warangal, Visakhapatnam and Adilabad. In order to set right this anomalous situation, the erstwhile Nizam Government appointed special officers under leadership of Prof. Christopher Von Furer Haimendorf in order to take up suitable measures for disreservation of forest land and assignment to tribals in Daboli Forest Block of Adilabad district. During 1945 to 1949, 70,000 acres were assigned to tribals in Adilabad district. After formation of Andhra Pradesh, Government also regularised occupation of forest land to the extent of 70,580 acres by tribals in Adilabad district as per the provisions of Government Order (G.O.Ms.No.2261, Food & Agriculture Department, dt. 25-11- 1968), Government also issued certain directions to Forest Depart-

1. The Kolams-a tribe in transition - Dr.K. Mohan Rao.

ment in Govt.Memo.No.26531/For-I/87-1, Energy, Environment, Forest, Science & Technology Department, dated 28-12-1987 to protect the interests of tribals. As per the provisions of this Order, local tribals who have been cultivating lands within reserve forest boundary prior to 1980 should not be evicted. But Government have yet to take necessary steps to regularise these occupations by local tribals. These measures will stabilise the resource base of tribals, if properly implemented.

(i) (c) Mining, irrigation and other projects:

There are mining and other projects both old and new. Efflux of time has not solved the problem of tribals in the long standing projects. Both in the older projects and the new projects, displacement of tribals is continually taking place. The impact of these projects goes beyond mere displacement. The new socio- economic situation imparts such a blow to tradition bound tribal society that more often than not it starts wobbling only to take an unintended direction. In Andhra Pradesh, the coal belt situation was studied and an Action Plan was prepared to upgrade the skills of the tribals and prepare them for better participation both directly and indirectly. The Scheduled Tribe population involved is 4.06 lakhs spread over 4 districts, 55 Mandals and 1155 villages. Much of the tension prevailing in the area can be defused while conferring plentiful benefit to the tribal thereby accomplishing the avowed objectives set-forth in the Constitution. Similarly, a Legislation is being contemplated to reserve exploitation of minor minerals in favour of tribals. Both, the legislation and Action Plan are on the anvil.

(i)(d) Irrigation and Hydro Electric Projects:

The construction of irrigation projects and hydro electric projects in tribal areas submerged large number of tribal settlements. The hydro electric project constructed at Machkund displaced nearly 50 villages but only two rehabilitation colonies were constructed in Chintapalli area. Hundreds of tribal families uprooted because of construction of Jolaput reservoir and Machkund Project during the fifties became 'nomadic' cultivators. They have been going from place to place in search of lands. The various tribal groups who possessed their distinct culture are finding it difficult to live in new surroundings. The tribal families who are settled in Chintapalli area go back to their original places of habitation in border areas of Jolaput, Munchingput for matrimonial alliances some times walking more than hundred kilo metres. Eventhough these projects are constructed in heart of tribal areas, tribals are hardly benefited. But on the contrary, they are being uprooted from their original moorings.

(i)(e) Sanctuaries:

There are 14 animal and bird sanctuaries in Andhra Pradesh, of these 7 are situated in tribal areas. The tribal population affected is 0.37 lakhs in 256 villages in 10 districts. Let us take the example of Project Tiger in Srisailam Chenchu belt of Andhra Pradesh. Here the core area, the buffer zone have been identified and it is estimated that only 3 to 4 thousand Chenchus are there in the core area. Elaborate instructions and procedure for compensating the loss of human and animal life (including injury etc. caused to human beings) are given if these attacks take place outside core area. Happily the Tiger population has registered a substantial increase and so has the ***incidence of "losses"***. The tiger, unfortunately, in course of its perigrinations obviously does not recognise the core area and the buffer zone boundaries. The situation is gradually becoming alarming due to depredations of tigers. As per

the present Government rules, the animals and human beings killed by wild animals within the core area of the tiger sanctuary are not entitled for any kind of compensation. Several Chenchus are having patta lands within the sanctuary area. All kinds of restrictions are imposed within the sanctuary but native tribals are not properly rehabilitated. Some of the Chenchu men and women when they go for collection of minor forest produce and some of the plough bullocks distributed by Tribal Welfare Department are being attacked by wild animals. Most of the Chenchus are not aware of the sanction of compensation by Forest Department for the loss of cattle due to attack by wild animals. The bows and arrows of Chenchus are confiscated. A section of the Chenchus who are largely subsisting by hunting and gathering are facing insurmountable difficulties to eke out their livelihood. It is reported that incidence of T.B. is also on the increase. Due to inaccessibility of some Chenchu Villages, medical facilities are not available to Chenchus. This affects a very vulnerable tribal group which is recognised as "Primitive" among other Tribal groups.

(i) (f) Introduction of developmental programmes and institutions:

Similar to land alienation is the influx brought about by the process of directed change. A number of institutions,schemes for the welfare and development of tribes and tribal areas and certain National projects are being taken up where the tribals' participation is minimal due to variety of reasons. The workforce to operationalise the schemes atleast in the initial stages consists of non-tribal immigrants who lay the foundation for the influx of non-tribals. The D.B.K. Railway Project constructed during sixties displaced number of tribals who were inhabiting along the railway track in the tribal areas of Visakhapatnam district. The paltry compensation paid was spent on unproductive purposes and alternative land was not provided. Efforts were not made to impart adequate skills to absorb the local tribals on skilled jobs available. Similarly, the Heavy Water plant established at Manuguru, Khammam district recently displaced large number of tribal families. The oustees were paid inadequate compensation and alternate cultivable lands were not provided. Efforts were not made to provide employment to the tribals displaced. Government offices, several educational institutions are being established by acquiring tribals' lands. But they are not provided alternative source of livelihood. In some cases, the tribal families are not paid even compensation.

The new dimensions of super-fast pace of changes everywhere and particularly the change in tribals own perceptions, must compel the attention of every one concerned to the scenario of displacement. **The uniqueness of each situation must be recognised.** Detailed investigation must be carried out and location specific and problem specific data obtained to tackle the problem adequately. This should be done before compassion fatigue overtakes the Nation vis-a-vis the tribal. **Abridgement and loss of command over resources is taking place at a pace hitherto unknown and hence the urgency.**

(ii) Perception of the equation and the compensation:

Besides recognition of the fact that each situation is unique it is equally necessary to test whether the current perceptions of displacement and compensation for the loss are adequate and valid. In the past, the rulers prescribed what is good for the people. Not that everything they did was not good but the fact remains that atleast some of their actions stemmed from the spirit of a conquisitador, like for

instance taking over the natural forests almost neglecting the rights of the inhabitants of the forest. Similarly , Whenever an irrigation project or a mining project was established, the oustee's rights were mentally set off against the general good that such projects would do to the society in order to justify the take over of his assets. Naturally compensation had a very limited connotation in their minds. The ramifications of the loss and the dimensions of the distress such a process sets in must have rarely crossed their minds. Further, the need to be frugal which was their characteristic must have prevented them from going beyond payment of limited amount of money. Here the equation was understood in terms of a Government conferring considerable benefit to the society while at the same time not denying or declining the share of the individual occupant/owner of the asset. At that point of time preceding which man in authority could straight away abrogate the rights of the citizens without compunction it was perhaps considered to be a liberal measure. Everything apparently fitted into the legal frame which was evolved on the aforementioned premises or logic. Even after independence, the Statute Book carries the hangover and what should cause concern is the fact that even the weaker sections-the tribals stand on the same footing as anyone else, eventhough the implications of displacement and loss of control over resource base has deeper implications in his case because several well known and well recognised factors. Recent liberalised thinking and action provides for land to land compensation and assistance in settling down at the new site.

Compensation in monetary terms, is determined with reference to the extent of land and assets that are lost by the individual. Here two methods are adopted: one is to determine the local market value of the asset and the other is to assess the productivity. Both are depressed in the tribal area and what ultimately prevails is the arbitrary decision of the official. 'Land to land' is attractive only on paper. When it comes to grounding such a scheme, innumerable difficulties arise. Firstly, good land is all occupied everywhere what is left is marginal and uncultivable land. What actually happens is that the oustee or the beneficiary does not even respond to intimation by the authorities to occupy it in some cases. The cash compensation component slips out of the tribals' hands no sooner than he receives it; towards repayment of loans and other social obligations. The result is direct degradation to starvation and poverty.

In the tribal context, the calculations of value and solatium are one sided. If fair compensation is to be determined in view of loss of command over resources, a radical departure must be made from the present procedure. Not only must the value of assets but also the loss of situational advantages must be reckoned with and the contribution which such an acquisition makes to the State/National financial kitty must also be reckoned with while calculating the compensation. The reason deter being that the tribal as an individual or the tribal group does not either exclusively or in substantial measure derive benefit from the dividends that accrue while the society in general does. The immediate beneficiary of the development projects and urbanisation process is the non tribal, therefore, there is need to recognise the share of tribal and assign it to him through the instrumentality of a well-thought out system.

The displaced tribal is invariably forced to join the economic mainstream of the nation which per se is not favourably disposed to the unorganised rural sections. Dr.B.D.Sharma has summed up the situation in the following words:

"The highly inflated, self-centred entitlements of the organised- urban are being sustained largely by (i) cornering of dividends accruing to the national economy due to technological inputs directly in the modern industrial sector or indirectly through technical collaborations, imports and other transactions with advanced countries, (ii) expropriation of the activities accruing in the unorganised rural sector through heavily loaded exchange equation and machination of the money system. The daimonic-demonic character of money is responsible for the setting in of a 'benevolent-vicious spiral' blessing those who have and destroying those who have not. A dual process of marginalisation is operating, one at the base in the rural sector and the other at middle levels in the urban sector stripping clean all those with moderate assets who make a bid to join the organised. The economic dualism has the support of the powerful administrative system which is a co-sharer in the "legitimate gains being a part of the organised. The administrative system is also responsible for substantial invisible transfers, regular and otherwise"1.

B. Process of Rehabilitation:

If displacement results in abridgement and loss of the resource base, it is perhaps understandable though not justifiable on moral.... grounds; but strange as it is operationalised today also contributes in substantial measure to it. Basically it is on account of lack of advance planning on systematic lines. In fact all the rehabilitation measures whether bearing the caption of 'Rehabilitation' or not are all adhoc, inadequate and half-hearted. In this context, the author, guide and philosopher of the "New incisive policy of tribal development" Dr.B.D. Sharma was perhaps the first top functionary to concede it and mention the need for such step as early as in mid 70s in the paper on 'Planning for industrial development of tribal areas' in which he observed that "the variables in socio-economic situation are so delicately it. *Therefore, a comprehensive industrial development plan keeping in view all aspects may be necessary*" 2. The fact that he is still pleading for a rational policy after lapse of a decade and more in his report as Commissioner for Scheduled castes and Scheduled Tribes is enough proof that the problem remains. He recommends by advancing strong arguments that "Pending the investigation into the Constitutional safeguards relating to the command over and access to resource of the tribal people and their displacement and consideration by the Government of their findings towards arriving at a national consensus and policy frame, all ongoing projects and also those pending consideration with the Government at different levels may be reviewed and it may be ensured that safeguards provided for the tribal people in the Constitution are honoured in their real spirit and that their side does not remain unconsidered simply because they did not have the opportunity or the necessary articulation for presenting the same or because of the incongruity of the Law *itself concerning their rights*".1.

What is more alarming is the fact that planning for rehabilitation and the actual rehabilitation is not even coterminous with the process of *investigation and setting up of the mining*, industrial, irrigation

1. The web of poverty-Dr.B.D. Sharma, *1989, P.4.*
2. Occasional papers on Tribal Development-7 by Dr. B.D. Sharma, formerly joint Secretary, Ministry of Home Affairs, Government of India and presently Commissioner for Scheduled castes & scheduled Tribes, Government of India, New Delhi.

etc. Projects. In fact because of the human factor involved, it should begin far in advance and continue sufficiently long after the project is completed in order to achieve satisfactory results. Wherever there is likelihood of large scale displacement of tribals, sociologists, anthropologists and those trained in social work should invariably be associated from the very beginning.

(i) THE MODE AND STRATEGY OF REHABILITATION:

(i)(a) Forests:

The weaknesses or shortcomings in the forest policy and the consequent hardship caused to tribals attracted the attention of all concerned high power Commissions like the Dhebar Commission appointed under the provisions of the Constitution in 1960s and in fact all other Committees which dealt with the problem of tribals. While accepting all recommendations made in this connection and considered unexceptionable from the point of view of preserving forests and protecting the tribals' interests were accepted, but the implementation has been far from satisfactory. The recommendations Fall broadly into two categories; (a);(a) settling the boundary disputes and regularising the occupation of land by tribals in the Reserve Forest and (b) recognising the rights of the tribals over the forest produce for their personal consumption and procurement of minor forest produce for sale. To clear the doubt in the minds of those who may question whether any effort is made at all to rehabilitate tribals affected by forest policy, it may be mentioned that such an effort is indeed made though not under the label of rehabilitation. The mess that is created in this process and the tug-of-war between development functionary and foresters with political and other malignant forces joining issues leading to tensions would constitute a subject by itself for a volumenous treatise. Within the confines of a paper of this nature, it suffice to say that:

(1) The tribal is accused of destroying the forests while actually it is otherwise.

(2) The process of demarcation of boundaries after passing the first Act more than one century ago (1864) still on and in 1990s also it is still being done keeping the tribals in a permanent state of uncertainty.

(3) Minor Forest Produce bearing trees etc. are yielding place to commercial mono culture plantations, gradually knocking out a good source of income of the tribal.

(4) Non recognition of tribals' rights in the forests statutorily.

(5) Imposing of further restrictions through the new Act 1980 on excising the forest lands, blocking development of irrigation sources and extension of power supply to tribal areas.

(6) Even the recognised rights the tribals are supposed to enjoy are not allowed to become operational because of distortions that emerge at the cutting edge level.

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1. Report of the Commissioner for Scheduled Castes and Scheduled Tribes, 1986-87 issued in 1988.

(i)(b) Establishing of mining and industrial projects:

It is the usual practice to acquire the required extents of land and compensate those who lose their assets under such projects. This is a one time affair and the loss is obvious. Experience shows that such of those who lose their assets in this manner acquiesce to the abridgement and loss and live on but the plight of those who do not apparently lose anything but continue to stay where they are and suffer due to disorientation is heart-rending. A study of such a situation was made in the coal-belt of Andhra Pradesh and it was found that the local tribals derived negligible benefit of the tremendous economic activity generated in the coal belt townships. Plentiful opportunities of both direct and indirect employment which could have been availed by the local tribal easily with proper planning and coordination have all gone to outside population. Even unskilled jobs which could have gone to tribals were not been given to them till one of the official at top management level decisively interfered and did it in one round of selections. What happened to those who lost their lands in the distant past is evidently not even remembered by anyone nor there is any conscious and systematic effort now to upgrade the skills of local tribals to match the requirement of the Collieries.

The process of settling those who have lost their lands under irrigation and power projects presents yet another dismal picture. Under the Machkhund River Hydel Project, several tribal families were displaced, proper count of those who migrated on their own or of those beneficiaries of so called rehabilitation was not kept. Some of them have strayed in search of livelihood into East Godavari from Visakhapatnam district. Any number of such examples can be given. The lacuna basically was that the rehabilitation programme drawn up and the staff employed for the purpose was inadequate.

The tribal families who are displaced due to irrigation projects have to be provided equal extent of land in the command area of the same irrigation project. The beneficiaries themselves should be made to part with a portion of their land to suitably compensate those who lost their lands.

(i) (c) Rehabilitation of tribals displaced on account of the large scale influx of non-tribal population:

This is the most complicated and complex of the problems of the tribals. Tribals have lost their lands on a large scale and the process is still on notwithstanding the protective regulations implementation of which over the past two decades does not seem to have produced any satisfactory results. Restoration of the land to the tribal who has lost the land must be followed up by financial assistance and support by way of technical guidance, besides constant vigilance to prevent relapse of alienation. At present, the process is routine and lacks crucial inputs to meet the special requirements of the tribal. An Action Plan has been prepared for protection and Development of the land base of the tribals. Much of the hardship will be mitigated if this Plan is implemented.

(ii) THE CONCEPT OF CONTINUAL FLOW OF BENEFIT:

When once the concept of compensating the loss of assets by calculating the dividends also is accepted, it would be necessary to device a method of spreading the payment over a reasonable period of time.

STATEMENT-I

Details of District - wise and Taluk - Wise Total and Scheduled Tribe Population as per 1961 and 1971 Census Reports

Name of the Dist.	Taluk	1961			1971		
		Total	S.T.	%	Total	S.T.	%
1	2	3	4	5	6	7	8
Adilabad	Utnoor	55,099	32,953	59.80	93,823	47,084	50.18
	Asifabad	23,053	11,865	51.46	31,193	13,852	44.40
	Luxettipet	22,194	2,437	10.98	61,946	6,418	10.36
	Boath	17,628	6,840	38.80	23,654	7,748	32.75
	Sirpur	17,414	3,673	21.09	25,604	4,321	16.87
	Adilabad	20,231	10,069	41.58	31,866	12,534	39.33
Warangal	Mulug	34,596	13,171	38.07	51,265	15,780	30.78
	Narsampet	17,670	8,692	49.19	32,085	11,270	35.12
Khammam	Bhadrachalam	87,770	47,820	54.48	1,13,189	53,968	47.67
	Burgampad	81,239	26,083	32.10	1,04,921	30,640	29.20
	Kothagudem	97,719	29,001	29.67	1,22,759	29,569	24.10
Srikakulam	Parvathipuram	43,555	37,745	86.66	53,043	[illegible]	85.85
	Palakonda	20,060	19,437	96.89	23,320		94.30
Visakhapatnam	S.Kota	8,052	7,533	93.55	11,792	9,791	83.03
East Godavari	Yellavaram	63,426	42,964	67.73	83,029	51,682	62.24
	R.C. Varam	45,140	34,294	75.97	54,261	39,171	72.18
West Godavari	Polavaram	46,175	27,570	59.70	53,987	29,734	55.07

Note: The Census population of 1981 reports are not adopted as area restriction in case of Lambadas, Yerkulas and Yanadis is removed.

STATEMENT-II

THE EXTENT OF LAND UNDER THE OCCUPATION OF NON TRIBALS IN THE SCHEDULED AREAS

Sl. No.	Name of the District	Total land in scheduled area in acres	Land under the occupation of non-tribals in acres	Percentage
1.	Srikakulam	14,949.17	359.20	2.20
2.	Vizianagaram	42,333.00	91.00	0.21
3.	Visakhapatnam	2,88,107.00	N.F	..
4.	East Godavari	1,73,417.49	33,739.89	19.46
5.	West Godavari	75,702.42	27,979.16	36.96
6.	Khamman	7,71,604.93	4,07,368.33	52.79
7.	Warangal	1,42,533.00	1,02,104.50	71.64
8.	Adilabad	2,97,170.95	1,80,349.40	60.69
9.	Mahaboobnagar	42,391.60	1,444.18	3.41
	Total:	18,48,209.30	7,53,435.66	48.29 (excluding Visakhapatnam)

COMMAND OVER RESOURCES OF TRIBAL PEOPLE WITH THE CHANGING CONTEXT - A CONCEPTUAL FRAME

-M.G. Gopal, I.A.S.*

INTRODUCTION:

Tribal areas in general are rich in natural resources Decades ago only aboriginal tribals had control over the resources available in the tribal area. With the migration of non-tribals in to the tribal area, the authority of the tribals over the resources has been eroding. The extent of command over the resources in tribal area of the tribals has to be discussed with reference to the following aspects.

1) What are the resources available?
2) How do we assess /measure the command over resources?
3) What can be done to make tribals improve their command over these resources?

1. AVAILABILITY OF RESOURCES:

The following are the resources available in general in tribal areas.

A. Land
B. Forest
C. Surface and Underground water
D. Human Resources
E. Cattle & Other Resources

Resources are meant for exploitation to result in increase in incomes and wealth which are essential for the well-being of tribal community particularly when they have to be brought to the national main stream. For any productive activity in addition to land and labour, availability of capital and organisation are very important. The later two factors of production are critical constraints in tribal area and hence their backwardness.

Thus, mere availability of the resources listed above is not at all useful to tribals unless the wherewithal to exploit them is made available to them.

Already most of the resources available in the tribal area have been taken away from the hands of the tribals and it is necessary to examine how best the balance available could be brought under tribals' command. I propose to look at this problem from the point of view of tribal economy.

2. ASSESSMENT OF COMMAND OF TRIBALS OVER THE RESOURCES:

A. LAND:

Availability of resources is different from ownership of the resources. Traditionally tribals used to have command over the resources through their community. There were no laws and regulations in the

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past as they are now to-day written in the shape of legislation. As the interference of the Government machinery started in the tribal area with positive view to bring these gullible people into the main stream, exploitation elements taking advantage of the loopholes in the legislation have also entered in the tribal area. For instance a tribal cannot face a a non-tribal when the non-tribal's name is entered as cultivator in the revenue records eventhough in fact the tribal is the cultivator. The tribal would realise about this only when he has to get crop loan from bank and by the time he realise, the adverse possession of the non-tribal would have already been established.

Thus, it is important to distinguish between the availability of resources vis-a-vis legal ownership by a tribal.

According to estimates the total extent of cultivable land in the Tribal Sub-Plan of Warangal District is 1.56 lakh hectors within which the tribals holding is only 24,000 hectares or about 15%. Out of this, about 11,254 hectares has been found to be under the occupation of non-tribals in contravention of the L.T.R. Besides the revenue land for which the tribals have pattas, about 6,250 hectares of land in (57) villages notified as Reserve Forest is under the occupation of the tribals for which there are no pattas. Thus, the extent to which the tribals have command over the cultivable land available in the tribal area which was decades ago under the control of only the tribals, has come down substantially over a period of time.

More ownership cannot mean that the tribals have command over the tribal land. Whatever small extent they own, the tribals can be said to be having total command over the land only when they are in a position to optimise the output from the land, not in ideal terms, but vis-a-vis the standards attained by others who are living with the tribals in tribal villages. For instance, the average yield of paddy in this area is about 25 quintals per acre where-as the yield in the tribal land has increased from 10 to 15 quintals only per acre in the recent past. The reasons may be several.

B. FORESTS:

If we take forest wealth, the tribals have little command over this resource, due to the Forest Conservancy Laws and the exploitation of the resources already in the past to pre-empt tribals getting command. For example, most of the Sundry Trees available in the forest area have already been worked in the past by the forest contractors to produce Kach and Katha. Paper and Rayons Factories have already been set up by the big business houses without benefiting the tribals. Land fit for cultivation in the forest areas devoid of any tree growth has been notified under the Section (4) of the Forest Act. The tribals cannot construct irrigation tanks because of submergence of the forest land. Concession regarding collection of minor forest produce are not exclusively available for tribals because of the fact that even the non-tribals living in the forest area can share the collection of minor forest produce. The tribals cannot sell the minor forest produce to a person who is prepared to give a better price because of the monopoly rights given to Forest Department in respect of Tendu Leaves and G.C.C. in respect of produce like Broom Sticks. Thus, whatever, command the tribals have over forest produce is negligible when compared to the restrictions that have been imposed on the tribals by wild-life and Forest Conservancy Laws.

C. SURFACE & GROUND WATER:

Even in respect of the exploitation of ground and surface water potentiality for the benefit of the tribals the scene is discouraging. In the Tribal Sub Plan area of Warangal District there are two Medium Irrigation Projects with a total settled ayacut of 13,560 acres out of which the land held by the non- tribals is about 10,000 acres i.e. 73.7%. To add to this the tribals are not allowed to draw the water flowing waste in the catchment area in the rainy season under the pretext of registration of lower riparian rights. Most of the Tribal Sub Plan is covered under sub-basins G.6&G.10 of River Godavari and a part of the area is covered under subbasin K.12 of Krishna River. As on date there is an uptapped potential of 41,071.38 M.ft of water available in Godavari Basin and 4,072 M.ft of water available in Krishna Basin which if tapped fully can irrigate around1.44 lakh hectares.

As regards ground water the net annual r coverable ground water recharge in the Sub Plan area is estimated to be 7,305 hecta Metres out of which only 2,814 Hecta Metres is only being utilized now. Thus, even-though sufficient water is available t oth above and underground the entire tribal land holding is not irrigated.

There is a potential water spread area of about 400 hectares under the village tanks besides Godavari River flowing across the tribal area for fisheries production. As against present yield of 35 to 50 tonnes of fish production in the village tanks (against 7 to 8 tonnes before I.T.D.A. Started stocking seeds in the tanks) there is a potentiality to tap about 300 tonnes fish per anum from the tanks and about 150-200 fish per day if only the required seed production is increased and the other infrastructure is provided.

D. HUMAN RESOURCES:

There is a vast human resource in the tribal area which is either unemployed or under-employed. By improving the skills of the tribals, their income earning capacity can be improved substantially (for example beedi making, carpet weaving, katha manufacturing etc.)

According to the estimates there are 18,000 underemployed and un- employed persons in the age group of 14 to 20 years. They get employment for about 100 days in a year and their average earning per day is Rs. 8/-. If their skills are improved, they will be able to get full employment and will be able to earn an average wage of Rs. 12/- per day thereby, improving their income from existing Rs. 1.44 crores to Rs. 5.40 crores in a year.

E. CATTLE & OTHER RESOURCES:

The Tribal Sub Plan of Warangal District is a white cattle zone. The Cattle are of low grade and are non-described a types. If only the cattle are upgraded the incomes of the tribals can be improved substantially. It is estimated that against total cattle population of 1.20 lakhs held by tribals there are 30,000 female cows and 13,000 she buffaloes. The present milk production is almost nil. By upgrading the cattle it is possible to get milk production of 3.87 Cr. litres in a year or Rs. 11.61 crores.

The command over the resources in the tribal area has also to be examined with reference to the stage of development in which tribals are placed i.e., (a) food gathering stage, (b) Shifting cultivation, (c) Settled cultivation and (d) Stage of entering the main stream. For an educated tribal who is aboriginal what matters is his command over the opportunities available in the tribal area for employment vis-a-vis the nontribal/other developed tribals, more than the land held by his parents. Similarly, a tribal who has high enterprenural abilities, it is a question of an opportunity to encash his abilities to earn more money by doing business. For instance, group of aboriginal tribals have come forward to sell jaggery and coconuts in the Bi- annual Medaram Jatra held in 1988 and with the organisational support given to them they did the business in 1988 and again in the recently held Jatra and made substantial profits, eventhough this change is resisted by the non-tribal community who traditionally did business in the Jatra, because of the support given by the Government. However, it is not the end. The tribals are aspiring to enter into every type of business/contracts if only they are given an opportunity against the resistance put-forth by the non-tribal lobby.

3.WHAT CAN BE DONE:

From the above discussion, one issue clearly emanates. The tribals do not have command over the resources either because of non-ownership or non-exploitation of available resource to the optImum extent. The reasons are (a) Inadequate capital for investment (b) Inadequate extension support, (C) Laws of the land and (d) Organisational abilities.

For attempting to find out a solution, the following case study relating to this Tribal Sub Plan area may be helpful.

For the past 5-6 years, steps have been taken in this Agency to provide assured irrigation facilities for the tribals lands. During the year 1988-89, a quick survey was undertaken to find out the benefits that accrued to the tribals after irrigation facilities were provided. It was noticed in the study that the tribals were taking paddy, maize, Groundnut and Green Gram crops only. The net yields per acre in different villages, are given hereunder:

Sl. No.	Name of the Village	Crops taken in one acre	Yield per acre (in Kgs.)
1.	Sadireddypally	Paddy	596
2.	Kothapally	Maize	340
3.	Tondiyal Laxmipur	Maize	500
		Paddy	950
4.	Project Nagar	Paddy	1360
		G'nut	600
5.	Yelisettipally	Maize	750
		Paddy	715
6.	Timmapur	Maize	225
		Paddy	872
		Green Gram	90
7.	Kalwapally	Maize	450

As the tribals were not getting good yields, it was decided to take up (a) Soil testing, (b) Preparation of cropping pattern to utilise the land throughout the year, (c) Demonstration of suggested crops in places where better returns are got by the non-tribal farmers through field trips, (d) Supplying the inputs required for the suggested crops free of cost and making tribals contribute their labour and (e) Constant technical support for 10 acres of land under each irrigation source in 10 villages. These plots were called Multiple Crop Demonstration Plots.

The results of the MCD Plots have shown that the yields went up substantially as given hereunder:

Crop	Average yield per acre in MCD (in Kgs)	Increase in yield (in %)
1	2	3
Maize	939	107.3
Paddy	1670	86.0
Green Gram	204	126.7
Ground Nut	729	21.5
Chillies	930	NR
Turmeric	1212	NR
Onion	2100	NR
Vegetables	1000	NR

Thus not only the yields of the crops traditionally taken by tribals has improved, but new crops were also introduced with respectable yields. The average income per acre under the MCD Plots was Rs. 5,837/- as against pre MCD income of Rs.1,464/- per acre for the same farmer. The increase in income per acre in percentage terms worked out to 298.7% just in one year by taking measures (a) to (e) listed above.

During the year 1989-90, ITDA did not give any support to such of the farmers who were beneficiaries of MCD Plots during 1988-89 except for arranging for crop loans through banks in some cases and ensuring timely availability of inputs of good quality with 25% subsidy under the normal ITDA's Agricultural Programme. The following are the statistics relating to yields in the same plots during 1989-90 Kharif season.

Crop	Yield pre MCDs (in Kgs)	Yield in MCDs (in Kgs)	Yield post MCDs (in Kgs.)	Increase over pre MCD (in %)
Maize	453	939	760	66.9
Paddy	898	1670	1607	82.8
Green Gram	90	204	222	146.7

The results of Rabi Crop are being collected. Seeing the positive results during 1989-90 MCD Plots were organised under 46 bore wells/tube wells in 38 villages and the results are encouraging. Eventhough availability of agricultural staff, maintenance of bore wells/tube wells and erratic power supply etc. are the constraints in making these programmes a success, in view of limited number of villages where MCD plots are located, proper monitoring was possible to manage the constraints.

From the above case study, it can be inferred that there is vast scope for improving the command of tribals over income generation capacity of the resources they have. For increasing the incomes in farm sector, either the land holding of the tribals has to be increased or the productivity of the land has to be improved. While the first alternative is impossible to achieve, the second alternative seems to be the only choice which we have to concentrate.

It is possible to increase the incomes from farm sector in the following ways.

a) Dry land with same crop by ensuring utilisation of HYV of seeds and required inputs.
b) Dry land by suggesting a change in the crop.
c) Wet land with same crop by ensuring HYV seeds/changing varieties and required and required inputs.
d) Wet land with changed cropping pattern
e) By improving the crop intensity.

For all the above permutations, common requirements are availability of credit, land development and introducing water harvesting techniques, besides making available inputs of high quality in time.

The statistics given in Annexure-I would reveal that even the productivity of dry lands can be substantially improved if required capital is provided for working capital/recurring charges and fixed costs. The following incremental surplus for each crop with pay back period for fixed costs is possible for dry crops.

Name of Crop	Extnt of land held by tribals (in Hcs)	Incremental investment (Rs. in Crs) Recurring	Fixed	Total incremental surplus (p.a.) (Rs. in Crs)	Pay back period (in yrs)	Average incremental surplus (per Hcs.)
KHARIF						
Paddy	6300	1.330	2.360	2.060	2.2	1,682/-
Jowar	1055	0.316	0.158	0.143	1.1	1,355/-
Maize	1048	0.327	0.157	0.197	0.8	1,879/-
Green Gram	642	0.107	0.096	0.041	2.34	638/-
Ground Nut	1053	0.246	0.105	0.281	0.09	2,668/-
Sesamum	394	0.059	0.059	0.012	4.92	304/-
Horse Gram	462	0.077	0.046	(-)0.003	-	-

Except Horse Gram where the incremental income is less than the incremental recurring charges, and Sesamum where pay back period is relatively huge (5 years) there is no reason why investment should not be made in the tribal farm sector by organisation such as NABARD directly through ITDA. Even in respect of leguminous crops which fix nitrogen in the soils and thereby improve productivity of the lands, even if incremental loss is noticed marginally, there is need for investing amounts as a social cost.

Thus, it is possible to usher in green revolution in tribal areas even without provision of assured irrigation facility by taking up dry land technology. However, massive extension support and functional micro projects will have to be set up for a group of 20-30 villages to achieve the task in respectable time frame. The existing structure in the form of ITDAs will have to be supplemented with functional projects. It will not possible to do so now considering the ceiling on administration charges to be incurred by ITDAs in the range of 8%-10% of SCA and capacity of the financial institutions to lend to the tribals adequately. The present rules regarding financing a defaulter also need relaxations by way of rephasement of dues of non willful defaulters. It is, therefore, suggested that NABARD directly lends through the ITDAs/Micro Projects/G.C.C. for this purpose.

CONCLUSION;

It is possible to prepare projects for human resource development, exploitation of forest resources etc. on the above lines. With the help of voluntary agencies such as Bharatiya Agro Industries Foundation, Urli Kanchan Pune, even cattle wealth can be upgraded for improved returns to tribals from this source. Master Plan for creating irrigation sources to cover all the lands of tribals have already been prepared by ITDAs and it is necessary to fund the projects not only with the Tribal Sub Plan Funds of Irrigation Department, APSIDC etc. but also from general sector funds considering non-achievement of Tribal Sub Plan Targets in the earlier years.

If the tribals who are facing many problems including exploitation by anti-social elements have to be brought to the main stream, investments of a far higher order and minor adjustments in administrative structure will be the only solution.

DISPLACEMENT AND NEW DIMENSIONS OF UNREST IN TRIBAL AREAS IN ANDHRA PRADESH

(A case study of Adilabad district)

Dr. VNVK SASTRY, *

Problem:

Displacement can occur in two ways and cause difficulties to the people. Physical displacement may result in temporarily dislocation in work ways and the society gets settled in the new environment on its own or with the help of an outside agency. It may not have the same patterns of life in the new situation but may slowly get adjusted to the new situation, if basic requirements of life are available. What is really dangerous is the problem of economic displacement which occurs due to factors extraneous to the society on whom they do not have any control. Once again this occurs due to two forces. Migrant individuals or families coming into the contact with the local society for trade etc. may initially help the members of society by providing some facilities like loans, goods etc. but ultimately usurp the resources of members of that society. The second force is the state.

In case of tribal areas, the non tribal migrants coming into contact with tribals always had the advantage of better knowledge, better financial resources and better linkages with the state machinery. Therefore, they were able to continue their hold over the resources usurped by them through various manipulations. It is also in our knowledge that the active support of the state machinery in the initial stages and its passive resistance to implementation of legislations protecting tribal interest, in the later stages that is helping the non- tribal exploiters to settle down in tribal areas permanently to continue their exploitation. While this is so, even since the first Forest Act came into existence and State and its machinery started seriously increasing the control over natural resources in tribal areas, the state appears to have overtaken the non- tribal exploiter and became a bigger usurper of tribal's rights over the means of production.

The European and American Anthropologists and their Indian students always tried to explain the elevage as an outcome of ethnic interaction through the concepts like 'Diku' (Agrawal, B.C.1977, caplon, L1970, Haimendorf, 1945, Prasada Rao 1971). Even the present author tried to explain the unrest in tribal areas of Adilabad district in a similar way (SASTRY:1979). But a further study has, however, shown that a lot of other areas of conflict were not explained. May be because we suffer from "establishment myth".

The tribal areas of Adilabad District is taken as a case for explaining the new dimensions of tribal unrest.

Present Study:

The tribals in adilabad district rebelled against Nizam in 1940. Again in 1981, they rebelled at Indervelly. From then, the tribal unrest is continuing and is intensifying over time and space. It is

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assuming new dimensions, year after year. The tribal's participation in extremist movement is also increasing even after the development efforts intended to wean tribals from extremist path have also been stepped up by Government.

What are the perspectives of unrest in tribal areas? Why unrest still continues inspite of taking up of development activities in a big way? what is the level of participation of the tribals in the extremist movement being organised actively over a decade by peoples War Group of Communist party of India (Marxist Leninist)?

These are the main issues proposed to be analysed by the author in this paper which incidentally is also a gist of a book, by the author, getting ready for publication.

The first tribal rebellion occurred in 1940 in Babijhari area when Kumram Bhimu along with eleven of his followers were killed by Nizam's police. Five years later, the H.E.H. Nizam appointed Prof.Haimendorf as advisor under whose guidance various measures like distribution of land, starting of education scheme, enacting protective regulation etc. were taken up. As the tribal society as a whole was not exposed to outside contact at this time, restoration of status-quo-anti was sufficient. To achieve this, prof. Haimendorf once told this author: "It was sufficient to convince Nizam and Revenue Minister".

After the merger of Nizam's dominion in the Indian Union, the popular government of Hyderabad and later on the linguistic state of Andhra Pradesh was formed. The tribal areas of Adilabad district except Kinwat and Rajura areas (which went to Maharastra) formed part of Andhra Pradesh State. Under the community development and tribal development approach various development were taken up.

Opening of tribal areas by laying roads for improvement in communication, provision of better medical facilities, sinking of drinking water wells, control of Malaria and Yaws playing of buses by State Road Transport Corporation etc., have helped non- tribal migration and their settlement in tribal areas. In Utnoor taluka (which is heart of tribal area) alone the population increased by 60% between 1961 and 1971 and more than 100% between 1971 and 1981. Much of the population increase is due to non-tribal influx (for details of analysis see Sastry: 1989).

Communications development initially helped development of soc- ial facilities. They together helped population influx and their settlement. The migrant population first settled in road side villages and the later immigrants who are mostly their kinsmen or friends settled in interior tribal areas to act as the agents of earlier migrants in trade etc. The interaction between tribals and non-tribals that followed was always to the dis-advantage of tribals who lost lot of land. Non implementation or slow implementation of protective regulation for most part of period, the hurdles created by issue of the order of G.O.Ms.No.129, the informal pressures exerted by the vested interests and their henchmen in state machinery and the legal hurdles have ultimately resulted in non-implementation of protective legislations with respect to land in its true spirit.

The position prior to Indervelly incident was that the State's control over the forests in the form of Forest Acts has increased without any regard for the way of life of tribals living in those areas from times innumerable and their interaction with nature. As Dhebar commission pointed out, the rights and privileges of tribals became concessions in course of time. The tribals are thus at mercy of the state machinery to enjoy these concessions. The exploitation and harassment of forest, excise, police and revenue officials increased.

The Integrated Tribal Development Agency created in 1974-75 to protect and promote the interests of tribals did not make any impact. It operated from Adilabad, the district headquarters away from heart of tribal areas.

It is in this period, the Communist Party of India (Marxist- Leninist) led by Dasari Lakshmi Kantham has organised tribals to revolt against the exploitation. On April 10,1981 tribals gathered in large numbers at Indervelly. The tension that resulted has only ended with the killing of thirteen tribals in the police firing. Eventhough the official figures of deaths are disputed by many tribals of the area even today, the fact remains that these incidents left deep scars on the minds of the tribals.

If Nizam has taken five years to react to Babijhari uprising of 1940, in appointing Prof. Haimendorf as Advisor in 1945, the popular government of Andhra Pradesh reacted immediately (for details see Chapter on "ITDA experiment in regaining tribal confidence" in Sastry 1989). A brief description is made here.

The first and foremost step taken was to select right type of personnel to man ITDA. One officer of Indian Administrative service who did committed work among chenchus of Vikarabad area was selected as Project Officer. For the post of Assistant project Officer, a Gond youth who was working as Deputy Collector and know to be a 'good boy' in the area was selected. Similarly for the posts of Revenue Divisional Officer, Adilabad, Sub- Collector, Asifabad and Special Deputy Collector, ITDA, Officers with right type of aptitude to work among tribals were selected. For the posts of specialists in horticulture, sericulture, education etc., also officers with good reputation for work and knowledge of subject were selected. One post of Kolam Development officer to take care of primitive tribal group 'Kolam' was also created and filled in by another committed officer.

The Second important step taken was to mobilise the financial resources. Once these two are achieved to the satisfactory level, programme formulation and implementation has started. The guiding principle was that empathy but not sympathy is required for of-ficials working in tribal development. Secondly durable assets that would generate continuous income to tribals were created. Tribal participation was ensured by way of holding numerous Grama Sabhas and area level tribal meets held frequently followed by continuous tours to villages. A Gond Welfare Advisory Committee consisting of respected Gond elders was also constituted. Educated Gonds were appointed to act as liaison officers between tribals and ITDA. For programme implementation, the entire project was divided into eight sectors and the sectorial officer concerned was held responsible for implementing all the development programmes.

Irrigation development, horticulture and sericulture programme and agriculture development were taken up simultaneously in almost all tribal areas while the protective regulations were implemented in right spirit. The tribals could be attracted to the ITDA programmes. But then, this honey moon did not last long. While some of the basic issues relating to land and forest were yet to be tackled, the programme implementation received a set back with the transfer of the Project Officer.

Moreover, when the tribal unrest subsided for a moment the initial enthusiasm of providing extra funds was discontinued. The Administrative setup was also slowly disturbed. The tribals slowly slipped back into extremists fold. The problems that continued to bother tribals are briefly mentioned here.

Problems with forest Department:

i) *Kolams whose villages were included in reserve forests continued to face the problems with* forest officials;

ii) the reserve forest lines continue to pass through middle of revenue village;

iii) the commercial forestry programmes continue to be irrelevant to the tribal economy.

iv) large stretches of lands assigned from Daboli forest block in 1940s continue to be in the dispute between forest and revenue department zones resulting harassment of tribals by forest officials;

v) Non-tribals of Kesavapatnam village who cut forests in places like Narayanapur were left *unpunished while cases were booked against Gonds of Narayanpur for this illegal felling by* non-tribals;

vi) Tribals of villages like Devapur area alleged that while smugglers of teak wood escaped easily, the Gonds bringing wood for house construction were objected resulting in police firing and death of tribals in places like Maddimada;

vii) Payment of 'Patti' was abolished in 1940s as per tour notes of Griegson but tribals have to pay 'mamuls' for each and every activity in forests even now,

viii) non-tribals cultivating in reserve forests are left free while tribals doing the same are to pay fine;

ix) forest and revenue maps never coincided for majority of villages and

x) lands assigned from 'GAT' numbers measuring from 2000 to 6000 acres are always in disputed zones.

Survey and Settlement problems:

i) Survey was not done in many areas;

ii) where survey was completed settlement was not done;

iii) sub-division was not done for many lands;

iv) names of non-tribal pattadars or influential tribal pattadars were written against survey numbers of innocent tribals;

v) Pattas were very often given to tribals during V.I.P visits but follow up action like measuring and showing to tribals later was not taken;

vi) actual extent of land a available on ground as less than extent of land shown in their pattas in many cases;

vii) while some disgruntled officials, and officials posted in tribal areas as punishment postings never showed sympathy to tribal cause such of the officials who got postings to tribal areas in search or 'green pastures' manipulated records to make money from tribals and non-tribals as well;

viii) Under Land Ceiling Act, many land-lords surrendered surplus land to Government and got compensation. In some cases the same land was sold by them to poor tribals or non-tribals. The surplus land resumed by Government from landlords was distributed to the poor people. While the poor people who purchased the lands from landlords quarreled with the other poor people who were assigned the same lands by Government, the landlords enjoyed the usufruct from those lands;

ix) 'Pattas' written several years ago for some surplus lands resumed by Government were not given to the pattadars even in 1987.

x) non-tribals who migrated to Pakistan during partition of India still held pattas in some of the scheduled areas of Adilabad District.

xi) Several 'absconding landlords' still continue to be landowners besides the absentee landlords; and

xii) confirmation of ownership rights to non-tribals under 38 E and 50-B of Act occurred in scheduled areas in contravention of provision of Land Transfer Regulations which puts absolute prohibition on such transfer to any member other than scheduled tribe.

LAND TRANSFER REGULATION:

i) as lot of area is not surveyed and settled, the cases booked are therefore, limited only to the particulars available in the records;

ii) beenami transfers are not covered;

iii) Powerful tribals alienating lands of other weaker tribals are not covered;

iv) legal hurdles were created by professional litigants and issue of stay orders by higher courts denied or delayed justice to tribals;

v) physical possession was not restored to many tribals due to lethargy or mischief of lower level revenue officials;

vi) hurdles were created by G.O.Ms.No. 129 which exempted cases of non-tribals with less than the areas prescribed in Government order,

vii) informal hurdles were created by political vested interests and their henchmen in state machinery; and

viii) Lower level officials connived with non-tribals or tribal landlords to defeat the cause of poor tribals.

IMPACT OF INCOHERENT PERSONNEL POLICY:

Very often the incompetent or corrupt officials were posted to tribal areas as a punishment posting. Officials who did not 'go well' with the higher ups also got postings to tribal areas. There is also a trend in recent years to 'manage' for postings to scheduled areas in search of 'green pastures'.

EXTREMISTS INCREASE THEIR ACTIVITY:

As the living conditions of tribals deteriorated, their dependence on extremists to save themselves from exploiters increased by the same token. The extremists held village courts and threatened forest, excise and revenue officials who are creating problems for tribals. The landlords who grabbed tribal land also got warnings. After occurrence of a series of such acts, many of the lower level officials stopped going to tribal areas while higher level officials also stopped going in a routine way.

It is at this time, the State Government have taken up a programme of sale of Arrack in a big way raising revenue. Even in remote villages where there was acute drinking water problem, the arrack packets were available in plenty. The leading arrack contractors of the district were said to have contributed huge sums to extremists so that the latter will not interfere with their trade. The extremists on the other hand are reported to have purchased arms like AK-47 assault rifle with this money. This has changed the very strategy of the extremists in these areas.

With the acquisition of sophisticated arms, their 'striking power' has improved. Their earlier strategy of 'hit and run' was changed to 'hit and stay' only to challenge the police. On August 18, 1987, the extremists ambushed and killed ten policemen including two sub-inspectors near Alampally village in Khanapur forests. The active support given by tribals to extremist during this incident is another important factor to be noted here. Once again, the State woke up as its 'welfare image' in those tribal areas was at stake.

Development Programmes after Alampally incident:

After detailed discussions with officials tribal leaders and other non-officials, the Government have taken several decisions to develop Adilabad District as "Model District with particular reference to development, welfare and protection of scheduled tribes." The decisions are briefly as follows:

i) eviction of all non-tribal illegal occupants of land in scheduled area;

ii) all pre 1980 cultivation in reserve forests not to be disturbed; their occupation to be regularised subsequently.

iii) Lambadas migrated from Maharastra after 1976 to be identified to make them ineligible for benefit of development;

iv) adverse possession of land for more than 12 years by tribals to be regularised;

v) forest revenue boundary disputes to be settled.

vi) privileges of tribals in forest accorded in 1960 to be implemented;

vii) in the forestry programme, 60% should be covered by species useful for consumption by tribals;

viii) Orders already given in 1986 reserving 100% of posts of forest guards and 50% posts of foresters in scheduled areas to be implemented immediately;

ix) all minor irrigation tanks with tank area in reserve forest and ayacut outside to be cleared immediately;

x) a master plan for minor irrigation costing Rs. 16 crores to be implemented. Of this, Rs.3 crores to be released by May 1988.
The schemes to be executed by tribals only;

xi) three medium irrigation schemes at Pedda vagu (Ada) Pedda vagu (Dasnapur) and Chalamalavagu which would benefit large tribal ayacut to be implemented immediately;

xii) about 250 lower level posts in different departments in Scheduled areas to be reserved exclusively for the local Scheduled tribes;

xiii) in addition to 3000 houses already sanctioned to the district for scheduled tribes, 7000 additional houses @ Rs.4000/- per house were sanctioned. Further, 10,000 houses were announced making the total houses sanctioned to 20,000. A seignorage fee of Rs.500/- per house will be paid to forest department for providing good standard wood in standard sizes.

xiv) 182 tribal villages officially declared as electrified but not actually electrified will be taken up for electrification besides taking up electrification of 102 villages to achieve 100% tribal village electrification. Two thousand irrigation wells will also be enerzised.

xv) Jowar will be supplied @ Rs.1.25 per kilogram;

xvi) 1000 posts of teachers will be sanctioned to be filled by only local tribals educated to 10th class or more,

xvii) amendments to Land Transfer Regulation will be proposed;

xviii) all the decisions should be implemented before 31.12.87.

In the Praja Sadassu held by Minister for Revenue on September, 22, 1987 and Chief Minister on September, 24, 1987 i.e., in a gap of two days at Utnoor, wide publicity was given to these decisions generating lot of hopes for the tribals and discontentment among non-tribals by the same token. The immediate result was that the district Collector was attacked by non-tribals on the same day of Praja Sadassu by Chief Minister i.e., September, 24, 1987.

In order to implement these decisions, the ITDA swung into action immediately. Village level meetings and tribal meets were organised to ensure participation of tribals. The traditional institutions like Rai Sabha and Dandari were used to reach tribals. A programme to assist economically nearly 10,000 families was implemented. In 206 out of 220 scheduled villages in Utnoor Revenue Division, the land records were updated for over two lakh acres. All 20,000 houses were taken up. But the major shortfalls of this scheme are as follows:

i) funds were released for only 10,000 houses, that too after a lapse of one year for housing. The lack of funds created problems in implementation and there are more dissatisfied tribals in housing programme than those are happy.

ii) the forest-revenue boundary disputes which is a perpetual problem since 1940s is yet to be resolved;

iii) the supply of Jowar Rs. 1.25 per kilogram was implemented only in August 1989 i.e., after a lapse of two years. Meanwhile, the tribals suffered a lot during drought of 1988.

Drought of 1988 and famine raids:

The tribal areas experienced drought and heavy rains alternatively from 1986. The worst drought period was in 1988 when tribals were not having food due to crop failures of earlier years and no money for next year's agricultural operations. The extremists organised 'famine raids' in almost all parts of the tribal areas of the district and tribal participation was total. According to one report (Udayam, Feb,5,1990) 15,200 tribal families were distributed one quintal of Jowar and one kg.of chilies and few cash per family by extremists. Government stepped in very late in implementing the Jowar programme. But then the initiative is lost. The tribals started differentiating the two schemes. While they got Jowar free in the extremist programme, the Government Jowar has to be purchased. Tribals questioned, "How can we buy Jowar when we do not have any money after a series of droughts." The tribal unrest is continuing and adding new dimensions day by day.

The tribal society was not spared by general society even in the fields of political organisation language and religion where tribal areas were invaded resulting in slow erosion of tribal identity.

CONCLUSIONS:

The unrest in tribal areas is being explained so far in terms of tribal non-tribal interaction. The cleavage was tried to explain in terms of ethnic relations mainly by the European or American Anthropologists and their Indian students. But a closer examination of the unrest in tribal areas, with Adilabad district in Andhra Pradesh, India has shown that the actions of State machinery either on its

own or by supporting the exploiters (whether tribal or non-tribal) has been the major source of problem in tribal areas.

The forestry programmes by and large is being framed and implemented for the furtherance of industrial and urban vested interests. The tribal has almost lost control over the traditional means of livelihood (except M.F.P) while alternative sources of livelihood were not provided. The agricultural land is limited and with in this, major areas were lost due to land alienation. s ergence in medium irrigation tanks, reserve forests, mines, industries etc.

The development administration except for brief period of time was mc lifferent and did very little to improve tribal economy. The efforts of tribals to organise themselves through traditional 'Rai Sabhas' for establishing their identify and a place in the system were foiled by political vested interests.

While the loving/deserting relationship between government official and tribals was going on from 1940, the extremists started staying with the tribals continuously since late 1960s. They could gain confidence of tribals and once they have established themselves the tribal unrest took new dimensions. Now it is unrest in tribal areas. The tribals who were only a sympathisers earlier became cooperators in the last decade and after the famine raids of 1989, the tribals became complete participants.

Inspite of all these happenings, the tribals still have hopes on the Government and is attracted towards tribal development a agencies whenever they swing into action sincerely. Therefore, a new approach of recognising tribal as a 'participant in development' is required leaving the present philanthropic beneficiary type approach.

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COMPENSATION - FOR WHOSE REHABILITATION?

...Muthyam Reddy Katta*

Last four decades witnessed displacement of a large number of people in the country. It is due to none other than the 'development projects' which have been taken up by the governments at Centre and at the State level. In almost all the third world countries including India, these projects have been sponsored by International Agencies like World Bank. These projects comprising industries, Mines and Dams etc., shall require huge land base. Private land is acquired for the projects like Coal mining Steel plant and major irrigation dams. Under the guise of 'Public purpose' leading to displacement of people from their places. It is a forced displacement necessitating the compulsory relocation of ousted families. Needless to mention, it destroys the existing system of production with untold misery to the uprooted families. Thus, the displacement is against the will of people and their rehabilitation is involuntary.

In essence, displacement entails sacrifice - sacrifice of ones own socio-economic life which is age old and which is deeply rooted in their association with the land, the activities and the bondages that must have formed over a period of time. All this has often been over looked on the name of public purpose. No one was bothered even to know the sufferings of displaced persons. That too it is only during the last few years that the problems faced by the displaced persons received the Dept. of Economics, Osmania University, Hyd. Attention of some journalists, social activists, planners, jurists and other concerned individuals. "Considering the magnitude and seriousness of these problems and length of time that they have been in existence, it may be mentioned that even now the attention is as insufficient as it is belated". (Kashyap Mankodi Fernandes edited). It is this period that the World Bank also evinced keen interest in this problem. Michael M. Cernea (World Bank) observes that they failed to restore, let alone improve, the social and economic well-being of the displaced population. Critical conclusions in the respect have been reached both by the Bank and by many socio-anthropological and environmental studies undertaken by independent researchers from developing and developed countries. Some of the voluntary organisations, social workers and a few intellectuals with some concern towards people have been raising their voice against the large scale displacement of people and destruction of ecology, environment and trying to cry a halt to the vehicle passing through the public road with a development name plate. A debate is going on in the country on this issue. It is not intended to go into those details in this paper.

A cursory look at the displacement of a number of people by various projects in the country is necessary to understand the magnitude of displacement and resettlement. Following table shows the details.

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A CONSERVATIVE ESTIMATE OF PERSONS DISPLACED AND REHABILITATED IN INDIA

Sl. No.	Type of project	No. of Displaced	Percentage Rehabilited	Percentage Not rehabilited
1.	Mines (Coal etc.)	1700000	26.5	73.5
2.	Dams and Canals	11000000	25.0	75.0
3.	Industries	1000000	30.0	70.0
4.	Sanctuaries and Parks	600000	25.0	75.0
5.	Others	1200000	25.0	75.0
	Total:	15500000	25.5	74.5

Source: Walter Fernandes and et.al.

It is only 1/4 of the people displaced by various projects that were rehabilitated and others were left to their own fate. It is appropriate to mention here that about 1079 people displaced by salandi dam, in Orissa were dead for want of food. To add to this, there was a cyclone in 1971 which affected them badly. According to collected data 1079 people died during 1971 to 1977 (Antyodaya Chettana Kendra). From among the lucky few who were alive most became nomadics in search of livelihood. Many others have become bonded labourers or daily wage earners under timber contractors and smugglers. We found over thirty thousand displaced persons from Orissa and Chattisgarh among the Asiad construction workers in Delhi in 1982 (W. Fernandes et.al.).

While the plight of the displaced persons in general merits and attentions, the trials and tribulations through which the tribal people pass through in particular due to displacement requires immediate attention. Four steel plants commissioned in Bokaro, Bhilai, Durgapur and Rourkela in Bihar, M.P., West Bengal and Orissa respectively displaced about 29000 of tribal people (W. Fernandes et.al. 1989). Forty eight per cent of them were displaced by only Rourkela Steel plant of Orissa. The five principles known as the tribal 'Panchshil' (Singh, K.S. 1980) advocated by Shri Jawaharlal Nehru could not help the displaced tribals, in their rehabilitation. Land acquisition and rehabilitation policy of the government at Centre and state did not consider tribal people as a special category though there are specific provisions in the constitution for their welfare.

Their hardships as a constituent of the displaced population commence from (i) the outdated provisions of the land Acquisition Act and (ii) the unimagination way in which they are sought to be implemented.

Land Acquisition:- Land acquisition for 'public purpose' is done according to a law. The law is Land acquisition and Compensation Act 1894. This was made by colonial rulers in India. It's counter-part in England is known as the law of 'Compulsory Purchase' and in U.S. 'Rights of Eminent Domain'

(Sanjiva Rao). This Act has undergone a few changes through amendments since then, the latest being in the year 1984. This act empowers the government and its agents to acquire any privately owned land for 'public purpose'. In return compensation in cash is paid to the owners of the land.

However, one important point to be noted in this connection is that this act was not meant for acquisition of land on a large scale as it is being done in the post independence period in India. And it is not for a particular project like a dam or industry which submerges and occupies lakhs of acres of land and hundreds of villages. It was only meant for a small scale acquisition of land for roads and buildings. It is applicable for all kinds of public purpose all over the country.

Land acquisition act insists upon the ownership of the land. Only those who have legal ownership on the land they possess are eligible to get compensation. Having the land and depending on the land, variously, for survival is not a sufficient condition to claim the compensation according to the act. As a result about fifty per cent of the people of any submerged or affected village were rendered ineligible for compensation, no matter what they are deprived of in the process - their lands, property, jobs and what not. Here lies the limitation and narrow perspective of land acquisition act. When a village and its land as a whole is affects/submerges it is not only the owners of the land who stand to loss every one else in the village who directly or indirectly depend on the socio-economic structure of the village for their livelihood. The various groups of people that become unwilling scapegoats for the so called public cause are mentioned in a chart entitled Annexure-II.

Most of them are illiterate and their knowledge of the land Acquisition Act and its provison has to be thoroughly discounted. The position is much more worse if they are tribals, because their exposure to the working of the government sponsored institutions is patently non-existent.

To mitigate, if not remove, the unpleasantness of having to reconcile one self to a new life in a totally strange environment the government proposes to make good the loss of property etc by paying some compensation. The compensation is supposed to be helpful in their rehabilitation. The present paper tries to examine this aspect on the basis of the experience of ousted families in Srisailam Project area.

Fixation and payment of compensation is effected at different stages in different ways, the sequence of which can be out lined under the following subheads:

1. Classification of Lands:-

The basis for fixation of compensation is provided by the type of land about which the revenue department makes in own assessment. As usually the cane, the classification of lands differed from one officer to another. Generally they were divided into two to three groups basing upon the nature and structure of the soil. But in many cases the lands were wrongly classified. For example, in chandur village, the lands used for single wet crops and farm Yards were classified as dry lands and double wet land as single wet. Not only this, the lands once classified were further sub-classified in to A.B.C. and D depending on their structure and compensation for them was fixed at reduced level. This aspect was pointed out by the court in one of the appeals preferred by the aggrieved parties. The Judge observed in his judgment delivered on 16th June 1981, as "I, therefore, hold that the classification of lands done by the Land Acquisition Officer and the rates of compensation for the acquired lands fixed by the land acquisition officer in this village (Chandur) is unjust, improper, baseless, in correct, far low and arbitrary". (C. Narayana Reddy, Principal District Judge, Mahaboobnagar). He further said that the allegation that

with a view to reduce the compensation, the land acquisition officer arbitrarily described the lands as cart- track, hardsoil, fallow waste, pebbles on some flimsy grounds is not at all true.

2. Valuation on the Basis of Market Rates:-

Once the land type is known, the market rate pertaining to that kind is used for arriving at the compensation. But the Market rate is a disputable piece of information. Registration rate (at Registrar's Office) was considered as market rate to arrive at the compensation by the land acquisition officer. But the fact which is well known, is that "the figures entered in thee documents form only 1/4 or 1/5 of the actual purchased price" (Assembly debates, 25 June, 1958). Here is an important observation made by one of the land acquisition officers in his award. "In local enquiry it is revealed that the vendee has purchased the said land at the rate of Rs. 1,050/- per acre but got the total area of As. 3.12 Gts. registered for Rs. 1500/- only. Thus it is clear that the sale has been registered at a lower rate to escape expenditure of stamp duty though purchased at a higher rate". (Award No. 3/76, Chandur). In spite of his being aware that registration statistics cannot represent the true market rate he has still considered them as market rates. As a result the compensation worked out to be very low. And the land owners' (displaced families) claims were rejected by the L.A.O.s saying that the claimants did not provide any evidence in support of their claims.

3. Revision of Awards Through Litigation:-

As the compensation fixed by the land acquisition officer is meagre the only alternation left for the displacement persons (DPs) was to knock at the doors of the court. But this alternative was not known to majority of the DPs. Because of this only in 3000 cases compensation was accepted under protest with in the stipulated time of 2 months. Only these cases were referred to the court by L.A.Os. About 22,000 other cases who could not seek relief under protest, were referred to on the direction of the High Court. Still there are 6,000 cases awaiting reference. Of the cases referred to the court only about about 4500 cases were disposed of till the end of 1987 (Noteby Lok Adalat, Kurnool).

The difference in the compensation amount fixed by the Court and land acquisition Officer on the one hand and between the claims of a displaced person and court as well as L.A.O. on the other hand can be seen in the following table.

COMPENSATION FIXED BY L.A.O. AND THE COURT

Sl. No.	Classification of the land	Rate Claimed by the DP	Rate Fixed By LAO	Rate Fixed by Court	Difference between LAOs rate and Court rate
1.	Dry Land				
	A. Group-I	5000	1263	4000	2737
	B. Group-II	4000	731	3000	2269
2.	Wet Land				
	A. Single Crop	5000	2500	5000	2500
	B. Double Crop	12000	2500	8000	5500
3.	Farm Yards	20000	500	20000	19500

Source: Judgment by C. Narayan Reddy, Principal District Judge, 16th June 1981 (Chandur Village).

4. Government's Stand on Rivised Awards:-

As thousands of cases were pending before the State Government, High Court constituted an exclusive court at Kurnool in the year 1981 and a sub-court at Atmakur in 1987 for the quick disposal of the cases. This positive attitude of the Government did not last long. Later, when a single judge of the High Court has directed a reference to be made (of those who have not taken the compensation under protest) on the Plea that S.12(2) notice has not been duly served the government, through its special Deputy Collector, filed a writ appeal against the ruling of the single judge. (ARR 1984 A.P.). It means the State Government was not interested in referring the cases of majority of the DPs who were ignorant of law.

Another example is that the Government appealed against the judgments of lower courts which are constituted for trying these cases. Thus, to go in for appeal against the lower courts in High Court and *against the single judge of the High Court in the High Court bench merely amounts to delaying* the process of providing a little relief to the aggrieved parties. But unfortunately it does not stop there. Delay in the settlement of these cases is as much expensive to the state exchequer as it is to the oustees. For the disposed cases "Government has to pay Rs. 30 crores to the claimants. Out of this in the mean time, the decree demand is satisfied to an extent of Rs. 3 crores (Convener, Lok Adalat, Kurnool 1987). This delay helps neither the Government nor the displaced.

In the entire episode, the Government attitudes snack of Vendetta for all along it considered all those who went in appeal against the Government award as its opponents and tried to prolongate the process of trial in different courts. Whatever may have been the general import of the common usage that 'justice delayed is justice denied' its aptness is remarkably noticed in the case of displaced families.

5. Emergence of Middlemen and Touts:-

The compensation policy followed by the state has paved way for the entry of middlemen and touts. The first and important middleman is the lawyer. The erstwhile patel, patwari, in most of the cases, and village Sarpanch of submerged villages in sporadic cases have become touts.

There are about fifteen stages in between the passing of the initial award and the appeal in the High Court. At every stage there is a cost. The lawyers' fee is the highest amongst the litigation costs. There are several complaints against the lawyers dealing with these cases. One lawyer of Mahabubnagar could not escape, despite serious efforts, from suspension from the bar. The Bar Council took this step in 1979 after conducting an enquiry into the complaints of irregularities against the lawyers involved in compensation cases. There are also a couple of judges in this list. One of the serious implications of the government policy towards rehabilitation is the quick emergence of certain institutions and certain practices both of which pulled down the credibility of the state machinery meant for rehabilitation. Payment of illegal gratification is one such practice that virtually robbed the exchequer and the evicts and enriched the middlemen. The payment of enhanced compensation to displaced persons of Chandur

village is a case in point. On the basis of information collected from 42 displaced families of Chandur Village, the extent of bribe per acre of land, per individual and per village is calculated. It can be seen in the following table.

ILLEGAL GRATIFICATION

Sl.No.	Particulars	Amount enhanced	Amount of bribe
1.	Per individual case	37930	9459 (25.0)
2.	Per Acre	2620	653 (25.0)
3.	For Village	2897720	722218 (25.0)

Source: Muthyam Reddy, K. Draft Ph.D. Thesis, 1990.

This table represents those who have taken compensation under protest. But in the case of others whose cases were referred to on the direction of the High Court, the illegal gratification is much higher (53.0%). This is because of the enhanced fee charged by the lawyers and other middlemen. Seeing all this one is constrained to conclude that if the compensation has helped any body at all, it is only the lawyers and middlemen and the needy and the displaced are pushed to the background.

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ANNEXURE - I

Rehabilitation Policy and Provisions under the Five Major Dams in Andhra Pradesh.

1. Rehabilitation Policy under Nizamsagar Project (1923-31)

1.	Nature of Rehabilitation	:	Physical Rehabilitation(PR)
2.	Compensation	:	Market rate existing on the date of acquisition
a) Lands:			
i)	Wet (Single Crop)	:	O.S. Rs. 100 per acre.
ii)	Wet (Double Crop)	:	O.S. Rs. 150 per acre.
iii)	Bagath Crop area	:	O.S. Rs. 50 per acre.
iv)	Dry Crop area	:	O.S. Rs. 15 per acre.
b. Houses		:	*On the basis of model estimates of same houses made by* P.W.E., arrived the valuation (No. of houses 4232) an average rate per house is Rs. 250/-

3. Rehabilitation:

a)	Land for Cultivation	:	— Equal area lost under command area.
b)	House	:	— Site equal to the loss
c)	Transport	:	— Provided free transport to carry on men and material.

d) Other facilities:

1. To help D/Fs obtain necessary building materials

2. To give D/Fs proper design for houses after making decent layouts with all facilities

3. To make some cash payments for purchase of implements for agricultural, manure and other necessities.

4. To Construct model house economically

- *The above were to be got done as soon as the expropriation is* to be taken place, so that there may be no time left which would inconvenience the ryots and in turn delay the rehabilitation of ryots and development of the ayucut. These should be entrusted to Government officers of Outstanding ability to all concerned, so that it can be got over satisfactorily.

— Permitted to use the house material without any payment(D/F: Displaced Family).

ii. Rehabilitation Policy under Thungabhadra Project (1945-53)

1. Nature of Rehabilitation: Physical Rehabilitation(PR)

2. Compensation:

a) Land : Market value prevailing in 1941 + 200% ex-gratia on the value existing in during 1941-42, excluding 15% solution.

b) House : As above + 300% ex-gratia on the value existing during 1941-42.

3. Rehabilitation:

a) Land for Cultivation :
- — 5 acres to each family including Tenants and Agricultural labourer holdings under command area.
- — Under rehabilitation Scheme Taccavi Loans both cash as well as in the shape of housing materials and agricultural implements, etc., were given and treated them as interest *free.*

b) House Site :
- — 10 cents of land
- — Army was involved in the construction of houses and one house per day on an average was built.

c) Communication:
- — Approach roads and internal roads

d) Transport:
- — Free transport to shift men and material

e) Amenities :
1. Wells for drinking water
2. School Buildings
3. Community Halls (Big Colonies)
4. Dispensaries and Hospitals
5. Weekly Market Sheds
6. Public latrine blocks
7. Travellors Bungollow.

iii. Rehabilitation Policy under Nagarjunasagar Project (1958-69)

1. Nature of Rehabilitation: Physical Rehibilitation(PR)

2. Compensation

a) Land : On the basis of market rates (Registration Statistics) prevailing on 1-7-1953

b) House : -do-

3. Rehabilitation

a) Land for Cultivation :

— 5 acres of dry land per family. Families who have been living by cultivation for the last 3 years are only eligible.

— In respect of owners of land, only families owning 20 acres or less, taking their holdings both in the submerged area and else where in account, should be entitled to the free grant.

— In respect of land, the grant should be just enough to make their total possession elsewhere in new centres aggregate to 10 acres dry subject to a maximum free grant of 5 acres.

— In addition to any free grant of dry land which a family may be entitled to as above, each displaced family living by cultivation for the last three years and each owner of land whether owning less than 20 acres or more, may be assigned dry land on payment of market value, subject to the condition that the total holding in the new village should not exceed 20 acres.

b) House:

— 10 cents for each family, above this on payment with a ceiling of 25 cents (including10)-not obligatory.

c) Communication:

— Provision of access to roads

d) Transport:

— Free transport of men and material including hay stocks.

e) Other Amenities:-

1. Wells for drinking water
2. School buildings
3. Community Centres in each centre (Rs.10000 - 2 centres)
4. Construction of Temples (Rs. 7500)

f) Other facilities:-

— Provided an ex-gratia payment to families who received a compensation of Rs.500 or less for house property to make up the difference between Rs.750 and the actual amount subject to a ceiling of Rs.300.

— Removing and use of material of non-residential buildings is permitted only on the payment of 73% of the assigned cost.

— Cultivation of the land to be submerged is allowed only on payment of rent equivalent to the assessment payable prior to the acquisition

iv. Rehabilitation under Sriramsagar Project (1963-64)

1. Nature of Rehabilitation : — Partly Physical Rehabilitation (PR) Partly Rehabilitation Cash Grant (ROG)

2. Compensation

(a) Lands — Different methods by different officers. Different rates for different types of lands. Rate per acre is decided on the basis of registration statistics of three years preceeding the date of notification obtained from Sub-Registrar's Office. In some cases rate per acre of compensation was fixed on the basis of 'Bhagana'.

(b) House — Either on a rental basis, or on the basis of sales of similar properties in the neighbour or on the basis of the original cost of the construction of the building. In this case followed the rates mentioned in the Gazzettee in the Government. Minus depreciation charges -Minus (10%) deduction for the inferior quality and contractor's margin

3. Rehabilitation

I. Physical Resettlement (Rehabilitation)

a) Land for Cultivation : — Land equivalent to the extent acquired from the, subject to a maximum of 5 acres of dry or 2 acres of wet per family (only families who are living by cultivation for atleast 3 Years prior to their displacement. No land on payment.

b) House : — 10 cents for those who lost house and land

c) Communication : — Approach roads and internal roads

d) Transport : — Rs. 1 per family per mile (from 1974 increased to Rs.2.50 per mile)

e) Ex-gratia Grant : — Rs.300 per family

f) Subsidy for reclamation : — Rs.100 per family

g) Other amenities : 1. drinking waterwell (one for 50 families) - Rs.7500

2. Community Hall - Rs.5000

3. School Building - Rs.15000

4. Temple - Rs.10,000

II Rehabilitation Cash Grant : a) D/Fs whose land only were acquired might be grants 50% of the compensation paid for the lands acquired, subject to a maximum of Rs.500 (At present Rs.1000)

b) D/Fs whose houses only were acquired might be granted 50% of the compensation paid for the houses acquired, subject to a maximum of Rs.500 (At present Rs.1000)

c) In the case of D/Fs whose lands as well as houses were acquired they might be paid 50% of compensation paid for the lands and houses subject to the maximum of Rs.2000 (At present Rs.5000)

v. Rehabilitation under Srisailam Project (1974-)

1. *Nature of Rehabilitation* : *Rehabilitation cash Grant* (R.C.C.)

2. Compensation

a) *Lands* :

— As in the case of Sriramsagar

b) House : On the basis of Original cost of the construction Tenants and Government land cultivators were not paid.

3. Rehabilitation :

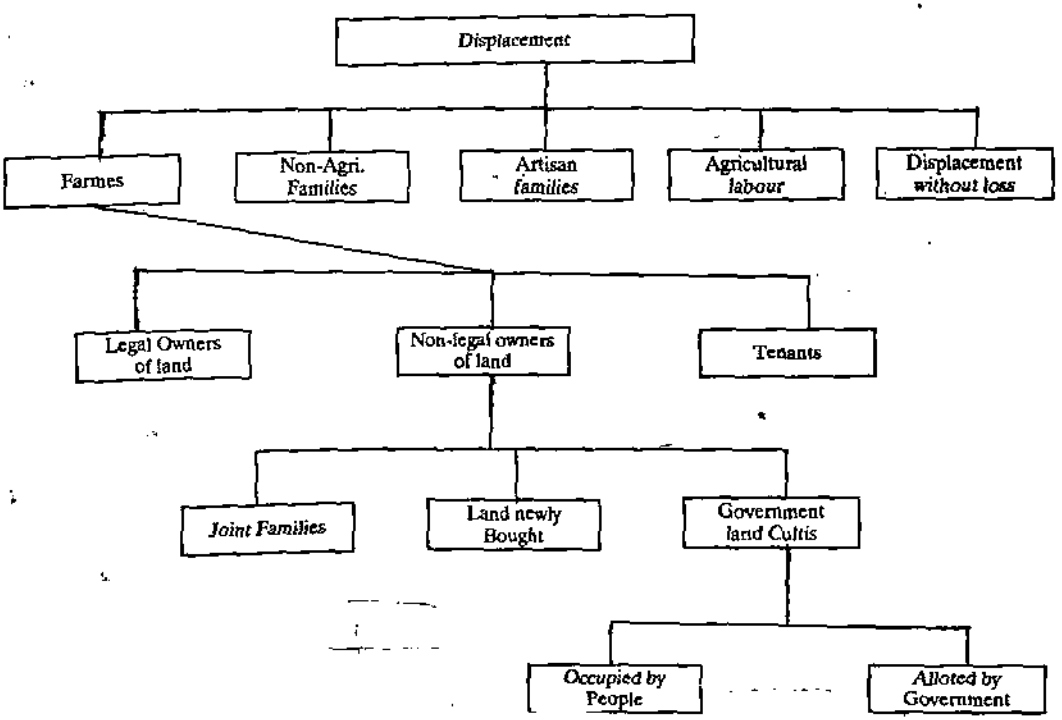
— D/Fs whose lands only were acquired might be granted 50% of the compensation paid for the lands acquired subject to a maximum of Rs.500 (At Present Rs.1000)

— D/Fs. Whose houses only were affected might be granted 50% of compensation paid for the acquisition of the house property, subject to a maximum of Rs.500 (At present Rs.1000)

— In the case of D/Fs whose lands as well as houses were acquired, they might be paid 50% of compensation paid for the acquisition of land and houses properties, subject to the maximum of Rs.2500 (At present Rs.5000). This is not applicable to D/Fs who were tenants/cultivators of Government lands before evacuation.

ANNEXURE - II

PROCESS OF UPROOTING AND DISPOSSESSION



PEOPLES PARTNERSHIP IN ECOLOGICALLY VIABLE AND SOCIALLY COMPATIBLE DEVELOPMENT

Helen. V.Sheila *

INTRODUCTION

Air, water and soil are the basic essentials for the survival of human animal and plant life. Forests help to provide these people at large, particularly the tribals look upon forests as a gift of nature necessary for sheer survival. Forests help the continuous cycling of air and water and they strengthen the hydrological systems by retaining underground water and reducing floods. They prevent soil erosion and also provide food, fuel and fodder to millions of tribals to derive their livelihood from collecting forest produce that is available without cutting of trees.

The importance of forests.

1. They provide rural population with many of their subsistence needs.
2. They are important to soil and water conservation.
3. They are source (Raw Materials) of Industries.
4. They generate genetic resources.
   (Impact of Deforestration)

1. Desertification:

Deforestration results in desertification and drought and adds to human misery. It leads to decline of environmental support systems essential for sustainable agriculture.

2. Loss of Genetic Diversity:

Deforestration, particularly that of tropical moist forest areas, will have disastrous effects on environment. The most forests are genetically and ecologically rich resources that have less potential for recovery. This will create a permanent degradation of biological productivity.

3. Loss of Soil:

Deforestration leads to soil erosion with disastrous consequences in the reduction of soil fertility, in increasing floods, heavy silation of dams, tanks, reservoirs, streams and rivers.

4. Deforestration and Rainfall:

Deforestration also results in climatic changes. The links between forests and climates particularly the rainfall are not understood well. Forest destruction is believed to be responsible for a significant decrease in rainfall.

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5. Food Availability:

Deforestration leads to decrease in average per capital food availability by decreasing agriculture production.

6. Effects on human Life Employment:

Forests are an important economic activity wherein a significant number of persons find employment in selling firewood and things made out of bamboo etc. Minor forest produce provide subsistance and also income to tribals. Most of the tribals depend on minor forest produce for survival. Of all the people, tribals are the worst effected.

Measures to be taken:

The concept of real development must be understood by all. The development model of past four decades proved (Distructive Development) in which millions of people in Rural and Urban areas have been rendered destitute. Any effort at decentralisation must, therefore, aim at providing people with the power to determine a development strategy in tune with their aims and aspirations.

1. To restore ecological justice and integrity to humanity by returning, to the millions of people who live and depend on the forest, their right to sustainable livelihood.

2. To restore ecological balance through ceasing further forest destruction and regenerating damaged forest lands through the guidance of local people peasants by planting only their choice of trees and plants, with the aim of restoring ecological diversity and survival of local people.

3. To restrain the over consumption and wastage of resources by the privileged groups through making the necessary change in life style and consumption patterns consistent with the development of sustainable livelihoods in order to satisfy the ecological, spiritual, social needs of the people.

4. To empower tribals and people who depend upon the forests for their livelihood, with the responsibility of safe guarding the forests and ensuring their generation by.

   a) Empowering local people with the right to a decisive voice in formulating policies for their areas.

   b) Achieving land security for rural people, both by through revising the land tenure legislation and through land reforms.

   c) Rejecting social and economic policies based on the assumed cultural superiority of non forest peoples.

5. To halt all those practices and projects which would contribute either directly or indirectly further forest loss.

6. To initiate shift towards developing systems of production that are ecologically and socially sustainable.

Technical Measures to be taken.

— Afforestration (with appropriate region specific species) Agro forestry (the system of growing together arable crops and trees which are compatible and complementary to each other.

— Improved dry land farming technology (drought resistant varieties of seeds mulches, strips-cropping, minimum tillage, suitable forms of inter cropping and crop rotation etc.)

— Erosion control measures both mechanical (contour bunds, bench terracing, grassed water ways, gully revetment structures) and vegetative gross cover pasture development, special anti erosion crops.

— Water harvesting methods (checkdams, farm ponds, percolation tanks).

DISPLACEMENT AND REHABILITATION OF TRIBALS IN ANDHRA PRADESH

(Background paper)

TCR & TI Hyd.

1. INTRODUCTION:

Andhra Pradesh State has 31.76 lakhs scheduled Tribe population according to 1981 Census. The sprawling scheduled Area which is traditional tribal habitat in Andhra Pradesh extends over 30,293 sq.kms. in the districts of (1) Srikakulam, (2) Vijayanagaram, (3) Visakhapatnam (4) East Godavari (5) West Godavari (6) Khammam (7) Warangal (8) Adilabad and (9) Mahaboobnagar. The Scheduled Area constitutes about 11% of the total Geographical area of the State. Out of the total 33 recognised Scheduled Tribes, 30 groups are inhabiting the forest covered mountainous tracts. Two tribal groups namely, yerukula and yanadi are found in the plains, living in symbiosis with other rural population while the Lambada/Banjaras are found both in tribal areas of Telangana and plains areas through out the state except in the northern Coastal area. The density of population in tribal areas is 69. The picturesque tribal area presents a variegated canvass in ecological setting and ethnic composition.

The district-wise predominant tribal groups in the 9 Scheduled districts are as follows:-

Sl.No.	Name of the District	Main Tribal groups	Percentage of Sch.Tribes to total population of the district
1.	Srikakulam	Savara, Jatapu Gadaba, Konda Dora	5.36
2.	Vizianagaram	-do-	8.49
3.	Visakhapatnam	Gadaba, Bagata, Konda Dora, Kotia, Khond, Manne Dora, Muka Dora, Reddi Dora, Porja, Valmiki	13.74
4.	East Godavari	Koya, Konda Reddy, Kammara, Konda Dora, Valmiki	3.87
5.	West Godavari	Koya, Konda Reddy, Yerukula, Yanadi	2.31
6.	Khammam	Koya, Konda Reddy, Lambada	24.54
7.	Warangal	Koya, Lambada	12.72
8.	Adilabad	Gond, Kolam, Pradhan, Thoti, Andh, Lambada, Naikpod	16.69
9.	Mahaboobnagar	Lambada, Chenchu, Yerukula	6.35

Lambada (Banjaras) are the largest tribal group in the state and the dialect spoken by them can be included in Indo-Aryan linguistic group. Mongoloid recial features are traceable in the tribal groups living in Srikakulam district, especially Savaras and the dialects spoken by them comes under Mundari Linguistic group. Most of the *tribals of the state racially belong to proto-Austroloid group and* the dialect spoken by them can be classified under Dravidian linguistic group. A few Negrito racial characteristics like frizally hair, black complexion etc can be traced among Chenchus of Nallamalai Hills and Yanadis of Nellore district.

The social system of Tribes of Andhra Pradesh both regional and local patterns can be delineated. The great Gond tribe of *Adilabad* is characterised by a four-fold phratry organisation. The same social

organisation prevails among not only two statellite tribes namely pradhan and Thoti but also among the neighbouring Kolams. The Koyas are found living in the Godavari region starting from Adilabad to East Godavari district. The Koyas and Gonds linguistically and culturally belong to same family. The tribes of Visakhapatnam except the Khonds or Samanthas have common totemic clan organisation while the Khonds exhibit loose phratry organisation with a number of brother clans grouped together. Savaras are ancient tribe which is supposed to have many subgroups and they are found in Srikakulam and Vizianagaram districts. It is interesting to note that the basic exogamous unit namely clan is absent in some sections of the Savaras where marriages are regulated by the Principle of precedent and cross-cousin alliances. The other sections adopted the surnames of their neighbours like Jatapus and even of the plains castes.

Almost all the tribes have agriculture as their main-stay. The most primitive form of agriculture locally called 'PODU' or shifting cultivation is still practiced by the hill dwelling Konda Reddi, Konda Dora, Savara, Khond etc. However in their agricultural practices and cropping pattern regional and local variations can be noticed especially among the settled cultivators. In Gond area of Adilabad, mixed cropping is practised with pulses mixed with cotton or Jowar and cotton being the cash crop. In the Koya country Khammam Warangal, East and West Godavari districts Jowar is the food crop while virginia Tobacco and Chillies are grown as cash crops. Small millets are mainly grown in the undulating terrains of Visakhapatnam and Vizianagaram districts and Niger being the commercial crop. In the savara country of Srikakulam and Vijayanagaram district wet crops are grown on terraced fields specially prepared on hill slopes by the side of running streams where besides wet paddy, the commercial crops of Ginger, turmeric and bananas are also grown.

The Chenchus, the most primitive of the tribes are yet to out- grow the food gathering stage characterised by hunting small game and collection of roots, tubers and honey. For all the tribal groups collection of Minor forest produce both for domestic consumption and sale is an important subsidiary occupation.

The tribal habitat was by and large devoid of sophisticated economic development activity till the era of planned development set in fast and radical changes. Several projects were launched in the tribal areas both for the development of the tribal and the areas, they inhabit besides schemes were taken up on resource availability considerations. Thus the situation which was hither to near static has acquired a dynamic character. Inevitably this has brought in its wake, problems of adjustment and with the widening of the range of activities, the problem has become more and more acute, compelling our attention to it.

II. PROBLEM APPRAISAL:

The tribal areas where the level of socio-economic development is very low, introduction of large scale development activity some times results in uprooting of the local tribal groups.

In the present day, a social system comprises of mainly two major sub-systems namely, the rural or tribal and the urban. Redeliffe Brown defines a system "as a set of actions and inter-relations amongst

the persons." These (actions and inter-relations) are usually organised around a core of institutions develope to interlink various constituents of the system. The Tribal system is based on action oriented dominant modes of production in simple agriculture and allied occupations; whereas the urban system is a complex one wherethe deminant occupations are commercial, Industrial or administrative conditioned by individual activity. The tribal villages/hamlets are recognisable ecological units usually belonging to allied households interms of kinship and economic interdependance besides display greater cohesion and corporate activity and individual activity. On the other hand, the urban system characterised by higher technological adoptation exhibits high level skills, sophisticated economy etc. The tribal areas being rich in resources like water, minerals, especially coal etc attract many industries, irrigation and power projects, involving sophisticated technologies and consequent planting of urban oriented technological societies amidst tradition oriented simple tribal societies. Further, in the name of bridging the development gap between the tribal areas and the adjacent plains areas so as to make the tribals join the mainstream of national life many medium irrigation, ply wood and paper industries have been established in tribal areas. The establishment of these complex and some of the most modern and sophisticated socio- economic structures in just a position with the simple socio- economic life of the tribal communities has resulted in causing disturbance to the local tribal societies without much benefit to them.

The tribal economy is simple and geared towards greater self- sufficiency of the family. The tribal tends to produce most of his essential needs. They produce on each farm as many varieties of crops as they need for consumption. Thus, usually the tribals produce what all they need to consume which comes usually from their own farms except commodities such as jewellery, clothes, etc, which are of secondary importance. Further, the tribals practice barter and their knowledge of monetary system is less. The introduction of development projects monitises the local economy as a aresult of which the tribal is reduced to the status of an unequal partner vis-a-vis the new entrant-of Boing semi literate or illeterate with literacy less than 8% for state as a whole or less than 5% in areas of tribal concentration where majority of the projects are taken up, the tribal is not in a position to derive and demand the due share of the benefits nor is he in a position to orient his traditional socio-economic activity to the new situation.

The modernised technological culture is thus penetrating the traditional tribal system disturbing equilibrium. Thus, with the establishment of major projects the local tribals are largely affected and sometimes uprooted from this traditional mooring and the resultant socio-economic problems.

Displacement of settlements and their population on account of construction of industrial, irrigation and hydro-electric projects is world-wide phenomenon and it is more pronounced in developing countries. These projects give rise to several problems like loss of land, house sites and other capital assets which are a common feature. The extent of loss is generally evaluated and compensation paid usually in cash. Some times the displaced people are rehabilitated through suitable programmes either by the concerned agencies or by the local or district revenue administration. For instance the tribals displaced due to construction of Machkhund Hydro-electric project at Jalapul have been rehabilitated through land colonisation scheme at Thazangi in Chintapalli Panchayat Samithi of Visakhapatnam

District. The colony is located at a distance of 20 K.Ms from Chintapalli. In the initial stage about 300 families were rehabilitated and each household was assigned 5 acres of developed land, agricultural implements, plough bullocks, necessary seeds, fertilisers and other inputs. The displaced persons were employed in the colony construction programme to enable them to earn livelihood while engaged in the land colonisation scheme. But the land colonisation scheme has been taken up for 300 families only where as the displaced families were more in number, so several families have migrated further and interior into the forests. They resorted to the 'Podu' cultivation for their subsistance. Many families have migrated to the tribal areas of East Godavari district also. Similarly in other projects, the displaced persons were rehabilitated or compensated suitably. But wherever the compensation was paid, people were left to fend for themselves. However in all the cases they were paid cash compensation. No follow up action was taken up for rehabilitating the displaced persons and consequently in some cases no suitable land could be purchased or made available either to purchase on cash payment or by way of assignment through acquisition by Government agencies. Due to time lag some of the displaced persons used the compensation for consumption and unproductive purposes and ultimately they were left with no alternative but to suffer more than before the construction of the projects. Based on the experience Government realised that more payment of compensation would not help and decided to shoulder the responsibility of rehabilitating the people affected due to projects. In accordance with this policy Government have rehabilitated the tribals who have been rendered landless and homeless due to Machkhund reservoir, Kothagudem Thermal project, Sileru project etc.

As mentioned above, Machkhund Reservoir Diversion Dam at Jolaput, Upper and Lower sileru Hydro Electric projects in Visakhapatnam district, Thermal power station at Palwancha, coal mining complex at Kothagudem and its peripheries and Manugur Heavy water plant, Mailaram Copper Mines, Bhadrachalam paper Boards in Khammam district, Godavari plywoods in East Godavari are some of the important large scale projects. Besides these during the Fifth five year plan many small industrial undertakings and medium irrigation projects have been taken up to benefit the tribals. Government have also assumed responsibility of rehabilitating the people displaced due to the projects by way of implementing land colonisation schemes.

CASE STUDY:

It has been felt necessary to assess the usefulness of these rehabilitation programmes. Further at the instance of Government of India the study on the displaced persons was taken up. A case study was conducted for assessing the efficacy of the rehabilitation programmes intended for the benefit of displaced population in the tribal areas on account of construction of a Medium irrigation project in West Godavari district. The study was conducted with the following objectives (1980)

1. To assess the efficacy of the rehabilitation programme and identify the bottlenecks in implementation of the programme.
2. To assess the time lag between the land acquisition and compensation payment.
3. To know how far and how fast the displaced persons could adapt themselves sucessfully to the changed condition.

4. To know the utilisation pattern of the compensation paid to the displaced persons.

5. To assess the magnitude of the displacement problem due to the construction of Medium Irrigation Project.

6. To assess the employment potential for the absorption of displaced persons.

The scope of the study is confined to a Medium Irrigation Project in ITDA area of West Godavari District.

A sample of 30 displaced households by the Medium Irrigation Project in West Godavari were selected for collection of data on socio-economic conditions. The other data were collected from the village officers, land acquisition Tahsildars, Executive Engineer, of the project and the office of the Assistant Engineer and Revenue Divisional officer. Discussions were also held with the officials connected with the irrigation project and rehabilitation programme. Two types of schedules were used for collection of data from the heads of the house holds of the displaced persons and the concerned officials.

PROJECT PROFILE:

A medium irrigation project has been taken up to harness water for irrigation purposes from Jalleru, revulet which drains into yerrakalava near Vegavaram of Polavaram taluk of West Godavari district. The estimated command area of this project is 3,500 acres and the efforts are being made to increase the command area upto 4,000 acres. Jalleru revulet originating in the Eastern ghats flows in Southern direction till Aliveru village where the reservior is constructed and drains into yerrakalva after flowing 25 kms, distance down stream of the reservoir site. The scheme was inaugerated in the year 1976 (29.8.1976)

The reservoir is located near Aliveru village; 81.20.10 longitude and 17.17.0" latitude, at a distance of 12 kms to the north of Buttayagudem vill age, head quarters of panchyat samithi. The project site is connected by an earthern road upto Doramamidi (9kms) and by a black top road measuring 3 kms. Length right upto reservoir site. The catchment area of the stream is 48.13 sq.kms. The yield works out to 500 mc ft.

The reservior F.R.L + 216.60M (+710. oft) and silt level of the head sluice would be at + 208.90 m (685. oft) The live storage of the reservior is 8.69 Mcum (310.40 Meft).

The earthern dam constructed for the reservior runs to a length of 1.79 kms with top width of 5m peak height of the earthern dam being 31.42 m (103. oft).

The regular work was in progress at the time of the study. The proposed regulator would be with two vents measuring 12x6 metres with radical gates to discharge floods of 12,300/-c/s (339.cmc per sec)

The Head sluice on the left flank is with silt level +208.90 MA(+685.00 ft) to discharge 70 c/s(1.98 cumecs) through one vent measuring 1.0 x 1.5 m.

The take off main channel from the head sluice runs on a ridge for a length of 6.0 kms in Doramamidi and Buttayagudem villages and their hamlets.

The proposed command area of the project is spread over 3500 acres (1416 hectars) benefitting cultivators belonging to 7 hamlets of two revenue villages viz. Doramamidi and Buttayagudem. The beneficiary hamlets are as follows: Jeedipudi, Rangapuram, Thellamvarigudem, Kota, Buttayyagudem (part) Dasappagudem, Thellagudem, Muppenavari gudem (Part).

The estimated cost of the project is Rs. 329.89 lakhs including direct and indirect charges. The anticipated financial returns of the project works out to 0.244% though the optimum financial returns are 0.5% and it has been relaxed infavour of tribal areas so as to extend irrigation project benefits to the scheduled tribe cultivators. The cost benefit ratio of the project works out to 1.857 at 5% interest rate, while it is 1.089 at 10% rate of interest. The government have relaxed the norm in favour of tribal areas (the viable benefit cost ratio is 3.00%)

PROFILE OF THE SETTLEMENTS IN THE CATCHMENT AREA OF THE PROJECT:

The catchment area of the reservoir is spread over 48.20 sq.kms. The water spread submerges Aliveru, a revenue village and its hamlets i.e. Yerrayagudem, Lankapakala and Thummagudem. The total geographical area of these settlements is 1.97 square miles with total population of 680 persons of which 328 are males while 352 are females. Of the total population, 99.73% i.e. 651 are scheduled tribes. Among them 314 are males and 337 are females, while the rest of the population belongs to non-tribal communities. The two tribal communities, Koya and Konda Reddy are inhabiting these settlements. It is predominantly a Konda Reddy settlement. Konda Reddies belong to primitive tribal community for which special developmental programmes have been evolved. Of the total population, only 38.86% (253) are working. A vast majority of working population are males, ie 213 out of 253 total working force while a small number ie 40 are females.

The land use pattern of the settlement reveals that of the total geographical area, 833 acres is cultivated land while 428 (ac) is cultivable waste and the entire extent of cultivated land has been classified as un-irrigated land. The operational land holdings size indicates that 54% are marginal farmers among Konda Reddi's while only 28% are marginal farmers among Koyas. Among Koyas 34.48% are small farmers while 38% are small farmers among Konda Reddi's. Only 6.25% of Konda Reddi farmers have operational holdings ranging from 5-10 acres while 31.03% of Koyas have holdings 5-10 acres. Lastly only 2% among the Konda Reddi's have operational holdings of more than 10 acres while 7% among Koyas have more than 10 acres. A good number of Konda Reddi house holds subsist on food gathering and shifting cultivation. The number of marginal farmers is more among Hill Reddis than Koyas.

Though paddy is the principal crop in this area, jowar is also grown on large extents in this area followed by bajra. Paddy is grown as dry crop due to absence of irrigation facility. However it has been observed that paddy is preferred to millets as high yeilding fertiliser responsive short duration varieties of paddy are readily available. The cultivators are showing preference to high yielding paddy variety

though their adoption is subjected to number of limitations ie ecological, social, economic etc. the high yielding varieties are susceptible to more pests and diseases than the local varieties. The monsoon pattern also imposes limitations on the adoption of high yielding varieties.

The cropping pattern indicates that about 80%-of the total cropped area is earmarked for raising food crops while 20% of the area is used for commercial and other miscillaneous crops. Jowar is mainly cultivated under rain-fed conditions. Among pulses black gram and greengram are grown as mixed crop with jowar and bajra during the kharif season while Red gram and bengal gram are grown during the rabi season.

Regarding infrastructural facilities, Aliveru village was connected with a Katcha road. Since construction of the reservoir the road was improved and black topped upto earthern dam to a length of 9kms ie between Doramamidi and reservoir. All these settlements have drinking water wells. There is a single teacher primary school at-Aliveru. An adult literacy centre is functioning for the benefit of women. There is one special Nutrition centre with 40 beneficiaries, besides that the village has a community radio set. A dispensary is located at Doramamidi at a distance of 3 kms from Aliveru. Girijana Co.operative corporation affiliated D.R. Depot is functioning at Doramamidi. The Aliveru single teacher primary school is linked with Ashram High school at Doramamidi. Now a branch post office has been opened at Dam site and electricity is brought up to dam site. A livestock supervisory unit is located at Doramamidi. A telegraph office is also located at Doramamidi.

These settlements are covered by ITDA programmes in Agriculture and animal husbandry sector. Konda Reddis of these settlements are getting the benefits of development programmes implemented under primitive tribal groups (Konda Reddies).

Consequent on the acquisition of agricultural land and house sites for the project, the inhabitants have been shown alternative accommodation at Marlagudem, abetting the road leading from Jangareddigudem to Buttayagudem. The tribal inhabitants have rejected the site because of the distance. The revenue department is on the look out for an altemative accommodation near the dam site. The total number of displaced households is 118 of which 69 belong to Konda Reddies, 48 to Koyas and one non-tribal. Seventy eight land owning house holds have been compensated for their loss while the other 40 households who have no agricultural lands are being considered for compensation by way of providing house sites and land assignment. Agricultural land measuring 250.09 acres has been acquired at a cost of Rs. 12.98 lakhs.

The Medium Irrigation Department has deposited Rs. 17.00 lakhs with the Revenue Divisional officer, Kovvur for payment of compensation to the displaced persons. The land was acquired by the public works Department in the year 1977 and the compensation has been paid to the tribal households in the first quarter of 1980 and for some households in the second quarter of 1980, as mentioned earlier, so far an amount of Rs. 12.98 lakhs has been disbursed as compensation to the displaced persons. The compensation is being paid by the land acquisition Tahsildar appointed for this purpose. He is stationed at Jangareddigudem to conduct enquiries and pay compensation to the displaced households.

The sample house holds belong to tribal communities ie Konda Reddi, a primitive tribal group and Koya. Of the thirty households 19, belong to Koya community and the rest ie 11 belong to Konda Reddi.

The land has been valued per acre ranging from Rs. 4000 to 5000. of the 77 tribals received compensation, 8 have got less than rupees five thousand, 25 have got compensation of Rs.Five to ten thousand. while 13 tribals have received compensation of 10 to 15 thousand, fifteen tribal households got a compensation of Rs. 15 to 20 thousand and only, 16 tribal households have received more than 20 thousand rupees. Maximum number of households are in 5 to 10 thousand rupees. It can be seen that a large number of Koyas have received more than 20 thousand rupees when compared to Konda Reddis. As mentioned earlier the Koya cultivators are mostly found in 5 acres and above range and consequntly t ney have received more compensation.

PROFILE OF SAMPLE HOUSEHOLDS:

On sample basis 30 households have been selected for collection of data among the displaced tribal households. The salient features of these households are follows:

The total population of the 30 sample households is 146 of which 52% are females while the rest are males. The female population is 30. As many as 14 households are having land measuring less than 2.5. acres 10 households are having land measuring 2.5 acres to 5 acres while 5 households have more than 5 acres of land and only one household has more than 10 acres. Agriculture is the main occupation agriculture labour, collection and sale of minor forest produce being the subsidary occupations. Some of them work as causual labourers in non agricultural sector also.

All the heads of households are illiterates except two who have studied upto 5th class and they too are drop outs from school. Illiteracy is a major problem which is found in all age groups. It has been observed that enrolment in the single teacher school is very poor as the school has been opened very recently and efforts are made to increase the enrolment rate. The special Nutrition Centre functioning in the village is operating as incentive to the pre-school age children.

The compensation pattern of the House holds indicates that 3 tribals have been awarded compensation of less than Rs.5.000 and eleven tribals have received compensation amount of Rs. 5 to 10 thousand, while any 2 tribals have received compensation of Rs.15 to 29 thousand and lastly 7 tribals have received Rs.20 thousand and above. The date indicates that more than one third of the sample household received compensation of 5 to 10 thousand rupees.

The compensation amount has been paid to the tribals in two instalments through cheques. The displaced tribals have expressed the view that they had to visit the Mandal office good number of times and be present at the settlement at the time of visit of revenue officials for verification of claims etc. The tribals have opined that they faced lot of problems to get the compensation amount, due to their illiteracy and ignorance about procedural formalities.

The displaced tribals have utilised a part of the compensation for various purposes like cultivation, household maintenance, purchase of land, purchase of cattle, repayment of loan etc. The utilisation

pattern reveals that 24 out of 30 have deposited the amount in the Bank, 10 have used part of the amount to most cultivation expenses, 5 have utilised the amount for meeting household maintenance expenses, 7 have used part of the amount for purchasing of land and four for purchase of cattle while four of them have used the part of the amount for re-paying the loans.

As settlement locations is not yet decided the inhabitants of these Aliveru village and it hamlets are indecisive about the future programme and utilisation of the amount. The delay in this process is likely to force the tribals to spend away the amount for unproductive and consumption purposes.

Regarding changes in occupation the data reveals that only 3 members have been absorbed in the project work as daily causal labourerswhile the other continued agriculture as main occupation. There have been no major changes in occupation. It has been reported that residents of Aliveru and hamlet have been reluctant to work in the reservoir construction programme and the probable reasons were that tribals were assured of getting sizable amounts as compensation, and the work is extracted on piece rate basis. The PWD is adapting a system of continuing causal labourers i.e soon after the construction of one irrigation project is over the casual labourers working there in are shifted to the other project instead of dispensing with their services. Due to this system the same working force continue to be employed as casual labourers in the other projects. This system ensures labour supply to the contractors without any break.

III. RETROSPECTIVE SCHEME:

A good number of projects have been taken up in the State since launching First Five Year Plan with a view to exploit resource potential for the benefit of the people. Projects which involve displacement of local inhabitate in substantial members are a) Irrigation and power projects b) Industrial projects c) Mining projects d) Sanctuaries. The projects are mainly taken up in areas rich in natural resources like water, minerals and forests, tribal areas in the state.

Displacement in those projects follow either from acquisition of tribal lands or from earmarking forests for industrial exploitation and assignments of the Government land under occupation of tribals for the use of the projects. While in the former case, economy of the population dependent on land gets upset, in the second case impoverishment of a section of tribals which depends for its living on the forests *IS A NECESSARY CONSEQUENCE. In either case, there is disruption of the socio-cultural life* of the tribals wherever physical displacement of habitations and families take place.

To examine the displacement of tribals in our State due to construction of various industries, irrigation and power projects it would be necessary to list them out in the following table.

Sl. No.	Name of the Project	Population affected	No. of villages	Extent of land acquired	Whether compensation paid	No.of ST persons employed
INDUSTRIES:						
1.	Heavy Water plant at Manuguru in Khamam district	170ST	8	329.35 Acres	Compensation in cash	101 paid

2.	Someswara Cements and Chemicals LTD Ippalnavangaon Adilabad	9	1	N.A	-do-	40
3.	Bhadrachalam paper Boards Sarapaka Khammam	8	1	1.17 acres	-do-	40
4.	*Irrigation* Polavaram West Godavari Dist	95,362	220	86,400 acres	to be taken up	—
5.	Srisailam Project (left bank) Kurnool	120	83	N.A.	—	
6.	Vardarajaswamy Project, Kurnool Dist	164	1	133.43 Hects	35,580	—
7.	Peddabagu Project Khammam Dist	1140	NA	1112acs	N.A	N.A
8.	Paliperu Project Khammam Dist	1728	NA	NA	NA	—
9.	Gundlavagu, Khammam district	274	N.A	105acs	NA	NA
10.	Jallcru, West Godavari dist	635	NA	430acrs	NA	NA
11.	Maddi gadda in East Godavari dist	345	N.A	455	N.A	N.A
12.	*Sathanala Project Adilabad district*	32	N.A	1642 Acres	N.A	N.A.
13.	Bandakalya in East Godavari	N.A	N.A	N.A	N.A	N.A
14.	Peddavagu Project	N.A	N.A	7112	N.A	N.A
15.	Mondikunta in Khammam	N.A	N.A	472 acrs	N.A	N.A
16.	Chalm lavagu in Itkapally in Adilabad Dist	51	One	427.05acres	N.A	N.A
17.	Reservoir Acres Gajjabigodda near Bomik Village in Srikakulam district	22	One	20 acrs	N.A	N.A
18.	Vengalrayanagar Project Kuddadivalasa, Vizianagaram district	130	5	N.A	Rs. 1,78,791.33	N.A
19.	Jajhavathi reservoir project, VZM dist	281	2	N.A.	Rs. 4,27,781.67	N.A
20.	Vattivagu project Adilabad dist	3	1	N.A	N.A	N.A
21.	Machkund Hydro-Electricity project, VSP dist	1860	186	4228.39 acres	Rs. 550000	N.A
22.	Sileru Project Visakhapatnam dist	N.A	13	925	N.A	N.A
23.	Wild life sanctuaries 7 Nos	17181	252	75428.95	N.A	N.A

WILD LIFE SANCTUARIES:

There are 14 notified Wild Life Sanctuaries including 3 Bird and 3 Crocodile sanctuaries in the State. Out of these there are 7 sanctuaries which fall in tribal areas of the state. The location of these sanctuaries posed many problems to the traditional inhabitants ie tribals. As presence of human beings and their activities are considered to be detrimental to promotion of wild life, there is total prohibition on any kind of human activity. Even in the interior forest areas, there are tribal and non tribal settlements which are affected. Human habitations often occupying prime wild life habits no doubt resulted in denial of scarce water sources to the wild animals. However in a situation like this, the intersets of both humans and animals should be taken into consideration and ways deviced to minimise suffering. Under the guise of protecting endangered species, the tribals are prohibited from hunting even the unendangered species, like wild fowl, Rabbit, patridge etc in these sanctuary areas by confiscating the hunting equipment such as primitive bow, arrow, spears, snares etc, which make the tribal incapable of hunting even outside these areas, thus denying him a source of food and consequent nutrition. Tribals who subsist on collection of Minor Forest produce are not allowed to pursue their traditional occupation. It is a well know fact that tribals and wild life co-existed for several centruries and it is poacher from outside who has been responsible for windli..g of wild life. Therfore, the tribal interests are to be protected rather than causing displacement by imposing various restrictions due to establishment of wild life sanctuaries. It is necessary that the forest department should provide employment to tribals in the various activities connected with the sanctuary activities. The details of wild life sanctuaries in tribal areas are furnished in Annexure.

CRITICAL REVIEW ON REHABILITATION MEASURES TAKEN SO FAR

During 1957 and 59 the following rehabilitation measures were taken up for the displaced families from Machkund Reservoir project.

a. Each family was provided with 10 cents of land for construction of a house.

b. Each family was allotted 5 acres of land for cultivation purpose.

c. Rs.250/- were given as loan to each family for land reclamation

d. All the rehabilitated families were provided with electricity.

The displaced families of Nagarjunasagar project are entitled for the following concessions and facilities, in addition to the payment of compensation to their lands, houses etc at the rates prevailing on 1.7.53 as provided under Nagarjunasagar project Acquisition of lands Act XXXII of 1958 as per G.O.Ms.No. 12 public works (Nagarjuna sagar) Dept dt. 10 June 1960.

1. The displaced families who have been living by cultivation for the last three years and whose holding in the submersible are and elsewhere not to exceed 20 acres should be granted, free of cost, dry landnot exceeding 5 acres so that the grant should be just enough to make their total possession elsewhere and in the new rehabilitation centre aggregate to 10 acres dry subject to a maximum free grant of 5 acres. In addition they are also sanctioned dry land on market value prevailing on 1.7.1953 as hereunder.

1. a) the displaced families owning 5 to 10 acres be granted 2 1/2 acres.
   b) the displaced families owning 10 to 20 acres be granted 5 acres and
   c) these owning more than 20 acres be granted 12 1/2 acres.

2. Each displaced family should be given a house site free of cost upto 10 cents. Assignment above this limit should be on payment of cost subject to a maximum of 25 cents.

3. Each displaced family of cultivators who were pattadars of lese than 10 acres be granted an amount of Rs. 100/- loan and another Rs.100/- as grant, to meet the expenditure on reclamation and levelling of lands being assigned to them in the rehabilitation centres, set up by the project.

4. So the displaced families who receive compensation of Rs.500/- or less for their household property in the submerged village to make up the difference between Rs.750/- and the actual amount of compensation, an exgratio should be paid subject to a maximum of Rs.300/-only.

5. The displaced families should be provided free transport to enable them to shift along with their belongings from the submersible village to the rehabilitation centre.

6. The displaced families should be permitted free of cost transport of dismantled materials of residential buildings and in the case of non residential buildings, removal of dismantled-material should be permitted on payment of 75% of the assessed cost.

7. Wells should be provided in the new rehabilitation centres at the rate of one well for 50 families.

8. Access roads and common facilities such as schools, temples etc which are inundated by the Project in the submersible village should be provided in the new centres at the cost of the project.

9. Land owners can use the lands acquired in the submersible village until such time as flooding occured, on lease, the lease rent being equivalent to the assessment payable for the lands.

Goveernment have not adopted Nagarjunasagar project pattern in the case of Srisailam and Pochampad projects and directed that the rehabilitation of displaced persons under the Srisailam and Pochampad projects be undertaken in accordance with the following principles as per G.O.Ms.No.141 PWD (Project wing) dt. 19.4.68.

1. a) Displaced families shall be granted free of cost, land equivalent to the extent acquired from them subject to a maximum of 5 acres of dry land or two acres of wet land per family (only families who are living by cultivation for atleast 3 years prior to their displacement shall be eligible for such free grant.) No further land will be assigned to the displaced families even on payment of market value.

   b) Displaced families who desire to get themselves rehabilitated at the centres established by the Government will be granted 10 cents of land in such centres free of cost as housesite

in the case of those lands have been acquired and 5 cents of land in the case of those whose lands have not been acquired.

2. Displaced families who desire to get themselves rehabilitated in places other than the rehabilitation centres established by the Government where lands but no house properties were acquired and in cases where house properties were acquired a cash grant equivalent to 50% of the compensation paid for such properities subject to a minimum of Rs. 500/- and a maximum of Rs.2000/- per family.

3. The Government also directed that in case compact blocks of Government waste lands are not available for the purpose of assignment to the displaced families and establishment of rehabilitation centres, forest lands with sparse free growth shall be dereserved for the purpose.

In addition to the above Government directed for provision of certain common and communal facilities in Rehabilitation centres at Pochampad as per G.O.Ms.No.203 PWD (Project wing) dt.7.5.89 as given below:

	Amenities	Cost
1.	Drinking water well (one for 50 families)	Rs.7500/-per well
2.	Community hall	Rs.5000/-per centre
3.	School building	Rs.15,000/- -do-
4.	Temple	Rs.10,000/- -do-
5.	Laying of approach roads, internal roads, side drains and house plots	Rs.33,000/- per centre
6.	Ex.gratia payment	Rs.300/- per centre
7.	Subsidy for reclamation of lands	Rs.100/- per family.

Government of Andhra pradesh in Irrigation Department (Project wing) vide G.O.Ms.No.98 dt. 15.4.86 made provision for the employment of displaced persons or their dependants as stated hereunder.

i. Not more than 50% of vacancies of the categories equivalent to Junior Asst/Typists and the cadres below arising in major and Medium Irrigation and Power projects shall be filled up by the displaced families or their dependants of a respective project duly following the reservations for various categories viz., SC ST BC ex-Servicemen physically handicapped and Meritorious sportsmen etc.

ii. The candidate eligible for appointment under this scheme shall be the displaced persons or his/her son, daughter or spouse there being no other earning member in the family.

iii. Applications for appointment from the eligible candidates shall be made to the District Collector concerned. Preference shall be given with reference to the date of displacement and to those applicants whose houses and lands acquired against those whose land a house only is acquired. The District Collectors shall draw up a list of such applications and forward the same to the project authorities for appointment.

iv. All appointments made in this scheme shall be temporary to start with. However, the services of those employees will be regularised in the categories of posts whose pay is equal or less than that of Junior Assistants.

v. The temporary appointment of the persons employed under this scheme can be considered for regular appointment without subjecting them to normal process of recruitment rules, provided they satisfy other conditions of recruitment prescribed in the rules such as age, and educational qualifications etc. However a formal notification may be made to the employment exchange and after filling up the vacancy the appointing authority will furnish all relevant particulars of the candidates to the employment exchange covering the area.

vi. The regular appointment made under this scheme shall be kept outside the purview of A.P.P.S.C Necessary amendment to the A.P.P.S.C regulations shall be issued separately.

Inspite of the several GOs and Guidelines issued from time to time the rehabilitation it is soon from the case study of Jalleru reservoir project that the rehabilitation programme was not taken up on systamatic lines. Besides paying compensation Government are also trying to provide them housesites but the tribals have not accepted the offer as the site selected by the Government is far away from their original habitation and it was not linked by the tribals affected by the irrigation project. As an alternative Government are trying to acquire a site nearer to their original habitation and their environment. The proposed site is adjecent to the earthen dam of the Jalleru medium irrigation project and it appears that the proposed site has been tentatively selected in consultation with the tribals affected by the project. The decision about the site first selected for houses was conveyed to tribals without their consent, hence it was rejected. In the second instance the tribals indicated their preference as there was dialogue between tribals and rehabilitation agency.

The rehabilitation programme was organised and implemented by the revenue department while the scheme was financed by the irrigation department. The Revenue Divisional officer is the custodian of the finances and supervising officer of the rehabilitation programme, while land acquisition Tahsildar is the valuation, award enquiry officer for the rehabilitation programme. The village Assistants have been associated with the programme while the development department officers like M.D.O and P.O of the ITD Awere not associated with this programme. The rehabilitation programme was implemented by the revenue department without the knowledge of the other agencies like Mandal Praja Parished etc. It would have been better had there been coordination and consultation between the development departments and the Land acquisition agency incharge of implement of rehabilitation programme.

Usually the land required for the project construction work is acquired and compensation is paid to the land owners to compensate their loss. Before the construction work commences the compensation is paid but in irrigation projects there are instances where the compensation is paid years after the work is started and the award enquires continues to be in process even after the project work is completed. As per existing law in the scheduled areas the land belongs to the scheduled tribes and the compensation is to be paid to the tribals based on the extent of land acquired for public purpose. The compensation is to be paid to the tribals based on the extent of their land acquired for the public purposes. The Land Acquisition officer faces problems while passing awards for unsurveyed land. The allternative left to the Land Acquisition officer is to depend upon the land records maintaince by the village assistants who maintain land records for land revenue collection purpose etc. Sometimes the cultivator is deprived of the compensation for the simple reason that he does not posses recorded right on land i.e., title (patta) though the particular cultivator was in possession of land for decades. Aliveru village is one of the unsurveyed villages of Buttayagudem Mandal. The survey was done after the land under reference was acquired for the project work. The extent of land possessed by each tribal and non tribal household was decided with reference to the land records and the boundaries are delineated. The compensation amount was decided after this process was over. The Land intended for acquisition was notified in the State Gazette and enquiry was conducted by the Land Acquisition officer himself personally and the awards passed. The Land was required during the months of April/July and December of 1977 and the compensation was paid to some of the tribals in the month of March 1980 ie., after a lapse of two and a half years period, and in some cases the compensation was paid a little later ie in the month of 1980. The delay was partly due to the survey operations and identification of the land owners and extent of land with reference to available land records with the local revenue officials. It was reported that still compensation is to be paid for 10 tribals.

As mentioned early, the compensation was paid after considerably delay and the tribals are left free to select the land for agriculture etc. The enquiry reveals that the tribals have used the compensation amount for other purposes than purchasing land. The modeof payment of compensation has given scope to the affected tribals to use the compensation amount for various purposes other than for acquiring durable assets. The analysis of utilisation pattern indicates that the tribals spend away the amount on unproductive purposes. More payment of compensation to the tribals would not help them and at the same time responsiblity of the Government does not end with the payment of compensation alone. The displaced persons have to be rehabilitated fully by the State Government.

It may be concluded that the rehabilitation agency has not given serious thought to the problem of rehabilitation and on the other hand it considered that responsibility ends with payment of compensation to the displaced tribals. Time schedule was not adopted for implementation of rehabilitation programme.

V PRESENT POLICIES - CENTRAL AND STATE

Government videtheir memo.No.560/VIII/86, dt.25.6.87 have laid down the following guide lines.

IRRIGATION:

1. Schemes involving submersion of tribal lands should not be taken up and where it becomes unavoidable rehabilitation should be taken up on land to land basis.

2. Housing, school and health facilities should be provided in full.

3. Comprehensive rehabilitation scheme should be a first charge on the project and form part of the project report.

4. Rehabilitation of irrigation projects already taken up should also be considered.

MINING:

With a view to safeguard the interests of tribals in mining activities in the State, Government have issued order vide G.O.Ms.No.408, Industries and Commerce Department dt.16.7.88. The order emphasises that there should be no disturbance of tribals or their way of life (ii) the flora and fauna which held tribal economy should not be disturbed. (iii) Tribals should be provided employment at all levels by proper man power planning and training programme formulated in advance. All the unskilled labour should reserved for local tribals and the Integrated Tribal Development Agencies should moniter the safeguards.

WILD LIFE SANCTUARIES:

It has been observed that whenever wild life sanctuaries have been established, there is displacement of tribals and disturbance to their normal life as most of these sanctuaries are in tribal areas. In order to provide safeguards to tribals, the Government have issued orders vide G.O.Ms.No.310, Forests, Animal Husbandry and Fisheries (For.III) Department dt.5.8.86. The orders direct that whenever wild life santuaries are established in tribal areas, it should invariably ensured that there is no disturbance to tribal life and the livelihood of tribals besides their customary rights fully safeguarded and protected. In exceptional cases where displacement of tribals becomes necessary, the affected tribal families should be fully and completely rehabilitated close to their original habitations with all necessary amenities duly ensuring necessary moans of livelihood.

Guidelines issued by various Central Ministries:

The following are the various guidelines provided by Government of India Ministries;*

1. Ministry of Home Affairs: The guidelines issued in 1982 inter- alia, provide for payment of compensation to the evicted tribals, allotment of land for land, preferably in the command area, employment of atleast one number of the evicted tribal family in the project, training and suitable support to the tribals for setting up of small industries, supply of drinking water, free housesites and other basis educational and medical facilities to the new tribal settlements.

2. Ministry of Water Resources: The Ministry had in 1980 suggested assignment of Government waste land in the Command area to the displaced persons and also to compel big landlords in the command areas to part with their land for re-settling the displaced tribals. The State

Government were requested to pass a legislation facilitating resettlement of the tribals in the command areas. Further the State Governments were requested to ensure that in the interests of the weaker section of society were suitably protected before sanctioning such projects.

3. Ministry of Environment and Forests: In response to a communication from the Ministry of Environment and Forests, the Planning Commission has now made it incumbent on the various divisions that projects of the State Governments requiring clearance of the Planning Commission should be cleared only with the prior approval of the Central Government under Forest (Conservation) Act 1980.

4. Ministry of Industry: (Department of Public Enterprises) considering the seriousness of the problem, the Government of India have issued detailed guidelines for land acquisition, payment of compensation for the land acquired, rehabilitation of the displaced tribals etc, involved in major projects, vide Ministry of Industries Department of Public Enterprises O.M.No.15/13/84-BPE(C),dt.3.2.1986.

A persual of guidelines indicates that the earlier offer of employment of atleast one member of every displaced family as given in the guidelines of the Ministry of Home Affairs has been withdrawn as it is felt that this may adversely affect the commercial viability of the undertakings due to over manning the project with persons not suitable for the jobs. The project authorities have been requested to assist concerned State Governments for organising and financing useful avocations like poultry farming, animal husbandry, etc for displaced tribals.

*Displacement of tribals due to location of Central/State projects problems and Related issues-A working paper presented at the Annual Conference of Director/Dy.Directors of the Commission for SCs & STs 3-4 June, 1986.

V. COMMISSION AND RECOMMENDATION

A critical analysis of the measures undertaken shows that the tribal people affected by medium irrigation projects, mining projects, Industries, Sanctuaries etc in the Tribal areas face social disorganisation and economic destitution. It is also clear that even some of the elementary aspects of tribal problems have not been appreciated so far in relation to acquisition of property and rehabilitation. Cash compensation for lands acquired in the tribal setting has a debasing effect. More over, land is the vital resource base on which the tribal subsists. Therefore, the loss of this economic resource which the people suffer in these areas remains unassessed in the existing legal frame for land acquisition and compensation devised for an entirely different situation in advanced areas. Added to this, the displaced tribal faces many problems in moving to an entirely unfamilier economic system under which he is not properly equipped to survive.

Keeping the above perspective inview the following suggestions are made:

1. In the present set up projects are being started without giving serious thought to displacement. A holistic view is to be taken had rehabilitation scheme should form part of the project report.

Ecological inbalance caused due to establishmei of projects/and their adverse impact on economy of tribals to be securately assessed and remedial measures to be specified in the project report itself.

2. Besides technical focaibility human problems arising out of establishment of the project location should be considered fully and alternatives available for location should be investigated and decision taken to mitigate human suffering.

3. The present practice of more payment of compensation to displaced tribals should give way to a policy of drawing up a comprehensive rehabilitation programme ensuring social service, Land Development and other economic uplift programmes so as to promote sustained economic development of the rehabilitated.

4. Necessary steps should be taken so that no project in tribal areas is cleared unless a detailed and compresensive plan of rehabilitation of the people adversely effected, is prepared and the Project authority satisfies the Government that there is full administrative preparedness for executing the rehabilitation plan. No project should be cleared unless Tribal Welfare Department gives clearance.

5. Before evacuating the population, a new site nearer to their previous habitation should be shown. The leader of the group is to be consulted before selection of the site and the whole site is to be handed over to them to construct their own village as per their plan and convenience. They should be encouraged to undertake the work of their construction speedily.

6. Efforts should be made to provide sufficient extent of land for religious places, burrial/cremation grounds, pastures etc as selected or agreed by the displaced.

7. Rehabilitation measures will have to be taken up first and later the construction of the project should be taken up. All the displaced should be provided subsistance allowance till they are able to get regular income. The land acquisition officer should be made responsible for rehabilitation also and an officer posted for this purpose should not be disturbed till the entire process is completed.

8. In the recruitment of labour for project work, displaced tribals should invariably be preferred. Further petty works, earth work, levelling etc. Which do not involve much technical skill may be given to tribal contractors so that the construction work benefits also flow to displaced tribal. The ancilliary units which may be set up to supply semi-finished/finished goods to the main project are to be given on priority to the displaced by providing them necessary training and financial assistance with marketing tie-ups. For this tribal entreprenuers are to be identified in advance and they have to be impacted with necessary skills for establishment of these ancilliary units and the whole cost involved should be borne by the Project itself.

9. Establishment of ancilliary industries by providing necessary training and financial assistance with marketing tie up should be provided.

10. No project should be set up in tribal areas unless Tribal Welfare Department gives clearance.

11. Tribal Welfare Department's representative should be a nominated to the Governing body or advisory board or executive council of the project so as to facilitate continuity in rendering suitable advice for proper rehabilitation and adjustment of affected tribals in the new environment.

12. Non tribal entreprenuers in tribal areas should not be allowed to establish major projects by strictly implementing the Andhra Pradesh Scheduled Areas Land Transfer Regulation. Whenever the project is to be established in National interest and involves heavy investment, Government or Government undrtakings may take up these projects. Further, the possibility of lowering costs by reducing the size or capacity of the project is to be studied so that the tribals can take up the project with Government's financial help.

13. Construction of major and medium irrigation projects may be avoided as far as possible. Small check dams, lift irrigation schemes etc can be taken up to tap the potential. Tanks at the foot of the hills may be developed and pisciculture has to be developed extensively as the tribals are fond of fish. These fish tanks also ensure sizeable income. These steps will stabilize the sub-soil water system and maintains ecological balances.

14. In order to promote group participation, the traditional leadership is to be encouraged and taken into confidence. Though these leaders become disfunctional in the new set up but they have to be given supervisory role to utilise their present skills with a view to stimulate the group participation. These leaders are not knowledgeable about the modern life, therefore they have to be trained as functional leaders for the new situation.

15. The centres of rehabilitation should be developed into model villages with all basic facilities. These centres should be nearer to the market places and other higher order services centres like high schools, medical services etc.

16. In the even of accidential deaths during construction of the projects and in Wildlife sanctuaries due to animal attacks sufficient compensation should be paid to rehabilitate the affected families. Similarly compensation should be paid to those who are injured and rendered physically disabled.

17. Comprehensive consolidated guidelines may be issued with the approval of all Departments concerned.

ABSTRACT

Sl. No.	Name of the sanctuary	District	Villages/Hamlets			Population			Families			Area under cultiv.		
			Scheduled	Non Scheduled	Non Sub plan	Total	Scheduled Tribe	Others	Total	Scheduled Tribe	Others	Dry	Wet	
1.	Nagarjuna Sagar Srisailam Tiger Sanctuary	Guntur Prakasam, M.Nagar Warangal Kurnool	31	89	—	120	3,972	19,432	23,404	923	933	13357.50	—	1335
2.	Eturnagaram Wildlife Sanctuary	Warangal	15	2	—	17	3,932	3,501	7,433	786*	700*	2721.00	2822.0	5543
3.	Pankhal Wild life Sanctuary	Warangal	16	1	—	17	4,404	1,974	6,378	881*	395*	6765.00	2374.0	9139.0
4.	Kinnerasani Wild-life Sanctuary	Khammam	21	—	—	21	10,280	9,292	19,572	2,056	1,541	15928.00	862.0	16790.0
5.	Quwal wild life Sanctuary	Adilabad	4	14	14	32	6,132	16,180	22,312	1,085	3,389	10759.00	5930.0	16689.00
6.	Pranahita Wild life Sanctuary	Adilabad	—	2	18	20	1,782	13,887	15,669	390	2,963	11438.00	1045.5	12483.50
7.	Papikonda Hills Wildlife sanctuary	Khammam E. Godavari W. Godavari	25	—	—	25	55,300	28.500	83,800	11,060*	5,700*	1330.38	96.57	1426.95
			122	108	32	252	85,802	92,766	1,78,568	17,181	15,521	62298.88	1313.07	75428.95

DEVELOPMENT PROJECTS AND DISPLACEMENT OF TRIBALS

Walter Fernandes *

With many human rights activists getting concerned about the situation of displacement in general and that of the Weaker sections in particular, in recent years there have been many efforts to stop projects that cause displacement. However, one factor that comes out of many of these activities is that it is those areas which have a relatively stronger section of the population that is going to be displaced (as for example, Baliapal) or the focus is more on saving the forest than on the people (as for example,the silent valley) that get greater attention and tend to be presented as success stories. There are very few cases where the population belonged to the weaker sections and yet succeeded in making its voice heard. And yet, the fact remains that a proportionately large number of persons displaced by these projects belong to the poorest sections, more particularly the tribals and the Scheduled Castes.

The Situation of Displacement:

The most noticeable point about displacement during the last three decades is the enormity of the problem. According to a very conservative estimate we made based on extrapolation, we have come to the figure of around 145 lakhs of persons displaced during the three decades of planned development. In other words, the numbers displaced are as important as those of the transfer of population in the holocaust that followed the partition of the sub-continent in 1947.

Hence the second factor that stands out is the lack of awareness of the situation in the country as a whole and the dismal state of rehabilitation. The situation of rehabilitation has not changed substantially from the time the Bhakra Dam was built in the 1950s to projects like Talcher in Orissa in the 1980s.

Thirdly, one has to look at the category of persons displaced. A proportionately large number of them belongs to the Scheduled Castes and Tribes, particularly the latter. While tribals form only 7 percent of the country's population, their proportion among those displaced by development projects is as high as 40 per cent (Govt.of India 1985: 18-19). It would mean that between 50 and 60 lakh tribals have been displaced according to our conservative estimated (Fernandes, Das and Rao 1989:) during the last three decades.

The Main Sources of Displacement

Hydel power and irrigation projects are obviously the most important source of displacement because they submerge vast tracts of land. For example, 15 major dams we studied each of which has displaced between 10,000 and 80,000 persons, have submerged about 464,000 hectares of land and have displaced over 8 lakh persons. Over a third of those displaced are tribals (Fernandes, Das and Rao 1989: 70-71).

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but is the prime means of production. As such it supports not merely the owner of the land, but his servants, the village artisans, merchants and others and when this cycle is distrubed, all these activities are disrupted. But only the owner is offered compensation.

The result of this situation is greater impoverishment of these groups than that of the stronger section of society. But the whole legal system is geared to supporting the powerful but not the persons who depend on the common property resources. The result of this situation is a state of "dispossession" of the tribals who are sacrificed for what is called "national development" which has in practice come to be understood as the enrichment of the upper classes at the cost of the poor (Areeparampil 1989: 22-24). Land is transferred to the strongest sections for that exclusive use and for this the tribals and other weaker sections are deprived of what they have.

Lack of Rehabilitation:

The woeful state of rehabilitation has to be seen primarily in this context. The policy of compensation itself goes against the poorer sections since no compensation is given for common property resources. Claims have been made of rehabilitating them by giving them jobs. First of all, most jobs that are offered turn out to be of the unskilled variety and by no means a compensation for the loss of their livelihood. Besides, most of them are temporary jobs and little or no effort is made to train the displaced persons to fill qualified posts in the new project. Though the scheme of a job per family is an improvement over what existed earlier, viz.total disregard for any type of rehabilitation, it can not really serve the purpose. *First of all, most families have a communal land holding system. Which of the families of the* clan that hold a plot of land and is called a household get this job. Besides, there are several adults in a family and they may be families of different sons living together. But only one of them gets a job. Moreover, what happens to families that do not have an adult male or a female head of the family? (Fernandes and Ganguly Thukral: 7-8). All these factore ensure that the tribals do not really get many jobs. Moreover, even jobs are given, they are inadequate. For example, after 32,751 families displaced by coal mines between 1981 and 1985 when the policy of a job per family was existing, only 11,901 families i.e. only about a third, were given jobs (Govt.of India1985).

Conclusion:

We have given a summary of the situation of the displacement of tribals. What comes out of it is a situation of dispossession of their resources and further impoverishment. It is these factors that force one to question the very pattern of development and ask whether this is really national development.

Statements are made about the need to get the tribals and other weaker sections into the mainstream of society. As things stand, they enter the mainstream as subordinates and as bonded labourers. Tribal areas have in practice, become sources of low priced raw material and cheap labour but not of human development. It is this form of development that needs to be questioned and a new look taken at the development projects that displace primarily the weaker sections.

What is of much greater importance is the fact that the new dams that are coming up, are primarily in the tribal areas. As a result, from the displacement figures of 20 major dams that will displace over one million persons for which figures are available to us, more than 50 per cent are tribals.

However, as far as tribals are concerned, mines and wildlife sanctuaries seem to be the major sources of displacement. Our estimate of persons displaced by coal and other mines during the last three decades is around 17 lakhs, of whom more than 12 lakhs are still to be rehabilitation (ibid; 80). Out of 1,210 mines that were active in 1985, 498 were for coal,. Of these more than 90 per cent were in the tribal areas of Eastern India. Similar is the case with some other minerals like bauxite (CMIE 1986: 93).

Also other figures show that mines form a major source of displacement of tribals. Take for example, the Chotanagapur plateau which is one of the richest areas in the whole country. It has huge reserves of coal, iron ore, mica, bauxite, China clay, copper, manganese, limestone etc. This region produces 48 percent of the country's coal, 48 percent of bauxite, 45 per cent of mica,100 percent of Kyanite and 90 percent of apatite (Areeparampil 1989: 16).

In other words, more than 50 per cent of those displaced by mines are tribals. For example, the coal mines alone have according to official figures, over 2 lakh acres of land between 1981 and 1985 and have displaced 1.6 lakh persons, most of them in the tribal areas of Eastern India (Govt. of India 1985). The situation is expected to get much worse.

Landlessness and Property Rights:

As far as the tribals and the Scheduled Castes are concerned, what matters is not only the numbers involved but the type of people who are displaced. A distinguishing feature of these groups is that according to the present legal system, a larger of them are without property rights. There are two types of persons in the country-those who come under the tenancy laws and tribals and other forest dwellers who come under the forest laws. Most tribals occupy forest land that does not have pattas.

Moreover, Patta land is not their source of livelihood. Traditionally these groups have depended on the natural resources for their survival. Forest, land and water have been their life support system. Hence they have developed a culture that kept a balance between human and environmental needs and treated these resources as renewable. In other words, they developed a symbiotic relationship with constructive dependence on the natural resources, particularly forests (Fernandes, menon and viegas 1988: 159-170).

In other words, these are the populations that have depended primarily on the common property resources and not on patta land or individual ownership. Once they are displaced, the common property resources can never be replaced. Moreover, compensation if given only for private land and not for the common property resources. Even when alternate land is offored,its price is higher than the compensation. Besides, since the law does not give any right to the forest dwellers over forest land which they have occupied for decades, they do not get any compensation(Dhagamwar 1988: 253). Being landless they are much more dependent on the village as a unit than the big and medium farmers who get compensation for the loss of their land. It is forgotten that in a village economy land is not only a site,

but is the prime means of production. As such it supports not merely the owner of the land, but his servants, the village artisans, merchants and others and when this cycle is distrubed, all these activities are disrupted. But only the owner is offered compensation.

The result of this situation is greater impoverishment of these groups than that of the stronger section of society. But the whole legal system is geared to supporting the powerful but not the persons who depend on the common property resources. The result of this situation is a state of "dispossession" of the tribals who are sacrificed for what is called "national development" which has in practice come to be understood as the enrichment of the upper classes at the cost of the poor (Areeparampil 1989: 22-24). Land is transferred to the strongest sections for that exclusive use and for this the tribals and other weaker sections are deprived of what they have.

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PROJECTS CAUSING DISPLACEMENT
BASIC TYPOLOGIES AND THE NATURE OF ISSUES

-C.V. Krishna Rao*

The urgency for implementing developmental programmes has equally thrown up instances of anti thesis. At one place we wanted to form an irrigation project, another place we are taking up industrial plants; at a fourth place flora and fauna is fenced in National Parks. In all these cases, people whose interests were adversely affected-agricultural, habitation are asked to provide themselves alternatively. In effect they were elbowed out.

The cruse of the problem, therefore, is to learn the rope-trick of launching the developmental projects without endangering the interests of even one family displaced by the project.

It is also appropriate to recall that some projects which have been investigated, designed, estimated and were about to step on the launching pad have been stalled on pleas of environmental hazards, ecological disturbance, jeopardy of people's interests etc. After the Catastrophe of Bhopal MCL Gas Plant, apprehensions about the possible futuristic hazards have grown up to militant levels.

In Andhra Pradesh, we have observed that people displaced by projects have often been 'compensated' in cash. Cash compensation as the best method is always a debatable issue. For each hectre of land owned by the displaced person, compensation is fixed as per in L.A Act. We fondly hope the beneficiary invests the same amount in an alternative outlet and settles himself. This does not happen in the way we desire. Reasons are very many. One of them is that assets cannot be acquired at the desired place in the same quantity.

When the affected families belong to tribal communities, the problem is all the more intense. The tribal families do not and can not use the cash compensation fruitfully and the result is that every project that uproots a habitat or a hamlet or a village throws them as under as dry leaves in a gale.

When the land owned by them is not shown up in the revenue records as having alienable title, it does not attract consideration for a compensation. He will be reckoned as an encroacher and his occupancy is encroached up on mercilessly by authorities. When the land is under dispute, the compensation amount cannot be disbursed and the dispute is decided in a court of law. Meanwhile project work goes on; the displaced person is reduced to destitution.

In a period of 50 years, sizeable quantum of developmental work was put in the shape of schools, dispensaries, sale depots, libraries, community halls, drinking water wells etc. These massive benefits will be estrayed if the person is displaced. Or otherwise they have to follow if we desire to set him up in similar surroundings.

To compensate in cash is a simple and complete transaction as far as Government is concerned. But it is only a 'Primitivee' method of discharging responsibility. The obvious second alternative is

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compensation in kind. Land to be compensated by land; hut by hut; community services enjoyed by him shall abound in the alternate place.

The crucial issue, therefore, is that the project plan shall be complemented a plan-not supplemented-to restore all the interests adversely affected. The fear of the project engineer is that cost-acre ratio will not be balanced if the rehabilitation costs are also added to the cost of the project.

May be-Affect if demands a solution.

It will also be rewarding to survey the rehabilitation measures that we have taken up in the last two decades and draw inferences about the adequancy of the measures or otherwise.

For instance our experience of Chenchus of Kambalapalli and surrounding village of Nalgonda district (Sagar Dam), Aligiri in West Godavari District (Dam), Buttayagudem Block, Rajulamadugu(Forest), Adilabad District makes us know the percentage of success.

Administratively can the project implementation authority (be it Irrigation of Forest or archeological etc.) be assigned the duty of rehabilitation of the persons displaced by them? For the reason that completion of the project is a stupendous task demanding all the concentration of money, men and acumen, rehabilitation of the displaced persons cannot be taken up by them.

Can there be a separate department as the Rehabilitation Commissioner who now accelerates his assignment at the times of natural calamities?

Or will the commissioner for Tribal Welfare through his well knit organisation take on this work?

We consider that rehabilitation of displaced persons consequent on launching of development projects demands the benefit of sympathy, intelligence and experience.

We have to grapple with the following issues:

(i) FORM OF COMPENSATION:
   (a) for titled properties;
   (b) for enjoying properties.
   (c) Cost of house and belongings - not as they are valued at site; but as would cost for newly providing for.

(ii) Social service facilities that have been lot and the Scheme to provide them.

(iii) Family wise approach is necessary to ensure that not a single individual is left uncared for; group-wise approach is at the same time necessary to provide social services and alternate habitat.

(iv) We have to resolve that a new project shall not be approved unless a complementary scheme of rehabilitation forms part and parcel of the project estimate.

(v) We have also to decide who shall administer rehabilitation measures.

In fact the problem is not limited to Andhra Pradesh; it is a problem anywhere in India. It is not a problem peculiar to India only. We heard of it in Long Island and can spot the inadequacy of supplications to the uprooted on international level.

RELOCATION OF VILLAGES FROM NAGARJUNASAGAR SRISAILAM TIGER RESERVE.

HITESH MALHOTRA *

THE TIGER RESERVE:

Nagarjunasagar-Srisailam Tiger Reserve has been started from 22- 6-1983 with Head Quarters at Srisailam. The areas flanking both sides of Krishna River over an extent of 3568 sq.kms. falling in Mahabubnagar, Nalgonda, Guntur, Prakasham and Kurnool Districts are included in the Tiger Reserve.

The main object of this Tiger Reserve is to preserve the eco- system in this unique "Sriparvatham" which was once the research laboractory of famous Buddist monk 'Nagarjuna Charya' who is reputed to have discovered "Sanjeevini" the Elixir of life on these hills.

The efforts made towards this objective have resulted in increasing valuable fauna and enriching the entire ecosystem. Tiger population has increased from 64 in 1984 to 94 in 1989. All forest fellings, collection of M.F.P., grazing and other human activities have been banned in the core area of the Tiger Reserve for the outsiders. The local residents tribal population in the core area is, however, permitted to collect M.F.P. and graze their cattle inside the Tiger Reserve.

THE TRIBAL:

The Chenchus, Sugalis or Lambadas and Yerukulas are the main tribes living in the sanctuary area. The Chenchus are the native Adivasi tribesmen of Nallamalais. They are reported to have links with the Adivasi Tribe 'TODAS'. There are 64 chenchu Villages called Chenchu gudems with (4000) population in the sanctuary area. Sugalies or Lambadas are another scheduled tribe who have invaded into the forests mainly because of their land hunger and for cattle breeding. Their population is around 25000 and they are mainly found in the fringes of the sanctuary. Sugalies are not native to this place. They are said to have migrated from western India Unlike chenchus they are hard working, healthy and clever. They are slowly invading the chenchugudems in the interior areas also. They are involved in many forest offences.

The details of tribals living in the core area of the Tiger Reserve are as follows:

District	No. of villages	No. of families			Population		
		Chen-chus	Sugalies +others	Total	Chen-chus	Sugalies +others	Total
Guntur	2	45	2	47	210	9	219
Prakasham	8	156	98	254	672	391	1063
Mahaboob Nagar	14	106	25	131	409	126	535

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THE NEED FOR RELOCATION:

The core area is the sanctum -sanctorum of the Tiger Reserve. It is, therefore, endeavoured to make this area as free from human interference as possible to allow nature to take its own course to heal the wounds inflicted by the man. All departmental activity has already been stopped.

The local tribals had been living in these forests in complete harmony with nature. Developmental activity, land hunger and depletion of forest wealth has brought the so called civilised people to the forests. They have exploited the forest reserves and the tribals for their selfish motives. Depletion of forests has disturbed the water regime in the forest areas. Perennial streams now dry in summer. Water tanks have silted up and dry faster. Many tribal areas are without water in summer months forcing the tribals to shift to other areas where water is available.

Present day depleted forests cannot provide for all the needs of the tribals. Consequently they have to depend on outside supplies. This again exposes the innocent tribals to the outside people. The Govt. subsidised supplies can reach them efficiently only if basic infrastructure like roads and Govt. depots are developed. This again makes it easier for outsiders to invade the tribal areas. Thus it is not difficult to conclude that today tribals cannot survive only on available forest resources.

In the tribal villages there is more area under encroachment than what is legally permitted. On the encroachment land stringent provisions of Forest Conservation Act make it very difficult to carry on developmental activities for the upliftment of tribals without violating the Forest and Forest Conservation Acts.

It is true that the tribals belong to the forest as much as other wild fauna and flora and their right to live in the forests can't be disputed. But as explained above the tribals in the present day situation cannot live in isolation. They have to change their life-style or lose in their struggle for existence in favour of better adapted human beings. The dominance of sugalies over chenchus in Nagarjunasagar - Srisailam Tiger Reserve also proves this point. This has been happening in nature ever since the life has begun on the earth much before man appeared on the scene. The species which can't adapt themselves to the changing circumstances are vanishing from this earth.

These are sufficient reasons for shifting tribal population from difficult interior areas to outside or on the fringes of the forest where various developmental activities can be carried out much more easily. This would reduce the pressure on the forests and leave the undisturbed interior forests for the wild animals. This way the forests, wild life and environment would also flourish.

REHABILITATION :

Displacement of people from their age old villages is quite an agonising experience. The reluctance on part of the tribals is quite understandable. The experience in Nagarjunasagar-Srisailam Tiger Reserve is that the tribals having good land, water and reasonbale road system are very reluctant to leave. But the tribals not having water, road and medical facilities etc are quite willing to shift if land with irrigation source is provided.

Adequate compensation in terms of house, land, employment living conditions and other basic facilities is a pre-requisite for any such exercise. Equally important is the assurance of better living conditions to the displaced persons. This can be achieved with total sincerity of purpose and flawless execution of rehabilitation schemes. It is important that our sincerity of purpose is adequately demonstrated to the affected people before they are displaced. Involvement of affected people in the construction and other activities of the rehabilitation colonies will help us in gaining peoples confidance. This will also cut out future complaints form the occupants. In the Tiger Project some good work has been done in this regard in many Tiger Reserves. In Nagarjunsagar-Srisailam Tiger Reserve also we have shifted Pechervu and other villages. We have learnt a lot from our past experience. We have tried to improve our rehabilitation schemes. Latest centrally sponsored scheme in this respect provides for Rs. 49,000/- per family shifted out of the Tiger Reserve. The Scheme provides for cultivation of land, houses, Roads, Cattle pond, Primary health centre, Veterinary centre, Community centre, school, Village wood lots and pasture developments etc in the rehabilitation colonies.

The idea of displacement of man from Tiger Reserves and sanctuaries is to reduce the Man-animal conflict for the benefit of both. For once man has to withdraw in his own larger interest.

KOTTALA CHERUVU CHENCHU REHABILITATION PROJECT IN KURNOOL DISTRICT IN ANDHRA PRADESH, INDIA

Dr. V.N.V.K. SASTRY, *

INTRODUCTION

Kottala Cheruvu is a small village 10 kms. from Atmakur in Kurnool district in Andhra Pradesh where Chenchus of 'Pedda Cheruvu' village are being rehabilitated.

The village 'Pedda Cheruvu' is a historically famous Chenchu village located in the traditional foot path routes to Srisailam Temple from Atmakur side. The Chenchus were guiding the piligirms going by walk to temple and talking care of them. In turn, they were given food, presentations etc by pilgrims. Due to their contacts with outsiders, they have also learnt agriculture. After the road from Kurnool to Srisailam was formed in late 1950s, most of the pilgrims started reaching Srisailam by buses or motor cars. Very few highly religious minded Lingayats from Karnataka still come by walk in this route.

Eventhough the income from pilgrims decreased, the economy of chenchus did not change much because of their shift to agriculture and good incomes from sale of Minor Forest Produce especially highly commercial forest produce like gum. But their habitat was threatened by two projects namely Varadaraja Swamy medium irrigation project and Project Tiger. This village will be submerged on completion of the irrigation project and this village is also included 'Core area' of Tiger Project. When it was proposed by irrigation department to evacuate these villagers and settle them at Kottala Cheruvu, the Project Tiger officials took the opportunity to hasten the evacuation process. One day, they were all said to have been moved by lorries to Kottala Cheruvu.

Well Planned Rehabilitation Project:

The entire expenditure on rehabilitation was proposed to be met from funds of Irrigation Department as part of Project cost.

The components of rehabilitation project are:

i) all the chenchu families will be given land two acres per family.
ii) the lands will be developed by clearing bushes, removing stones etc.,
iii) they will be supplied plough bullocks, seed etc, Irrigation wells will be dug and irrigation facility will also be provided from new irrigation project.
iv) subsistence allovance will be provided:
v) One ashram school for chenchu children will be opened.
vi) daily requirement depot will also be opened
vii) medical facilities will be provided
viii) permanent houses will be constructed and
ix) village will be electrified.

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The chenchus who are exposed to outside contact have shown enthusiasm. Since they know agriculture, it was expected that they would settle at new place without much difficulty. What was lacking was initiative from development administration.

Ill-executed Project:

i) Only one acre per family was distributed and it was not fit for cultivation readily;
ii) the land was not developed;
iii) Irrigation wells were not sanctioned as promised;
iv) plough bullocks were supplied to only 30% of Chenchus, No seed was supplied. They could not use them as the land was not made suitable for cultivation;
v) no subsistence allowance was paid;
vi) the Ashram school was started but had only one teacher till recently who was mostly engaged in serving food to children (but not without complaints of mis-management).
vii) the D.R depot functioned only twice in a week
viii) for medical facilities, they have to go to Atmakur.
ix) the houses were constructed so badly that the chenchus constructed small thatched sheds outside the houses allotted to them. They said, they did not want to die, if these houses collapsed.
x) for village electrification, the department of irrigation requested the electricity board to electrify it as part of normal programme, while electricity department requested the irrigation department that Kottala Cheruvu may be electrified as part of project. No eletrification was done so far.

The result:

As no livelihood was ensured at Kottala Cheruvu, the chenchus decided to continue their occupation of collection and sale of minor forest produce, by goingback to Pedda Cheruvu. But, the wild-life sanctuary officials, who by then removed the huts and demolished the village refused the entry of the chenchus. Better sense prevailed when the Field Director, Tiger Project interfered and allowed some of the chenchus to stay in Pedda Cheruvu to work as fire protection force and others for collection of minor forest produce. But the chenchus are not allowed to construct their huts. So they were living under trees when the author saw them in March 1989. Subsequently they were allotted one more acre of land per family which also needs development.

The primitive chenchus, who were at pre-agricultural stage of economy before their rehabilitation from Pedda Cheruvu due to ill-executed rehabilitation project are now living under trees, a stage which they led perhaps, 1000 years ago.

New Dimension:

It was reported that Dalam leaders of Communist party of India (Marxist-Leninist) People War Group, encouraged the Chenchus to stay at Pedda Cheruvu only and promised to fight with Government if, chenchus are disturbed.

POLAVARAM BARRIAGE AND TRIBALS : A NOTE

K. Thimma Reddy. *

The proposed construction of Polavaram barriage on the Godavari river for irrigation in East Godavari and Visakhapatnam districts and water supply to the Visakhapatnam Steel Plant through Eleru reservoir will have tremondus effect on the tribal groups in the Godavari valley. The area of submergence stretches on either bank of Godavari from Polavaram to Kunta and also includes areas in the river systems of Sabari and Kinnerasani. The submergence area falls under 50 metre contour line.

A team of scholars from Anthropology, Archaeology, Geoengineering faculties of Andhra University and Deccan College, Poona carried out a survey of all the villages in the submergence area. The features taken up for study included traditional ethnics and cultural ecology besides Geology, Soiltypes, Bioclimate, Vegetation, Historical background, archaeological evidence etc.

The team identified about 120 very c mmon tree and plant species. They include a variety of edible plants, trees yielding minor forest produce and of commercial value.

Koyas, Koyadoras and Konda Reddis are the important tribal groups inhabiting this part of the Godavari valley. There are about 250 settlements with in the submergence area. These settlements are single tribe, multi tribe, multi caste settlements. Exclusive settlements of Koyas are about 57, Konda Reddi 22, Vada balija 2. Koyanayaka 1. Kondakammara 2. Koyadoras 3. Adi Andhra (SC) 4. There are also multi caste villages numberi about 22. These are mostly located around Bhadrachalam, Kunavaram etc. There are also tri al and multi caste villages. Mixed house holds of Koyas and multi caste number about 40, while Kon Reddis and multi caste are 10 in total. Besides these, two or three tribal groups inhabiting the same village are also found. We found in several villages a few households of other communities from the plains. They state that they are there temporarily as such they do not constitute the population of the village. Some settlements with a few tribal house holds constitute the remaining settlements.

The above account amply proves the predominence of Koyas, followed by Kondareddis in the submergence area, and intrusion of multi caste population into the tribal villages. The exclusive multi caste villages in the open country in the tribal area have certain roots since long, perhaps from late medieval or british period.

The traditional ethnics inhabiting this region; the Koyas, Kondareddis, Koyadoras etc. adopted to mountain ecosystem. Their settlements are located on either side of the Godavari, on alluvial flats, low hills and also at high altitudes.

Geo-ecological studies (inter-relationship between human and biological features of life zones) in Eurasia and other mountainous regions have shown a vertical pattern to environmental and human

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diversity in mountainous areas. In other words, the mountainous regions have different vertical zones of production and difference in productivity are reflected in the relationship between vertical zones and population density. The altitude, climate and soil fertility set upper limits on types of crops and pastoralism.

When we look at the Godavari valley from this angle we find that the Koyas, Koyadoras and Kondareddis inhabiting the environment of the Eastern ghats exploit various vertical life zones which offer distinct resources.

The alluvial flats and foot hill zones generally characterised by tropical black clays are suitable for plough cultivation. The tribals have been gradually adopting to this by cultivating the lands in the alluvial and colluvial flats on either side of the river systems. The middle and high altitudes, characterised by lithsols and tropical red ferruginous soils, are only suitable for shifting cultivation (Tribal traditional adaptation). They also offer a variety of big and small game, ave fauna, different kinds of wild plant foods and other forest produce of commercial value. We have also observed goat pastoralism and piggery besides fishing in the ponds, streams and rivers. Thus the tribal groups in the Godavari valley in general and submergence area in particular can be termed as agro-pastoral.

Their subsistence strategies also include hunting,and fishing. Kitchen gardens with beans, gourds, brinjal, chilli, yam etc. are a common sight in every village. Ragi, Bajra, Jowar, maize, rice, black gram, redgram, green gram, chilli, castor, tobacco, ground nut etc., are the principal crops grown by the tribals. But whereever the intruded multi caste house holds are found in the tribal villages, chilli, tobacco and cotton get preference and prominence. We have also noticed water being pumped from Godavari, in stages to even for off fields for growing cash crops like chilli and tobacco.

As to the land holdings and problem, the valley is no exception from the general phenomena of land alienation. Though we do not have an emperical data, a number cases of a tribal working as a labourer in his own farm are not uncommon. What is surprising is that this phenomena of tribal land being exploited by nontribals is taking place where the so called marxist, Leninist groups were active. We were also approached by tribals with strong appeal to restore their lands. Some of the intruders, the tribals say, could manage to get the certificates of ownership prior to 1917 with the connivance of the revenue officials.

The region figures in historical documents from 3rd century A.D.onwards. Haiyayas (Ca 610 A. D.), Chalukyas (Ca 920 A.D.), Chalukya-Cholas (Ca 1076 A.D.), Velanati Chodas (Ca 1120 A.D.) Kakatiyas (Ca 128-1323 A.D.), Reddies (1323-1450 A.D.), Gajapathis (Ca 1450-1513 A.D.) Rayas of Vijayanagara (Ca 1513-1565 A.D.), Qutubshahis of Golconda (Ca 1565-1670 A.D.) ruled the area before East India company took over and which finally came under the British rule.

What is intriguing is that the area remained in isolation inspite of several dynastic rules over a long period. This observation is based on two factors, one, the absence of worth mentioning monuments of architectural glory of any of the above dynasties and the socio economic conditions including food producing technology, of the tribals inhabiting the valley, being primitive.

The problems that emerge out of the above description are many. But two of them demand our attention. One relates to the displacement and rehabilitation of Koyas, Koyadoras, Kondareddis while the second relates to the payment of compensation for the lands. The first problem calls for understanding the adaptive strategies and traditional behaviour of the tribal groups inhabiting the valley. The tribals who are increasingly adapting plough agriculture and cultivation of cash crops are drawn into market economy. If once the displacement takes place they may prefer, as they are adapted to mountainous environment, to move into the middle altitude beyond the 50 mts. contour line, rather than into new areas. If such would be the case, enough alluvial region for plough cultivation will not be available. They may get back to shifting cultivation. This would be retrogressive step as they are now getting into the main stream of modern society.

Considerable amount of land is under the control of non-tribals. In the case of payment of compensation, can the government take care that it reaches the tribals and not the enterprising caste population from outside?

DISPLACEMENT OF SCHEDULED TRIBES DUE TO HEAVY WATER PROJECT IN KHAMMAM DISTRICT, ANDHRA PRADESH, A CASE STUDY.

C. CHENCHU RAJU, M.A. *

A good number of development projects have been taken up in the State to harness the natural resources like minerals, water and forest wealth for the benefit of community. The Projects which result in displacement of local inhabitants can be classified as Irrigation and Power, Industrial, Projects, Mining, Forest and Wild Life Sancturies etc., The development projects are mostly located in tribal areas which are endowed with rich raw material resources. The local inhabitants are displaced due to acquisition of agricultural lands or house sites, consequently their economic base and socio-cultural life is disrupted.

As a part of collection of data on Andhra pradesh Tribal Development Atlas, a case Study has been conducted on rehabilitation of displaced tribal families due to the construction of Heavy Water Projects, Manuguru in Khammam District.

A brief profile of Heavy Water Project and the findings of the study are presented in the following pages:

GENERAL:

Heavy Water (Deuterium Oxide - D20, molecular weight 20 as compared to 18 for light water) is a very important constituent of the Nuclear Power Generation system adopted by India.

Heavy Water is not radicactive. It has the same appearance as light water but is 10% heavier and has different physical properties but same chemical properties.

The source for heavy water production at the Manuguru Project is light water itself. This process has been developed indigenously at the Bhabha Atomic Research Centre, Trombay, Bombay.

LOCATION:

The Project Site falls in the coal belt of Andhra Pradesh and is located close to Godavari River in the Ammagaripalli and Kummarigudem villages of former Manuguru Taluk in Khammam District. The site is about 33 Kms. from Bhadrachalam and approximately 55 kms. from Bhadrachalam Road Railway Station. The site has been chosen due to abundant supply of water from Godavari River from which heavy water would be extracted and proximity to Singareni Collieries which would meet the requirement of coal to generate steam and power.

HOUSING COLONY FOR EMPLOYEES:

The Project has housing colony for the employees. This colony is located at Aswapuram village about 8 Kms. from Plant site by road with 1000 quarters of various categories and another 600 is planned.

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Master plan of the Colony provides dwelling units in different categories, in addition to public utility services such as hospital, schools, hostels, shopping centre complex etc.

MANPOWER REQUIREMENT:

Manpower requirement of the plant is finalised. Anticipated man power during operation and maintenance stage of the plant may be of the order of 1592 personnel including those of scientific, engineering, technical cadres etc.

COST OF PROJECT:

The total sanctioned financial out-lay of the plant including for housing colony is Rs. 650 crores (Approx).

STATUS:

The construction work was started on September, 1, 1982 and the project is expected to produce heavy water by middle of this year (1990).

Off-site and on-site Emergency Plan:

Exclusion zone of 1.5 Kms. radius is identified and human habitations are strictly prohibited. Sterilised zone is identified within 1.5 kms. to 5.0 kms. radius from plant where the inmigration is checked by the State Govt. The emergency planning zone is also identified within 16 kms. radius from the plant and it is declared as civil defence Town. In the event of any gas leak inhabitants of this zone would be evacuated.

LAND ACQUISITION:

It was reported that 2800 acres was acquired for this Project. Of this 500.05 acres is private land, 1515 acres of Revenue Department land and 785 acres Forest land were acquired from 5 scheduled villages namely, Aswapuram, Amerda, Ammagaripalli, Kummarigudem of Aswapuram Mandal and Samthsingaram of Manuguru Mandal and their hamlets - Jaggaram, Mittagudem, Tokugudem, Korsam-varigudem (Laxmipuram) for the establishment of Heavy Water Plant, Residential colony for staff members, Aerial Ropeway, Exclusion Zone. The land acquisition work commenced in 1983. An amount of Rs. 38 lakhs was paid by the project as compensation. Another Rs.7 lakhs was paid due to enhancement of valuation of land as compensation of Supreme Court/High Court orders. In these 5 villages, the total agricultural land is reported to be 3776.50 acres, of which 2558.75 belongs to Tribal (67.76%). For Heavy Water Plant, the agricultural land measuring 500.05 acres has been acquired. Of this 329.36 acres belongs to scheduled tribes (65.76%). Thus it is evident that a large chunk of tribal land was acquired for Heavy Water Project Purpose. It was also reported that in all 328 (Tribal and Non-Tribal) families have been affected. Out of which 122 are tribals (37%), 32 S.Cs and 174 are others. The agricultural land of Sch. Tribes measuring 284.87 acres was acquired for plant purpose, 4.95 acres for Aerial Ropeway, 8.12 acres for exclusion zone and 31.92 acres for Residential colony construction purpose.

House-holds and Land particulars:

There are 3125 households in these 5 villages of which 328 have been affected constituting 10.40%. Totally there are 888 S.T. households, out of which 122 have been affected due to land acquisition, constituting 13.73 to the total/ST house holds. The tribals who are displaced due to Land acquisition belong to Koya and Banjara Communities. The displaced Tribal families are classified into three categories - 1. Permanant Patta land holders. 2. 'D'form Patta land holders, 3. Un-authorised occupants of Govt/land. The Department of Atomic Energy have deposited compensation amount with the District Collector, Khammam, for payment to the landlosers after due verification and enquiry.

Compensation:

The Special Tashsildar was appointed for land Acquisition and passing awards to the landlosers. As per the land Acquisition (Amendment) Act, 1984 the salatium at the rate of 30% under section 23(2), 12% additional market value under Section 23 (A) and interest at the rate of 9% under Section 34 for the first year and there after @ 15% has to be paid for the land ceasing. It is informed that all the patta holders among tribals have been paid compensation. The compensation is not paid to the tribals who have been occupying Govt. lands unauthorisedly as they are not yet taken any final decision on payment of compensation to this category of tribal households. Payment of compensation was continued upto 1988 still some are pending in Kothagudem sub Court for payment of compensation.

EMPLOYMENT POTENTIAL:

The Heavy Water Plant management has identified employment opportunities in different trades and skills at the tag end of 1985 and it was estimated that there would be 206 vacancies for direct recruitment in different skills and trades. A good number of vacancies are in Millright Operation, Maintenance, Instrument and Communication, Fireman, Nurses, Auxiliary Nurses, Ward Boys, Ayas, Boiler Operaters etc., While in other trades/Job only limited number of vacancies are estimated.

Besides these above noted jobs, the Heavy Water Project has also identified skills and technical trades (18) in which training could be imparted to the candidates from among the landloser families.

Further it was indicated that it would be possible to take some candidates with M.Sc., B.Sc., I.T.I. certificates qualifications, while a majority of the candidates from landlosers families are illiterates. In view of this position, it was expected to provide employment to the illiterates in Horticulture and Afforestation work to be taken up in and around the plant area to provide green belt as required. The possibility of undertaking this afforestation work by forest department and to lease out this work to a co-operative of the landlosers families was also contemplated. It was also contemplated to take up this work of horticulture /afforestation departmentally and get the work done by way of engaging the members of the landlosers to overcome the problem of employment to the uneducated, members of the landlosers families. For the literates among the landloser families it was proposed to provide employment by organising necessary training. In case of persons with prematric qualifications, it was proposed to absorb them as helpers in the technical sections. And in case of Matriculates it was planned to take them as Clerks or Operators by imparting them necessary training. In view of this, the pro-

management has collected 230 applications from landloser family members and breakup of applicants with reference to their general educational qualifications and vocational training is furnished herewith. This includes S.T., S.C., B.C. and O.C.candidates.

Graduates (Science/Commerce)	18
Intermediate pass	15
I.T.I.	16
Matric/SSC pass	31
Below matric/X class	28
Below V class	122
Total :	230

With regard to S.T. families there are only 46 candidates with literacy level. Of the 46 members, 2 have passed SSC 16 have studied literacy level of 5th to X Class while 28 below 5th class.

EMPLOYMENT PROVIDED IN THE PROJECT:

The Heavy Water Project Management has notified trainees recruitment programme in category-I for 80 posts and in category - II for 200 posts. For category - I, the minimum qualifications is B.Sc. with Maths, Physics and Chemistry or Electronics with 55% aggregate marks or Diploma holders in Chemical/Mechanical/Electrical/Instrumentation/Electronic Engineer. For Category-II, the minimum qualification is H.S.C., or S.S.C. with 50% agregate marks in Maths, Physics and Chemistry besides I.T.I., certificate in Fitter trade, Electrical, Process instrumentation of electronic trade with 2 years duration training or in case of less than 2 years training, one should have one year experience in the field after completion of the course. Certain physical standards are also prescribed for the job. Though the trainee recruitment programme was notified none of the local tribals in general particualarly from landloser families could fit into this job requirement due to their poor educational qualification, physical conditions and under nutrition.

As a part of the rehabilitation measures the management is trying to provide jobs to the family members of the land losers, i.e. at the rate of one from each family. It is informed by the management that out of 122 S.T. land lose families only 72 have approached the personnel department and registered for jobs and the other 50 have not approached the management for jobs. In case of S.Cs. all the 32 have registered for employment In case of O.Cs. 148 have registered out of 174 landloser families. The management have provided jobs for 14 ST candidates and they are working as helpers in A and B categories and other 32 are likely to get jobs shortly. This leaves a balance of 26 of this 22 are found to be ineligible candidates as they are not dependants and members of the land losers families. They are ineligible in light of the guidelines issued by the District Collector. The family has been defined as husband & wife and dependant children. The management has been advised by the Dist. Collector to verify the eligibility of the members of land loser families seeking employment in Heavy Water Project. It is informed by the management that all 22 persons are not authorised nominees of land loser families. This leaves a balance of 4 among the S.Ts. and they are illiterate who are waiting in the list for a suitable

job. With regard to SCs 3 out of 32 have been provided jobs and another 21 will be provided jobs shortly and the balance 8 are in the waiting list. Regarding the other communities 36 out of 148 are given jobs and another 56 will be given jobs shortly and 30 are in the waiting lists. The management have rejected 27 cases of OC as they are not authorised nominees.

It is informed by the management that the recruitment is localised only for certain categories like group 'C'(Technical, Administration Auxiliary) and group D (helpers A and B) and for other posts which are of purely scientific and higher level posts with experience is being done on all India basis. Scientific posts are filled by drawing personnel from Baba Atomic Research Centre Training School and this category is exempted from rule of reservation for SC/ST as per Govt. orders of Personnel and Administration Reforms. For Dept of Purchase and Stores appointments are made by the Directorate of Purchase and Stores Central complex Bombay. The Security Personnel are recruited and trained at Regional level and posted to various Govt. under takings by CISF. It is estimated that the total manpower for Heavy Water Plant would be to the order of 1592. Of this only 834 are earmarked for local and All India basis recruitments as on 30.12.89. This is provisional estimate.

Further it is informed that about 200 posts of helpers category are likely to be allocated for local recruitment and the balance 558 posts are to be covered under conditions mentioned above.

The details of Sch. Tribes employed in Heavy Water Project as on 30.12.89 are as follows. This includes local recruitment and rehabilitated S.Ts. from among land loser families as mentioned below:-

Sl. No.	Category	Total No. of Posts	No. of posts Reserved for S.Ts.	No. in Possession by STs	Number Vacant
1.	Technical	710	51	16	38
2.	Non-Technical				
	a) Administration:	40	5	1	4
	b) Auxilary	84	6	17	–
		834	62	34	42

It can be seen from the above statement that 62 Posts have been reserved in favour of S.Ts., of which 34 S.Ts. have been recruited and 42 posts are remaining vacant for want of qualified candidates among S.Ts. It is informed by the management, that out of 34 appointments made from S.Ts. 14 are from the displaced S.T. families. The total number of posts in column No.5 and 6 makes 76 while the statutory reservation posts is 62. This means the excess number i.e. 14 is due to recruitment of S.Ts. from land losers S.T.families. This indicates the fact that only 20 S.Ts. have been recruited against reserved posts in favour of S Ts. under reservation policy.

Apart from this the Heavy Water project has employed 24 S.Ts. as casual labourers in the project work Apart from this 28 S.Ts. are also working on daily wage basis under Subcontractors. At present there is no recruitment due to ban imposed by the Government.

As mentioned above now there are 42 posts remaining vacant want of qualified candidates from S.Ts. The details are as follows:

Sl.No.	Category:	No.of posts.
1.	Scientific Assistant 'C'	5
2.	Scientific Assistant 'B'	8
3.	Scientific Assistant 'A'	7
4.	Tradesman 'D'	1
5.	Tradesman 'C'	1
6.	Tradesman 'B'	14
7.	Tradesman 'A'	1
8.	Nurse	1
9.	U.D.C.	2
10.	Junior Stenographer	1
11.	L.D.C.	1
		42 *

It is informed by the management that there is poor response for employment notification from S.T. candidates Some candidates are not possessing minimum general educational Technical qualifications and experience, physical standards. It is also informed that many candidates are suffering from colour blindness, wearing of mask is necessary in many sections. Candidates with sight problem has to wear glasses and such candidates can not put on masks. Due to this problem Tribal candidates are dis-qualified. Colour Blindness is due to malnutrition.

Though it was programmed to identify the educated tribal candidates among landlosers and impart them necessary training and provide employment in the Heavy Water Project. It is observed in spite of many meetings, discussions and correspondence between the Dist. Collector and Project Officer, I.T.D.A. and Heavy Water Project Management, no training programme was evolved and organised for the benefit of educated tribals among landlosors for their absorption in the project employment. In this connection, the Heavy Water Project Management also made a reference to the Chief Secretary to Govt. of Andhra Pradesh and Director of Employment and Training, A.P., Hyderabad with a request to explore the possibilities of organising training programme for the dependants of landloser families to whom the project management has an obligation to provide employment at least one person per family. Skills and trades requirements were also identified and intimated to employment and training department. As on to-day nothing seems to have been materialised except sponsoring tribal candidates for training in I.T.I. in July 1986.

* For qualifications and experience vide Annexure -I.

A case study was conducted for assessing the rehabilitation measures taken for displaced tribals on account of establishment of Heavy Water Plant. On a random sample basis, data was collected from 27 displaced tribal families The samples have been drawn from 3 villages 1, Jaggaram H/o. Aswapuram 2. Chandralaboru H/o. Amerda 3. Mittagudem H/o. Ammagaripalli and Ammagaripalli villages. The salient features of the sample survey are given here under:-

Sl. No.	Name of the village	No. of families		Extent of Land owned (acres)		Extent of land acquired from STs (in acres)
		S.T.	Others	S.T.	Others	
1.	Aswapuram	283	926	872	1341	40.32
2.	Ammagaripalle	148	295	262	756	173.67
3.	Amerda	123	96	647	353	53.42
	Total:	554	1317	1781	2450	267.41

It is seen from the above statement that there are 1871 total families, of which 554 are ST families and remaining 1317 families are others. The total land of these 3 villages is 4231 acres of which 1781 acres belongs to ST families and 2450 acres belong to others. It is also seen that 267.41 acres has been acquired from these 3 villages from tribals.

ASWAPURAM:

Aswapuram is Mandal Headquarters and it is located on road side, enroute to Manuguru. The total geographical area of the village is 31.98 sq.Kms. and there are 1209 house holds with total population of 6067, of which 3046 are males and 3021 are females. The S.T. population is 1411 (23.25%). The estimated number of the S.T. households are 283. Of the total population 505 are scheduled castes (3.32%). The literacy percentage/population is 16.04.

Prior to the acquisition of land by the project 52 males and 46 females were employed in agriculture as main occupation and 8 females and 22 females were engaged in Agricultural labour and one male was engaged in economically productive activities. After land acquisition the employment pattern has recorded significant change indicating that 52 are engaged in Agriculture and 71 are engaged in Agricultural labour and the rest are engaged in other occupations. Out of the total agriculturists, 27 are males and 25 are females. It is reported that 2 members are in private employment, while 2 members are engaged in cattle- grazing. The employment pattern indicate that there is change in the employment source, two male members have secured job in private small scale industrial Units and another three are engaged on daily wages in Heavy Water Plant. Number of persons depending on Agricultural sector has decreased from 128 to 123. The increase in number of persons employed after land acquisition is very marginal and negligible.

With regard to operational land holdings, 8 households have less than 2.50 acres, 8 households have holdings ranging from 2.50 to 5.00 acres size. The total extent of land holdings possessed by the sample household tribals is 142.93 acres. Of the 27 households, 11 tribal households have permanent pattas (40.7%) another 11 have 'D' form patta (40.7%) (Assignment pattas) while the rest 5 have occupied

Government land. Regarding the agricultural land, it is reported that 95.31 acres of land has been acquired for the project from the sample households. Of the 95.31 acres acquired from tribals for the project purpose, patta land works out to 28.33 acres (29.72%) and D form patta works out while Govt. Land 35.90 acres (37.60%) is 30.71 acres (32.62%). The above analysis indicates that out of total land possessed by tribals. 66.68% of agricultural land has been acquired for the project purpose leaving only 33.32% at the disposal of the tribals for cultivation. This shows that tribals have been deprived of major portion of agricultural land leaving only a meagre extent of agricultural land for cultivation. The acquisition resulted in disturbanc of means of substance. It was also infomed that 20 out of 27 households have been paid compensation and remaining are treated as unauthorised occupants of Government land as such are not paid compensation. In case of two tribals, ownership is disputed as such the compensation is not yet paid and the case is referred to sub-court, Kothagudem, for award.

INCOME:

With regard to annual income before displacement, it was reported that they were getting mainly from Agricultural sector i.e. farm produce and supplementary income from Agricultural labour and petty business. Their main occupation is Agriculture and secondary occupation is Agricultural labour and petty trade. The average annual income of the sample household was Rs. 5,781.50. While the average income per household after the displacement was reported to be Rs. 4,827.80. This indicates that there was considerable drop (16.5%) in the average annual income per household. Further the income from agriculture was reduced and many of them now have to be depended on daily wages agricultural and non-agricultural causual labour. It is evident from the data that prior to displacement, the annual income from labour was Rs. 1,644.45 per household, while the income from agricultural labour after displacement has recorded increase i.e Rs. 2,872.23 (74.66%) indicating the increased dependence on daily wages. This is an adverse affect of displacement. The very subsistance economy was through out of gear.

Compensation:

With regard to compensation, it is seen from the data that Rs. 7,900 is paid per acre in case of wet land (paddy) and Rs. 3,650/- per acre in case of rainfed dry land (paddy) and Rs. 2,600\- per acre in case of other dry land. With regard to time lag between the date of land acquisition and date of compensation payments in 4 cases the time lag was reported to be one year. In one case the time lag was one year and three months. In 10 cases, the time lag was 3 years and in five cases the time lag was 5 years. In other seven cases the compeensation is not yet paid the ownership is disputed. The delay is attributed to administrative procedures and in 9 cases the compensation was referred to sub court at Kothagudem for award. When asked about the edequacy of compensation that 18 tribals are of the opinion that they were not compensated adequately. The land value was not assessed according to market rate, while 2 tribals agreed with compensation rate.

COMPENSATION UTILISATION PATTERN:

With regard to liabilities, it was reported that 6 tribals have borrowed Rs. 19,600\- from Banks before acquisition of land while 2 tribals have borrowed Rs. 11,000/- from Banks after land acquisition.

As against this Rs. 10,000\- have been repaid to Banks. It is informed that 5 tribals have borrowed from private sources before acquisition of land and one has borrowed Rs. 600\- from private sources after land acquisition. As against this, Rs. 39,500/- was repaid to private money lenders. None of them except two have purchased land with the compensation money. The informants were also asked about utilisation pattern of compensation. It was informed that 11 tribals have used this compensation amount to meet their household expenditure, 5 tribals have cleared their liabilities. 2 tribals have purchasd land and another 2 have deposited in banks. Majority of the tribals have spent away the compensation for household expenditure, no asset has been acquired. This has distrupted their economy and means of substance. Ne rehabilitation measures worth the same is implemented by the Government or the Department of Atomic Energy for the displaced tribals in particular and for the other communities in general.

CONCLUSIONS:

Consequent on establishment of Heavy Water Plant as many as 328 households have lost their agricultural lands measuring 500.05 acres. Of 328 families, 122 are scheduled tribes and most of them are Koyas. Tribals land measuring 329.86 acreas has been acquired for Heavy Water Project. The land has been acquired from Aswapuram, Ammegaripalli, Kummarigudem, Amerda and Samathsingaram and their hamlets for plant, Acrial Ropeway, Exclusion Zone and staff quarters. The land was acquired in the year 1983. The tribals have lost a major portion of their agricultural land and are left with a meagre resource of agricultural land.

With the acquisition of agricultural land, they have lost their main economic base and their employment pattern has also been affected. Many of them have to depend on daily wages, the affected S.Ts. have become marginal and submarginal workers.

Literacy Level is very low and a large number of members of the land losers have no education and could not fit in to the job requi-rements of the Project, Consequently the tribals are working as daily wage earners with the sub contractors who are executing the construction and installation work.

The heavy water project could provide direct employment and monthly salaries jobs on a limited scale for want of qualified personnel. Even on daily wages, only a small number of tribals i.e. 28 are working with the sub-contractors as manual labourers. Another 24 STs are working on daily wages with Heavy Water Project. The wages are paid by Heavy Water Project to those 24 S.Ts.

Heeavy Water Project has identified a good number of technical jobs trades and estimated the number of vacancies in each trade job. Through training programme in trades and skills for educated tribals among landlosers families was organised exceept sending four S.T. candidates for training at I.T.I., Kothagudem. Even for illiterate tribals from landlosers families, it was contemplated to provide them employment in Horticulture and Aforestation in the proposed green belt in and around the places. Even this is not materialised. As a policy matter, the tribal have to be given preference in employment, but that it is not-implemented on the protext that most of the tribals are illiterates.

Among SCs, only 3 areS appointed and other 21 are going to be appointed shortly. Regarding O.C 35 have been appointed and 56 are going to be appointed shortly. The Project management is obliged to take atleast one member from each affected S.T. households. If this was implemented as many as 122 ..oals would have got the job. As against this 122, only 14 are employed on regular basis and another 32 are going to be appointed shortly. Among 122 S.T. land looser families, 50 have not approached the management for jobs for reasons not known. The management has also not initiated comprehensive rehablitation measures for the affected families. On the otherhand it has shifted the responsibility to the Revenue Administration. The revenue Dept. has identified the land-loser families and paid compensation and did not go beyond this measure. One more disturbing feature is that the tribals who have been *cultivating Govt. lands have been evicted without any compensation, while compensation was paid* only for permanent patta holders and assignment patta holders. The compensation paid to the tribals has been mostly spent on household expenditure. None of the tribals have purchased land with the compensation amount paid to them except in two cases, while in few cases, the compensation amount was used for clearing their liabilities.

With regard to annual income per household, it is noticed that there was a considerable drop and many of them are totally depending on daily wages. The affected villages are not provided with minimum facilities like protected drinking water, health, services, education facilities and approach road, etc., on the other hand the management is providing all these facilities in the residential complex of the Heavy Water Project. There is no information on the measures taken to save the tribals from the environmental pollution.

A review of the location and construction of developmental project brings out the fact that tribals are the main victims of the industrial activities while the benefits of these developmental projects mostly flowed to the non tribal community. Most of the direct and indirect benefits are reaped by advanced communities. The pull and push factors are affecting the local tribal communities. The tribal with no or poor skill and illiteracy and not able to participate in economic activities of the project/operations of the project area while the advanced communities are in a better position to derive benefit from direct and indirect inpact on account of their better literacy and technical education/professional training etc. The *nature of activities are attracting outsiders to the project areas.* This adds to the push factors and results in displacement of tribals besides losing lands, house sites and means of livelihood etc.

SUGGESTIONS:

Rehabilitation of displaced families should be made obligatory on the part of the Department or Management. This should form an integral part of the main project implementation schedule.

All able bodied members of displaced families should be provided employment and if necessary be given training to the willing persons for their absorption in future vacancies in the project. Suitable

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This paper is prepared on data collected in connection with Tribal Development Atlas A.P. in the year 1987-88. Data has been updated.

training arrangement has to be made and the identified persons have to be sent for Training to the existing institutions in the vicinity. Atleast one member from each landloser family whould be provided employment in the project. A certain peercentage of jobs should be reserved in favour of members of displaced S.T. families in addition to the statutory reservation policy. To this effect, Governmeent and the Management/Dept. should enter into an agreement. Rehabilitation either at group or community level should be a rule in case of displaced Tribal families. These measures should include provision of house sites or construction of houses at concessional rates or provision of cencessional loan for house building and other community facilities like provision of education, power, health, roads, drinking water, recreation etc. The landless tribals should be adequately taken care of the rehabilitation measures. The payment of compensation in cash should be avoided as far as possible to prevent its misuse or wasteful expenditure and compensation also should be adequate and timely. The displaced persons should be ensured of adequate compensation in kind. The tribal Welfare Department should be represented in recruitment committee to ensure justice to the local tribals in general and particularly to the land loser families.

A training programme can be organised immediately for the literate tribal among the land losers in respect of trades like Millright operator. Maintenance, Fitter, Welfare, instrumentation and communication, Fireman, Nursing (Male and Female) Ward Boys and Ayas, Boilar operator etc. as there are vacancies in Heavy Water Project. The members of land loser families and other tribals can be sent to Training or orientation to the Horticulture Training Centre at Garimella padu near Kothagudem, managed by I.T.D.A. Paloncha, so that they can deployed in Horticulture and aforestation schemes of the Heavy Water Project. For the trade and diploma course the candidates can be deputed to local I.T.I. Krishnasagar or Kothagudem and G.M.R, Polytechnic, Bhadrachalam and Government Polytechnic at Kothagudem.

ANNEXURE - I.

Sl. No.	Category:		General & Technical qualifications, Training and Experience Prescribed for each category of job.
1.	Scientific Assistant	'C'	Diploma in Electrical Mech, Chemical Tech. Electronics etc.
2.	Scientific Assistant	'B'	—do—
3.	Scientific Asistant	'A'	B,Sc. (MPC.)
4.	Tradesman	'B'	(a) SSC appeared + 2 years ITI certificate in Mech. Elec. Instt. Operations Civil (b) 8 years experience.
5.	Tradesman	'C'	SSC appeared + 4 yrs, Experience.
6.	Tradesman	'B'	a) SSC appeared + 4 years OR b) SSC passed with 1yr. trade Certificate OR c) Intermediate.
7.	Tadesman	'A'	a) appeared for SSC and 2 years experience in the trade OR b) SSC passed or c) SSC appeared + 1yr trade certificate.
8.	Nurse	Regd 'A'	Grade nurse and MID wife.
9.	Upper Division Clerk		Degree with 50% marks + knowledge of type writing.
10.	Jr. Steno-grapher		Matriculation, Type-writing and short hand 30W.P.m. & 80 W.P.m. respectively
11.	Lower Division Clerk		SSC with 50% marks with typewriting speed of 30 W.P.m.

Rehabilitation of Shifting Cultivators Insitu: A Scientific Frame.

Dr. A. Somasekhar

The primary objective of development is not only to meet the essential needs of vast multitude of people in India but also create legitimate aspirations for improved standards of living on sustained basis. Sustainable development is development which meets the needs of the people without unduly disturbing the ecology. In order to promote sustainability of development which is intimately linked to the dynamics of population and growth, the Government must define the environmental goals and development objectives and establish clear priorities among competing demands on their scarce resources. Inspite of limited land, water and other rsources, a country like Japan achieved economic miracles through integrated economic planning and collective efforts between the Govt. and industry. Economic development is a complex process. Human progress is always depended on our technical ingenuity and capacity for cooperative action. Environment and deevelopment are not separate challenges and they are inexorably linked. The new era of economic growth should be more forceful and at the same time socially and environmentally compatable. The sustained development (Modernisation being a part of the same) and better environmental management depends upon the people who have the right perception and awareness. There is every possibility for people who have the right perception and awareness to influence the policies and implementation stategies which could lead to sustained development.

In Indian context, it is necessary to understand H.MYINTS distinction between backwardeness and under development. Backwardness implies backward people ridden with social and religious dogmas and this is the greatest obstacle in the way of economic development in India and need deliberate policies to change these. They arrest our onward march of development. Hence it becomes necessary to adopt short term action oriented measures for the upliftment of the unprivileged class of our economy which very much includes the emancipation of tribal population in India. Tribals need to be integrated in Indian Society.

Scheduled tribe population is spread all over the country. India has the largest concentration of tribal population next only to Africa. According to 1981 Census the numerical strength of schedule tribe population in the country is 5,16,28,638 constituting 7.89% of the total population. They are divided into numerous groups and subgroups and speak a variety of languages. The tribals constitute a small but an important element in Indian population and belong to varying and different stages of development with a distinct style of life and cultural ethoes. They stand out in sharp contrast to the general village population of the country with significant differences among the tribals themselves. Different tribal groups represent different levels of techno-economic development, social organisations and there are wide variations in their customs and institutions. They suffer from various forms of economic exploitation, social discrimination and political isolation. Tribal people in India by and large are living under the conditions of object poverty and they form the majority of people living below the poverty line.

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The tribal economy is essentially a primitive economy. The majority of tribal population is engaged in agriculture and practise shifting cultivation. The tribal agriculture is the primary source of livelihood and it is at the lowest type of subsistance forming. Settled cultivation is more an exception than a rule.

In Andhra Pradesh, there are 33 tribal communities with a population of 31.76 lakhs constituting 5.93% to the total population of the State. Out of 33 tribal groups 30 are found living in scheduled areas in the districts of Srikakulam Vijayanagaram, Visakhapatnam, East Godavari, West Godavari, Khammam, Warangal, Adilabad and Mahaboobnagar. In the Scheduled Areas, the tribal groups have been practising shifting cultivation. The extent of shifting cultivation in the scheduled areas of the state is estimated at 62.948 Hect. It is more in the hilly and forest region of Srikakulam, Vijayanagaram, Viskhapatnam and East Godavari. In these four Northern Coastal districts of Andhra Pradesh, all the tribal groups subsist on agricultural activity and most of them depend on podu cultivation. Wet, Dry and Podu cultivation are the chief sources of income under agriculture.

Magnitude of Podu:-

Podu is prevalent in the hilly areas of Srikakulam, Vijayanagaram, Visakhapatnam and East Godavari districts. *The magnitude of podu in terms of villages and families is furnished here under* *1 (1988)

Sl. No.	District I.T.D.A.	Total No. of Villages	Podu Villages	No.of Podu families	Extent of Podu (Hectares)	Average Podu holding per family (Hectres)
1.	Srikakulam Seethampet	347	86	9051	5282	0.58
2.	Vijayanagaram Parvathipuram	431	266	8696	7396	0.85
3.	Visakhapatnam Paderu	3454	1816	25383	21529	0.85
4.	East Godavari Rampachodavaram	599	204	6871	7252	1.06
		4831	2372	50001	41459	0.83

The identified Podu village constitute 49% to the total villages of the four ITDAs. The magnitude of podu problem varies from one ITDA to another ITDA. Paderu ranks first in the extent of podu land followed by Parvathipuram, Rampachodavaram and Seethampet. The average size of Podu holding is 0.83 hectares and it varies from 0.58 hectares to 1.06 hectares per family.

*1. Source:- Survey conducted by ITDAs & Regional Centre, T.C.R.&T.I., Paderu.

The distribution of Podu land in hilly areas of these four ITDAs is as follows:*2.

Sl.No.	ITDA	Extent of Podu			Total
		Hill Top	Slopes	Foothills	(Hectares)
1.	Seethampet	—	4901	381	5282
2.	Parvathipuram	—	7396	—	7396
3.	Paderu	6632	7080	7817	21529
4.	Rampachodavaram	769	6140	343	7252
	Total	7401	25517	8541	414 59

The podu area in hill slopes constitutes 61.5% to the total identified podu area. The percentage of Podu area under foot hills is 20.6.

Podu Tribal Groups:-

Among the 33 tribal Groups, 30 communities are inhabiting hilly areas of the State, of which 23 tribal communities are found in four ITDA areas. The principal tribes inhabiting the identified podu areas are Bhagatas, Khonds, Gadabas, Vilmikis, Porjas, Konda Doras, Kotias, Koyas, Konda Reddies, Nooka Doras, Savaras and Jatapus. The tribal groups have a rich heritage of customs, folklore and folk cultures. The society of shifting cultivators is characterised by isolation and hence the economic features develop around its regional self-sufficiency. The unit of production is the family which tries to produce much of its own goods. The main characteristics of hilly tribal groups are:

a) Closeness of the people to natural environment.

b) Primitive Technologies -sustenance oriented.

c) Predominance of Podu as against settled agriculture.

d) Conservatism as against inventiveness

e) simple and happy life as against complicated and worried existance.

Many tribal groups of Northern coastal Districts were traditionally Podu cultivators. In the Districts of Srikakulam, Vizianagaram, Visakhapatnam, East & West Godavari, slash and burn cultivation is still the main method of tillage for a good number of tribal communities basides plough cultivation since most of them possess Dry and Wet lands. Konda Reddis of East Godavari, West Godavari and Khammam districts mainly depend on Podu cultivation. The hilly areas of Seethampet in Srikakulam district, Gummalakshmipuram of Vijayanagaram District are covered with Podu patches, savaras and Jatapus of these two districts are depending on Podu cultivation. Savara villages are also located in the high hills

* 2 Source:- Survey conducted by ITDAs & Regional Centre, TCR & TI, Paderu.

where scope for plough cultivation is very much limited. Savaras are famous for terrace cultivation besides slash and burn cultivation. Khonda of Visakhapatnam district are noted for Podu cultivation, though the other tribal groups are also engaged.

The Survey conducted by the Regional Centre, TCR & TI., Paderu (Visakhapatnam District) in 12 selected Podu villages of Srikakulam, Vijayanagaram, Visakhapatnam and East Godavari districts revealed that the Podu cultivation essentially provides the bare requirements of tribals for survival. Over the ages, Podu has become an inalienable part of their life and culture with a number of ceremonies built around it. The main emphasis in Podu cultivation is on food crops. The study further revealed that the cycle of shifting is reduced to a greater extent and it is determined by locally prevailing agro-climatic conditions, growth of population and restrictions imposed by Government. The tribal is confined to a limited number of podu patches in which he is shifting from one patch to another in the case of sample villages of Srikakulam, Vijayanagaram, and Visakhapatnam districts. Konds Reddis of East Godavari district are still going for fresh Podu as the restrictions imposed by Forest Department are not rigorously applied.

Rationale:-

It is a fact that the practice of shifting cultivations has led to rapid soil erosion and land degradation resulting in bedrock exposure in some instances. The shifting cultivation in extensive areas resulted in damage to the soil and forest wealth disturbing the ecological balance. The soils gradually become infertile and unfit for cultivation of crops in these areas. With the increase in size of Podu family and size of Podu village coupled with the restrictions imposed by forest Department the pressure on Podu land is increased. Ultimately this particular phenomenon has a stifling effect on the tribal community as a whole, thus making it a weak link in the main stream of national development process. Verrier Elwin, while discussing the problem of shifting cultivation, emphasizes that the important thing is to develop shifting cultivation on scientific lines which will limit its disadvantages and promote the fertility of the soil.

Past and Present Efforts:-

In the tribal areas of Andhra Pradesh sporadic efforts have been made to wean away the tribals from undesirable pratices associated with Podu. During Third Five Year Plan, pilot demonstration project in Machkhund Basin Area was introduced. Anti Podu committees were constituted in ITDA areas during V Five Year Plan period. However the efforts made in this direction did not provide us good results. A programme of Action has been drawn up for rehabilitation of shifting cultivators and it is under implementation during VII Five Year Plan. Horticulture and Social Forestry are taken up and each family is provided with one hectare of land as owner participant besides subsistance allowance during the lean months. During the period 1985-86 to 1987-88, Podu rehabilitation programmes have been taken up in four ITDAs covering an area of 11,480 hectares (Seethampeta-3572, Parvathipuram-1206, Paderu 4525, Rampachodavaram, 2177) and the species like Mango, Cashew, citrus, coffee etc., have been raised. Necessary measures like identity card, payment through Banks, periodical inspection etc., have been taken up for successfull implementation of the scheme.

An appraisal study Regional centre, T.C.R & TI. Paderu, Visakhapatnam Dist, A.P.(1988) on social forestry and horticultural programmes of Paderu ITDA area of Visakhapatnam district revealed that:

a) Survival rates of plantation on physical verification is only 53.5% as against recorded 77% in the selected 10 villages.

b) Plant material is not being supplied in time.

c) Irregular payment of subsistance allowance to beneficiaries.

d) Identify Cards, though distributed, are not maintained properly.

e) Lack of effective monitoring.

The present measures of rehabilitation of Podu cultivators are not effective and require a scientific approach by solving the following specific problems.

a) Village and forest boundaries:- It is essential to decide the village and forest boundaries by joint identification team. In the present Mandal setup, the extent of reserved forest area should be known to protect forest wealth and to under take afforestation.

b) Encroachments in forest area:- Some of the forest officials opine that there is no shifting cultivation except encroachments. In the interests of tribals, the encroachments are to be regularised.

c) Confirment of Pattas:- Most of the Podu cultivators are not having ownership rights on Podu lands. D-Form pattas should be issued in the name of tribals.

d) Practice of Podu on hill slopes above 10°. It is observed that Podu cultivation is undertaken on hill slopes of above 10° for survival. 'D' form pattas are to be assigned to tribals by relaxing the rules.

e) Records of rights:- Tribals who have been cultivating the Podu and valley lands deserve legal rights. It is essential to establish record of rights in hilly/scheduled areas.

Need for a Scientific Approach:-

The scientific approach for rehabilitation of Shifting cultivators involves optimum utilisation of the human and natural recources in Podu areas by ensuring community participation. The watershed development approach has to be dovetailed with Integrated Tribal Development Approach. Planning Commission recognised the need for integrated development on a watershed basis.

Watersheds in hilly tribal areas are to be identified on the basis of Area stratification through Grid method. Watershed may be defined as an area linked to the flow of water through the basin to the plains lending itself to plan for soil conservation, water harvesting and harnessing and land use, during the process of which the development unit can be delienated into Micro and Mini water shed. Water sheds and its sub-water sheds are to be identified from Ridge to valley-Highest point from the water drains to the valley point wherein the entire run off goes to a river. Water shed-wise planning(BMS) involves:

i) Identification of Hills and Hillocks

ii) Land use-village wise area, forest Areas, protected and unprotected forests.

iii) Soil Survey-classification and delienation of soil into arable and non-arable lands.

iv) Survey, number-wise & Beneficiary-wise crop survey (to be determined) based on needs and land holding capability in each village (Kharif & Rabi).

v) Village-wise soil conservation survey depending upon the necessity of the fields (Treatment measures).

vi) *Demarcation of areas for afforestation, Agriculture, Horticulture, pisciculture, fooder grass* etc.,

vii) Action Plans (village-wise) are to be prepared by

a) Agriculture/Soil conservation, b) Forests, c) Animal husbandry, d) Horticulture, e) Irrigation Departments and these are to be integrated.

Master Plan for each watershed has to be prepared with:

i) Information on basic resources - Soil, Water, Plant, Animal etc.,

ii) Information on economic status of farmers.

There is need to initiate 'Operational Research Project' for integated watershed development consisting of inter-disciplinary team of Scientists and Extension functionaries with the following functions:

i) Preparation and implementation of Action Plans

ii) Developing an optimum scientific land and water use plan.

iii) Identification of priority water sheds and introduction of ecologically sound and Socio-economically compatible technologies.

iv) Identification of areas needing priority treatment.

v) Identification of packages of treatment measures depending upon slope, soil, rainfall etc.,

vi) *Evolving a pattern for integration of line departments at watershed level (Single line of* administration).

vii) Ensuring adequate return of food, fodder, firewood etc.,

viii) Improving of Logistic support and thereby economic conditions of people at a higher level.

ix) Ensuring peoples participation through a built in Social Fencing Model.

The inter-disciplinary Team has to be vested with adquate financial and administrative powers for effective formulation and implementation of Master Plans and Action Plans at watershed level under the supervision and guidance of Project Officer, ITDA. It is therefore essential that the operational Research Project Team which consists of Scientists, planners and Administrators should function in close coordination with local Politicians and farmers for promoting and practicing the concept of watershed management for the benefit of tribal areas.

The cencept of integrated Watershed development envisages the following specific objectives:

1. To wean away the tribal from shifting cultivation and enable him to make use of the available resources effectively through HRD for becoming Sedantory cultivators.
2. To provide water harvesting and storage facilities besides Erosion control strategies and a package of agricultural practices in each watershed area for the benefit of farming community.
3. To takeup a scientific and massive afforestation programme by demarcating suitable area in each watershed in order to maintain ecological equilibrium.
4. To promote income generating activites like Horticulture, Animal husbandry, Fishery and Poultry besides cottage and small scale agro-forest based industries which will enhance the risk absorbing capacities.
5. To undertake transformation of food shortage economy of shifting cultivators into Food sufficient economy.
6. To provide social and community services at appropriate level for integrated development of each watershed.
7. Developing value added products in the villages through improved post harvest technology and evolve an effective marketing programme with total involvement of tribals to prevent exploitation.
8. Ensuring tribal participation by constituting villages resource development and Management Society and by making them as members in implementation committee at each watershed level.

Appropriate Strategy:-

A good number of strategies have been emerged and put into practice depending on the main *objectives of different five year plans. Infact the strategies are mechanisms* with which the theoretical propositions are applied to the solution of problems. In order to achieve the above objectives; GREEN HORN STRATEGY with SOCIAL FENCING MODEL is to be adopted for comprehensive and allround development of tribal people and area. It is a strategy based on the principles of area economics and peoples participation and management. This stretegy is a need based strategy rather than a time-oriented strategy. The main feature of this (tailor made) strategy is that it keeps on changing in the process of growth and reflects the will of tribal people living in that particular area. It is based on the philosophy that tribal development is for the tribal population of the tribal population and by the tribal

population inhabiting the particular area. The Green Horn strategy is based on the following four fundamental pillars.

1. Up by the boot - straps policy - Policy framers will have to take into account the traditions, culture and civilisation of tribal people.

2. Negotiating approach - Development Plan shall be prapared by people (assisted by Scientists/Planners) and contribute labour resources voluntarily and built up group leadership.

3. Concentrating Frame work in Successive contours:- Area will have to be classified based on the level of programmes, local needs and natural resources - Development will be concentrated firstly in the outermost contour and after its steady and speedy development, the work shall be taken into another contour very close to it.

4. Gentle pull philosophy:- It has to replace the present big push philosophy.

The strategy will have to be adopted for rehabilitation of shifting cultivators with Social Fencing Model. (Mishra called it so). This is based on the statement that Hills are not store rooms of cattle to go at will. They are the perennial sources of all energy that we need. The Model envisages:

i) Protection of hilly areas from grazing and illicit cutting of trees.

ii) Buildup Socio-economic human capital while saving physical environmental capacity through social fencing.

iii) Constitution of village society and water users Association.

iv) Aims at making all hilly villages self developing and self sustaining with social fencing system

The guiding principles are the promotion of a secure basic life support system and judicious utilisation of natural resources. The whole strategy would centre around the active participation of the people in the fulfillment of their basic needs. The people's involvement can be ensured by ingraining the concept of 'Social Fencing' which implies a Voluntary and self imposed discipline in managing society's resources at watershed levels.

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FACTORS AFFECTING REHABILITATION PROGRAMMES OF THE DISPLACED: A CASE STUDY OF THE YANADIS OF SRIHARIKOTA ISLAND

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India, as a developing country, establishing river dams, large industries, defence and scientific research centres etc. in the larger interest of the nation. These establishments are today's most controversial socio-cultural and environmental issue creating many problems such as social disorganisation, rehabilitation of the displaced population, loss of forests, increased pressure on agricultural land and so on. The displacement of populations from their traditional habitat and the consequent exposure to new cultural milieu have created many problems for both the affected populations and the administration.

The displaced populations faced various problems such as fixing of inadequate compensation, inordinate delay in payment of compensation, misdeeds of the concerned officials in fixation and payment of compensation and the problems faced due to lack of proper planning for rehabilitation programmes.

Social scientiests have begun recently to study the displaced communities as a consequent of different large contructions and establishements in India (Karve, I., 1967) Roy Burman, B.K., 1968; Vidhyarthi, L.P., 1970; Sarkar J.C., 1970; Muthaiah, B.C. and Mathur, J.S. 1975; Reddy, P.S. 1981; Joshi, B.L., 1982; Joshi, V., 1983; Sawant, P.R., 1985 etc. Most of the studies deal on the displacement, the way of compensation spent, rehabilitation and resettlement programmes, the socio-economic conditions before and after the displacement, the problems of the affected populations and also gave suggestions for the welfare of the affected populations, The nature and problems of displacement and rehabilitation programmes of the river dam projects differ from the displacement and rehabilitation programmes of the other large constructions in some aspects such as getting employment opportunities, areas of urban growth, utilisation of old acquired lands etc.

Usually these populations are tribals and peasants, mostly the poorest and the most powerless. Starting with the problem of rehabilitation of the displaced persons, though the planners grant compensation in the form of land elesewhere, they fail to realise the socio-cultural and psychological attachment that people have to their ancestral homes. The displaced populations could not adjust to the new setting and after abandoning the rehabilitation colonies they returned to areas close to where they originally lived.

The present case study deals with the factors affecting rahabilitation programmes of the displaced yanadis of Sriharikota island. The data for the study were collected from the secondary sources such as official records and the filed work conducted among the yanadis during 1978-81.

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The Government of India established the East Coast Rocket launching station in 1969 at Sriharikota Island in Nellore District, Andhra Pradesh. The Islanders about 10,000 including a fair proportion of scheduled tribes (Yanadi) did not desire relocation but they had no alternative other than submission to the plans of the Government of India. The evacuation programme was linked with a rehabilitation scheme.

The Yanadis, a prominent Scheduled Tribe of Andhra Pradesh living in Nellore district were in considerable number in the Island. Sriharikota Island lies between the Bay of Bengal and the Pulicat Lake possessing good reserve forest and cultivable lands. The Yanadis are the ex-criminal tribe and one of the original inhabitants of the Island. They were the workers of the Island being servants of the neighbouring caste people. Some of them were engaged by the Forest Department in works and many were in the services of the fuel coupe contractors. They also depend on fishing, the collection of roots and tubers and hunting. As they were food gathering tribe, their life and the Island environment were closely related.

Due to displacement most of tribals have lost their traditional eco-social and cultural system. The breakdown of a stable society and a stable organisation always causes disorganisation and disintegration in all spheres. Due to sudden changes in the eco-cultural systems, there are found to be some problems of adaptation resulting in changes in all aspects. The displaced families have been given compensation for their property. Most of them were rehabilitated at different places of Nellore district. Those who were not willing to resettle in the colonies were paid the ex-gratia amount of Rs. 500/-and conveyance charges to resettle at their selected places. Most of the Yanadis were resettled at different places along the side of the buckingham Canal wherever they find the works in casuarina gardens. The Government has provided two colonies one at Mannarpolur and another at Golagamudi in Nellore district. But the Yanadis rehabilitated at the two colonies were left the colonies as they were not adjusted to the local conditions.

Rehabilitation programme:

To rehabilitate the 79 families of the Yanadi, two places were selected. Although the non-Yanadi of the Island were given an opportunity to select the places of rehabilitation, such an opportunity was not extended to the Yanadi for selecting suitable sites for their rehabilitation. Simply, the then Collector of Nellore district ordered the Reclamation Officer to bring some of the Yanadi families to an old colony by name Golagamudi and the others at Mannarpolur.

The Reclamation Department of Nellore district constructed the Golagamudi colony for the denotified castes such as Dommara, Pamula, Vadde and the denotified tribe of Yerukula. However, the families of pamula, vadde and Yerukula abandoned the colony in 1970 and consequently nearly 30 houses were kept vacant. The 39 yanadi families collected from different villages in the Island were accommodated in the vacant houses of this colony.

In the beginning, the Reclamation Department supplied cooked food to the Yanadi Islanders for a few days and gradually it was replaced by a few measures of rice for every family on every day and

stopped even the supply of rice after a few days to make them independent. Cultivable lands were allocated to every family. Agricultural implements were also supplied to each family. Five pairs of buffaloes were given to the colony for cultivation. Fishing nets were also supplied to them to fish in the nearby tank called Sarvepalle tank. The residential school located in Sriharikota Island, was also shifted to this colony. A big portrait of Lord Venkateswara was given to them for daily prayers. As the colony was new to the Yanadi Islanders, the Reclamation Department took much care and the Reclamation Officer visited the colony very frequently. In the beginning, the Department itself cultivated some dry crops in the land allotted to the colony. Even before the crops ripened the yanadi abandoned the colony.

The Mannarpolur colony lies at a distance of 20 kms. from Sriharikota Island. The soils are very hard, rocky and with a low water-table. There are no trees in the colony site to give shade. Each Yanadi family spent the hutment grant of Rs.100/- for the construction of a house on the site allotted to it. The land allotted to each family was to be reclaimed. The Revenue Department did not provide irrigation facilities, drinking water wells, community halls, school buildings and inputs for agriculture as provided in the other rehabilitation colonies. After two months of their stay, all the Yanadis abandoned the colony.

Factors for abandoning the colonies

The yanadi could not adapt themselves to the conditions of the colonies, owning to environmental, Socio-cultural, administrative and psychological factors.

Environmental factors

In contradistinction with the abundance of resources available in the old environment, there were meagre resources in the environment of both the colonies. The rehabilitated yanadis had to compete with the other ethnic groups to exploit the environment. The new environment at Mannarpolur provided none of the secondary sources of subsistence such as jungle wealth and fishing and hunting grounds which existed in the old environment. However, the Golagamudi colony had a big tank in its neighbourhood. The tank provided some fish but the waters were full of leeches. Hence, the Yanadis found it difficult to fish in leech-infested waters. Apart from this, the yanadis before their displacement, were accustomed to a type of easy way of getting their daily menu which included fish, meat and wild vegetables. This was not possible in the colonies.

Socio-cultural factors

Several cultural factors also came into play. The yanadis attached great deal of importance to the selection of a site for establishing a settlement. The selection of sites for the colonies was neither in conformity with their beliefs nor in congruence with their environmental and social cultural considerations. Every problem they faced during the initial days of rehabilitation, was attributed to the anger of the spirits believed to be inhabiting the site. The Government selected the site according to the availability of vacant land, without taking into consideration the tribal beliefs. The Yanadi settlers believed that their old gods and spirits still living in this old environment were controlling their destinies in the new lands.

Another area where cultural factors played a dominant role, was the type of shelter required by the Yanadis. The huts of the yanadis before their displacement were compact, cozy if not spacious in conformity with the environmental condition. On the contrary, in the rehabilitation centre of Golagamudi, the type of construction itself was not to the taste of the yanadis. The tiled houses were old and were inconvenient to them.

Even the residential pattern in the rehabilitation colonies did not conform to the cultural norms of the Yanadi Islanders. Especially in Golagamudi colony, it was difficult for the yanadi settlers to adjust with the different ethnic groups. The neighbourhood pattern also was not according to the wishes of the Yanadis. In the Mannarpolar colony, the Yanadis could not adjust geographical conditions. They were habituated to the use of plenty of potable water and accustomed to living on fine sand before displacement. There was no provision for sacred hut in the rehabilitation colonies.

Another area where the social-cultural factors played a role was the sense of belongingness. As the Yanadis rehabilitated in each colony were from different settlements in the Island, they could not develop the sense of belongingness to the colony. In fact, the new situation gave rise to many problems concerned with kinship bonds and marriage alliances. Their traditional, social and kinship networks badly got affected and they were forced to make readjustments in these spheres. The officials of the rehabilitation schemes unwillingly settled a few families from each settlement of the Island.

Morever, there was incompatibility of traditional occupations with the present occupations. The settlers were asked to take up agriculture and they were provided with merely a few acres of land. The Yanadis found it difficult to take up settled agriculture because their migratory life, their motor habits, their work conditions and their simple technology were not suitable to the new way of life and work conditions. Besides, as they were more accustomed to the local toddy and arrack in the Island, they could not tolerate the non-availability of sufficient liquors in the new environment.

Prior to displacement, their belief system was closely associated with the environment of Sriharikota Island. The Island was the original place of their deities who were propitiated for the tribal well-being. The shamans formed as effective links between people and the supernatural. Even the powerful shamans in the old habitat proved inefficient in the colonies. Frequent deaths in the colonies were attributed to the wrath of deities of the old habitat.

The ideology of the Yanadis was such that they did not think of the morrow because some kind of food or the other was available throughout the year in the island. Their wage labour was often found in conjunction with the traditional sources of food. The ideology was out of harmony with the new situation.

Administrative factors:

In addition to the aforementioned environmental and socio- cultural factors, several administrative factors also were responsible for the abandonment of the rehabilitation colonies by the Yanadis. First, the officials were not able to identify suitable sites for the rehabilitation colonies. The officials selected the colonies without any understanding of the environment and the way of life of the people to be

rehabilitated. Had the environment of the colonies been similar to that of the traditional settlements, probably things would have been different.

Another administrative factor that acted against the rehabilitation of the Yanadis was the lack of coordination between various departments of the Governments connected with development schemes. There was no cooperation between the departments of Agriculture, of Rehabilitation, and of Revenue. No official ever gave guidance properly to the rehabilitated yanadis as to how they should cope up with the new environment. The officials were never in touch with the leaders of the Yanadis in both the colonies.

Out of sheer ignorance of the results of the new innovations the Yanadis did not realise the utility of the new innovations. In this context, the Yanadi leaders often criticised the bureaucracy that it merely launched the programme without taking adequate follow-up measures. Another important area where the need for co-ordination between various wings of administration way the flow of financial assistance. The officials allotted the land for the colony near Mannarpolur and took interest in the programme only for a few weeks after its inception. Subsequently, the Yahadi Islanders had to leavee the colony.

Psychological factors

Several psychological factors also worked against the rehabilitation programme. As their technology was exceedingly simple, their wants also were very limited and the concept of planning for the morrow did not exist with them. This was a crucial psychological factor which came in the way of the rehabilitation programmes. The Yanadis were content with what they had. They obtained food on a day-to-day basis. The unrestricted flow of inputs in the initial stages developed laziness and dependant attitudes among the Yanadis and they expected everything for free of cost later also. The sudden stoppage of assistance led to disillusionment and discouragement.

The ejection and rehabilitation were a traumatic experience for the Yanadi Islanders because they curtailed the cherished freedom and disturbed the life style of the Yanadis.

The feeling of insecurity also forced the Yanadi settlers to abandon the colony. As the neighbouring caste people in the new setting, unlike those in the old setting, were more advanced economically and otherwise, the Yanadi settlers with their poor living and helplessness experienced inferiority complex. The complex made them not to demand their rights for their better living.

This case study suggests that rehabilitation programmes, especially meant for the displaced people, require proper planning, execution and follow-up taking into consideration the ecological, socio-cultural, psychological and administrative factors carefully. The dispaced populations proper occupational and individual rehabilitation rather than the mere provision of infrastructure in the rehabilitation colonies or new villages and community rehabilitation. Further, the physical, emotional and sentimental issues involved in the forced migration and rehabilitation have to be understood sensitively and the problem tackled with patience and interest.

As the problems of displacement and rehabilitation does not fall into their jurisdiction, designers and planners are not readily concerned. Most of the studies in displaced populations show that most of the affected populations preferred and resettled in the areas as nearer as possible to their old villages as they resemble to the old village settings, the emotional attachment to their ancestral homes, the extension of kin network with the surrounding villages and the intention of cultivating their old lands whenever possible.

With these expeeriences the following points are suggested to be considred in the planning of displacement and rehabilitation programmes of the displaced populations;

1) to prepare plan proposals of displacement and rehabilitation along with the pi: : porposals of the project construction;

2) to make through study of socio-economic conditions and attitudes of the population to be affected, to understand their ways of life for proper rehabilitation;

3) to educate the population to be affected in advance about the importance of the project and detailed information of their proposed displacement and rehabilitation;

4) to pay adequate and legally accepted compensation to the properties of the affected to avoid legal suits and courts;

5) to establish a separate directorate of rehabilitation to co- ordinate and execute the programmes carefully,

6) to make the affected population to participate in planning and implementation of rehabilitation programmes through rehabilitation advisory committees at different levels.

7) to design and implement the rehabilitation programmes mostly to suit their old socio-cultural and ecological setting;

8) to creeate a high power autonomous body for rehabilitation work to design and implement the programme.

9) to link the payment of compensation to the rehabilitation programmes to spend the compensation amount in a meaningful way,

10) to circulate a detailed final ort on the displacement and rehabilitation programmes among the populations to be affected;

11) to handle the programmes of displacement and rehabilitation carefully and patiently or through voluntary organisations,

12) to provide rehabilitation centres as nearer as possible to their old villages and

13) to provide occupational rehabilitation or individual rehabilitation rather than communal or village rehabilitation with the provision of civic amenities only.

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DISPLACEMENT AND REHABILITATION : DATA FROM THE RESETTLED COLONIES AROUND THE STEEL PLANT AT ROURKELA, ORISSA.

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In India development is largely equivalent to setting up of factories, construction of irrigation and power projects, opening up of mines, etc. The adverse impact of this process on the ecosystem and the consequent deprivation and disturbance suffered by certain sections of the society are often lightly dismissed as the 'price for development'. The damages on the ecosystem are often permanent.

Most development projects involve displacement of some people who are called upon to sacrifice for the greater interests of the nation. On the other hand, those who are displaced doubt the basic premises of the modernisation and welfare programmes.

A number of emperical studies such as that of Bardhan (1984), Bunker (1084), Robertson (1984), Gajarajan (1985), Laskhmi (undated), Panda and Panigrahi (1988) Reddy and Reddy (1988), Sharma and Sharma (1981), Tripathy and Nanda (1988), Roy-Burman (1961) have generated interesting and useful data on the sociology of displacement and rehabilitation.

We present here the story of displacement and rehabilitation of a large section of population of Rourkela consequent to the programme of the installation of Hindustan Steel Limited during the fifth decade of the present century.

To begin with, we have tried to reconstruct the social life of the community on the eve of displacement and rehabilitation, their reactions to the facilities offered by the Government in the form of compens ation, the degree of solidarity that existed in the pre-displacement village. We have also indicated the present community structure of the rehabilitation units.

The data were collected from sixty respondents chosen on a purposive basis, from each resettled colony covering all major ethnic groups among the displaced and supplemented with data from governmental records and census, Interview, case study and observation methods were employed to collect empirical data.

II

Rourkela is situated 413 Kilometres West of Calcutta on the Howrah-Bombay Railway line. It is located between 84° 50' East longitude and 22° 15' North latitude. The city is situated in a delta shaped valley formed by the river Koel joining river Sankh at an altitude of 150 to 200 metres. The landscape is fairly flat and open, except a few laterite dunes and low hillocks.

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The Steel Plant at Rourkela was set up in the public sector with the Collaboration and technical knowhow of a private German firm, 'Krupp Demag'. The project report was finalised in November 1955 and was accepted by the Government of India in February 1956. The firest clod of earth was moved in October 1956 for the construction of the plan and February 3,1959 it was commissioned.

The blue-print for the layout of the township, the steel plant and other ancilliary industries submitted to the Government in January 1955, covered an area of 207.37 sq.Kms. including 10,500 acres for the town ship. The Government, however, transferred 3,181,86 acres of private land for the project. By December 1962, the Government had handed over 19,557.06 acres of land to HSL out of which 4,882.39 acres were governmental and the rest acquired from private owners. Acquisition of private land uprooted 2,465 households from 30 villages. In this population 70 percent belonged to tribal communities (Table.1)

It seems that at the initial stage people were not a ware of the fact that they would be displaced from their agricultural lands. Therefore they did not protest, or, in other words, they were prepared to accommodate a new project in the region, but, possibly were not prepared to accept it as a substitute to their old farming economy. At that phase then attitude towards the plant was accommodative indifference.

However, when it became clear that agricultural land would also be taken over the attitude of people turned from accommodative indifference to bewildered confrontation. Through a number of village level meetings, convened by the ganjus (traditional village heads), they gradually began to register their protest.

The non-tribal, upper easte rich cultivators wanted to have the best of both the worlds. They wanted to retain their command over the traditional economy and at the same time aspired to enjoy the benefits of the growing industrial complex. They had the resources to take up small contracts and utilise the urban industrial infrastructure, such as, education of their children and to equip their children for white collar jobs. The landless labourers also looked upon the industrial project as a source of regular income. They had, therefore, r thing to lose. It was the middle and small cultivators who felt disturbed at what was happening.

Rumours were circulated, and allegations were made that people belonging to some villages, or some castes or tribes were trying to strike a separate deal for themselves. Therefore, inter-village rallies could not be organised at the initial stage. For instance, a rumour was afloat that as the Germans were collaborating in the implementation of the project, the Lutheran Christians under the advice of the missionaries, are not opposing displacement. It seems that mutual suspicion flew along the channel of traditional inter-village and interethnic rivalries. When it was definitely known that a certain village was to be dislodged only then the village stood as a single entity to assert itself sub-merging the conflicting interests and could serve as unit for external unity.

Sometime towards the middle of 1955, the ganjus or headmen of the different villages convened a meeting at Mohania Bagan, where it was resolved that the people did not want the steel plant in their

neighbourhood. It was further resolved that if the government felt that there was no alternative to the establishment of the plant on the site already selected, the displaced cultivators should be given equal amount of agricultural land as compensation at a suitable place of their liking. A small committee was also set up to press upon the government to accept these demands.

Gradually an organisation called 'Steel Plant site people's Federation' came into existance. Some change also took place in the nature of the leadership. Local persons with political contacts at the district level, came to the forefront and operated through the ganjus or traditional headmen of the villages. Thus, an alliance took place between the local traditional elite and the political elite at the district level.

Ethnic prejudices, however, did not completely cease to exist even at this stage. The people belonging to the Kissan tribe of the villages Udutum, Barkani and Purnapani formed a separate committee to safeguard their interests. It, however, failed to make any impact. Ultimately, the Kissans had to fall in line with others.

Gradually opposition to the plant was not confined to holding meetings and sending deputations only. In several villages it took the form of non-cooperation. The H.S.L. found it difficult to recruit local labour, especially in those villages where agricultural land were under notice of acquisition.

At last, the then Chief Minister of Orissa personally came down and was successful in persuading the people to cooperate. The movement, however, continued demanding adequate compensation for the loss of the property, preference in employment, and settlement facilities near the plant site.

With the question of preference in employment and in other spheres of activities created by the project coming to the focus, another dimension was added to the agitation. So long the agitation was carried by the people directly effected by the project; but now it became an all Orissa concern. The political parties of the State began to demand preferential treatment for Oriyas in employment and other benefits created by the project. This expansion of the concept of the children of the soil however, created another tension. The local people, particularly the tribals felt that they were the children of the soil and the other Oriyas, particularly those from the coastal region, were the intruders.

After protracted negotation, the Government of Orissa issued a press note, accepting the full responsibility of the rehabilitation of the displaced persons in 1955. Under this scheme the government laid out three settlement colonies and leased out housing plots, 18.29 X 12.29 metres (60 X 40ft.) to each displaced family on long term basis. The terms of payment is Rs. 5.00 per year and the allotee is under constraint to sell or mortgage the plot or the building contructed on it.

Beside these, 15 reclamation areas were opened within a radius of 100 kilometres from Rourkela. In these reclamation areas the displaced persons were allowed to reclaim land for which a subsidy of Rs. 100/- per acre was proposed.

Location of resettlement colonies and reclamation areas:

The site of the resettlement colonies near the plant site, which are agreed upon, are:

i. Jalda-about 5 kms. South of the Steel Plant site.

ii. Jhirpani-about 7 kms. North of the plant site and about 4 kms. North of the steel township.

iii. Bondomunda-about 6 kms. East of the Plant site.

Particulars of the sites selected for reclamation for agricultural proposes are as follows:

S.No.	Name of site	Location
1.	Amgaon	Deograph sub-division of Sambalpur about 135 kms. South-East of Rourkela
2.	Ulundajharan	Bonai Sub-division of Sundargarh, about 48 kms. South-West of Rourkela.
3.	Hatidharsa	Sadar sub-division (Rajgangpur), about 48 kms. South West of Rourkela.
4.	Silikubta	Bonai sub-division, about 87 kms. south of Rourkela.
5.	Champajharan	Bonai sub-division, about 40 kms. South of Rourkela.
6.	Gohmi	Bonai sub-division about 48 kms. South of Rourkela.
7.	Kacharu	Panposh sub-division of Sundargarh, about 80 kms. North of Rourkela.
8.	Raghudhara	Panposh sub-division, about 50 kms. South of Rourkela.
9.	Sukuda	panposh sub-division of Sundargarh, about 50 kms. North-East of Rourkela.
10.	Kadlibahal	Panposh sub-division, about 32 kms. North-East of Rourkela.
11.	Tainsar	Panposh sub-division, about 50 kms. South of Rourkela.
12.	Totokendubharna	Panposh sub-division, about 40 kms. South of Rourkela.
13.	Bartagutu	Panposh sub-division, about 50 kms. North of Rourkela.
14.	Sankarla	Panposh sub-division, about 128, kms. North-West of Rourkela.
15.	Usra	Panposh sub-division, about 32, kms. North-West of Rourkela.

It is found that married people tended to settle in the reclamation centres, whereas unmarried youths stayed in large number in resettled colonies. In about 50 percent of the households, the old economic ties continued even after physical separation. Members of such families, who are living in the resettled colonies, visit their relations in the reclamation centres during the busy agricultural seasons and send them monetary remittances frequently. In some cases it was noted that this link does not lead to harmonious inter-personal relationship.

Frequently, the members of a family living in the industrial zone think that those who are living in a reclamation centre are not doing their best to maximise the produce from the land alloted to them. On the other hand, those living in the reclamation centres feel that the members staying in the industrial areas had developed extravagant habits. In contrast, in many cases, where economic inter dependence got weakened, there are less emotional tension and mutual recriminations.

The displaced persons who were interviewed in the three resettled colonies stated that at the time of selection of the resettled colony option was given to the village as a unit and not the household. When asked whether the authorities refused to entertain option given by individual households, the informants stated that very few persons thought of making individual options separate from those of their respective village communities or ethnic groups at that stage.

Out of the 30 villages affected by acquisition, all the resettled households of 18 villages are found in one or the other colonies only. All resettled households of 3 villages are also found in a single colony. Overwhelming majority of the resettled households of 6 villages are also found clustered in one or the other colonies. Households of only three old villages are found scattered in more than one colony. In general, people of old villages opted for resettlement with the village as a unit (Table-2).

Members of the displaced families differed in their choice whether to opt for the resettled colonies within the industrial complex or in reclamation centres in the outlying areas. We found that the older people preferred to shift to the reclamation centres; but very old persons stayed in the resettled colonies, as they were not physically fit to undertake the arduous tasks of reclaiming land and carrying on cultivation under difficult conditions.

On the other hand, people in their early youth were attracted towards the opportunities of industrial occupations near about Rourkela. Middle aged persons who had less chance of getting regular employment in industrial establishments shifted to the reclamation centres in large number. Along with the middle aged persons, their wives and children also shifted to the reclamation centre. It seems that as a result of this pattern of physical split of households, education of the younger generation had suffered to a considerable extent.

In Jalda resettled colony, 1,787 plots were laid out of which 60 plots were 24.38x15x24 metres in size. In Jhairpani colony, 1,790 plots, each 18.29x12.19 metres in size, were laid out. In Bondomunda, there were 428 plots, each 24x38x15x24 metres in size. The Jalda resettled colony was laid out at three places; these were named as Jalda 'A' block, Jalda'B' block and Jalda 'C' block. Jalda 'A' block covered an area of 100.39 acres and 501 plots were laid out there. Jalda 'B' block covered an area of 55.58 acres, with provision for 330 plots. Jalda 'C' block is the biggest of three with an area of 212.31 acres and provision for 956 plots.

By the end of April 1963, all displaced households (2,465) were alloted housing plots in one or the other of these three settlement colonies, but only 1,721 Households availed the facility. 42 households did not immediately vacate their old houses. 702 households had not settled in the colonies as per schedule. Out of 2,465 households, 1,373 were alloted plots at Jalda, 916 at Jhirpani and 176 at Bondomunda,. However, 1,028 settled at Jalda, 637 at Jhirpani and 56 at Bondomunda (Table-2). The proposed compensations of government for agricultural land, crops and trees were not acceptable to the displaced persons. Finally, the government had to refix the compensation for the aforesaid items (Table-3 and 4).

Out of 15 reclamation units, 9 were situated in reserved forest and the rest were situated in village forest (Khasra) areas. Requisite amount of forest land was reclaimed and leased out to those displaced persons who would like to rehabilitate in agriculture (Table-5).

Against 1,495 claims for allotment of land in the reclamation areas, 1,393 cases (94 percent) were disposed by the end of 1962. But out of these 1,393 households, only 729 took possession of their respective allotments among whom only 223 households fully reclaimed the land alloted to them and the reclamation subsidies in full. In other words, by the end of 1962, only 16% of the total number of allotees, made full use of the facilities made available to them in the reclamation areas (Table-6).

In terms of the area it is found that out of 5,117.22 acres alloted to the displaced households only 4,041.39 acres were taken possession of; and out of the latter, again only 1,488.63 acres were actually brought under cultivation.

The housing subsidy varied between Rs. 100/- and Rs. 400/- depending upon the type of the house that the recipient of the subsidy owned in the old village. The payment started in 1955. The responsibility of its disbursal vested with the special officer, Rourkela Land Organisation. In each case the subsidy was paid only after the old house was acquired and the household concerned had vacated.

The displaced persons were provided with free transport facilities for removing their belongings from their old homes to the resettlement colonies. They were also provided with facilities for carrying housing materials from the old sites to the new sites by requisitioned truck through the village headman. Most respondents, however, stated that they were not satisfied with the transport facilities provided.

As a whole the respondents were satisfied to a reasonable extent with the compensation that they received for their houses and other assets. However, they were not satisfied with the amount paid as compensation for the loss of their agricultural land.

At the time of rehabilitation, an assurance was given to the displaced persons that they would be preferred to for all jobs under HSL as per their qualification. It is obvious that among the displaced persons there was hardly any who could fill up the higher supervisory and administrative posts. For employment in the category of skilled personnel also the scope was extremely limited. But there was some scope in semi-skilled and considerable scope in unskilled sectors.

In 1959, the HSL authorities adopted the following recruitment policy:

Priority was to be given to (i) displaced persons working in work charge and muster roll establishments; (2) other displaced persons screened by the selection committees; (3) other work charge and muster roll employees screened by the selection committees.

Following this policy, about 800 displaced persons were employed as unskilled and semi-skilled labourers by the HSL. Many displaced persons, however, preferred to work under private contractors, as the latter paid them better wages. The employment scope began to deteriorate with the completion

of many construction projects in 1960-61. The position further deteriorated with the adoption of a new policy by HSL on 25th Feb. 1961.

The new policy discontinued the preferential treatment extended to the displaced persons. While highest priority was given to displaced persons who were already in employment in the HSL, the next priority was given to other persons who had put in atleast one year approved service under the HSL, the other displaced persons were given a lower priority. HSL rationalised that they had already accommodated bulk of the displaced persons in the working age group at the time of displacement and cannot undertake the obligation to the future generations. In other words, those who were minors at the time of displacement were denied the preference to accommodate non-displaced persons, who had already put in atleast one year's work in HSL.

The logic did not satisfy the displaced population. On 19th and 20th April, 1961, a large number of them squatted in front of the office of the sub-divisional officer and the residencee of the Deputy General Manager, HSL and demanded their immediate absorbtion in the plant. As these squatters did not leave the place and there was apprehension of trouble, the police arrested a number of them including their leaders.

On 27th March, 1961, about 400 displaced persons attended a meeting organised by AITUC, where they pressed for absorbtion of all the displaced persons in the plant. They alleged that a few top official of HSL and the authorities did not allow their leaders to meet the Prime Minister, when he visited Rourkela. The agitation went on for quite sometime but due to lack of coordination it did not make much impact.

In fact, in September 1961, 450 displaced workers including a bulk of females were declared as surplus by HSL and were retrenched. The explanation given by HSL for such retrenchment was that the scope of employment for females in regular employment is extremely limited.

However, the situation improved slightly in 1962 with the expansion work of the HSL, consequently some displaced persons were absorbed and the tension ceased to a great deal. The displaced persons are also availing the employment opportunities in various newly installed ancilliary industries in the region.

At present, community life in the colonies is marked by both conflict and cooperation among the inhabitants. Some of the conflicts are carry overs from old village. New conflicts have surfaced around the new situations in the colonies. The focus of conflict, often are the non-displaced persons in the colonies as the tenants of the displaced persons. The solidarity and cohesion among the inhabitants carried over from the old village juxtaposed over the emerging unity among the inhabitants of the colony resulting from their physical proximity and common interests are frequently submerged by intensity of conflicting interest in the industrial setting.

It is argued that orthogenetically developed strategies neither destabelize the social system nor redically alter the normative system. It rather strengthens the people to face new challenges. Whereas

the social fabrics become weak and get destabilized if it loses control over its indegenous processes of production due to the advent of an exotic external system. Thus, the socio-economic conditions in the resettled colonies have now made life difficult. To meet family needs, many women and children have been forced to enter into the labour market and have become the victims of urban-industrial exploitation.

Table - I

Source: *Census of India (1961)* Volume-I, Monograph series Names and Sizes of the Villages acquired and numbers of households affected

	Name of the Village	Area in acreage	No.of House holds
	1	2	3
1.	Durgapur	908.34	96
2.	Guradehi	826.37	77
3.	Raghunathpali	564.75	151
4.	Tarkera	715.13	147
5.	Deogaon	328.64	69
6.	Mahulpali	370.66	44
7.	Bhangamunda	299.36	42
8.	Milmili	391.29	45
9.	Jharabahal	243.05	50
10.	Rourkela	853.86	182
11.	Tangrapali	268.22	48
12.	Barkahi	1326.36	128
13.	Bijubandh	116.76	12
14.	Jhermunda	146.82	8
15.	Udutum	847.50	134
16.	Khariabahal	241.58	43
17.	Kantajhar	684.13	65
18.	Jhirpani	665.25	59
19.	Ahirabandh	235.85	45
20.	Purnapani	816.84	187
21.	Tumkela	1062.37	327
22.	Uprambahal	267.63	30
23.	Sanlajibherna	104.34	31
24.	Hamirpur	902.50	48
25.	Bandposh	719.73	28
26.	Chhedn	1416.66	135
27.	Bankia	386.22	85
28.	Pardhanpali	299.05	32
29.	Luakera	604.05	97
30	Dahiposh	241.58	22

Table - 2

Resettlement of displaced persons in Jalda, Jhirpani and Bondomunda Resettlement Colonies

Sl. No.	Name of the Village	No. of households evacuated till 15th Apl. 1963	No. of house-holds yet to be evacuated	No. of households settled in Jalda	Jhirpani	Bondo-munda	Total	Remarks
1	2	3	4	5	6	7	8	9
1.	Durgapur	96	--	45	41	1	87	
2.	Guradchi	77	--	77	--	--	77	
3.	Raghunathpali	151	--	140	--	--	140	
4.	Tarkera	147	--	120	--	--	120	
5.	Deogaon	28	41	19	--	--	19	
6.	Madhulpali	44	--	42	--	--	42	
7.	Bhangumunda	42	--	42	--	--	42	
8.	Milmili	45	--	45	--	--	45	
9.	Jharabahal	50	--	50	--	--	50	
10.	Rourkela	182	--	118	--	49	167	
11.	Tangrapali	48	--	34	--	1	35	
12.	Barkani	128	--	47	15	5	67	
13.	Bijubandh	12	--	4	--	--	4	
14.	Jharmunda	8	--	7	--	--	7	
15.	Udutum	134	--	111	3	--	114	
16.	Khariabhal	43	--	--	41	--	41	
17.	Kantajhar	65	--	--	54	--	54	
18.	Jhirpani	59	--	--	54	--	54	
19.	Ahirabandh	45	--	--	44	--	44	
20.	Purnapani	187	--	5	140	--	145	
21.	Tumkela	327	--	48	136	--	184	
22.	Uparmabahal	30	--	--	29	--	29	The remaining 702 families have made their own arrangment in other place.
23.	Sanlajibherna	31	--	--	31	--	31	
24.	Hamirpur	47	--	--	22	--	22	
25.	Bandposh	28	--	16	12	--	28	
26.	Chend	135	--	37	3	--	40	
27.	Bankia	85	--	3	3	--	6	
28.	Pardhanpali	32	--	3	--	--	3	
29.	Luakera	97	--	2	3	--	5	
30.	Dahiposh	22	--	13	6	--	19	
	Total:	3425	41	1028	637	56	1721	

Table - 3

Rate of Compensation of different types of land and Handing paddy crop per acre.

Type of land	Rate per Acre	Rate for standing paddy crop per acre
	Rs.	Rs.
Bahal	900	75
Bherna	600	60
Mal	401	45
Gora	200	30
Kudar	227	30
Gharbari	227	--
Barcha	748	--

Table - 4

Rates of Compensation for different types of trades

Tree	Small Rs.	Medium Rs.	Big Rs.
Mahul (Basia Latifolia)		18.50	12.50
Mango (Mangifera indica)		21.00	21.00
Mango (graft)		28.50	21.00
Bahera (Terminalia bellerica)		7.00	4.00
Kusum		7.00	4.00
Tentuli (Temarindus indica)		17.00	12.50
Ganu		6.00	4.50
Char (Trewia nudiflora)	1.00	1.00	
Palm(Palamae)	..	9.00	5.00
Khajuri (Phoenix sylvestries)	..	6.00	3.00
Harida (Terminalia chebula)	..	6.00	3.00
Kendu (Diospyros melanoxylon)	..	6.00	3.00
Orange (Citrus anrantium)	--	12.50	7.50
Lemon (Citrus limonum)	--	7-50	4.50
Custard apple (Anona reticulata)	--	2.00	
Buro (Plum) (Zizyphus Jujuba)	--	4.00	4.00
Aola (Emblica afficinalts)	--	3.00	3.00
Pomegranate (punica grantum)	--	28.00	--
Coconut (Cocos nucifera)	--	15.00 (not fruit bearing)	30.00 fruit bearing)
Jack-fruit (Artocarpus integrifolia)	--	25.00	--
Bamboo (100 pieces)	--	5.00	--
Plantain (Musa sapientum)	--	12.00	0.25
Papaw (Carica papaya)	1.00	--	--
Bel (Aegle marmelos)	4.00	--	--
Gular (Ficus carica)	3.00	--	--
Guava (Psidium guyava)	6.00	3.00	--
Marking nut (Bhilua) (Semecar- pus anacardium)	2.00	--	--
Karanji (Pongamia glabra)	3.00	10.00	--

Table - 5

Particulars of reclamation areas, with reference to the acquisition and allotment of land

Sl. No.	Name of the reclamation area	Area acquired for reclamation purpose	Date of acquisition	Area allotted to the displaced persons	Area alloted for Bastisite
1.	Amgaon	2,211.00	18-7-56	1,829.10	97.60
2.	Ulundajharan	345.00	8-9-58	265.64	17.63
3.	Hatidharsa	1,355,00	3-4-57	310.20	62.40
4.	Silikutta	1,002.25	29-5-57	589.44	44.64
5.	Champajharan	332.40	31-5-57	323.40	6.89
6.	Gohmi	497.52	13-12-58	370.80	17.75
7.	Kacharu	91.12	--	89-60	---
8.	Raghudhara	91.91	--	82.93	--
9.	Sukuda	140.75	22-9-58	109.18	4.90
10.	Kadlibahal	68.85	22-9-58	53-97	3.53
11.	Taimsar	187.16	22-9-58	117.78	9.38
12.	Ratokendubharna	117.48	10-10-58	76.05	--
13.	Bartagutu	232.22	10-10-58	31.77	4.00
14.	Sankarla	92.82	10-10-58	9.47	1.80
15.	Usra	326.17	16-7-58	188.64	10.80

Village-wise distribution of patta holders whose lands were acquired and who were alloted lands in reclamation areas.

Sl. No.	Name of old village from where households were displaced	No. of holdings whose Bahal, Mal or Bherna lands were acquired	No. of holdings who were alloted lands	No. of holdings that took possession of lands alloted to them	No. of holdings to whom full subsidy has been given
1	2	3	4	5	6
1.	Guradehi	45	43	42	35
2.	Tarkera	84	79	49	11
3.	Deogaon	41	38	28	4
4.	Bhangamunda	23	22	5	4
5.	Jharmunda	22	21	10	--
6.	Ahirabandh	26	26	11	6
7.	Milmili	23	22	19	9
8.	Bijubandh	19	19	17	7
9.	Sanlajibherna	17	17	12	9
10.	Dahiposh	17	17	8	2
11.	Tangrapali	38	34	27	6
12.	Kantajhar	52	47	24	2
13.	Mahulpali	37	32	18	5
14.	Jharbahal	30	27	24	13
15.	Bandposh	32	30	11	4
16.	Raghunathpali	92	89	24	10
17.	Barkani	75	70	61	17
18.	Tumkela	153	143	90	9
19.	Bankia	44	40	3	1
20.	Uprambahal	22	22	15	3
21.	Chend	71	65	24	2
22.	Hamirpur	62	59	15	2
23.	Khariabahal	24	24	9	3
24.	Jhirpani	36	33	16	4
25.	Pardhanpali	14	13	--	--
26.	Luakera	61	57	38	10
27.	Udutum	75	70	57	20
28.	Purnapani	91	82	7	2
29	Durgapur	59	45	14	3
30	Rourkela	110	107	51	20
	Total	1495	1393	729	223

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IMPACT OF REHABILITATION PROGRAMMES ON SHIFTING CULTIVATORS IN ANDHRA PRADESH

-N. Gopala Rao*

I. INTRODUCTION:

In India about 24% of tribal farmers are estimated to have been engaged in shifting cultivation covering an extent of 9.29 lakh hectares. In Andhra Pradesh about 63,000 families are practising 'Podu' or shifting cultivation in an extent of 62,948 hectares. Their continued preference for shifting cultivation is due to its proven capability to provide food with each agricultural operations with minimal investment, its simple technology and non-availability of sufficient settled land which can provide them with food for the entire year. However, extensive damage caused by it to the forest wealth and the soils in the country do not justify its continuation in the wider national interests.

As the evil effects of shifting cultivation outweigh the benefits, the Government have been trying from time to time to control shifting cultivation through massive rehabilitation programmes like land colonisation, social forestry and horticulture. A detailed study has been taken up to examine the implementation of various horticulture programmes in the tribal areas of A.P. and their impact on the socio-economic conditions of the tribal households.

Among the 8 predominantly tribal inhabited districts in the State, high incidence of shifting cultivation is reported in the two coastal districts of Visakhapatnam and East Godavari. Hence a sample of 100 households from 10 villages in these two districts have been selected for a study of the impact of the programme.

2. PROGRAMME IMPLEMENTATION: THE SALIENT FEATURES:

Out of 27,887 families proposed to be rehabilitated in the State under the scheme in the first phase, about 10,059 have been covered during 1985-86 and 1986-87 with Rs. 3.67 crores central assistance. During 1987-88 and 1987-89 action was initiated to cover 12,300 families as the response from 'Podu' cultivators is found to be very encouraging towards the horticulture programmes.

Among the sample districts, while 2,869 hectares of 'podu' land has been covered with orchards like mango, cashew and jack in Visakhapatnam involving 4,563 tribal households till 1988-89, about 6,338 hectares of 'podu' land has been brought under cashew, lemon, orange and coffee plantations in East Godavari district during the same period. Most of the sample beneficiary households have abandoned 'podu' cultivation in that land which was surveyed by the revenue officials and allotted to them as unirrigated dry land for raising orchards.

In the East Godavari district, the orchard programme was carefully grounded providing technical and financial assistance at every stage of plantation beginning with digging of pits and construction of tree guards involving the house hold members of the beneficiaries. A maintenance allowance of Rs.100/-

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per household has also been provided without much interruption. Laiason workers have also been appointed for every 100 beneficiaries to supervise the work of lthe beneficiaries and report to the authorities on the rate of survival of plants for the sanction of maintenance allowance.

In the case of Visakhapatnam district, the implementation or the programme was relatively tardy without such personal attention and supervision of the officials during the various operations associated with planting the orchards. Enough care was not taken while matching the sites and species. Most of the mango plantations of sample beneficiaries have been located or rocky hill slopes with little water retaining capacity. Further, sufficient care was not taken either by the beneficiaries or the officials to erect tree guards to protect the plants from animal depredation leading to a very poor survival rate. This led to non-payment of wages and maintenance allowance.

So far as the survival of plants is concerned, while the growth of organge and lemon in most of the orchards of the sample beneficiaries in East Godavari district is far from satisfactory and the rate of survival is also not upto the mark, the rate of survival of mango plants in Visakhapatnam district is absolutely poor and disappointing. While young seedlings are planted in the name of gap filling every year to maintain the stipulated 75% survival rate for getting maintenance allowance in East Godavari, the beneficiaries in Visakhapatnam district did not bother about it as it involves considerable expenditure to procure mango saplings, which they could not afford.

3. IMPACT OF THE PROGRAMME ON THE BENEFICIARIES:

Implementation of the programme had a considerable impact on the socio-economic conditions of the shifiting cultivators in the sample villages in the East Godavari district. The results are comparatively poor in the Visakhapatnam district. While nearly 195 mandays of additional employment per household has been created during the first year of plantation in East Godavari district, only about 102 mandays of employment is generated in Visakhapatnam district. About 90% of the beneficiaries reported maintenance of orchards as their main occupation in East Godavari district because of the ;maintenance allowance. In Visakhapatnam agriculture continued to be the main source of income and 73% of the beneficiaries has reported horticulture as their subsidiary occupation. Maintance allowance constituted about 12% of the total household income in Visakahapatnam district while its share is as high as 62% among the beneficiaries in East Godavari district. Similarly, a higher per week expenditure on various items of consumption is also reported in East Godavari district compared to their counterparts in Visakhapatnam. Thus, the inter district variations are unmistakably clear indications of the relative rates of success of the programme.

The second and perhaps the most important indicator of success of the programme is the abandonment of practices of podu. While most of the sample beneficiaries in Visakhapatnam district have totally abandoned 'podu' cultivation after the implementation of orchard programme. It is ironically because of non-availability of suitable podu slopes around their habitations. In East Godavari, which abounds in virgin forests around sample villages, sample beneficiaries have taken up fresh podu cultivation on new patches in addition to the erstwhile podu lands converted into orchards. This indicates that the tribals are yet to be convinced of the necessity to stop shifting cultivation for ecological reasons.

4. SUGGESTIONS FOR IMPROVING THE PROGRAMME:

The following suggestions are made to improve the effectiveness of the programme.

i) Suitability of the soil and climiatic conditions for raising particular type of plantation should be adequately checked and verified by scientific methods before implementing the programme in particular are.

ii) As the soils of the podu lands possess little water retaining capacity because of the loss of top layer of the soil, adequate arrangement should be made to water the plants during the summer months. As the hill streams are the only sources of water in tribal areas and the orchards are located far away from the streams, the tribals could not water the plants adequately. In order to overcome this situation underground water sources should be exploited.

iii) The technical knowledge and skills of the present laiason workers are totally inadequate to guide the beneficiaries in raising the orchards. As the liaison workers are the main link between the beneficiaries and the implementing agencies, people with considerable integrity and enthusiasm should be selected. They should first be trained by locating orchards in their own lands which can serve as a demonstration to others and then only extend coverage to the other beneficiaries. Eventhough this may slow down the programme initially, it will result in much higher productivity.

iv) The staff supervising the plantation work are not sufficient to cover the entire area under their jurisdiction. Though the services of the Mandal officials besides the Project Staff of the I.T.D.As. have been enlisted during the formulation of the project, in practice only V.D.Os. in Visakhapatnam district and I.T.D.A. Project Agricultural Officer in East Godavai district are supervising the programme. The field staff to supervise the plantation work should be increased multifold.

v) As the technical background of the tribal households is very low, adquate training in raising orchards under close supervision, stage by stage, until the plants have reached the stage of definite survival on their land, should be ensured. As the tribals are accustomed to very care-free life over a period of time because of their subsistence economy, periodical meetings should be arranged with the extension staff to convince the beneficiaries of the long term advantages of raising orchards, besides, impressing upon their the harmful affects of shifting cultivation on the ecology.

vi) In order to control podu or shifting cultivation, besides the horticultural programme, vacant plain land without much forest cover around the habitations which is either under the control of Forest Department or other Government Departments should be reclaimed and allotted to the tribal households. This will enable the tribals to concentrate on settled land, diverting them from podu cultivation mainly because the incomes from their meagre settled lands are not sufficient to feed them throughout the year. Once the land held by the tribals becomes

viable and sufficient for cultivation, they are likely to abandon podu cultivation which is unremunerative compared to settled land.

vii) The failure to achieve positive results in tackling the problem of shifting cultivation, not withstanding substantial investments in the past decades is not entirely due to technological inadequacies or lack of skills but also due to lack of enthusiatic response from the tribal people, particularly the village heads and community leaders who are commending considerable respect and power over the tribal people. So, concerted efforts should be made to convince these community leaders about the adverse effects of shifting cultivation on the socio-economic conditions of the tribal people, besides creating considerable imbalance in the tribal ecology, who will in turn popularise the message among the masses easily and motivate them to take up horticulture programme.

viii) Food habit of the tribals is another major constraint which is promting them to stick to Podu cultivation as tribals are accustomed to millet crops which are grown quickly in podu lands with little investment. In order to wean them away from podu cultivation besides implementing rehabilitation programmes, supply adequate quantity of millets and other food grains should be ensured until they are accustomed to the changed cropping pattern on settled lands.

CHANGE IN FOREST POLICY - AND ITS IMPACT ON NUTRITION STATUS AMONG CHENCHUS OF NALLAMALAI HILLS OF ANDHRA PRADESH

O.S.V.D. Prasad, *

Introduction:

Chenchus of Nallamalai Hills were basically food-gatherers till fifty years ago. They were the only Tribal group inhabiting the vast and thick forests of these hills. The Chenchus were living in small 'Pentas' consisting of 5 to 10 huts. Suited to the food-gathering habit is their material culture. The small conical shaped huts can be easily dismantled and rebuilt in a new place within one day by a family. The other material include a bow and arrow and a big knife.

Each of the 'Penta' had a geographical Jurisdiction in which they move for food gathering. They hunted small game freely and their dependence on forest for food was total. Each of the tree and animal species are pact of their mythology and religion. This relationship between nature and man was disturbed by introduction of new forest policy by Nizam in the Northern part of Chenchu b[illegible]nd by British in the South of River Krishna. The introduction of Project Tiger has further imposed restrictions which ultimately resulted in non replishment of food yielding resources fall in nutrition status and ultimately resulted in the incidence of Nutritional deficiency diseases.

In this paper the Impact of forest policy on the nutritional status of chenchu is analysed especially in the context of conversion of 'Project Tiger' into 'National Park'

Traditional Foods:

Traditional foods of chenchu includes roots and tubers, leafy vegetables, vegetables, flowers, fruits, seeds and nuts, honey, mushrooms and flesh foods.

Among the roots and tubers 'Chenchu gedda' a variety of wildyam is consumed on large scale. The other root is 'Elavara gedda'. Both these roots are available through out the year except rainy season and so they are life saving drugs for many house holds (Pratap etal 1973)

The leafy vegetables like ' Palakoora' 'Mulla totakura' and various other leafy vegetables are mainly available in rainy season. The consumption of leafy vegetables in summer season is very low as the summer is very hot and most of the plants die. Among the vegetables 'bittergourd' is abundantly available in rainy season. The Ippa (Mohua) flower mainly available during March and April is eaten raw or cooked with oil are used for distillation of liquor. Tamarind is consumed during May and June 'Chitimitipandlu' are small fruits available during September and October and bears and Chenchus compete with each other for this tasty fruit. Various other fruits are also available. 'Sarappau' is another relished delicacy while honey is eaten raw or in other foods. Small game is hunt to consume flesh foods.

Change in food habits:

The commercialisation of 'Chenchu economy' occured when forest contractor G.C.C. etc. started purchasing M.F.P. collected by Chenchus. The wages from forest labour and the money available from sale of forest produce have helped them to purchase food items from local markets. The introduction

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of rice scheme by government has also changed their food habits considerably. Now the food items include rice, jowar, pulses, Chilly, Onion and salt.

Forest Policy and Impact:

The declaration of entire Chenchu area initially as Reserve Forest and later on as 'Project Tiger' area has imposed several restrictions on food gathering habits of Chenchus. The protection given to wild animals against the interest of Chenchus only resulted in loss of flesh foods in the Chenchu diet as there is no scope for a replishment of food yielding species in the availability of food has considerably decreased, Further in the Tiger project area no commercial activity is permitted and so very few Chenchus get seasonal employment in fire protection activity. Therefore, the only source of livelihood is collection and sale of M.F.P and Chenchu has to depend on vagaries of commercial market. The Scope for settled cultivation is also limited by the restrictions of Project Tiger. The cumulative result is reflected in the poor dietary in take all these restrictions which further resulted in very low nutritional Status. The continued lower nutritional in take resulted in several nutritional deficiency diseases. The impact is analysed in the following categories:

1. Dietary intake against R.D.A., 2. Nutrient intake against R.D.A.
3. Nutritional Deficiency diseases and, 4. Lack of I.C.D.S. coverage

1. Dietary intake against R.D.A:

The mean intake of various food items per cansumption unit per day are presented seperately for the summer and rainy seasons in the Table-1. Compared to Indian recommended daily allowances. (R.D.A) the Chenchu diet shows a surplus of 164.95 gms (41.2%) in cereals during the summer, and 126.34 gms. (110.8%) in leafy vegetables during the rainy season. The food was deficient in all other food groups in both seasons, though in different degrees. The average cansumption of oil, sugar, and Jaggery is almost nil through out the year. The deficiency in pulses, nuts and seeds was negligible during summer, but it is as high as 94.43% and 57.12%, in pulses, seeds and nuts respectively during the rainy season. The deficiencies in leafy vegetables and pulses were made upto some extent by Mohua flowers and Madapu seeds respectively during the summer.

2. Nutrient intake against R.D.A:.

The average per capita intake of nutrients for the summer and rainy seasons is presented in the table. 2 The chenchu diet records a suplus of 47.36% protein during the summer compared to R.D.A. but in the rainy season it was reduced to nearly half of the intake in summer and records a deficiency of18.41%. The diet satisfies the requirements of Iron, Thiamine, and Nicotinic acid, in both the seasons While moderate was observed in calcium. Remarkable seasonal variation was observed in calories, protein, vitamin A and Riboflavin. The caloric in take which was almost satisfactory in the summer showed 39.6% deficiency in the rainy season. 27.78% Riboflavin deficiency was observed in the rainy season. The deficiency in fat varies from 36.90% in summer to 78.6% in the rainy season. The deficiency of vit. 'A' was as high as 82.6% during summer but it is surplus by 208% in the rainy season.

The figures in the table suggest that majority of Chenchu house holds suffer from caloric insufficiency throughout the year. The rainy season shows high degree of caloric mal nutrition. Nearly 90% of them could non consume even the minimum required which was very alarming. The consumption of fat was very less throughout the year. The intake of calcium which is another mineral nutrient was

observed with little variation in both the seasons. During rainy season about 40% suffer from Iron deficiency. *The most severe malnutrition was in Vit. 'A' nutrient and calcium.*

3. Prevalance of Nutritional deficiency signs:

The nutritional deficiency signs are prominently found among the chenchu Children. The most common signs observed were, enlargement of liver, soreness at the angles of the mouth, onthalmic diseases, hair discolouration, moon face and dental caries. No cases of bleeding in gums or rickets were observed.

Tuber-culosis was found in alarming proportions among all age groups (Sastry : 1990)

It was found that the coverage under I.C.D.S programme is almost nil eventhough three I.C.D.S *projects with head quarters at Achampeta, Atmakur and Yerragedapalem have operational areas* including Chenchu areas.

Measures Suggested:

The following measures are suggested to save Chenchus from malnutrition.

1. Introduction of I.C.D.S. and nutrition Programme:

There should be one exclusive I.C.D.S. Project coverin ; entire Chenchu area in this programme. The children upto 6 years of age and pregnant and lactating mothers will be given special diet. A special drive should also be made to give Vit. 'A' doses followed by D.P.T., Polio, B.C.G coverage and Iron Folic acid tablets distribution. This should be done to 100% popul tion in target group with meticulous fallow up.

2. Health Care:

Special camps should be held to Identify Chenchus suffereing from T.B. and other diseases and special T.B. hospital should be set up to tackle the problem inview of the high incidence of T.B.

3. Mobile Medical Units & General Health Camps:

3 more Mobile medical units should be started before activising the existing 2 Mobile medical units.

4. Settlement of Chenchus on Agriculture:

The Chenchus are presently mentally prepared to settle on agriculture. Where even agriculture is introduced in a systematic manner, the Chenchu cultivators ha e takenup commercial crops like Chillies, Cotton etc. *But this transition should be slow. Therefore l: t lands available adjacent to forest* areas should be alloted, so that the Chenchus slowly shift to ag. iculture, while continuing their present occupation of collection and sale of Minor Forest Produce.

NOTE: Some of the material presented in this paper was collected by a research team headed by Late Sri V.V. Ramana Rao.

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TABLE NO. I

AVERAGE DIETARY INTAKE PER C.U. PER DAY COMPARED TO R.D.A. AMONG CHENCHU HOUSE HOLDS

Food Stuffs	R.D.A.	Observed intake		Summer		Rainy	
		Summer	Rainy	Deficit	Surplus	Deficit	Surpl
Cereals (g)	400	564.95	388.18	--	164.95 (41.2)	11.82 (2.95)	
Pulses, Nuts and Seeds (g)	85	82.00	1.33	3 (3.52)	--	83.67 (98.43)	
Mutton and Fish	85	43.84	11.58	41.16 (48.4)	--	73.42 (86.37)	
Leafy vegetables and flowers (g)	114	88.97	240.34	25.03 (21.96)	--	--	126.3 (110.8
Non-leafy vegetables (g)	85	6.46	3.65	78.54 (21.96)	--	81.35 (95.70)	
Roots and Tubers	85	80.80	36.44	4.2 (4.9)	--	48.56 (57.12)	
Fruits (g)	85	2.77	29.82	82.23 (96.7)	--	55.18 (64.91)	
Milk & Milk products (ml)	284	13.25	74.26	270.75 (95.3)	--	209.74 (73.85)	
Sugar and Jaggery (g)	57	0.92	0.01	56.08 (88.38)	--	56.99 (99.98)	
Oils and fats (g)	57	0.51	0.923	56.49 (99.3)	--	56.077 (99.10)	

TABLE NO.II

AVERAGE NUTRIENT INTAKE PER C.U. PER DAY AMONG CHENCHUS COMPARED TO R.D.A. AND AVERAGE INDIAN DIET

Nutrients	R.D.A.	Summer			Rainy	
		Average Indian Diet	Average Chenchu Diet	Deficiency or surplus if any compared to RDA	Average Chenchu Diet	Deficiency or surplus, if any compared to RDA
Protein (g)	55.000	58.000 (+)3.000 (5.45)	81.046	(+)26.046 (47.356)	44.872	(-)10.128 (18.41)
Fat (g)	45 to 60	29 (-) 16. to 31 (35.55 to 51.66)	28.37	(-)16.63 to 31.63 (36.91 to 52.71	9.597	(-)35.403 to 50.403 (78.67 to 84.00)
Calories (g)	2800	2100 (-) 700 (25.00)	2705.00	(-) 95.00 (3.39)	1691	(-) 1109 (39.60)
Calcium (g)	1.0	0.6 (-) 0.4 (40.00)	0.832	(-) 0.168 (-) 16.8%	0.859	(-) 0.141 (-) (14.1)
Iron (g)	20 to 30	31 (+) 11 to 1 (55.00 to 3.33)	57.9	(+) 37.9 to 47.9 (18.95 to 15.96)	37.427	(+) 17.427 to 7.427 (87.13 to 24.75)
Vit. 'A' I.U.	3000 to 4000	1200 (-) 1800 to 2800 (60 to 70)	520.412	(-) 2479.58 to 3479.58 (82.65 to 86.98)	9252.78	(+) 6252.78 to 5252.78 (20.842 to 13.13)

TABLE NO. III

RANGE OF NUTRIENT INTAKE AMONG CHENCHUS

	Summer		Rainy	
	Minimum	Maximum	Minimum	Maximum
Protein (g)	9.402	244.044	2.288	24
Fat (g)	0.727	251.274	0.418	.378
Carbohydrates (g)	132.650	1574.910	15.972	2.008
Calories (C)	877.660	7897.030	76.78	4643.89
Iron(mg)	4.271	389.887	0.350	252.749
Calcium (mg)	29.480	3949.000	5.50	8843.05
Vit.'A'I.U.	21.380	2609.530	5.76	1,48,152.34
Riboflavin(mg)	0.0485	5.3000	0.0256	5.9236
Thiamine(mg)	0.0880	6.9322	0.0145	6.7216
Nicotinic Acid (mg)	0.5290	90.4900	0.228	38.386

TABLE NO. IV

PREVALENCE OF NUTRITIONAL DEFICIENCY SIGNS AMONG THE CHENCHU CHILDREN AGE GROUP (Years)

Deficiency	1-2			2-3			3-4			4-6			1-6		
	Boys	Girls	Total	Boys	Girls	Total	Boys	Girls	Total	Boys	Girls	Total	Boys	Girls	Total
Protein Calorie Malnutrition:															
Marasmus	..	5.88	2.281	..	..	..	..	..	..	..	..	..	..	..	2.381
Easily Pluckable hair	..	..	..	..	2.32	1.37	..	..	..	..	..	..	..	..	0.49
Hair Sparse hair	4	11.76	7.14	..	..	..	..	..	..	..	..	..	..	..	0.98
Discoloored hair	36	35.3	35.7	13.33	16.29	14.07	..	..	..	12	..	5.7	..	..	13.72
Mo.on face	16	23.53	19	..	..	..	14.28	5.88	9.68	4	..	3.8	..	..	9.80
B.Complex Vitamin deficiency:															
Angular Stomatitis	..	5.88	2.381	10.00	16.29	13.70	14.28	35.5	25.80	24.	22.72	23.07	..	..	15.19
Red and raw tongue	..	5.88	2.381	..	..	..	..	..	..	4	..	1.90	..	..	
Papillae hypertrophic	..	..	..	..	..	..	..	..	..	..	..	..	..	..	
Papillae atrophic	..	..	..	..	..	..	..	..	..	12	7.4	9.60	..	..	
Nasolabial dyssebacea	..	..	..	..	..	..	..	..	..	..	..	..	..	..	

TRIBAL INDUSTRIALISATION IN ANDHRA PRADESH: A STUDY REPORT

V.S.V.R. Acharyulu *

1. PLANNING PROCESS AND PRESENT STATUS :

1.1 Economic Development in a democratic set up in necessarily to be considered with improving the majority's living conditions. The condition of the masses though improved marginally ovr the last four decades, there is much to be done dince a sizeable majority still live in poverty.

1.2 A study of 44 developing countries revealed that the total 20% of the population had an average of only 5.6% of the national income as against 56% for the top 20%. The share of the lower 60% of the population was only 26% of the national income and the balance went to the upper 40%. Indian situation by far corresponds to these averages.

1.3 The Constitution and Plan Document therefore, pledge for improving the conditions of the poor. The focus is being laid on Economic Development through technological changes for achieving the desired objective of Economic Development of the masses. The process involves specific action programmes for ameliorating the conditions of the poor and for their effective implementation. There is need to bring in radical changes.

1.4 While this is the general position, the position of tribals in th State who constitute 5.9% of the State's total population as on 1981 is one of concern. The situation of tribals in the scheduled areas is much worse compared to the tribals living outside these tribal scheduled areas. The tribal population in the districts where identified scheduled tribal areas exist is indicated in Table - I.

TABLE-I

District	S.T.Population		Total
	In Scheduled Tribal Areas	Outside Scheduled Areas	
Srikakulam	1,03,836	1,306	1,05,142
Vizianagaram	1,50,235	3,109	1,53,344
Visakhapatnam	3,49,935	4,192	3,54,127
East Godavari	1,39,061	4,361	1,43,422
West Godavari	60,230	6,356	66,586
Khammam	4,13,134	16,825	4,29,959
Warangal	2,82,077	10,695	2,92,772
Adilabad	2,68,277	4,609	2,72,886

* Joint Director, Industries Department, Hydcrabad.

1.5 Tribal population exists in other districts also as per the details in Table-II.

TABLE - II

SCHEDULED TRIBES IN NON-SCHEDULED AREAS IN A.P.

District	S.T. Population
Krishna	66,927
Guntur	1,39,749
Prakasam	77,847
Nellore	1,77,497
Chittoor	78,834
Cuddapah	37,580
Ananthapur	82,026
Kurnool	39,914
Mahaboobnagar	1,55,240
Rangareddy	72,656
Hyderabad	14,488
Medak	68,516
Nizamabad	90,266
Karimnagar	60,567
Nalgonda	1,95,660

1.6 Occupational analysis reveal that 50% of the tribals are workers living in rural areas. Of them, 87% are engaged in agriculture sector. A very nominal percentage (around 4% are engaged in household industry such as manufacturing, processing, serving and repaires. This demographic analysis provides an insight into the economic life pattern obtaining in the tribal communities. Over the past three decades, several committees have gone into the study of economic advancement of the tribal communities with the main objective of integrating them actively in the main stream of national life without disturbing the harmony of tribal life.

1.7 A majority of the tribals are agricultural workers and their agriculture being marginal, the only way to better their economic conditions is by diverting the workforce to secondary activity in keeping with the local natural resources. Thus, industrialisation assumed its role.

2. POLICY GUIDE FOR TRIBAL INDUSTRIALISATION :

The quest for tribal industrialisation in 1970s was for providing economic assistances to uplift the tribals above the poverty line. That was a mixed approach or we could call it a concluded approach that the tribal industrialisation means industries in tribal aras and tribal industries as well. The thrust was to encourage large and medium industries with the hope that the promoters of these industries would train the tribals to take up skilled jobs in the factories. The State Government has also announced higher rate of investiment subsidy apart from very special concessions like exemption from payment of Sales Tax for the first few years, etc. The hopes and ambitions did not materialise in erality. Very few peeople were able to get jobs that too in unskilled occupations. The options, therefore, are whether to (i encourage setting up of industries in the tribal areas or (ii encourage starting of industries by the tribals only or (iii

to encourage small scale industries both by tribals and non-tribals while taking special agreements from the large and medium industries assuring employment of a certain percentage to tribals in such industries.

2.2 The Working Group recommendations for the Seventh Five Year Plan is appended to illustrate elaborately the findings of the issue of tribal industrialisation (Annexure-I. The policy recommendation was to take safeguards for tribal employment while giving permissions for starting large and medium industries and special efforts for encouraging tribals to start cottage, village and small scale industries.

2.3 While all the committees so far constituted have broadly recommended tribal industrialisation, it would be unreal if the tribal tracks are totally sealed from the programmes for promoting industries thro' non-tribals with proper safeguards for the tribals and linkages for providing compensations, job opportunities, eliminating exploitation etc. More so when the tribals by their very inherent social and cultural utter backwardness cannot take-up the challenge of industrialisation even with several incentives and concessions offered by the State Government. It is therefore disirable that non-tribal should also be allowed to set up industries in the tribal areas duly protecting and safeguarding interests of the tribals since the gradual industrial advancement of the tribal areas is more likely to result in inculcating the spirit of entrepreneurship and the desire for advancement and prosperity thro' industrialisation among the tribals.

2.4 Promotion of industries by tribals present a complexity of problems which are not faced by non-tribals. The programme can be classified into two groups-one for the tribals in the areas of tribal concentration and the other for dispersed tribals. The tribal industrialisation should focus special attention on tribals in the scheduled areas. The tribals in plain areas should be able to avail the programmes on the lines of similar poverty amelioration programmes for weaker sections of the society.

2.5 Small Scale Industries can be promoted at the Growth Centres indicated by the High Power Committee. The cottage industries could be close to the living places of tribals. This is suggested for easy creation of infrastructure facilities and inter-dependent services. The Growth Centres are:

1.	Srikakulam District	1. Bhadragiri 2. Seethampeta 3. Pachipenta
2.	Visakhapatnam District	1. Paderu 2. Araku / Araku Valley 3. Chintapally 4. Koyyuru 5. Ananthagiri 6. Sileru
3.	East Godavari District	1. Rampachodavaram 2. Addateegala 3. Kutravada

4.	West Godavari District	1. Polavaram 2. Buttaigudem 3. Bragadapalli 4. Kannapuram 5. K. Ramachandrapuram
5.	Khammam District	1. Bhadrachalam 2. Yellandu / Sudimalla 3. Boorgamphad 4. Cherala
6.	Warangal District	1. Eturan..garam 2. Govindaraopeta
7.	Adilabad District	1. Utnoor 2. Jainoor 3. Indervelli 4. Hasnapur 5. Ichoda 6. Nardeikonda 7. Wankidi

3. TRIBAL INDUSTRIES :

3.1 The High Power Committee appointed by the State Government during 1979 has made far-reaching recommendations for tribal industrialisation. The Committee has suggested many candidate industries that could profitably be promoted for establishing by the tribals in the scheduled tribal areas. The listof industries Suggested by the High Power Committee are :

1.	Srikakulam	1.	Tamarind Starch
		2.	Oil Rotary
		3.	Sago Factory
		4.	Coconut and Coir Complex
		5.	Saw Mill
		6.	Bee-Keeping
		7.	Power Looms & Handlooms
		8.	Readymade Garments
		9.	Khandasari Unit
		10	Aluminium and Brass Utensils.
		11.	Bullock Carts & Agricultural implements
		12.	Palm Fibre Extraction.
2.	Visakhapatnam District	1.	Bee-Keeping
		2.	Tamarind Dee-seeding Unit
		3.	Sago unit

	4.	Saw Mill
	5.	Washing Soap
	6.	Splints & Veneers
	7.	Cane Furniture
	8.	Crushing of Non-Edible Oil
	9.	Niger Seed Oil Extraction
	10.	Dehydration of Ginger
	11.	Card Board
	12.	Safety Matches
	13.	Starch from Tamarind Seed
	14.	Lemon Grass Oil
	15.	Basket Maing
	16.	Mat Weaving
	17.	Agricultural Implements.
3. East Godavari District	1.	Bamboo splints for Agarbattis and Bamboo Chicks
	2.	Furniture
	3.	Tamarind Seed Dhal
	4.	Soap nuts & Sheekai Powder
	5.	Rope making
	6.	Oil Expeller
	7.	Kisan Rice Mill
	8.	Jaggery making
	9.	Bricks manufacturing
	10.	Unit based on Annato Seed
	11.	Essential Oils unit
	12.	Bilwan Oil Extraction Marking nuts
	13.	Palm Fibre Extraction
	14.	Agricultural Implements
4. West Godavari District	1.	Furniture Unit
	2.	Saw Mill
	3.	Slate Frame unit
	4.	Adda Leaves
	5.	Washing Soap Unit
	6.	Palm Fibre Extration
	7.	Slate Frames
	8.	Basket Making
5. Khammam District	1.	Mohwa Seed Oil
	2.	Safety Matches
	3.	Oil Rotary
	4.	Sunflower Seed Crushing
	5.	Charcoal

		6.	Dhal Mill
		7.	Rope making
		8.	Adda Leaf
		9.	Kisan Rice Mill
		10.	Beedi manufacturing
		11.	Basket making
		12.	Mat Weaving
6.	Warangal District	1.	Beedi manufacturing
		2.	Washing soap
		3.	Oil Expeller
		4.	Kisan Rice Mill
		5.	Rope making
		6.	Tractor Servicing
		7.	Adda Leaf
		8.	Met Weaving.
7.	Adilabad District	1.	Splints & Veneers
		2.	*Matches*
		3.	Mohwa Seed Cusher
		4.	Washing Soap
		5.	Gum Paste
		6.	Dhal Mill
		7.	Linseed Oil
		8.	Clay Roofing Tiles
		9.	Lime Kiln
		10.	Dehydration of Onions.

3.2 About 300 industries have come up in tribal areas over the last one decade including a major paper mill, a medium sized paper mill and a plywood factory apart from small scale industries. The small scale industries tarted comprise of mini oil expellers, flour mills, sugarcane crushers, saw mills, carpentry and furniture works bakery, tyre retreading, auto works, stone crushing, brick making, agarbatti, rice mills, motor rewinding, service and repair workshops, cement products and other forest based industries. The district-wise details are:

1.	Srikakulam	16
2.	Vizianagaram	37
3.	Visakhapatnam	47
4.	East Godavari	16
5.	West Godavari	103
6.	Warangal	59
7.	Khammam	14
8.	Adilabad	16
	Total	308

3.3 Taking into consideration the natural renewable resources available in the tribal areas and the possibility of their first state conversion with low level technology products with certain degree of value addition can be promoted. Intermediate technology has to play a vib-rant role in these industries. To cite, pressing of Drum stick seed to produce oil for Lubricating sophisticated machines can be started. It is an import substitute item and can also be exported. Camphor, an essential medicinal input, can be made with 'Kukka Tulasi'. In addition to the host of industries suggested by the High Power committee - (1) Leaf Cups; (2) Ben Oil; (3) Camphor manufacturing using native techniques; (4) Hank Yarn manufacture using 12 or 16 spindle compact units; (5) Safety Matches; (6) Picles manufacture; (7) Washing soaps; (8) Mehindi Powder; (9) Handmade paper, can also be promoted. Many more new areas can be explored by having continuous dialogue with different scientific agencies and industrialists with rich experience.

3.4 The industrial project ideas suitable for tribal industrialisation are already with us and many more can be added. What is needed is creation of necessary atmosphere and exposing the tribals to training programmes in the relevant fields and taking concerted efforts for meaningful advacement in this sphere of activity.

4. MANPOWER SUPPORT :

4.1 In Andhra Pradesh, the administrative structure through the institution of Integrated Tribal Development Agencies (ITDAs) has been created but these ITDAs lack supporting staff to take care of the industrial development. Industrial field is a specialised activity and general management personnel may not adequately, suit to take up the task of tribal industrialisation. It is, therefore, necessary that each ITDA is provided with an Assistant Director technically qualified in the discipline of either Mechanical Engineering or Chemical Engineering. The placement of individuals should be based on competence, sensitivity and dedication so that a sea change in the concept and implementation of tribal industrialisation could be brought about in the years to come. The responsibility of the Industries Officer in the ITDA should be to provide escort services and to take care of the needs of the entrepreneurs till such time a unit is commissioned. Post investment service like regular followup, guidance in production techniques packaging and marketing should also be provided by this officer. Critical evaluation of the programmes at periodical intervals should be a built in process so that the short falls could be identified and eliminated, Productivity levels in the fields of Agriculture, Horticulture, Animals Husbandry and Forestry would open up unlimited scope for industrialisation as they constitute a source for renewable raw material. The landless agricultural labour should constitute the first target group of beneficiaries. In Andhra Pradesh, about 49% of the tribal population in the Schedule areas are landless labour.

4.2 New recruits may not be of much help to achieve the ambitious programme through the ITDAs. The expenienced Extension personnel in the fields of Mechanical Engineering and Chemical Engineering (Graduate level), who undertake to serve atleast for a period of 5 years in ITDAs could be suitable proposition. Transfer of existing personnel (Assistant Directors) may not provide us the needed staff base since the person appointed will always like to come out of the tribal belt as has been happening now

in many other fields. Selection from the existing experienced Extension officer (Industries) who have an inclination to serve the tribals could be picked up and posted to these assignments.

4.3 At the Headquarters, either in the Commissionerate or Tribal Development or Tribal Development Cooperative Finance Corporation, there could be a Senior Official in the cadre of a Dy. Director or a Joint Director to oversee the functioning of the industrial staff posted in ITDAs and toguide them from time to time and also to have a constant dialogue with the development agencies and financial institutions in mounting the industrial programmes in the scheduled areas. The staff salaries on this account could be met from out of the allocations made from the Industries Budget so that there may not be any strain on the resources of the ITDAs or the Tribal Corporation. It is learnt that certain percentage of matching grant can also be obtained from the Govt. of India on staff expenditure. This source also can be tapped.

4.4 Sub-categories within the selected state categrories whose mambers should have on obligation to serve tribal areas for a minimum period of 5 years needs to be constituted. Only suitable officers having the requisite aptitude and dedication should be picked up by a selection process and posted.

5. TRAINING :

5.1 The level of skills of the tribals have to be taken as a pre condition in the introduction of new practices. Tribal Women play an important role in tribal areas. They can also be trained in a big way to undertake the industrial venture. The size of the units visualised should always be small as to be managed by an average tribal. The tribals need to be prepared before hand to participate in industrialisation or in the alternative, to make gainful living not with standing the establishment of a new modern industry.

5.2 The study report of St. Xavier Institute of Social Science, Bombay gives us beneficial clues to go about in this direction. This institute has picked up S.S.C. failed candidates and others with Upper Primary level education and exposed them on machine training programmes in the nearby towns for periods extending between 6 months 12 months depending on the line of activity. Each group of 10-15 tribals were accredited to anextension worker who stayed with the trainees allthrough the trainning period to guide and coordinate the programme. The Institute observed that persons who passed Matriculation or higher level of education are generally sucked out of the tribal area and are in fond of job avocations. They are not prepared to stay in the tribal area. I parting training to such people will be of no use in tribal industrialisation since at any moment, they are inclined to go out of the area.

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appropriate technology from the agencies engaged on this task, evolving suitable semi-mechanised machines, exposing the tribals to training and guiding them to set up industries in a continuous process.

6. FLOW OFINSTITUTIONAL FINANCE :

6.1 As a strategy for overally development of tribal people it was conceived that industrialisation could also be a profitable route and hence the State Govt. have to plan industrialising the tribal areas. In the past, the State Govt. has appointed a High Power Committee which has suggested a number o Cottage and village Industries and certain Small Scale Industries for starting by tribals themselves utilising the minor forest produce available in the scheduled tribal areas. The Committee has also recommended certain incertives for industries in tribal areas so that the large and medium industries and other bigger small scale industries that are started in tribal belts could provide employment to tribal people after exposing them to skilled job avocations. The situation in Andhra Pradesh, in most of the areas, is that the tribal belts are inhabited both by the nontribal and also by tribals. There are no remote areas like the tribals belts available in the North-Eastern States or Upper India. As a long term strategy, it is necessary to encourage setting up of industries in the small scale sector particularly by non-tribals also while counting on efective programmes for starting cottage and village industries and tiny industries in the small scale sector by the tribals.

6.2 For any industrial venture, the finances both terms loans and working capital loans flow from financial institutions which require mortage of the land and buildings for giving finances, except in the areas where the APIIC has constructed the factory sheds. The entrepreneurs do also construct their own factory sheds on the lands allotted by the APPIC with the finance from the inancial industitutions. The scheduled areas Land Transer Regulations Act of 1959 prohibit mortgage or sale of land to non-tribals under Sec.3 (i) (a). The APIIC has constructed Industrial East-test at some of the Growth Centres in the Sch. Tribal Areas as per the Govt. Policy and they were not able to execute the sale deeds in favour of industrialists through the buildings were handedover a decade back because of this restrictions. The APIIC has already brought to the notice of the Govt. that this clause is cousing hardship to the non-tribal entrepreneurs or raising the required finance from Financial Institutions like APSFC and Commercial Banks as they require mortgage of the land and buildings for giving finance.

6.3 It is, therefore, felt necessary that stipulations in the Act of 1959 should be relaxed in the case of Industrial Sector with the amendments as detailed below. This general Act was passed Keeping in view the wholesale acquisition of the Tribal lands by non-tribals to the determent of the interest of the Tribal people and this general stitulation should not come in the way of industrialising the Tribal Areas for the long term benefit of the tribals and for preparing them to take-up industrial ventures in the SSI Sectors in the years to come.

(a) In case of units taking financial assistance from APSFC or other Nationalised Commercial Bancks, relaxation is to be given to mortgage the land by the tribals or non-tribals in the scheduled tribal areas in favour of such institutions when they obtain finances from the institutions for starting industries.

(b) The APIIC should be declared as the sole agency for construction of Industrial Estates or Industrial Development Areas in scheduled tribal areas. The APIIC which is a state owned undertaking should be allowed to sell the factory sheds/developed areas to the industrialists whether tribal or non-tribal for industrial purpose in the scheduled tribal areas. The land sold by the APIIC to the industrialists should be allowed to be registered and in case any entrepreneur closes down his venture for any reason at a later date, the property should be handedover back to the APIIC ffor allotment to new entreprenurs. The sale price paid by the original entrepreneur should be refunded to him after obtaining the present value of the factory shed/ developed land from the new industrialists.

6.4. The above two stitulations adequately take care of any abuse in acquisition of lands by the non-tribals in the scheduled Tribal Areas for any other purpose other than for starting an industry. The Government to issue necessary amendments to the Act incorporating the points suggested above as it would go a long way for industrialisation of the Tribal Areas and also help in improvement of economic conditions of the Tribals.

6.5. *The APSFC had pooled funds from the Tribal Welfare Department from out o the allocations* of tribal Sub-plan for serving the needs of financing the industrial ventures covering industries by the tribal entrepreneurs. As discussed earlier, ventures that could be started by tribals are expected to be very small and the tribals are expected to be very small and the tribal entrepreneurs are now to industrial field and hence the debt repaying capacity is limited or restricted. The ventures cannot absorb the usual levels o interest rates charges by the Commercial Banks and the term lending institutions. It is, therefore, suggested that the SPSFC should provide the term finances at the rate of one percent (1%) while the *rates* of interest charged by the Commercial Banks should be subsidized to the extent of 7 to 8% tp allow a not rate of 3% to the beneficiary. Such a deliberate step will lead to successful running of term loans should be spread to 15 years as against the present level of 5 to 7 years covering the general category entrepreneurs.

6.6. The finance required for acquiring fixed assets by the tribal entrepreneurs can be provided by the A.P. State Financial Corporation or the Tribal Finance Co-operative Corporation. The working Capital needs have to be necessarily provided by the Scheduled Banks and the Co-operative Banks functioning in the Scheduled Tribal Areas.

7.INCENTIVES FOR NEW INDUSTRIES

7.1. Certain incentives were announced during 1976 and 1977 for rapid industrialisation of tribal areas

(Copies enclosed vide Annexure - II (a) to (c)

Incentives to all categories o Entrepreneurs:

(a) Investment Subsidy at 20% on the cost of fixed assets;

(b) 50% concession in Sales Tax on purchase of raw materials, machinery, equipment etc.

(c) Complete exemption of Sales Tax on sale of products for a period of 5 years. (Subsequently this was made applicable only to units with a capital investment upto Rs. 100 lakhs).

(d) Exemption from Non-Agricultural Assessment;

(e) Price preference of 5% over and above the existing price preference for a period of 5 years covering small scale industries in the Governmental purchase.

Incentives to Tribal Entreprencurs:

(a) Power subsidy to the extent of 50% for a period of 5 years;

(b) Interest subsidy between the actual rate of interest and the differential rate of 4% on any type of loan from financing institutions;

(c) Developed plots on free of cost. Developed plots have to be provided by the SPIIC.

(d) The factory sheds to be provided by the APIIC and cost realised over a period of 20 years free of interest. The incidence of interest to be reimbursed to the APIIC by the Government.

(3) Girijan Corporation to give first preferncc in disposal of minor forest produce.

7.2. The past experience show that incentives were taken advantage of by the large and medium industries to a great extent while the tribal entreprenurs could not avail much of the facilities provided. This was due to various reasons like incapability of tribal antreprencurs to start industries due to ...equate skill development and managerial capabilities, lack of adecuate training programmes and an ...mework to take care of the industrial segment within the ITDA Institutional framework.

7.3 Large and Medium industries go to tribal areas not because of love of tribals or commitment for their development but due to the economic compusions of the industry to be nearor to the source of raw material. The promises of big industries to provide skilled job opportunities to tribals was boliod ...d hence there is need to have-second look in providing incentives to large and medium industries or ...se people from plain areas who wish to start industries in the scheduled tribal belt in the small scale ...or. A district and separate approach also has to be adopted in respect of tribals who are living outside ...scheduled areas in case they wish to start industries.

7.4. As a policy framework, encouraging large and medium industries in tribal belts is to be on a very selective basis. The incentive for them could be limited to making available the required land and an investment subsidy at 30% on the capital investment. Incentives to tribal entrepreneurs for starting industries in tribal areas apart from 30% Investment Subsidy could be:

(a) Exemption from payment of Sales Tax and Purchase Tax for the first 10 years from the date of going into commercial production;

(b) Power subsidy at 50% for the first 10 years;

(c) exemption from stamp duty, water rates and non-agricultural assessment taxes;

(d) making available developed plots free of cost by the APIIC to Scheduled Tribes Entreprencurs;

(e) Making available factory sheds at cost by the APIIC on hire purchase basis without interest and the amount to be recovered over a period of 20 years;

(f) Making available finance covering term loans at 1% rate of interest and working capital loans at 4% interest;

(g) Purchase preference upto 20% in the Govermental Purchase Programme;

(h) transport subsidy at 50% upto the nearest rail head;

(i) Girijan Co.operative Corporation to provice the miner forest produce to that tribals to the excent required to serve a raw material.

7.5. The above incentives would definitely make the tribal ventures as successful industries and remove the inadequacies.

7.6 In respect of tribals living in other than scheduled areas, the incentives could be on par with the special incentives recently announced by the State Government covering the S.C. Entrepreneurs. There incentives include:

(a) Investment Subsidy calculated at 25% of the capital cost;

(b) Interest Subsidy at 6% for a period of five years upto a maximum of Rs. 1.00 lakh per year per unit;

(c) Reimbursement of Sales Tax and Central Sales Tax on sale of finished goods and on raw materials for a period of 5 year upto a maximum of Rs. 50,000/- per year per unit.

8.MARKETING

8.1. Marketing is the key factor or successful running off any industrial venture. The tribal entreprencure may not be able to attend to marketing by themselves. The Tribal Corporation should seen up a marketing wing within itself to take care of this nec ! and to provide affectove linkages sale of all the products made by the tribal entreprencurs. The Tribal Corporation should not add any handling chargeson the products made by the tribal industries so that they could be available at competitive rates. However much we profess on allowing the prrice preference to small scale industrial units in the last one and half decades, we have found in reality that the buying organisations are not given any price preference. Their reasons also are very valid since their activities are commercial and the procurements should be on compotitive basis and the social abligation should not make any inroads in their cost structure. It is, therefore, suggested that a set up like the one suggested ie. sale of products without any mark-up by the Tribal Corporation should be adopted. The sales effected by the Tribal Corporation covering the goods produced by the tribal entrepreneurs should also be exempted from the purview of APGST to avoid duble taxing.

8.2. The Girijan Cooperative Corporation and the A.P. State Trading Corporation have not done any help in this area as envisaged by the High Power Committee. Hence the specially created Tribal Finance Co.op. Corporation should undertake this responsibility.

SUMMARY OF RECOMMENDATIONS

1. Majority of the tribals are agricultural workers and their agriculture being marginal, the only way to better their economic conditions is by diverting the work force to secondary activity in keeping with the local natural resources. Thus, industrialisation of tribal areas assumes its role.

2. Promotion of industries by tribals present a complexity of problems. Tribals by their very inherent social and cultural background cannot take up the challenge of industrilisation even with several incentives and concessions as releaved by the past experience.

3. Landless agricultural labour should constitute the first target group of beneficiaries.

4. Setting up of certain industries by non-tribals on a selective basis will result in inculcating the spirit of entrepreneurship and the desire for advancement and prosperity.

5. Tribal industrialisation should focus on tribals in the scheduled areas and other dispersed tribals. Dispersed tribals in plain areas should be able to avail the programmes on the lines of similar poverty amelioration programmes for weaker sections.

6. The concept off Growth Centres approach should be adopted for promoting Industries in Tribal areas.

7. Special Training programmes should be implemented to enable tribal entrepreneurs to acquire the needed basic technical and managerial skills for setting up industries. The experiments made in the post by St. Xzvier Institute of social sciences, Bombay can be profitably adopted in A.P.

8. Industrial field is a specialised activity and general management personnel may not adequately suit to take up the task of tribal industrialisation. Special cadres to be created in the ITDAs and Tribal Finance Corporation. Industries officers with technical qualifications and experience and having aptitude for dedicated work in tribal areas should be posted to assume the responsibility.

9. Intermediate Technology & Appropriate Technilogy should be used extensively for Tribal Industrialisation.

10. In case of units taking financial assistance from APSFC or any Nationalised Banks relaxation to mortgage the land by the Tribals or Non-Tribals in the seheduled areas should be provided by suitably amending the Act.

11. APITC should be declared as the sole Agency for constructions ITDAs/IEs in the Tribal areas. It should also be allowed to sell plots/sheds to Industrialists Tribal or Non-Tribal. In the event of closure or misuse, the property should be handed over back to the APIIC for allotment to new entrepreneurs duly refunding the original price to the first allottee.

12. The term finance by APSFC to the Tribal Entrepreneurs could be one percent interest rate and in respect of Commercial Banks to be subsidized to a net of 3%. Similarly repayment should be spread over for 15 years from the present 5 to 7 years.

13. Working capital has to be financed by the scheduled Banks and the Cooperative Banks in the scheduled areas.

14 There is need to revise the incentives now available for new industrial Growth and make them more attractive.

15. Large and Medium industries should be compelled to train certain percentage of tribals in the skilled and semi-skilled jobs relevant to the industry and absorb them in the factory. While issuing licence itself, it should be clearly spent in the licence.

16. All goods produced by Tribal Entrepreneurs should be exempted rom APGST.

17. The Tribal Finance Corporation should be the agency to market the products made by the Tribal Entreprenurs. The Services rendered by the Girijan Corporation and the A.P.State Training Corporation in the post in extending marketing help to the tribal industries was not satisfactory. Special facilities like sales Tax Exemption, Transport subsidy is necessary to make the products competitive.

DEVELOPMENT OF TINY ENTERPRISES IN HILLY AREAS-A CASE FROM EAST KHASI IIILLS

J.B. Ramkumar*

0.1 Introduction

The development of smaller enterprises including industrial units and service sector establishments is important in the context of generating higher incomes and employment in rural, semi-urban, and tribal areas. This can be achieved through systematic and planned efforts of development agencies and various organisations covering the decentralised sector, viz., Khadi and Village Industries, Handlooms and Handicrafts, Coir and Silk. The All India Census of Small Industries has revealed that a little over 90 per cent of small units have capital investment in plant and machinery not exceeding Rs. 1 lakh. In view of this, the bigger units is considerably limited. In the latest Industrial Policy Statement of July 1980, the scope of 'Tiny Sector' was enlarged to cover all enterprises with investment in plant and machinery not exceeding Rs.2 lakhs and situated in rural and semi-urban areas with a population not exceeding 50,000. These enterprises do not call for a high level of infrastructure and are ideally suited for local entrepreneurs, particularly those coming from the weaker sections viz., tribals, artisans, educated unemployed, landless labour etc. The narrow capital base in these enterprises gives rise to problems peculiar to the sector and it is felt that special developmental and management skills are needed for promoting this sector in a sustained manner.

0.2 Objectives of the study

The NISIET had taken up, at the instance of the Directorates of Industries and Tribal Welfare, Government of Meghalaya a study on the industrial, service and small business enterprises for local khasi tribal community in East Khasi Hills of Meghala, a state. Meghalaya is mainly hilly and in between hills, there are some fertile plains. The partition of the country in 1947 and the subsequent c closure of the border trade with East Bengal (now Bangladesh) greatly affected the cultivation of crops and created untold economic hardships to the border people Eighty per cent of the people in Meghalaya are tribals, predominantly Garos, Khasis and Jaintia's each having their own way of living, customs and outlook. The female participation is high among non tribals. Another interesting aspect, the femals participation is quite considerable (17.9%) in industries specially household, in trade (27.2%) and 'other services' (17.7%).

0.2.1. The tribal development plan of Meghalaya aims at meeting special requirements of the state on account of its being a hilly region with long international border and predominent presence of tribal population. With low density of population (59 persons per sq.Km) Meghalaya offers national attraction for influx of population from out side, specially from high density areas. The State Government legislations to safe-guard the economic, social and cultural interests of the local people are also

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commendable. One such legislation for regulation of transfer of lands and regulations of employment are to be considered only as the first step in safe-guarding local people's interests.

0.2.2 Meghalaya falls in the last level of development. Dispersal of few medium scale industries in uneven in the state. The industrial concentration is occuring in and around Shillong town and there are pockets where the level of industrialisation is at a very low ebb. Cherrapunjee is one such pocket in East Khasi Hills.

0.3 Cherrapunjee - A profile

Cherrapunjee (also called Sohra) is marked by steep slopes, deep gorges, ravaines and hilly rivers forming cascades and water falls. Cherrapunjee - Mawsynram area records highest rainfall in the world. The rainfall during 1980 was recorded around 12,000mm. Rainfall comes during the months of May to October; and for weeks together sunshine is not visible. During the other months the climate is very pleasant. In the rainy season the daily rain does not adversely affect the health of the people.

0.3.1 Cherrapunjee constitutes 10 villages with a population of 6014, as per 1981 census, and is the administrative centre of Shella-Bholaganj development block. The area is populated mainly by Khasis. During the British rule the Khasis of cherra were having flourshing trade with the people of sylhet district (now in Bangladesh) in their products such as lime, oranges texpatta, beatle leaves, arecanut, coal and iron. Before the partition these products had an outlet in the Surma Valley (now in Bangladesh) in exchange for food and other daily necessities. In those days this area was prosperous but accessible only by foot to the rest of the Meghalaya state.

0.3.2 In the olden days Cherrapunjee was a famous place and its people discovered the process o smelting pig iron in crude form and exported this to the neighbouring areas. Indigenous lime burn ing and extraction of coal is an age old occupation of the Cherra Khasis, and this clearly indicatesthat they were very industrious

0.3.3 The partition of India and almost shatteered the economy of the Cherra people. Suddenly the once prosperous people in this area were reduced to destitution. Topography, climate, closure of the border, and uncertainity of trade across the border and the consequent near isolation had led the people of Cherrapunjee to continuously face hard ships. Nature has endowed this area with abundance of minerals and forest wealth and there is ample scope to develop different types of enterprises. This only can sustain the economy of Cherrapunjee area as there is very little scope to develop agriculture. Moreover, Cherrapunjee is famous for its scenic beauty and there is scope to develop tourist based enterprise to attract more and more visitors. This will boost up the economy of the area. The nearby Mawsmai Falls and the Mawsmai caves in its vicinity attract already a good number of visitors throughout the year. The Mawmluh-Cherra Cement limited., the only large scale industry of the State, is located at Cherrapunjee. This unit produces port-land cement by using locally available raw materials. It is a great boon to the people of Cherrapunjee areas from the employment point of view. The establishment of the cement factory has given rise to employment in coal, limestone, mining and brick business for the truck operators, contractors and for sundry services, which have come up. This large scale unit in a backward

area like Cherrapunjee is primarily responsible for general development of certain infrastructural facilities, while providing an impetus to develop further enterprises, services and business.

0.3.4 Besides agriculture in and around Cherrapunjee, the notable household industry is beekeeping. The Ramakrishna Mission which its main centre and other centres of activities in nearby villages imparts technical as well as vocational training especially in the traditional activities of beekeeping, bamboo and cane work, blacksmithy and carpentry. St. John Basco school is another institution serving the training needs of young men and women in technical trades since 1922, where the main skills imparted are printing, binding, tailoring, carpentry, furniture making, joinery and mason work.

0.3.5 There are very few small scale enterprises in Cherrapunjee. They are lime kilns, carpentry and blacksmithy units, bakery and cement hallow brick manufacture. Cottage industries such as cane and bamboo work, woodwork, knitting, craft of weaving and yarn from pine bares engage a number of skilled hands in the villages.

0.3.6 To cater to the local needs a weekly market is held and some retail trade enterprises in grocery, stationery, honey selling centres, fruit and vegetable stalls, tea and snack stalls have come up recently at cherrapunjee. But these services are inadequate to meet the needs of the people living in and around Cherrapunjee, including the cement factory colony. Cherrapunjee is the head-quarters of Shella-Bholagunj development block and the government employees and the local population mainly depend on Shillong for many of their basic services. Cherrapunjee is served by the United Commercial Bank and the Meghalaya Cooperative Apex Bank Ltd.

0.3.7 Cherrapunjee with its unique climatic conditions, abundance of lime stone, coal and clay, reserves, forest resources and tourist attraction has the potential to grow. The Mawmluh Cherra Cement Limited, has already made dent and initiated the process of industrialisation. This industrial base can be widened and strengthened through the right kind of strategy to develop tiny ancillary and auxiliary industries based on the requirements of the cement plant. The establishment of tiny enterprises based on resources and demand of Cherrapunjee will also greatly help the inhabitants to raise their income, as agriculture has limited scope (Annexure). Once such an industrial base is created more and more local people will also participate in taking up business and service enterprises which will serve their interest.

0.4 Development of Entrepreneurship among Khasi Tribals

Among the critical factors limiting industrial growth in Meghalaya state is the non-availability of entrepreneurs. Incidentally these entrepreneurs are 'made' and not 'born'. It becomes a scarce element in a tribal economy like Meghalaya where lack of entrepreneurs to perceive opportunities, organise resources and to set-up and successfully run the enterprises is very noticeable. There is a dire need to find out latent entrepreneurial talents in the local Khasis and their capacity to be self-employed. Many lack self confidence to come forward to start enterprises in spite of high literacy in the state. The enterprising nature is not fully developed and the motivation to take risk against frustrations is not strong enough. Some need counselling on industrial opportunities and other knowledge regarding the proce-

dure to establish and manage an enterprise. If a comprehensive programme on promotion of entrepreneurship could be taken up, this would meet the need of imparting information, providing, motivation and filling up skill gaps. It is argued that this way many new entrepreneurs might be developed and acquire competence to set-up and operate enterprises. It is a heartening feature that women in Meghalaya are highly industrious and enterprising. This fact has not been fully utilised for starting enterprises by them.

0.4.1 The package programme to develop entrepreneurs should include following steps:

a) Wide publicity of the prospective enterprises in the area;
b) Identification and selection of persons who could be trained as entrepreneurs;
c) Sharpening of their capabilities;
d) Ensuring that potential entrepreneur (trainees) has a viable enterprise;
e) Equipping him/her with basic managerial understanding;and
f) Helping him/her to secure necessary financial,infrastructural and related assistance so that the enterprise materialises within the shortest possible time.

0.4.2 Selection of potential Entrepreneurs

The team publicised the information about the prospects for the different enterprises through the local District Industries Centre, Tribal Development Authority, shillong and the Meghalaya Industrialists Association (MIA). Data on prospective entrepreneurs was collected through a structured questionnaire. The team could cover 37 respondents (10 at shillong and 27 at Cherrapunjee). There was a round table conference along with the potential entrepreneurs and the representatives of the promotional agencies at shillong.

0.4.3 Profile of the potential entrepreneurs Age, sex, education and enterprise:

All the entrepreneurs are from the Khasi Community. Entrepreneurs are well spread among the age groups ranging between 17 and 60 years. However 40 per cent of the entrepreneurs are in the age group of 30 to 60 years, who prefer to go for small business and service enterprises. The majority of the entrepreneurs are in the age group of 17 to 30 years who prefer to go for more conventional type of enterprises.

0.4.4 of the 37 respondents there were 8 women entrepreneurs whose education is below matriculation. Women entrepreneurs have some experience in handling small businesses and skills in the field of handicrafts, fruit preservation, tailoring and knitting. Since Khasi women are tradionally active in small businesses or enterprises, there is a great need in this area to focus attention on promoting entrepreneurship among women. This can be a model for the rest of the country, in tribal women entrepreneurship.

0.4.5 Quite in a good number of the respondents are qualified in carpentry and are having skill in cane and bamboo works and bee-keeping. This is indicative of the availability of entrepreneurship in the area.

0.4.6 Experience

Relevant experience holds a key to success in running an enterprise. Majority of the respondents have some technical /work experience and there is a need to impart to them managerial skills. They are to be trained in production management and other skills like salesmanship and maintenance of simple accounts.

0.4.7 Investment capacity

The investment capacity of the potential entrepreneurs interviewed at Shillong is in the range of 15 to 25 per cent of the total cost of the project. Only one respondent said that he could invest upto Rs. 1 lakh from his side. In cherrapunjee it ranges from Rs. 200/- to Rs.5000/- and the entrepreneurs prefer to run the enterprises in their own line of manufacture or expand the present capacity of their entreprises. During the course of the interviews the team could find keen interest among the entrepreneurs and an inclination to know more about new ventures in the area. This favourable climate is to be utilised by the promotional agencies.

0.4.8 Motivation for entry into an enterprise

What motivated these new entrepreneurs to break away from traditional roles and occupations, sacrificing security of jobs and taking a high socio-economic risk? The two strongest motivations were found in "a desire to be one's own boss" and "dissatisfaction with lower income" in the current occupation. Another entrepreneurial desire "to be different from others" had been the next most important motive followed by the demonstration effect of "success of others". Perceiving a profitable industrial opportunity is a crucial initial step in an individual's entrepreneurial movement. Sources of project ideas often reflect entrepreneur's capacity to make realistic assessment of prospects of the venture.

0.4.9 Training and guidance to entrepreneurs:

Training of prospective entrepreneurs constitutes an integral factor in developing entrepreneurship. Whether it is induced or naturally emerging entrepreneurship, due to the complexities sometimes involved in setting up and running enterprises, training becomes a necessity.

0.4.10 The potential entrepreneurs identified may have to be trained and guided to enable them to start and run their enterprises. We can think of different categories of entrepreneurs depending on their background and aptitude namely: (i) Educated unemployed (ii) Technically qualified (iii) people with service orientated background (iv) people with agricultural background and (v) people with less education, including illiterates. In terms of the context of the training programme for entrepreneurs, we may think of certain common and essential contents and also specific items in respect to each category mentioned above. Based on our experience and the need to entrepreneurs, a model of a curriculum of three weeks duration may be followed by the training agencies.

0.4.11 It may be mentioned here that the selected entrepreneurs may be trained by the DIC in collaboration with the tribal agency and lead bank in the area and also the SISI. The NISIET Institute may also be associated or its assistance obtained in the training programmes of the potential entrepreneurs either on the campus of the NISIET or at any place suggested by the sponsoring agency.

The training as such would provide an opportunity to the entrepreneur trainees to get motivated and to acquaint themselves with the procedures and facilitities available and to prepare themselves to go in for the ventures with more self-confidence and determination.

0.4.12 The follow-up after training is a necessary step to see that the trained candidates secure the requisite guidance and assistance is establishing their units. The sponsoring agency may have to take up the follow-up activities until the individuals establish and start their units.

0.4.13 *This brief analysis is restricted to two places and a group of 37 respondents. There was the* constraint of time. Also, other local agencies could not reach a wide area and population. But the team, based on the response received at these two places within the time available, believe that it is possible to generate awareness and create a climate for entrepreneurship development among the tribals. If we proceed in a systematic way, as suggested earlier (steps in entrepreneurship development) it will be possible to achieve success. What is really needed is a concerted and rigorous attempt by the agencies like the DIC, tribal development agency, the banks, the MIA, the tribal council, the youth organisations, Chiristan missionaries and other voluntary and promotional agencies.

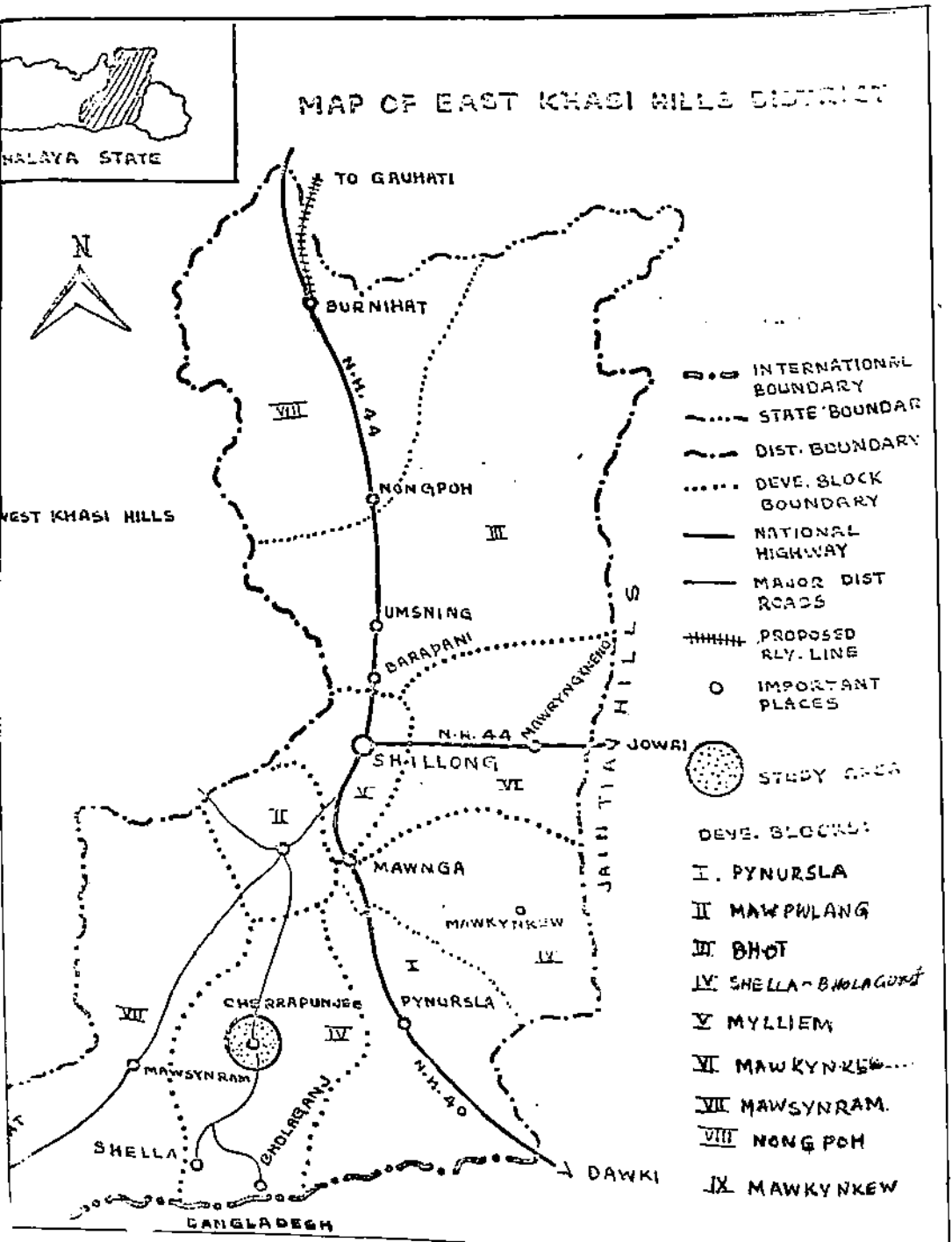
Annexure

Abstract of Tiny Industry., Service and Business Enterprises Recommended

	Type of Industry	Location	Number / Capacity	Investment in machinery & equipment (Rs. in lakhs)	Employment in numbers
	(1)	(2)	(3)	(4)	(5)
(A)	**Ancillaries & Auxiliaries**				
1.	Foundry	Burnihat	100 MT/month	50.00	82
2.	Bolts & Nuts	Shillong	11.5 tonnes & 37.000 nos. per month	12.00	17
3.	Wire Nails	Shillong	20 MT/month	0.80	4
4.	Asbestos Cement Pipes	Cherrapunjee	6 lakhs r.ft/year	2.00	26
5.	Pre cast compo-nent construction	Shillong	8 houses per day	6.00	35
(B)	**Resource Based**				
6.	Bleaching Powder	Cherrapunjee	300 tonnes per year	2.00	10
7.	Furniture unit	Saitsophen	1	0.20	6
8.	Fruit and vegetable processing	Lower Cherra	1	1.20	15
9.	Honey Processing	Upper Cherra	100 Kg. per day	0.45	12
(C)	**Service and Business Enterprises**				
10.	Semi Mechanised Bakery	Upper Cherra or Saitsophen	1	0.37	9
11.	Shoe-making and Repairing unit	-do-	1	0.08	3
12.	General Provision stores	Cement Factory Colony and Upper Cherra	2	0.70	6

(1)	(2)	(3)	(4)	(5)
13. Restaurants	Saitsophen & Cement Factory Colony	2	0.54	14
14. Transport Enterprises	Mawmluh and Upper Cherra	2	3.00	6
15. Electrical-cum-Electronic Servicing unit	Cherra Bazar	1	0.11	2
16. Cafeteria-cum-snack bar	Sait sophen	1	0.10	4
17. Book-cum-Magazine Stalls	Saitsophen, Cement Factory colony and Cherra Bazar	3	0.15	6
18. Laundry-cum-Dry Cleaning unit	Saitsophen	1	0.37	4
19. Printing Press	Saitsophen	1	0.60	6
20. Stationery goods	Upper Cherra	1	0.10	3
21. Automobile Service and repair shop	Saitsophen	1	0.50	7
22. Vendor's Stalls	Upper Cherra, Cement Factory Colony & Saitsophen	3	0.12	6
		29	81.39	337

* Investment in Tools and Equipment; + Total Investment.


MAP OF EAST KHASI HILLS DISTRICT
NALAYA STATE
TO GAUHATI
N
BURNIHAT
N.H. 44
VIII
NONGPOH
III
WEST KHASI HILLS
UMSNING
BARAPANI
NONGKHLAW
JAINTIA HILLS
N.H. 44
JOWAI
SHILLONG
V
VI
II
MAWNGA
MAWKYNREW
IV
I
PYNURSLA
VII
CHERRAPUNJEE
IV
MAWSYNRAM
N.H. 40
SHELLA
ENDLAGANJ
DAWKI
BANGLADESH
INTERNATIONAL BOUNDARY
STATE BOUNDARY
DIST. BOUNDARY
DEVE. BLOCK BOUNDARY
NATIONAL HIGHWAY
MAJOR DIST ROADS
PROPOSED RLY. LINE
IMPORTANT PLACES
STUDY AREA
DEVE. BLOCKS:
I. PYNURSLA
II MAWPHLANG
III BHOI
IV SHELLA-BHOLAGANJ
V MYLLIEM
VI MAWKYNREW
VII MAWSYNRAM
VIII NONGPOH
IX MAWKYNREW

FOREST DESTRUCTION AND TRIBAL DISPLACEMENT : PART-I

Dr. A.V.R.G. KRISHNA MURTHY, IFS. *

INTRODUCTION:

Forests and Tribals by their very location have to be complementary to each other and historically a symbiotic relationship existed between them. The location of the most dense, rich and valuable forests is also co-terminus with more primitive and aboriginal tribes. Forests as per the stationery books of Forest Department, occupy a quarter of the land surface in India (22.8%) as well as in Andhra Pradesh, exteading over 75 million ha in India (6.4 million ha for A.P.). Due to population pressures (both human and cattle), and other biotic factors (grazing, fire, clandestine removals by way of head-loads and over exploitation, (due to large gap existing between demand and supply for forest produce), both the extent, density and quality of forests have come down in recent years, threatening the very survival and continuance of humanity and bringing environmental and ecological disaster. As per NRSA estimates, while the well stocked forest area in the country has been put at 11 to 14% (GOI recent estimates 19.2%), the total wooded area is of the order of 44-49 million ha a loss of 30-32% during these decades 1950-80. India has lost during this period 4.2 million ha and two-thirds of this diversion of forest area is for avoidable nonforestry purposes, mainly cultivation and rehabilitation for which other alternatives are available.

2. In view of the symbiotic relationship that existed between forests and tribals, this large scale deforestation, loss in area, vegetative cover and consequent environmental degradation, has an adverse effect on the tribals and their life styles. Tribals living in the interior forests not only depend for their house constructional needs and materials on forests, but also depend for their food, (fruits), fodder, fuel, fertilizer and fibre entirely on surrounding forests. Their very life style is dependent on the abundance of forests, from which they collect fruits, roots, tubers, flowers and hunt small games as items of food. They derive their substinance and survival from forests by collecting, and marketing locally available minor forest produce to the local processing industries, export markets. Tribal lively hood is entirely dependent on not only gathering and makeling MFP but also, they are expert bamboo and wood cutters and with a little training in use of improved logging tools, there will be marked change in the output, reduction in wastage and increase in their wage earning capacity.

3. Forestry activity (havesting,nursery and plantation raising), is only "Occupation at ease" with tribals providing continuous, gainful, yearround employment to unemployed, under employed and seasonally employed. Harvesting of timber and fuel provide 145 mandays of employment per ha while nursery and planting activities can generate employment at 500-700 mandays per ha. All these forestry activities located at the door-step of the tribal habitations in the interior forests, in the past have

* Chief Conservator of Forests

contributed to tribal amelioration and socio-economic upliftment of tribals so as to bring them quickl ve poverty line without radically changing their life styles and age-old tribal culture.

FOREST SCENARIO:

4. At the beginning of the century we have about 40% of land surface under Forests of Government policies are oriented to encourage people to clear forests and bring them under habitation and plough by a series of incentives life Telengana Ijara and Kauldari Act etc. giving twice the area of forest cleared as Ijara or Patta. The population of the country and the tribals themselves then is so small, forests are plentiful everywhere and the tribals lived a harmonious life meeting their forestry requirements at their door-step. The life styles of the tribals are simple and wants so limited, with plentful resources, that there was no need for them to travel long distances to obtain their daily requirements. Besides, two to three decades back forest Department is the only single functionary of the Government, largely interacting and interfacing with the tribals and looking after their needs of development and socio-economic amelioration; particularly of aboriginal tribals like Chenchus, Koyas, etc. living in the interior forests.

5. With large chunks of forest tracts specially assigned and demarcated as 'Agency-areas' and brought under the direct administration of the 'Agent' to the Governor, the developmental needs of tribals were well taken care,. There was neither displacement of the tribals from their sylvan surroundings nor there is need for any special rehabilitation needs. The Forest Department was also entrusted till sixties of this century with the responsibility of tribal welfare also. The District Forest Officer, then was entrusted with providing special amenities to such aboriginal tribals like Chenchus (Kurnool and Prakasham districts), running primary schools in their Gudems (habitations) Residential schools and boarding Homes (viz. Dornal), Mobile medical units (Bairluty and Pecheruvu), adequately staffed Hospital (Dornal) Chenchu Cooperative Societies for providing credit and market facilities on the lines of D.R.Depots/shandi purchases of forest produce now provided by GCC Ltd.

6. With the conceptual change in the tribal welfare activities, a separate department of Tribal Welfare coming into existence and with service facilities provided by the GCC., Tribal Cultural Research and Training Institute and several voluntary (Non- Governmental) organizations, the role of Forest Departments in tribal Welfare has diminished over years. Forest Department entrusted primarily with 'restrictive-and-controlling' functions of protection, prohibition, regulation, (infact the functions of Forest Department can be managed by a single word 'No' for everything), has become not only a 'non-doling department', but also has become an alien towards tribals in its own functional environment. This is an unfortunate development of post independence era.

7. Forest and Wild Life conservation and preservation of environment and other natural resources, becoming a National Policy and guiding principles, and with enacting of Laws like (i) Indian Wildlife Act, 1972, (ii) Forest Conservation Act, 1980-FCA (and amended Act 1988), (iii) Environmental Act 1986 and various State Forest Acts, the work and functioning of the modern forester has become much more difficult, attracting lot of criticism, animosity and condemnation by other developmental activities. The restrictions imposed under FCA for diversion of forest lands for non forestry purpose

including stringent punishment under the various Acts like prohibition of grazing, forest produce exploitation, entry and similar restrictions particularly in core areas of Sanctuaries, National parks, Biosphere reserves, Nature preserves and permanent peeservation plots, has brought more antagonism and animosity both from people as well as from functionaries of other developmental departments of the same Government. This peculiar situation is the result of lack of prope. understanding,knowledge and appreciation of the work and duty of Forest Department generally, the long term benefits accrued from maintaining balance of nature and environmental health more particularly.

8. While the forests and tribals particularly can coexist and have a historically sound symbiotic relationship, it is possible to take up mutually complementary and beneficial developmental schemes. While developmental planning is essential for any National Development, what is required is evolving models and projects which aim at an integrated development of the Tract, people(tribals) and forests. Development without destruction of natural resource-base should be the aim and objective of all developmental projects. 'Saturation Planning' of the tract, people and forests and subjecting all developmental projects to 'environmental impact analysis' before grounding should be the twin objectives of management of the most important available resources viz., the forests and tribals' which is the subject matter of the symposium. This paper mainly attempts in analysing the twin effects of forest destruction and tribal displacement and rehabilitation vis-a-vis the developmental options and available models that can be complementary to both tribals and forests.

TRIBAL SCENARIO:

9. There are about 250 communities included in the list of Scheduled tribes with an estimated population of about 52 millions as per 1981 census. This population is spread over 19 states and six union territories located in remote hilly /forested regions. The terrain of these tribal abodes is generally undulating, inhospitable, with low productivity mainly due to faulty agronomic practices and shifting (encroachment) cultivation or upland dry cultivation as the main source of livelyhood in many states. While M.P., Orissa, Andhra Pradesh and all north-eastern council states are predominantly tribal populated, in A.P. alone the districts of Adilabad, Karimnagar, Warangal, Khammam, West & East Godavari, Visakhapatnam, Vizianagaram and Srikakulam are covered by tribal sub-plan. The districtsof Kurnool, Prakasham and Mahabubnagar are richly aboriginal tribal populated. With inclusion of sugalis or Lambadas in the Scheduled Tribes, not only their population has doubled during 1971-81 period, but even the tribal development problems are compounded.

10. With the advent of forest settlement and notification of 'Reserve forests' restrictions on 'tribal rights' were ultimately converted into 'Rights and concessions'. With increasing restrictions on their movement and enjoyment of the 'mother-nature's abundant gifts'. Inspite of the fact, that such rights and concessions continue to be enjoyed by the tribals in various states as-facilities, concessions or Nistar-rights etc. There is very little realization, understanding or enjoyment of those rights and concessions by tribals, mostly due to restrictive enforcements of these rights and concessions. Ultimately these rights and concessions have degenerated to clandestine removals, smuggling and harassment. This situation needs to be reversed and rectified by not only properly defining, recognizing and permissive

enjoyment of these rights and concessions, but also providing for free supply of forest produce like constructional material, bamboo, fencing, thorns, fuelwood etc. at free or subsidized rates at decentralized depots located in the tribal habitations, besides providing free access to the forest for tribals to collect their fuel, food and fodder needs,. Such a measure while contributing largely to the 'forest-conservancy'., will also reduce pressure on forests, and help better scientific/rational utilization of available resources and their development. If once the prime needs of tribals living in the forests are met at their door step by organizing decentralized timber and fuel-depots, growing silvi-pastures near every tribal habitation, and even methods like, rotational grazing and stall-feeding can be invoked, instead of the present practice of free uncontrolled and unregulated grazing-a suicidal policy for forest-conservancy.

FOREST DESTRUCTION AND TRIBAL DISPLACEMENT:

11. The tribals have not only very close linkages with their forest habitat, but also possess excellent ecological understanding of the intricate working relationships, that exist between tribals, forests and the other components of the total-environment. Thus the problem of forest conservation and protection, cannot be separated from the lives of the forest-dwellers, keeping in view of the symbiotic relationship, that exists between forests and tribals,. Forest destruction has an adverse affect on tribal habitations, their culture and life-styles. Thus wanton destruction of forests and wildlife resources is as much enimical and unwarranted to forest conservation as to the tribal welfare.

12. During the three decade period 1950-80, in India alone 4.2 million ha of forest area is diverted/released for such non-forestry purposes as extension of agriculture, rehabilitation, housing, industries and projects. Two thirds of this diversion is mostly for extension of cultivation/rehabilitation of evacuees which is an avoidable loss for which alternatives could have been easily found. During 1972-80 period the diversion of forests has been at an alarming rate of 1.41 lakh ha in India. The rate of degradation of the environment, including resource, and soil productivityloss due to accelerated erosion,salinization, alkalization, sand-draft and sand casting, is ten-fold viz.1.4 million ha,annually. A wholistic approach to the problem of displacement of tribals and their rehabilitation in forested catchments. The general public, the Government and environmental experts are all greatly worried about the alarming rate of depletion of forests, degradation of environment and its multifaceted adverse consequences on the eco system including tribals.

13. The main causes of depletion of forests and result adverse effects on tribal are manyfold:

i. Destruction of forests for developmental activities like extension of agriculture/habitations, road-development and diversion of forest areas for irrigation and hydel projects, setting up of industries etc.

ii. fragmentation of agricultural holdings/village-sites of the tribals, due to increase in tribal populations leading to more land hunger, further forest destruction, loss of resource-base and further economic backwardness of the tribals.

iii. Continued economic exploitation of tribals by middlemen, money lenders, captive traders(providing credit and marketing) in forest produce, lack of adequate infrastructure facilities, viz. proper housing, health checkup, nutrition; communications, electricity, provision of uncontaminated drinking water, properly functioning schools and hospital facilities etc. inspite of special plans, tribal welfare schemes undertaken.

iv. Superstitions and costly religious practices to make amends require continuous education and social exposure by voluntary and non-governmental organization.

14. The twin factors of destruction of forests, resultant displacement of tribals. The need for their rehabilitation is proposed to be discussed in this paper.

15. Destruction of forests not only results in the loss of a resource-base but also has adverse affects on the socio- economic life styles of the tribals. While the main cause of destruction of forests is population pressure, taking up developmental projects viz. Road development, irrigation, model projects, setting up of industriaes etc. the Government is taking care that by starting developmental projects in tribal areas, the tribals are not uprooted as far as possible.. When this becomes inevitable, adequate steps are taken to rehabilitate the evacuees in as near to orginal environment as possible

16. The Forest conservation Act, 1980(FCA) which has come into effect from 1980 and as amended in 1988, with more stringent measures to forest conservation, is an exceeding well-conceived and remarkable piece of legislation, both in the interest of forests and tribals. The FCA prescribes that all proposals for diversion of forest land for nonforestry purpose (defined as other than afforestation or related activities) even if the area is privately owned or recorded as forest, in Government records and lying outside the control of forest Department, requires prior approval and concurrance of GOI under section (2) OF FCA 1980.

17. The Act also prescribes certain guidelines and prior requirements/commitments for such approval viz.

a. Compensating by transfer to Forest Department equivalent,free-hold, unencombered non-forest land equal in extent to the forest area diverted.

b. Undertaking funding of a compensatory afforestation scheme prepared by the Department, at least as a sembfance of recreation of forest area/resource diverted.

c. In case non-forest lands outside, are not available compensatory afforestation scheme to be funded in twice the forest area diverted; in degraded forests under the control of Forest Department.

d. Agree to such other conditions prescribed by Government for preserving the forest and maintaining ecological - balance.

18. The above prescriptions/regulations adequately take care of

i. Unnecessary\unwarranted diversion of forest areas for developmental projects

ii. Minimising the area requirements for such developmental projects and restricting the user agency in asking for large extents of forest areas as buffers or elbow-areas

iii. Both loss of forest area and resource base is minimized with minimum adverse effects on the tribals.

19. It is gratifying to note that since inception of FCA 1980, the diversion of forest area for non-forestry purposes has been kept at minimum during 1980-88 period. From an earlier annual loss of 1.4 lakh ha. of forest area to a mere 3 to 4 thousand, except in cases large prestigious projects like Telugu Ganga project (diverted forest area 10400 ha) of A.P. state; Narmada-sagar and Sardar-sarover projects of Northern-India. Even in such large projects, adequate steps were taken and conditions prescribed not only to compensate for the loss of forest area, but also to rehabilitate and settle the evacuees with cash compensation, adequate land for housing and cultivation, solatium money settlement advance, adequate reservation of job and employment opportunities to the evacuees in local major projects for which area is diverted and other local development projects.

20. The Government of India prescription of adequate compensation and effective rehabilitation of evacuees displaced in large irrigation and hydel projects, has brought security to many of the tribals ousted; by diverting rich and valuable forests for developmental activity. It is also prescribed that in such resettlements and rehabilitation of evacuees, adequate steps should be taken in creating near sylvan-surroundings as possible and existing at original place, but also to incorporate an element human touch, contributing to restoration of original life styles of tribals. Such measures are always lacking in earlier rehabilitation projects like famousDandakaranya project or Isagoan Rehabilitation project of Adilabad district, (Bengal evacuees); where the people uprooted from sylvan surroundings are relocated or settled in an entirely different environment, and on a different trade/profession.

21. One of the successful rehabilitation projects implemented by Government of A.P. is the settlement of Srilanka-Repatriates on coffee estates in Visakhapatnam and East Godavari districts-their original trade of employment in coffee and tea gardens. Even when Machkand and Jalaput interestate Hydel-projects are implemented in sixties by A.P. and Orissa Governments, this human element in rehabilitation is lacking resulting in large scale migration of Samanthas uprooted under Jalaput reservoir to more greener pastures in A.P. Valuable forests of Eastern Ghats were destroyed and more than 500 illicit villages were established in the forests resulting in encroachment cultivation of over 50000 ha. of forests in Visakhapatnam district alone. By this ill-conceived and inadeauate, ed execution of Machjund, Jalaput Hydel-projects, not only vast stretches of forests were destroyed, but even the life-line of the reservoirs is cut-off, resulting in siltation, capacity loss and reduced power generation, with adverse effects on productivity both in Agriculture and Industrial sectors. We have yet to learn lessons from construction of largescale dams and artificial reservoirs and vast expenses of water causing uprootal of locals, misery and creating chaos in their life.

22. In the various Rehabilitation schemes suggested/implemented as per guidelines of GOI. and in approving diversion of vast stretches of forest lands for non-forestry purposes resulting in evacuation, and uprootal of people the following measures are noteworthy;

i. To provide adequate funds for rehabilitation of oustees in the original project itself and get a rehabilitation plan simultaneously approved by GOI along with original sanction of diversion of forest area.

ii. In the rehabilitation plan the following measures are considered obligatory;

a. Land will have to be provided for construction of homesteads to all oustee families affected by the project.

b. All oustees whose farm land is acquired for the project will have to be given farm land equal extent of loss land or 5 acres whichever is less.

c. For landless poor displaced adequate ex-gratia amount and solatium-money should be paid and preferably such money, is put in a fixed deposit to ensure a regular monthly-income.

d. Besides compensation for the property lost/acquired, adequate solatium money, displacement and resettlement grant should be paid.

e. Job reservations and local employment both in the project cleared and other available development activities (DRDA/ITDA) should be ensured for the oustees at least one job per family.

f. On the job training, facilities should be provided to the affected people to equip them with necessary skills.

g. Integrated rehabilitation measures should be undertaken in compact and manageable areas; providing all amenities and services like roads, schools, medical facilities, trade and market infrastructure, besides providing agriculture- land, and ensuring off-season employment opportunities in subsidiary activities like dairy, sericulture, poultry, bee-keeping, vegetable growing etc.

h. In order to ensure that cash compensation and solatium money paid is properly invested, vocational guidance and proper advice, particularly to landless poor to start a trade or vocation best suited; should also be provided.

i. involvement of voluntary or non-governmental organizations (NGO s) in resettlement of the oustees to gain confidence of people effected, is always desirable, in providing social, community and economic infrastructure facilities to the oustees.

j. Land development and land improvement schemes like soil and moisture conservation measures, water harvesting structures etc. at the new place, and provision of required

inputs for scientific farming to achieve the desired economic-objectives should form an internal part of the rehabilitation paln.

iii. The most important consideration in any rehabilitation plan is keeping in view the preferences, desires and wishes of the people-right from sanction of site for rehabilitation centre, designs for houses, so as to recreate as near the original sylvan-surroundings as possible; so that the life styles and cultural aspects of the people affected are not drastically changed and the oustees are not thrown suddenly in an altogether new environment.

iv. Since most of the major developmental projects (Irrigation and Hydel-Power) are located in forest rich tracts and people affected are mostly tribals, the rehabilitation areas should be located on the edge or very near to the forest. Even if sited outside forest the area should be selected in consultation with and should be acceptable to tribals so that, they still continue to depend for their off-season employment on forest produce, and continue their orginal avocations.

v. The people rehabilitated should be given preference in employment in the local on-going forestry projects viz.

a. Harvesting forest produce
b. Collection and processing of Minor Forest Produce and setting up special local processing units based on MFP like Gum Karaya, Beedi-rolling, Tamarind starch manufacture, Honey processing etc.
c. Nursery raising and plantation activity of Forest Department
d. Various social forestry and farm-forestry projects including Tree Patta schemes under which right on usufruct or produce is given to the beneficiaries rather than right on land.
e. Decentralised Farmers'nurseries with purchase back provision of seedling with Bonus.
f. Payment of cash incentives for raising successful saplings in both private, public and community lands like, canal/road side avenues, tank-foreshores and in degraded forests treating them as beneficiaries under suitably designed Tree patta schemes.
g. Reforestation of degraded forests under on going family assistance schemes.

vi. The need for rehabilitation and uprootal from vast stretches of forest areas arises due to:

a. Construction of large dams for strong water for irrigation and power projects-solution for this being the principle "Small is beautiful".

b. Setting up of National parks, Tiger-reserves, biosphere- areas and permanent preservation pl . which are to be kept free from human\cattle interference and stopping exploitation of forest produce atleast in the core areas-the solution for this being proper survey and appraisal of minimum needs of such conservation effort and accurately defining the minimum core-areas keeping in view the threshold levels and

c. Setting up of large scale mining/processing industries like Bauxite, Iron-ore etc.-before such a decision one should examine all possible alternatives and locating them out side gene-pool rich and forest-rich areas.

vii. In all the above cases of large scale diversion of forest areas, the projects before location should be subjected to 'environmental-impact analysis' and the best possible alternatives should be chosen. Diversion of forest- area should be the last resort and available alternative. In any case a balance should be struck and a decision taken on the emphasised priorities between the direct project benefits and long term benefits that are likely to accure from forest protection, environmental preservation, conservation of Gene pools and diversity of tropical forests, which are potential bread-baskets of future generations to whom we are all answerable.

viii. As per guidelines of GOI under FCA the direct and indirect benefits that will accrue from one ha. of fully stocked one ha. (1.0 density) of forests growing for a period of 50 years is assessed at Rs. 127 lakhs. The project benefits should naturally outweigh such huge environmental losses. Besides the replacement costs of forest-area diverted should be met through taking up of a compensatory afforestation scheme else where in non-forest lands/degraded forests. Even prof.Das(1978) of Calcutta University, at the Indian Science Congress, Tirupati, estimated the value of a common tree like Neem, growing for about 50 years and taking into consideration all the direct and indirect benefits at Rs. 15.70 lakhs.

ix. The role of trees in environmental conservation, preventing pollution and keeping the health of the people is well known and needs no special emphasis. Trees at self- sacrifice, absorb liquid, gaseous and solid particles pollutants and cleanse the atmosphere; besides maintaining the green-house effect on the atmosphere; by recycling oxygen and absorbing the carbon dioxide. Trees have got selective absorption properties of the pollutants viz. Flourine by casuarina, Sulpher-dioxide by Neem and Bongamia pinneta etc. The recent experimental studies taken up on Bhopal killer-gas(MIC) and as reported in Annexure-I confirm this. In view of these conclusive results, great care has to be taken, before sacrifycing a tree or forest by prioratising the benefits.

x. Finally it is necessary to not only subject any project for environmental impact analysis and evaluate the benefits accrued, but also the resource available including forest, soil and water should be put to use as per capability; under which it "provides most and deteriorates least"- following the cardinal principle of "Development without Destruction".

23. Finally, 'FOREST is the soul of the country and backbone of the Tribals. Sustainability of forest ensure sustainability of soil, water productivity, and life system- all inter related, integratedly linked and interdependent, with tribal sustenance. Forests have a treasure of Gene- pools,future food-reserves, store-houses of medicinal plants, ensuring humansurvival. We cannot thus bid a good- bye to the environmental concerns including tribals, as we are still a part of the complex eco system'. The forests

vital component and contribution is their role as a Resource-base, for tribal development. Thus th Tribal Development and environmental preservation are the two sides of the same coin.

24.Even the desires and aspirations of people displaced follow the flow of (forest) resources Prosperity depends not only on the health of man, but equally on the health of plants and animals i forests. Forest destruction and environmental degradation is thus a suicidal policy. Forest conserva tion-a cause dearer to all of us, a vision of our minds and our hearts, should be simultaneously achieve along with symbiotic tribal-relationship.

ANNEXURE-I

RESISTANCE OF PLANTS TO MIC GAS IN BHOPAL

S.No.	Name of Species	Locality-Wise Extent of Damage I	II	III	Remarks
I.	Azadirachath Indica	XXX (Service)	XXX	X	Total Defoliation in-I Severe-Byown Black leaves
2.	FICDS RELIGIOSA	XXX	XXX	X	Veb: Flesh in depoliation tr Leaves black burnt appea-
3.	SANTALUM ALBUM	XXX	XXX	-	rance partial depolication-I Black-Brown leaves lip and
4.	ZIZYPHDS MAURITIANA	XXX	XXX	--	margin burnt appearance PARTIAL-DEFOLIATIO (PARTIAL) BROWN-
5.	DALBERGIA SISSOO	XXX	XX	--	BLACK LEAVES Defoliation leaves black,
6.	ALBIZZIA LEBBEK	XXX	XX	--	Burnt-appearance.
7.	PONGAMIA PINNATA	XX	X	--	Leaves Partially affected margin & Tip have burnt
8.	Jacarenda minodue folia	XX	X	--	appearance. Partial defoliation-leaf black-
9.	CASSIA FISTULA	X	--	--	brown.
10.	GREVILLEA ROBUSTA	XX	--	--	A few leaf-Lesions Blac Lesions on
11.	TAMARINDUS INDICA	XX	X	--	leaf. Only upper crown affected
12.	Moringa OLEIFERA	XX	--	--	partial defoliation, leaves black. Leaves and flowers dropped.
13.	GILANTHUS EXCELSA	--	--	--	Yellow and Brown pakle, on leaves.
14.	EMBLICA OFFICINALIS	--	--	--	No. INJURY
15.	PHOENIX BYLVESTRIS	--	--	--	No. INJURY
16.	MANGIFERA INDICA	--	--	--	No. INJURY
17.	EDOALYPTUS EPP	--	--	--	No. INJURY
18,	POLY ALTHIA LONGIFOLIA	--	--	--	No. INJURY

SOUR E: RAM PRASAD AND PANDAY q.k. (1985)
PAQT-SPELIES INCLUDED (A BKC RAJAN, 1987)
XXX SEVERELY EFECTED XX PARTIAL X LESS
I. II &III REFERS TO DIFFERENT SITES IN BHOPAL

10.7.1988

FOREST DESTRUCTION AND TRIBAL REHABILITATION-PART-II

Dr. A.V.R.G. KRISHNA MURTHY, I.F.S. *

INTRODUCTION:

In an earlier paper on "Forest destruction and Tribal displacement" the symbiotic relationship that existed between forests and tribals has been emphasised. The recent enactments in favour of forests and wold life conservation in order to preserve and promote this symbiosis have been discussed. The Government of India's commitments under(i) Forest Conservation Act, 1980/1988, (ii) Indian Wild Life Act, 1972 (iii) Environmental Act, 1986, and (iv) the new draft Forest Policy 1988 not only for preservation of forests and wild life resources, but also to compensate for the losses in inevitable circumstances are also discussed. The various rehabilitation measures to be followed in case of displaced persons (oustees) due to large sized projects involving clearance of extensive tracts of forests as per statue and guidelines prescribed for forest and environmental clearance by Government of India have also been presented. Forests are considered as the soul of the country and back-bone of the tribals. Sustainability of forests ensures sustainability of soil, water, productivity, life styles etc. all integrated, inter-related and inter- dependable with tribal assistance. In this paper, it is proposed to discuse some of the forestry models adopted for tribal welfare and their economic amelioration in Andhra Pradesh together with steps taken for displaced tribals for rehabilitation under certain major projects will be presented.

It is obvious that the development of forests and tribals are the sides of the same coin and the two goals are fully competable and consistent with each other. The cultural practices and socio-economic conditions of tribal communities should be accepted as an important condition for determining the level of technology and intensity of operations needed in a rehabilitation area. Forest is a dynamic organism, affecting people and getting affected by them. The basic needs of these people effected and needing rehabilitation should be assessed in a dynamic frame with the prime criteria of people's preferences and acceptability of a particular programme. Any model of rehabilitation adopted requires to be modified suitably altered and adjusted midway to cater to the needs and aspirations of people. The plans for tribal development should consider the forest resources as a basic on which tribal economy can progress with confidence. The social services input must be provided on a priority basis in the more backward areas so that the initial handicaps of the tribal rehabilitation can be initially overcome, and available resources can be optimally utilised. No two situations are truly comparable, and each case to make it successful requires careful planning at the micro level.

The concept of saturation planning of the tract, people and forests and knowing their development in totality needs no special emphasis; while the best in the tribal culture and customs should be retained in the new environment, the rehabilitation models taken up should aim at the general economic improvement and social amelieration of the oustees (tribals), while accepting their primitive dependence

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on forests, their life styles should be so oriented to bring them into main stream of development, by providing community health education and safe drinking water in the new settlements. Housing is an important component of rehabilitation. The concept of providing semipermanent rural housing and permanent rural housing, needs to be suitably altered in the light of the preferences and acceptability of particular design by tribal communities. Traditional houses using local materials with better amenities and health improvement should be given greater emphasis. Reservation and preference in available jobs in various major/medium industries, irrigation and Hydel-projects and industries based on locally available natural resources, will not only reduce the dependence of tribals on dwindling forests but also quickly bring them above poverty line by socialeconomic upliftment. Tribal communities subsisted over centuries and live in perfect harmony with nature and with reasonable shelter, food, medicines, health and gainful employment derived from the surrounding forests. But, now with population pressure, dwindling forests and operation of a variety of new forces operating viz.extremists, smugglers etc. This balance has been disturbed. The planning commission has laid the following objectives for rehabilitation of displaced tribals.

i. Compensation should be adequate for ensuring effective rehabilitation and settlement in the new settlement without dependencee on middlemen and money lenders.

ii. Rehabilitation should take into account land to land replenishment and the potential productivity should be an important criteria in determining the extent of dependence and scale of compensation.

iii. In determining location of projects, all available alternatives should be thoroughly exercised, and while selecting the best alternative, minimum damage to environment should be considered and ousting the tribals should be kept at minimum if not totally unavoidable.

iv. Adequate provision should be made in the original project cost itself in terms of money, cultivable land, and for all community services and welfare amenities for the rehabilitation of displaced tribals.

FORESTRY MODELS FOR REHABILITATION OF DISPLACED TRIBALS:

A conceptual change in forestry concept and development have been brought about in the last 1 1/2 to 2 decades in the country. The concept of conservation of our natural resources-forests, wild life, soil and water is gaining ground and the present policies are oriented for preservation of existing gene-pools and valuable natural resources, reafforestation of degraded forests through various social forestry, farm forestry and agro forestry models and forestry to the doorstep of the people, through various innovative beneficiary oriented schemes, tree pattas and decentralised Kisan nurseries. An important development in Indian forestry since 1975 is the elimination of contractor's agency and mindlemen by introduction of departmental extraction of timber, fuel and bamboo and taking up collection and state trading in other minor forest produce by Girijan and Tribal development/Cooperative Corporations, including setting up of some local processing industries based on such forest produce colleected eg.gum karaya, Beedi rolling etc. Promotion of similar Forest Development Corporations in

many states in the public sector, to undertake special projects and locate special areas, involving institutional finance is another important development of last decade and half in Indian Forestry. The main emphasis in Indian Forestry is on conservation front and all forestry projects are oriented for active involvement and participation of the people and aimed at their socio economic upliftment. While rehabilitation and settlement of the displaced tribals due to location of major projects/industries in forested catchments has to be the main responsibility of the original project authority or user agency including funding for payment of liberal compensation solatium money land acquisition and development costs, provision of amenities and communal services as discussed earlier, the possibilities of providing alternate or continuous, gainful, year round employment to the unemployed, under employed and seasonally employed tribals through forestry activity are immense and require to be explored.

TRIBAL REHABILITATION MODELS:

All tribal rehabilitation and socio-economic upliftment programmes are essentially rural development and poverty alleviation projects to be implemented in an integrated model. Some of the ongoing projects and operated models are discussed below under the categories;

i. Forestry Development models for wage earning and economic growth oriented.

ii. Participative people's projects contributing to creation of durable assets and poverty alleviation.

iii. Specific rehabilitation projects of displaced tribals.

FORESTRY AND TRIBAL DEVELOPMENT MODELS:

The following models are listed and briefly presented:

a. Nationalisation of trade in timber/fuel through departmental extraction. Since 1975 the trade in timber and fuel is nationalised and after departmental extraction from forest coupes by state the produce is being sold in small lots at decentralised Government depots. This practice has not only eliminated the middlemen, and exploitation of tribals, but also a fair wage is assured to the tribals and their earning capacity improved assuring better living standards, even demestic sector needs of bamboo are being extracted departmentally and supplied to weaker sections viz., Tribals (Yerukalas, Chenchus) and buildings at subsidised rates, to help them professionally.

b. With Nationalisation of Trade in timber and fuel and with active collaboration of logging training centres project at Dehra Dun, Tribals are given special training in use of improved logging tools (eg. raker toothed saw etc.) so as to increase out put and efficiency and produce wastage and human effort.

c. State Trading in minor forest produce through monopoly rights given to M/s Girijan Cooperative Corporation Ltd. (GCC) offering trade and market facilities, assuring a fair price to the forest produce and secured income to the tribal.

d. Complete nationalisation of trade in Beedi Leaves and departmental collection of beedi leaves from 1986 onwards with increased collection charges of Rs. 0.30 to 0.40 paise for standard bundle of 100 leaves, contributing to improvement of tribal economy, wage earning capacity of Rs.25 to 60 per day through off season employment for about (35) days.

e. Employment in various nursery raising, and plantation activities estimated to provide 145 mandays per ha.of harvested forest area and about 700 man days per ha. for nursery and plantation activity. Besides road formation, mineral exploitation activities in forest area create additional employment opportunities. However it may be noted continuous, gainful, year-round employment can be only generated through forestry activity particularly to tribals living in and around forests. Even growing commercial crops like coffee, pepper etc. without disturbing the natural ecosystem/virgin forest will provide such year-round employment to seasonally employed tribals.

f. Seri-culture and tusser silk cultivation on Terminalia tomentosa, T.Arjuna (Arjun) in forests, planting mulbery trees in degraded forests and bee keeping and honey collection activities will also generate additional employment potential.

g. All forestry development activities and conservation efforts will not only act as anti-pollution measures providing the 5-fs i.e.fuel, fodder, food, fertilizer and fiore, besides recycling and replinishing atmospheric oxygen, soil, water and improving potential productivity of the site. This conservation effort itself contributes for provision of better health, food, medicines, shade and shelter to the tribals.

h. Environmental protection, soil building and enrichment, moisture conservation measures takenup in an integrated manner both in agriculture and forest lands particularly in river valley catchments, through soil and mosture conservation (SML) measures like contour bunds, terracing etc. and provision of water harvesting structures check dams etc. will not only provide local employment to tribals in the off season but also help to increase productivity of the site and ameliorate the economic status of the tribals.

i. Setting up of local processing industries on available Minor Forest produce and other locally available forest produce like, gum-processing, beedi rolling, Kathe manufacture while providing additional employment opportunities and added value to the product will also help economic upliftment of tribals.

j. Provision of credit and marketing facilities through organisations like GCC., thus assuring a minimum floor price for the forest produce and strengthening the public distribution system in tribal areas will be useful additional activity to eliminate exploitation of tribals by middlemen and petty traders besides improving their economic levels imperceptably.

k. Taking into consideration the life styles and cultural compulsions, like JHUM or PODU cultivation, ex-podu rehabilitation pilot schemes, in order to wean away the local tribals from

this pernicious habit, and rehabilitating them or more amenable and environmentally compatable schemes/pilot projects under which the land as a resource is put to best use under which it produces most and deteriorates least. Under this proposal, multiple cropping systems vertical and horizontal forestry viz.Ginger under finally thinned teak patches, coffee and pepper under the canopy of natural virgin forests etc. and assigning land use as per capability and for combined farming systems, silviculture on steep hills, horticulture in middle slopes and terraced and protected agriculture with assured inputs viz. irrigation, fertilizers, pesticides, improved seeds and planting material are some of the models, that can bring additional gains and economic benefits to the poor tribal are worth considering.

l. Minor forest produce species plantations, horticulture (jack,tamarind, cashew, mango, loose-jacket oranges, guava etc.) and agro forestry plantations, capable of yielding additional income, to the tribals may be encouraged and even subsidised on individual holdings with a sole intention of taking the family as a unit above the poverty line.

m. Providing tribal cooperatives and forest labour cooperatives for obtaining forest produce at subsidised rates viz. bomboo to Koya tribes in Mothugudem area, Chenchus in Nallamalais etc. and also own and run local processing and manufacturing units with benefits accruing to the whole community or raising community plantations of Babul in tank-foreshore areas and handing-over the assets to the community for protection, management and exploitation,. Such cooperatives can be at primary local level (LAMPS) for collection and processing, at State level for processing and manufacture (GCC/TDC) and at National Level Tribal Development Cooperative Federation (TRIFED) to provide export expertise, marketing intelligence, finance and other technical inputs.

CREATION OF DURABLE ASSETS FOR TRIBALS:

Participative management of resources and involvement of tribals (People) in creating such resources will largely contribute for successful implementation of any or all forestry development projects. Creating a vested interest in the resource created and providing a share in the harvest/revenue through various beneficiary oriented programmes will help to alleviate the tribals and bring them above the poverty line. This is only possible through innovative, asset creation projects, rather than by providing dolls to oustee tribals in rehabilitation centres. Some of the programmes undertaken by forest department are discussed below:

a. TREE PATTA SCHEME:

Under this scheme displaced tribals can be rehabilitated in Forest department ongoing plantation activity (Social Forestry/CIDA schemes) particularly on degraded forests, giving them a share in the harvest or allowing entire usufruct to be enjoyed by the tribals with no right on land. Under the tree patta scheme each tribal family is assigned 1.50 ha. of degraded forest lands for a rotation period of 7-10 years. The tribal family is ensured a comforable monthly wage of Rs. 600 per month during the gestation period of the plantation. A tree patta is issued in the name of tribal beneficciary (woman member

preferably) and at the harvest 50% of revenue/harvest is given to the tribals and 20% for reafforestation cost ever growing horticulture species, M.F.P. trees and Tesser cultivation can be incorporated in the project. The whole aim of this innovative tree patta scheme is not only to provide continuous gainful year-round employment in raising and maintenance of nurseries and plantations, but also create double assets to the tribals and help their poverty alleviation.

b. MULTIPLE LAND USE AND VERTICAL FORESTRY :

Some models experimented for tribal amelioration in Andhra Pradesh are:-

i. Agro-forestry i.e. growing tree crops in conjuction with agriculture as main crop either semi-vertically or simultaniously on the same land so that both crops are competable and complementary to each other and contribute to increased productivity on the same site.

ii. Agri-silviculture or age old taungya method under which in between tree crops (like bamboo, cashew, teak etc) farm crops like minor, millets, sweet potate, turmeric and pulses like red-gram etc. are grown as a subsidiary crop.

iii. *Vertical forestry like permitting tribals* free to raise Ginger under take canopy after final thinning (30-35 years) yielding a bumper crop of Ginger as in case of Chintapally experiment.

iv. *Introduction of coffee in virgin forests* of Eastern Ghats a non traditional coffee area, with suitable canopy manipulation, with subsidiary crop of peppet etc. So as to provide not only continuous gainful-year-round employment to local tribals and Srilanka repatriates but also to create durable assets by way of percelled coffee estates and given as Tree Pattas after a five year establishment of coffee as in case of Girijan coffee.

c. **Assistance to small and marginal farmers** under ongoing CIDA Social Forestry programme under which free seedlings are supplied to tribals to plant in their own holdings and cost incentives are provided at the end of 1st and 2nd years of growth for each successful seedling at the rate of Rs. 1/per each seedling each year.

d. **Pilot Project Scheme** in Regella village, Paderu Agency under this pilot project scheme, which is essentially an ex-podu rehabilitation scheme, the tribal beneficiaries are identified and inputs by way of irrigation, fertilizers, improved seed and planting material is provided. Ex.Podu areas are identified and percelled out at the rate of 2.5 ha. per beneficiary and developed either under horticulture/arbesiculture. Hill streams are bunded and irrigation water is diverted to the beneficiary fields with necessary other inputs to increase productivity and economic returns.

e. Soil conservation demonstration, Training and Research Plot, Boiguda:

Under this scheme in Machkund Basin at Boiguda village (near Araku) a soil conservation demonstration training and research plot has been laid out 1983/1984 years by the author. A minicatchment basis is adopted and a 100 ha. micro-catchment is developed deciding the land

use for silviculture, horticulture or protected terraced agriculture with necessary SML measures. Water arresting structure in the form of a dug-out pond is provided for this minicatchment, which is not only useful as a minor irrigation tank, providing drinking water to cattle and charged with first spown. The tank-bund is planted with fuel and horticulture species and when the pissiculture is ripe for exploitation, the local tribals of Boiguda village were allowed to fish and enjoy, to improve the diet and nutrition of people.

f. Integrated Rural and Tribal Development:-

Integrated rural developmental activities involving different departments working complementary to each others, like Agriculture, Forest, Soil Conservation, Animal Husbandry, Fisheries, Tribal Welfare and WALAMTARI will help to catalyse Integrated Rural Development. One such model of integrated rural developement is given in Annexure-II. The need for a single apex agency in charge of tribal development and rehabilitation needs no special emphasis. When Forest Department was incharge of Chenchu development in erstwhile Kurnool District (Dornal and Bairluty centres), providing education, medical-aid, infrastructure facilities,credit and marketing infrastructure (Tribal Cooperatives), distribution of clothes, such as apex body was available. The ITDAs working need to be re-oriented and streamlined, headed by Foresters also, so that conflicts of forest conservancy and Tribal Welfare/rehabilitation are resolved.

g. TELUGU GANGA PROJECT REHABILITATION:

Under this prestigious project, the forest area diverted is 10400 ha. and under the three reservoirs at Velgode, Brahmamgari Matham and Kandleru, totally (26) villages are getting submergeed and (16982) people are getting displaced. The rehabilitation plan approved by Government of India consists of provision of house sites and other infrastructure facilities and allotment of 5 acres of land to small and marginal farmers where lands are submerged, besides payment of adequate compensation, solatium money and resettlement allowance. The compensatory afforestation scheme, prepared for extent of non forest lands transferred to Forest Department consists of preparation of micro plans for each village as a unit of planning to provide for the full requirements, fuel, small timber etc.

h. DACHEPALLY PROJECT FOR CHENCHU REHABILITATION:

In an innovative rehabilitation project implemented at Dachepally village, Mahbubnagar district excellent results have been achieved. A group of 20 families of aborginal nomadic tribals- chenchus, who were entirely living on begging were identified as beneficiaries in a rehabilitation project, through social forestry. The beneficiary families were engaged for the first year on a six lakh poly-pot nursery, raising programme (the purchase back price is Rs. 0.30 paise per poly-pot including 5 paise bonus. By intelligent management, the concerned social forestry D.F.O. has saved Rs. 30,000. Utilising these savings as seed money and with a similar matching grant from the District Collector, and registering the chenchu beneficiaries under the Societies Act, a sixteen acre land has been acquired. This land has been put partly under agriculture, horticulture (Pomegranates, Guava etc.). Necessary inputs like improved seeds, fertilizers and irrigation was provided by digging two community wells with pump sets

and silvi pastures and fuel species. The D.F.O. Social Forestry has interacted with ITDA and District Administration semi permanent rural houses were constructed and buffaloes were supplied to run a community dairy. Originally the milk from the dairy is allowed to be sold in adjoining Mahbubnagar town by providing two cycles and milk cans through ITDA., but later on such sale was prohibited, and the tribals particularly children were compelled to drink the milk produced to improve their nutrition.

Both in the Dachapally Chenchu habitat and adjoining village, all the people are motivated to sell their seeds, and replace them with sheep. The Village was adopted by the Social Forestry Division and interacting with NEDCAP, the entire village was provided with smokeless-chullahs. This nursery-land development- plantation-farming programme was repeated and at the end of third year not only durable assets are created to the hitherto nomadic tribals, but also the 20 families are brought quickly above the poverty line.

This is the success story of a rehabilitation model adopted for settlement of nomadic aborigin tribals, leading them from begging to asset holding, resource-creation and environmental improvement made possible due to the initiative, involvement, innovation and dedication to the cause of tribals. This excellent work requires to be emulated in similar situations.

1. Waste land Development and Tribal Settlement:-

In the same Mahbubnagar District, in the ex-Inam land of Jinnur village, a similar experiment to settle same families of the aboriginal chenchu tribe was taken up in the year 1986. Hundreds of acres of fallow inam land was brought under Social Forestry by an innovative measure of nursery raising and plantation activity undertaken by the Social Forestry D.F.O. involving in this case institutional finance. The tribals were put on nursery raising programme similar to that of Dachepally with the difference that bank finance is made possible to the beneficiaries on a monthly minimum income Rs. 600 per month. The nurseries were started in November month and November to March , through a bank pass book, the beneficiary is paid/advanced at the rate of Rs. 600/-per month totally Rs.3000. This advance is replenished by Social Forestry D.F.O. before 31st March. From April to June-July a sum of Rs 2000/- is further paid in equal monthly instalments by bank and this amount is again replenished by bank by Forest Department. Thus, the earnings per beneficary for the 8 months period is Rs. 5000/- for raising a 50000 poly pot nursery. The costing of each seedling is estimated at Rs.0.25 including a labour component of Rs. 0.15, (the material cost Rs. 0.10), and the total amount available for distribution is Rs. 7500 (50000x Rs.0.15) of which Rs. 5000 is paid 8 months (Nov.June) and balance Rs.2500 alongwith bonus of Rs.0.05 per seedling (Rs.1250 for 25000 polypots) is deposited in the pass book in July-August months, (after purchase back and distribution of successfully raised seedlings). This forms the seed money (Rs. 3750/-) for lean months (July to October) or for meeting family expenses. This single instance shown now forestry activity through single nursery raising programme of Rs.25000 polypots can alleviate poverty and bring even the aboriginal tribals above the poverty line. The payment of wages and bonus through a bank or post office pass book is not only an innovation, but also builds up confidence in the tribals for payment of a fair wage without complaints of less payments.

This experiment of settlement and rehabilitation of tribals did not end with nursery alone. The main land lying fallow for years was planted with the help of some Chenchu families who are brought under tree patta scheme allotting 2.5 ha. for each tribal family, for raising, maintenance and watering of tree crops. By this successful experiment not only the fallow area is brought under green cover but a resource base and durable assets are created to bring the poor tribals-Chenchus quickly in the very first year itself above the poverty line.

j. TREE GROWERS COOPERATIVES AND WASTE LAND DEVELOPMENT:

From the proceeding two models, it is established that people's involvement is the deciding factor for success or otherwise of the Social Forestry programmes. To enlist public cooperation one of the measures taken was to raise nurseries through tribal beneficiaries (1986). The Social Forestry division adopted that year a few villages in Mahbubnagar district, raising social forestry nurseries as a nucleus of rural and tribal development, with mixed results. In such adopted villages, tree grower's cooperative societies were formed. The same year (1986) and by 1988, the entire district was brought under the village adoption model, with all the nurseries being raised by the tree grower cooperatives.

In this model, one village is being adopted in every Mandal and beneficiaries mainly women of SC and ST communities are selected and organised into a "Tree Growers Society". The members of the Society to start with will raise nurseries for distribution to people, later on as the society establishes, the members will takeup through motivation; tree planting, wasteland development, popularising smokeless Chullahs, bio-gas plants etc.through audio visual aids, printed matter and extension services the members will ultimately preach and practise village cleanliness, environmental protection, family planning etc. with support activities, demonstration plots/health and family welfare camps etc. provided by other development departments. Starting with nursary programme in November and ending with onset of monsoon in July in 9 months each adult member for 25000 seedlings at the rate of Rs.0.25 will earn Rs.6250/-or Rs. 7000/- besides bonus of Rs. 1250/- by purchase back of seedlings.

In Mahabubnagar district alone the Tree Grower Societies are raising 60 lakh seedlings through various schemes.

Besides the societies may hold, own, take on lease lands for Social Forestry, Horticlture etc. and also encourage setting up of cottage and small scale proceessing industries and other similar activities and provide gainful employment. The society can also undertake schemes for land improvement, irrigation, soil conservation, plant protection, social forestry, Horticulture and wasteland development etc. on other private lands or leased lands. The same society can also act as a Rural Cooperative Bank providing credit and marketing facilities, providing cash loans etc. and also secure purchase, sell, store and distribute domestic requirements to the members and meet their farming needs of agricultural implements, mechinary and vehicles etc. The society can also promote Social cultural and recreational activities and carryout such other schemes conductive and incidental to the objectives of the society. They can even take contracts to provide employment to the members.

Tree Growers cooperatives are being organised in Chittoor and Cuddapah districts also (28 Societies are so far registered), integrating the same with wasteland development programmes, incorporated in the ongoing social forestry (CIDA), IRDP., NREP., RLEGP., ITDA., DR.A.P., projects contemplated under Government of India assistance. Such Tree growers cooperatives are serving the twin objectives of greening the country - side cum environmental protection and wasteland development, besides providing continuous, gainful, year-round, rural employment and creating durable community assets. Popularisation of smokeless Chullahs and bio-gas reduces pressure on forests, diverts cattle dung from hearths to fields, improves environment needs, rural energy needs, reduces people's dependence on forest produce. Similar energy saving/substitution measures are also being implemented and built into Wildlife conservation and development projects undertaken in sanctuaries like Pulicat Lake (Venad/Pernad villages).

Besides Social Forestry, encouraging subsidiary farming occupations like dairy, poultry, bee keeping, sheep breeding, seri-culture, tusser silk cultivation, horticulture etc., the members of the tree growers society got supplemented income and move fast above the poverty line, contributing to over all development and socio-eco-nomic upliftment of the members.

In course of time, these tree growers cooperatives (Societies) mainly both S.C. and S.T. women members will go a long way in carrying the message of Social Forestry, poverty alleviation and tribal development to the rural messes, especially the down trodden.

III. TRIBAL REHABILITATION MODELS:

A member of displaced tribal rehabilitation models have been tried in the past viz.Dandakaranya project for tribals, Isagoan project for East Bengal refusgees, Srilanka repatriates rehabilittion scheme in Coffee estates, Ashoknagar (Warangal District), Tribal farming society project etc. all with vary in success and different results. Similar tribal and S.C. rehabilitation projects are now being contemplated in Telugu Ganga, Sardar Jeravar, Narmada Sagar all prestigious projects. The results are unpredictable at this stage and success or failure depends on the human element and selfless service built into implementation of these projects.

In Andhra Pradesh itself the Isagean rehabilitation project, (Adilabad) for East Bengal refugees for which large extents of forest lands are disreserved have ended up with evacuees depending initially more on dolls and finally leaving the main objective land farming avocation, provided, in the scheme and tempermentally unsuited to Bengali culture. Similar is the experience in Ashoknagar (Warangal district) tribal farming scheme-with main objective of dependance on agriculture, wherein about 2000 acres of forests lands intended and disreserved for tribals, finally passed on to the heads of already rich effluent non tribals from plains.

The work undertaken by Forest Department in settling Srilanka repatriates and local tribals in Visakhapatnam and East Godavari districts in non traditional areas grown-coffee estates, has been one of the successful ventures of rehabilitation during 1961-80 period. Similar is the significant result oriented scheme of tribal welfare takeup by Forest Department for Chenchus of Andhra Pradesh in

Kurnool, Prakasham and Mahbubnagar districts, where even now the old times of Chenchu Gudems remember and priase the good work one in running primary schools/Boarding homes, offering health,protection and providing credit and marketing facilities through Chenchu cooperatives entirely and through Forest Department in the past at Bairluty, Pecheruvu and Dornal etc. These are success stories, and some of the recent instances of rehabilitation, are discussed below-mainly pertaining to current major/medium irrigation projects and wildlife sanctuary schemes under implementation in Andhra pradesh.

a. SRI VARDARAJASWAMY GUDI PROJECT:

This is an irrigation project in Kurnool district where displaced persons of Peddacheruvu (Pecheruvu) are getting rehabilitated. the components of such rehabilitation and progress of works undertaken under this rehabilitation scheme are:-

i. Provision of free SRPH scheme Houses under R.L.E.G.P. scheme executed by A.P.Housing Corporation. Out of 160 oustee families 153 have already been provided with housing facilities by district administration.

ii. Provision of farm land as per State Government norms(5 acres dry and 2.5 acres wet) to each of the eligible families (So far 160 out of 196 families were already provided with a minimum land of one acre per family).

iii. Construction of school and Hostel buildings and community services required.

iv. Adequate piped drinking water facilities and meet energy needs particularly fuel, small timber, hutting material and pasture needs of cattle of displaced villagers.

v. A Training cum production centre for providing subsidiary means of income to the oustees through activities like use of modern logging equipment, tailoring, katha manufacturing, leaf plate making, basket weaving, wood crafts, bamboo articles manufacture, pickles making, resin tapping, gum collection, rope making, mainly to tribal women and children are important to improve and upgrade tribal economy. These skills are yet to be imparted.

vi. Provision for construction of Hospital, D.R.Depot, common latrins play grounds, internal roads and other recreational facilities (administrative sanction already given).

vii. Employment of displaced tribals in jobs of Forest Department/Project works as per enunciated policy of Government.

Besides above rehabilitation measures, provision of employment in the ongoing projects like forest harvesting, M.F.P.collection, Social Forestry nursery and plantation raising programmes to the evacuees has also been ensured.

Whatever may be the rehabilitation measures planned and undertaken ensuring socio-economic and ecological well being of the local displaced tribals by coordinating with different functionaries of

Government is a stupendous task. What can be best achieved by creating an apex body for tribal rehabilitation and involving on governmental (voluntary) organisations. A mixed production system incorporating arbori culture (silviculture), horticulture and protected agriculture and multiple land use (coffee under natural forest, ginger under teak, tesser cultivation, oil-plan, cocoa cardomum, pepper cultivation etc.) is the best answer for rehabitation of displaced tribals due to execution of large sized projects.

b. TRANSLOCATION OF VILLAGES FROM CORE AREAS OF WILDLIFE SANCTUARIES:

In order to ensure an undisturbed ecosystem for free feeding breeding and proliferation of their stock, it is necessary that certain tribal villages falling in core areas of Wild Life (WL) sanctuaries needs to be shifted and sited outside. This is in the interest of both tribals and wild life.

In the case of prestigious Tiger Reserve falling in Nagarjunasagar Srisailam Wild Life Sanctuary, and as a part of Sri. Vardarajaswamy Temple project rehabilitation scheme, certain villages of Kurnool district Viz. Pecheruvu, pangidi and Amudalapenta have to be shifted to Konalacheruvu nearer to the Varadaraja Swami reservoir in the first phase and provided with housing and other facilities required. In the second phase the tribal villages falling in Prakasham and Guntur districts Tiger Reserve were shifted to Kanumalacheruvu village area in Guntur district, where assured water supply is ensured from Nagarjunasagar canals.

The village Appapur located in very interior and in- accessible core area of Tiger Reserve falling in Mahabubnagar district is also proposed to be shifted out. Consultations are going on with the tribals of this village to ascertain their preferences and acceptability of a new site on the boundary of same forest, and setup new village with all facilities including housing and farm lands, schools, hospitals, religious places of worship etc. Already the Tiger Reserve field staff of the Forest Department is interacting and actvely interfacing with this village tribals and gain their confidence by provision of new school building assisting running of a Residential school with Hostel, providing medical facilities and help in transport of sick etc. and helping to procure their daily needs from the D.R. Depots. Ultimately this village Appapur will be shifted from core area of the Tiger project and located outside with the willi gness, approval, involvement and cooperation of the local tribals, site preparation, land development, adoption of S.M.L. measures, provision of social services and amenities viz. Schools, Hospitals, Worship places, community places, play grounds, drinking water, creation of new small timber, fuel and fodder resources, energy needs etc. Will be a prerequisite and will be completed before shifting any village at appropriate time and from core areas to areas sited outside, ensuring least inconvenience to the tribal families translocated. In addition at present the Government of India as a policy is giving 100% grant for rehabilitation of oustees from displaced villages and villagers displaced from wild life sanctuaries.

CONCLUSION:

It is understandable and inevitable to admit that suffering is always caused to people who are displaced on account of siting of a project. But it is however essential, that any proposal for diversion

of forest land, if it involves displacement of people, it should be accompanied by a comprehensive and satisfactory plan of their rehabilitation. The rehabilitation executing agency should act and look at the oustees (displaced tribals), with sympathy, understanding, human touch and selfless service to make the scheme successful and make a few more fellow human lives worthy. The rehabilitation plan should be in consonance with the socio-economic, cultural and emotional life styles of the tribals displaced. Let us have this Seminar Kindles such an approach in authorities and functionaries of the Government who matter for tribal welfare and their socio- economic amelioration.

ACKNOWLEDGEMENTS:

The author places on record the ecouragement received from Shri. K.V.S. Babu, IFS., Principal Chief conservator of Forests and Ex. Officio Secretary (Forests), in preparing this paper and for sponsoring me to this thought provoking Seminar. The assistance received from Sri. M.K. Prasad and Sri. J.V.Subba Rao, Asst.Chief Conservators of Forests in collecting basic facts for the draft is appreciated. The Secretarial help from Ms. Padmavathi and Mr.P.Prasad, is also acknowledged.

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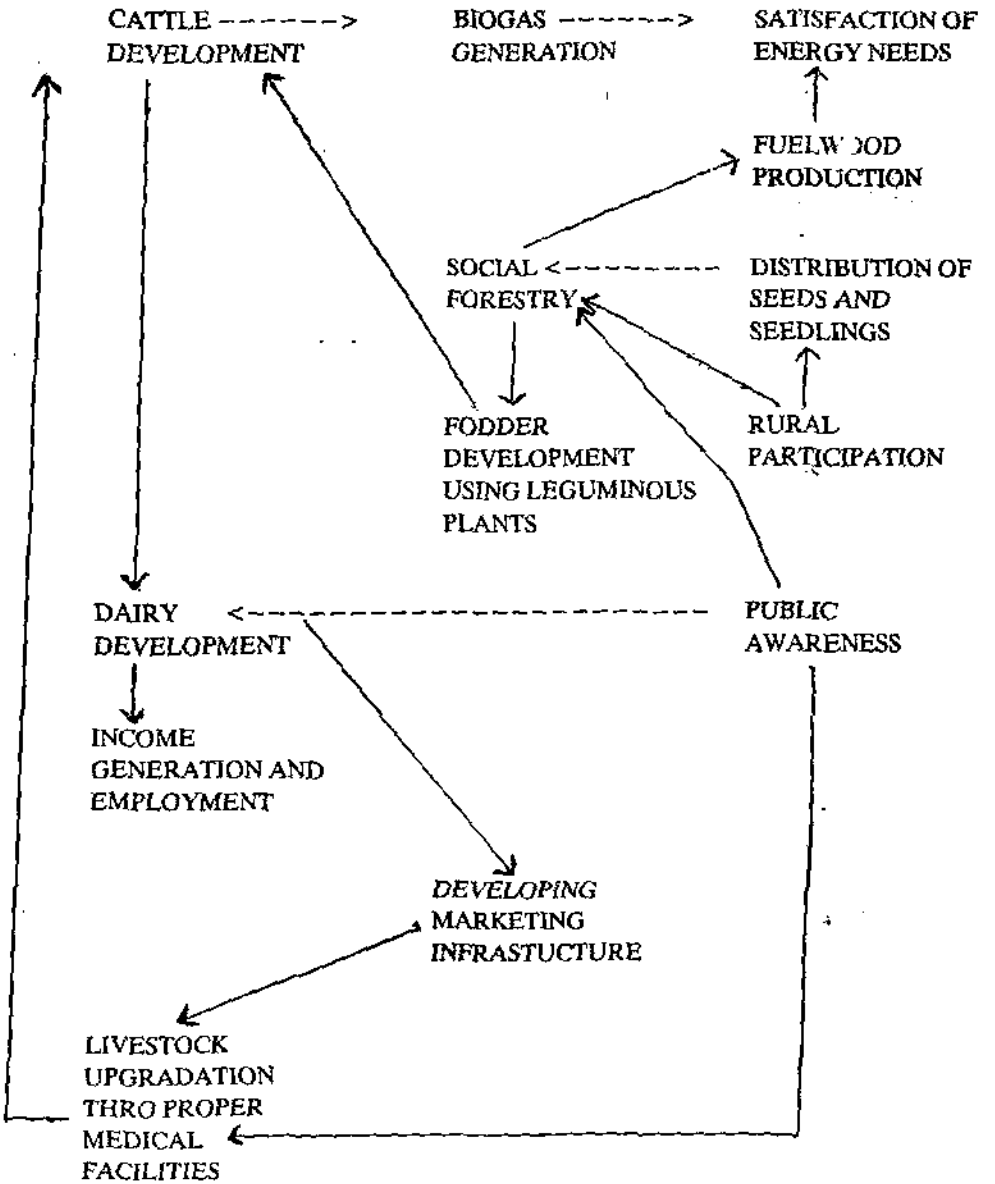
ANNEXURE - II

FIGURE 1 : INTEGRATED ENERGY SYSTEMS



DISPLACEMENT OF TRIBALS BY WILD LIFE SANCTUARIES

*K.V. SATYANARAYANA RAO
and
* S. MOHAN

Andhra Pradesh is the traditional home of 33 Tribal groups with a population of 31.76 lakhs Consituting 5.93% to the total population. Out of 33 recognized scheduled tribes, 30 groups are found living in the sprawling 30,030 sq kms. of scheduled areas and contiguous non-scheduled Sub-Plan area in the districts of Srikakulam, Vizianagaram, Visakhapatnam, East Godavari, West Godavari, Khammam, Warangal, Adilabad and Mahbubnagar districts covering 10.61 lakhs of S.T. population. The density of population in tribal areas is 125 per square Kilometer as against 194 in the plain areas.

The major tribal groups inhabiting both plains and scheduled areas are Gonds, koyas, Hill Reddis, Savaras, Bagatas, Valmikis, Sugalis or Banjaras or Lambadas, Yarukalas and Yanadis.

Forest and Tribals:

The tribals have been living in the Forest areas from time immemorial and they have developed symbiotic relations with forests. Forests are their cherished homes and they developed sacred relationship with various species of flora and fauna. The folk lore of forest dwelling tribes revolves round forests and hills. Forest provides them food, water, shelter, clothes, medicines and Employment. Thus tribals and forests are ecologically, economically and also culturally inseperable. They have co-existed from time immemorial land degradation of one will adversely affect the other.

The forest area in Andhra Pradesh is about 64,000 square Kilometers consisting mostly of tropical dry deciduous forests. The total geographical area is 275,068 sq kms. The percentage of forest area to total geographical area is 23.26% and this has been less than the prescribed national norm(i.e) 33.3% of land area.

Origin of Wild Life Sanctuaries:

The founding fathers of our constitution realized the need for the protection of forests and wild life. With the growing pressure on India's natural resources from human and animal populations, various forms of environmental degradation are evident in different parts of the country. The recurring natural calamities of floods and drought have also causing environmental degradation. Wild Life species are highly sensitive to such degradation as habitat destruction has led to the extinction of species in a majority of cases.

A comprehensive central legislation was enacted in 1972, called the wild life (protection) Act, for providing special legal protection to our wild life and to the endangered species of fauna in particular. It has a provision for setting up national parks and sanctuaries where wild life can receive fullest

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protection. Forests and protection of wild birds and animals have been included in the concurrent list in the constitution by the 42nd amendment in 1976.

Under the wild life (protection) Act, 1972, state Governments are empowered to declare any area as a sanctuary or a National park for the purpose of protecting, propogating or developing wild life or its environment. In India, there are 19 National parks comprising 6471.22 sq kms. and 204 sanctuaries.

Wild Life Sanctuaries in Andhra Pradesh:

There are 14 notified wild life sanctuaries including 3 bird and 3 crocodile sanctuaries in Andhra Pradesh covering an area of 9164 sq kms. of which about 7797 kms fall in reserve forests forming about 12% of the total forest area. Out of 14 wild life sancturies, 7 sanctuaries fall in Tribal areas in the State adversely affecting tribal life and development.

The total geographical area of the 7 wild life sanctuaries comes to 7,486.42 sq Kms. covering 256 villages. The total population of the sanctuary villages is about 1.033 lakhs, the S.T. component being 0.367 lakhs. The major tribal groups inhabiting these sanctuaries are Chenchus, Koyas, Konda Reddies, Gonds etc. A majority of them belonging to chenchu and Konda Reddy tribes, the two P.T.Gs. especially the former who have to fore go many development benefits because of their habitation in the sanctuary area. The sanctuaries include cultivated area of both wet and dry types indicating the danger posed to main source of livilihood to the people inhabiting the area. The total area under cultivation being about 76,000 acres, wet land accounts for about 13,000 acs. and dryland for about 63,000 acs. As Cultivation is the main source of livelihood for both tribals and non-tribals in the sanctuaries area, their economy has been adversely affected.

Displacement of Tribals:

Protection of Tribal rights and interests is as important as protection of wild life. Indian constitution ensured certain privileges,rights and reservations to the scheduled Tribes. It is certainly obligatory on the part of government to protect the life, tradition and economy of tribals. But the establishment of sanctuaries in the Tribal areas natuaraly affect the life and development of tribals to a great extent. It is a very well established fact that tribal and wild life have been co-existing for centuries and this co-existence is for mutual benefit. But the starting of wild life sancturies posed many problems to the traditional tribal inhabitants of the sanctuary areas. The existence of human habitations, often occupying core wild life habitat resulted insecurity to the people. Further, development works taken up for the welfare of tribals are also affected.

In Light of this situation, Nagarjunasagar-Sri-sailam Tiger project has been taken as a case study in this paper. The adverse affects of locating this Tiger project on the life and economy of Tribals (Chenchus) are discussed hereunder.

The NagarjunaSagar-Srisailam Tiger project is located in 5 districts viz., Guntur, Prakasham, Kurnool, Mahaboob Nagar and Nalgonda with a total area of 3568.00 sq.kms. There are 124 villages in the sanctuary area and out of these 124 villages, 35 villages are lying in the core area of the project consiting of 527 families with a population of 2033 chenchus. While there are 23 Sch. villages in the

sanctuary area, 14 Sch. villages are in Core area. At present there are 1402 Chenchus are living in the Core area. There are 89 villages in the Buffer Zone distributed in Guntur, prakasham, Kurnool, Mahabubnagar and Nalgonda districts.

As this sanctuary is located in Nallamalai hills the primitive tribal group viz. Chenchu who are mainly food gatherers and who subsist on collection of MFP and Forest Labour are the main sufferers. The Chenchus are at the pre- Agricultural stage of economy and largely subsist on flora and fauna of the forest area facing much hard ships in the wake of imposing restrictions on the food gathering activities after declaring Nagarjunasagar-Srisailam Tiger project in the Nallamalai hills. The Chenchus are afraid to go to forest for collection of M.F.P., edible roots, tubers, wild fruits etc., One chenchu man was killed by tiger near Mannanur when he had gone for collection of Gum. Some of the plough bullocks distributed by I.T.D.A., for Chenchus living in villages on the periphery of Tiger project were eaten by tiger at padra and Jangareddy-gudem village in Amarabad Mandal of Mahbubnagar district. It is generally reported both in news papers and personal representation that the sanctuary authorities are not disposing off cases pertaining to payment of compensation due to loss of human life or cattle due to attacks by ' Carnivorous Animals like Tiger, in the sanctuary areas.

Further, the compensation paid is also very small compared to the huge loss sustained by the tribals. For example, in this Tiger sanctuary 2001 cattle were reported to have been killed between 1980-81 1986-87. During the first three years i.e 1980-81 to 1982-83 no compensation was paid for the 435 cattle killed. However during the remaining years an amount of Rs. 5.30 lakhs reported to have been paid as compensation for the cattle killed between 1983-84 to 1986-87. This works out to an average of Rs. 338 per animal which is on the low side. Further, it is also reported that two human beings were killed by Carnivors, while 12 others were injured upto 31-3-1987, in the Nagarjuna Sagar- Srisailam Tiger Reserve.

In former days, Forest Department used to employ Chenchus in Bamboo and wood cutting, afforestation operations etc.

After the introduction of Tiger project all kinds of exploitation of forest resources are prohibited. Consequently Chenchus are not employed as daily labourers. Chenchus who partly subsist on hunting small game like rabbits, wild fowl etc, are prohibited from hunting and their bows and arrows were also confiscated. They were denied opportunities for earning daily wages, collection of M.F.P. edible roots, tubers, small game hunting etc. causing economic displacement to the tribals. Because of restrictions imposed on movement of vehicles by Forest Department, Tribal welfare Department could not implement certain development schemes in core area of the project. Even the Ashram School located in Ferahabad, a buffer village of sanctuary was shifted. Another problem is the maladjustment that sets in the process of adjusting to the new environment, both human and natural and the consequent susceptibility to exploitation from out side which will be further accentuated as the new colonies are usually located out side the scheduled area for obvious reasons, and their own inherent in-abilities to adjust to alien surroundings.

Suggestions:

As the development of Tribals and protection of wild life can not go hand in hand in the sanctuary areas, it became imperative to relocate and rehabilitate such settlements outside the reserves. These posed a delicate problem involving not only sentiments but also humanitarian considerations.

The following suggestions are indicated to the rehabilitation of Tribals affected by sanctuaries.

1. Each Tribal family should be provided with 3.2 hectares of cultivable land in addition to a plot of 610 sq. meters as house site free of any charge.
2. The cultivable land is thoroughly ploughed and made fit for sowing agricultural crops at Government cost and then alloted to each family.
3. For the construction of the residence each family has to be granted Rs. 2500 = 00 as subsidy and Rs. 2500 = 00 as loan.
4. In addition to the above, community facilities such as drinking water, primary school, approach road, community centre, etc, are to be provided by the Government.
5. Shifting of families should start only after a fully developed rehabilitation colony is established with all civic amenities like schools, hospitals, roads, drinking water etc. livelihood sources like developed agricultural land, Irrigation facilities, household and occupational assets like utencils, implements etc, are ensured.
6. The rehabilitation colony should as far as possible be on the periphery of the sanctuary area with permission for the tribals to enter the sanctuary area for the collection of M.F.P. and even hunting for household consumption unendangered wild animals. This prevents feeling of complete uprootment among the tribals from their natural moorings and the consequent maladjustment.
7. Tribals can with advantage, as they have traditional expertise in tackling wild animals and ingrained knowledge of the habits and movements of the wild life, be employed exclusively as watchmen and forest guards.

Annexure

›anctuary	District	Area in Sq. Kms	No. of vill. effected	Population			Area under cultivation		
				Tribal	Non-Tribal	Total	Dry	Wet	Total
ıgarjunasagar ·'saiiam r sanctuary	Guntur, Prakasam Mahabubnagar, Nalgonda, Kurnool.	3568.00	124	3,968	19,432	23,400	13,457.50	—	13,457.50
ırnagaram wild life ctuary	Warangal	803.00	17	3,932	3,501	7,433	2,721	2,822	5,543.00
khal wild life nctuary	—Do—	860.00	17	4,404	1,974	6,378	6,765	2,374	9,139.00
innerasani wild life ınctuary	Khammam	635.40	21	10,280	2,292	19,572	15,928	862	16,790.00
)awal wild life ınctuary	Adilabad	893.00	32	6,132	16,180	22,312	10,758	5,930	16,688.00
'ranahita wild life anctuary	—Do—	136.02	20	1,782	13,887	15,669	11,439	1,045.50	12,484.50
apikonda Hills wild fe sanctuary	Khammam, East Godavari & West godavari	591.00	25	6,260	2,360	8,620	13,338	96.57	1,426.95
	Total	7,486.42	256	36,758	66,,626	1,03,384	62,399.88	13,130.07	75,529.95

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FOREST REGENERATION THROUGH COMMUNITY PROTECTION:

THE WEST BENGAL EXPERIENCE

Proceedings of the Working Group Meeting
on Forest Protection Committees
Calcutta, June 21-22, 1989

edited by

K.C. Malhotra and Mark Poffenberger

Sponsored by:

West Bengal Forest Department
Indian Institute for Bio-social Research and Development
Ramakrishna Mission
Ford Foundation

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D.D. Sarkar

D.N Shukla

R.P.P. Singh

M.A. Sultan

G. Yadav

FOREWORD

In this State, with its progressive socio-political environment, social forestry and related activities are consciously directed towards promoting popular participation and ensuring the flow of benefits to specially identified groups of disadvantaged people. These include small and marginal farmers and people belonging to traditionally and economically backward classes, such as scheduled Castes and Scheduled Tribes. The strong political will of the Government, a pragmatic land reform policy, and supportive resources have helped considerably to make social Forestry truly 'peoples forestry' in this state.

Dr. Ambarish Mukhopadhayay
Minister in charge
Department of Forests and Environment
Government of West Bengal
Calcutta

(Excerpted from his speech inaugurating the workshop, June 21st, 1989)

INTRODUCTION

There is a growing body of experience from India and abroad, that cooperative action between forest departments and forest communities can effectively protect degraded forest lands allowing them to regenerate and increasing their productivity for both communities and the government. The early experience from the pilot project at Arabari in West Bengal demonstrated that villagers living on the edge of forested areas, could close them to grazing and cutting, resulting in rapid regrowth. When the villages surrounding the Arabari forest tract were given the exclusive rights to restrict access and use minor forest products, and a share in the timber, they effectively protected over 600 hectares and saw the productivity of the degraded forest increase dramatically.

News of the Arabari experience was transmitted through south west Bangal by forest field staff and other villagers, and over the next eight years more than 1250 villages formed Forest protection Committees covering 152,000 hectares of degraded forest, which is now regenerating. Since increased protection was supplied by the community on a voluntary basis, the cost of regenerating forest lands is a modest Rs. 250 per hectare, only 5% of the cost of establishing a plantation crop. Enrichment planting of indigenous and exotic species within the natural forest (Such as mushrooms, bamboo, medicinal herbs, and grasses) can further increase the flow of benefits to forest communities and the state.

Diagnostic studies indicate that forest communities, like forest departments are concerned by the rapid degradation of the forests they live near. Forests represent an important source of fuel, food, building materials, and medicine. The men, and especially the women, in many forest villages spend long hours in the forest gathering a multitude of forest products, some of which are consumed in the home, while others are sold. Among landless families, forest related activities may represent the primary source of income. While it is difficult to estimat the number of rural Indians primarily dependent on public forest lands for cash and goods in kind, it is likely to number in the tens of millions. Each year, in kind, it is likely to number in the tens of millions. Each year, three to five billion workdays are created within the public for : sector for fuelwood collection alone. One "minor" forest product, the leaves of the tendu plant used for bidi making, generates revenues of over $300 million annually. The uncalculated value of the fibers, medical, food sources, oils, and essence in immense variety would increase the total many fold. It comparative data were available, it is likely that the income from "minor" forest products in many forest districts would make timber revenues appear insignificant by comparison. However, historically professional foresters have overlooked these products, and concentrated their attention on timber extraction. Forest communities have suffered as the forests are logged and the habitat which supports their forest product gathering enterprises are disrupted.

Aside from economic motives, many rural Indian Communities hold forests in high regard, as an important part of their belief systems. The forest is the place of meditation and spiritual insights. Many trees and their leaves and fruits are used in rituals, and are vested with symbolic values. On a more secular level, the forest is a place of childhood games and adolescent romance, and a place to escape social pressures. Among the Forest Protection Committees of West Bengal are communities of landed families, whose private holdings minimize their economic dependence on the forest, but their love for

the trees lead them to devote their time and attention to its protection, allowing regeneration to occur, much to the satisfaction of participating families and the forest field staff.

The lesson we draw from the forest protection committees of West Bengal is one of hope for the State, for the nation, and for the World. The process of forest degeneration can be reversed. Through partnerships between foresters and forest communities, effective protection can be established with ecological and economic benefits for the community and the larger society. However, the task is not an easy one. It requires the political will of the state to delegate responsibilities to the forest communities, and changes in policies and procedures that may have been in effect for over a century. Ultimately, it requires a transition from management practices developed during the 19th century, to a management system that can respond to the social, economic, and ecological needs of the 21st century. It requires dynamic leadership within the forest department to allow for a transition from traditional modes of timber production and forest policing, to a cooperative, responsive ability to work with rural communities.

In West Bengal, the political commitment of the State to better forest management, the dynamic leadership of senior forest officers, a well motivated field staff, and eagerness and commitment on the part of forest communities has resulted in the emergence of a new system of public forest management. By 1989, 37% of the State forest land of south west Bengal were under joint protection. The next challenge the forest department must address is consolidating this program by improving its field capacity to work with participating communities by providing organizational, legal, and production and marketing support. The purpose of this workshop was to bring the Department's senior officers, Divisional forest officers (DFOs), and Range officers (ROs), together with social scientists and policy makers, to analyze recent experiences with the program and set priorities for further improving it.

The report begins with an excerpt from the State Minister's inaugural address, in which he underlines the commitment of the state Government to respond to the needs of forest people in an ecologically sound manner. His foreword is followed by part I which presents papers from two of West Bengal's most senior foresters. Both Chief Conservators have played an instrumental role in the development of the Forest Protection committee program, and provide considerable insights into the program's implementation and evolution. In part II, the results of the workshops discussion groups' recommendations are presented covering needs for improving protection, production, planning, and Departmental staff support capacity. These suggestions are based on the experience of the district and range level officers who are in daily contact with the program. In part III, the results of case studies from Forest Protection committees are presented. The studies were compiled by Satish Chandra and Mark poffenberger, with support from anthropologists from the Indian Institute of Bio-social Research and Development (IBRAD). It is hoped that this report will provide interim documentation of emerging approaches to joint forest management, and the issues that need to be addressed during such management transitions.

The organizing committee wishes to extend its gratitude to Minister Ambarish Mukhopadhyay for his willingness to inaugurate the workshop and his guidance, and to Mr. Jayant Sanyal, state Secretary

for Forests, for his support. Thanks are also due to Mr. Bardhan Roy, Chief conservator of Forests for West Bengal and his predecessor Mr. Prabir Guhathakurta, now at the World Bank for their encouragement in bringing the FPC experience to the general public to the staff of the West Bengal Forest Department, who related their knowledge and experiences to the researchers and in the workshop, we are also indebted. Finally, to Dr. S.B. Roy and the IBRAD staff, who tirelessly organized the workshop, and to Mr. K.R. Raghunathan who brought this report through the long revisions to publication, we give our thanks. In closing, we would like to dedicate this report to the Forest Protection Committees of West Bengal.

PART I : OPENING STATEMENTS

PARTICIPATORY FOREST MANAGEMENT IN WEST BENGAL

by
U. Bannerjee, IFS
Additional Chief Conservator of Forests
West Bengal

Popular participation in forest management is an innovation that a growing numbeer of foresters all over the third world are striving to achieve. To comprehend the issues arising from participatory forest management in the state of West Beengal, the existing forestry context need to be appreciated. Current state forest policies and strategies have been shaped by several concerns. Foresters are increasingly alarmed by the progressive denudation of tree cover, both within and outside the forests, to meet the growing demands of household and industrial consumers, and by the adverse impact of forest loss on the environment. As a result, foresters are questioning the wisdom of continuing forest management through the imposition of a regime of institutional rigidity, often assuming repressive dimensions, in chilling isolation from the people who live around forests and suffer from the loss of forests. Planners and field level staff realize that the state's disappearing forests can only be saved through a system of participatory resource management, in which local people are meaningfully involved.

Like many political and social movements, this concern for forest loss has emerged out of a crisis. The crises are two-fold; firstly, the crisis of eroding resources and its larger socio-ecological implications. The second is the crisis of confidence, and the ever-widening gap between the professional forester and the people.

Public awareness and concern about forestry, ecology, and the environment has grown rapidly during the last decade. In fact, from an obscure branch of natural science, these issues have captured the public's attention. There is a maturing social consciousness about forest loss and all that it implies. Yet, such concerns tend to focus on the problems of deforestation, while failing to search for solutions.

What is needed is a total change in the attitude and concept of forest management. There should be a conscious attempt in all forestry projects and programs to ensure that the benefits from such activities go to the people, not as a philanthropic gesture from a benevolent doner, but as a responsible and honorable partner in forest management and related activities. Forests can survive only if the Victims, as well as the agents, of forest destruction are involved in participatory management.

Thr forest departments of the region were established over 100 years ago during the colonial period. In those days population pressure on the forests were light. Consequently, all our silvicultural regimes, management practices and priorities were developed in a situation of plenty. Today, after a century, the situation has changed dramatically and our traditional forestry attitudes and concepts have much less relevance.

Over the last decade, large-scale social forestry projects were launched in India often with massive assistance from international donors. The State of West Bengal also jumped on to the "Social Forestry Bandwagon" in 1981. West Bengal was the third state to establish a program, preceded by Utter Pradesh and Gujarat. I must admit that during the initial years there was a lot of confusion and misperception about program direction and how to address emerging social and technical problems.

Expectedly, when the task of ensuring community participation was assigned to professional foresters, with their 'resource cop' syndrome and state revenue earning orientation, they had some difficulties. Traditionally, foresters learned to keep people and forests separate, and also to treat agriculture and forestry separately. Therefore, there was some hesitation in implementing these new programs.

While the growing and tending of tree is well-known to professional foresters, in encouraging popular participation we were handicapped. In this aspect our expertise, our training, our tradition, and our background has never encouraged community participation. The major problem faced by the professional foresters now is to develop the capacity institutionally, and individually to promote and formulate realistic programs to manage forests in a way which is meaningful to the people who live near the forests and suffer the problems of forest loss.

Recognizing the concept of participatory forestry is little more than a decade old, compared to 15 decades of conventional forest management in this region, it will take time for this new approach to Forest management to be integrated into professional and administrative circles. While there has doubtless been some success in terms of physical achievements, we approached the implementation largely through our traditional knowledge of silviculture, and with an imperfect and mundane knowledge of the needs of forest communities. To many of us the concept peoples' participation, was obscure; it meant merely to give some employment opportunities to rural people; to give some low- priced forest product as a fringe benefit. By achieving this it was presumed that we had fully secured and ensured popular participation. The index of success was invariably assessed in terms of the traditional input-output framework, where success was always assessed in terms of resources invested and resources created. For example, if a target was to raise 100 ha. of farm forestry plantation, a forester reaching this figure of 100 ha. would be deemed to have achieved 100% success. The issue of who benefitted from this 100ha. was given little or no importance.

These initial success not withstanding, the concept of participatory resource management is still developing among West Bengal's foresters. The job is hard indeed. Developing an effective institution for such participation is not an easy task. In fact the term, 'peoples' participation' is so general that no one clearly comprehends its full implications. As a result we often approach the issue with a 'I do, you participate' attitude. In such circumstances the Forest Department will prepare a plan, implement it - may be offering some unskilled or semi- skilled jobs to the local people, and they are then expected to participate in the program. Such lip service cannot achieve lasting results. Another approach to participation is what is known as 'money pack models' where monetary incentives are offered to the people to seek their involvement and participation. The type of intimate or intensive popular participa-

tion where local people act as equal partners with the Forest Department can hardly be achieved through these approaches. In West Bengal, compared to some other states in India, the level of popular participation is generally higher, but an ideal institutional arrangement for seeking popular participation had not yet been realized.

I am personally delighted that in organizing the Forest Protection Committees, the process of developing meaningful partnerships with communities is taking concrete shape. This is due to a number of factors; firstly, the tree- community nexus is well known to the people, especially those living in the peripheries of the forest. Secondly, as trees grow forest communities benefit from an increasing flow of forest products which enable them to earn a subsistence living. The field staff must be congratulated for assisting these villagers to organize and driving home the key message, that, if the trees survive they will be primarily for the forest communities' benefit.

Finally, a clear cut policy decision by the state government regarding the sharing of benefits from these resuscitated forests has also helped to narrow the credibility gap that exists between the forestry administration and the people at large. These favourable factors have contributed substantially in motivating people all over the southern wooded districts of the West Bengal to organize and protect forest lands. It is most satisfying to note that more than 1,250 Forest Protection Committees are now operating in West Bengal, protecting over 150,000 ha. of forest area. The promise of better results through participatory management is clearly seen from the initial successes of this program.

This approach has attracted attention from forest administrators and planners at national and international levels. Social Forestry in this State is fast emerging as a major landuse option, with the potential to play a significant role in resolving problems of rural poverty and land degradation. Yet, it must be fully appreciated by foresters that a completely new orientation in management practices and perceptions are necessary to guide this program to a fruitful end. This approach reguires foresters to deal with new actors, new locations, new products and new economies of scale. I am, therefore somewhat apprehensive that unless the present promising trends are zealously protected and consolidated. We may again slide back to 'Square One' once the initial euphoria is over. Therefore, I call upon my young colleagues in this field to appreciate that it is not high profile technical deliberations or beautifully drafted workshop reports which will determine success or failure, but the actions of poor forest dwelling communities. They are waiting for action - real action - to attain a more dignified existence with better living conditions through sustainable utilization of forest resources, placed under their care.

We have generally assumed that it is difficult to develop awareness among rural people towards rational use of forest resources because they have traditionally considered forests to be an inexhaustible resource. It was further believed that it is even more difficult to help forest communities to apply appropriate management systems to common property resources like forests which are often vast, sprawling, and open to abuses by impoverished rural people and their famished cattle. In contrast to these concerns, the experience of the West Bengal Forest protection Committee program shows communities identify strongly with the aims and objectives of the program. Apart from the rapid

regeneration of the region's sal forests, the spontaneous response from forest villages is the program's biggest achievement.

Hopefully, the resurrection of tree consciousness among rural communities can be sustained. Yet, such efforts can only be successful through constant endeavors to improve our technical performance as well as our capacity to work with the people. It is recognized that these efforts could wane if the slogan of participatory resource management is muffled by indifference and inaction. Much of the program's dynamism could die out, eroding the effectiveness of village management institutions, which are emerging spontaneously, unless one is cautious about lapses in program and policy attention. To maintain this momentum for improving forest management, the process of fundamental change in the basic approach of foresters must continue, along with changes in belief systems, values and assumptions of forest communities. In seeking to alleviate the anguish of the poor through viable programs, we are not merely fulfilling our professional responsibilities but also our fundamental obligations as civilized men, to our less privileged brothers and sisters of the forest.

PRESENT STATUS OF FOREST PROTECTION COMMITTEES

by

S.Palit
Additional Chief Conservator of Forests
Social Forestry Wing
West Bengal

This paper examines the background the present status of the Forest Protection committee program in West Bengal. *The launching of the sal forestry project began in 1972 with an experiment in* natural forest regrowth in Arabari in southwestern Bengal. At Arabari, initially we were trying to provide saturation employment to compensate surrounding villages for protecting the forest and for income lost due to the moratorium on cutting. However, the Forest Department realized that we did not have enough financial resources to do this for the state as a whole. While the Forest Department needed to *meet some of the forest communities' opportunity costs, the sustainability of community protection* naturally depends primarily on the willing cooperation of the people. *If they are paid for everything,* the movement you stop payment, the forests will go. Therefore, we are now attempting to meet the forest communities half-way. The Forest Department attempts to meet the lost income of communities involved in the Forest Protection Committee program by giving them rights to all minor forest products, a 25% share of all timber products, and through supplemental employment programs, while the people give their labour voluntarily for forest protection.

The broad strategy is to create employment opportunities through resource building activities and sharing of usufructs. The program is attaching increasing importance to collection of nonwood forest products, the improvement of wells and other drinking water resources, and the construction of earthen dams leading to improvement of agricultural production. Resource development activities are identified through the formulations of micro-plans. *Micro-plans are drawn with community members, giving them a variety of options to choose from based on their needs and priorities and considering the* physical *potential of their environment.*

At the moment the program has focussed on the sal forests of the state. Sal forests are a particularly appropriate environment to initiate the program because they are a highly productive and economically valuable natural forest system, considerably more valuable than other plantation production system. While participating communities may attach some importance to the 25% share of final timber yield *after 8 or 10 years, it is the flow of non-wood products from sal forests that is valued most. Given current* policies concerning the distribution benefits flowing from a regenerated natural sal forests and other production system, it is clear that the benefits received by communities may be larger in natural forests than in forest land under plantation production. In fact, so much income in cash and kind can be drawn from the non-wood forest products alone, that eventually we may find the communities are reluctant to allow a final feeling of the forest.

I think it is important to note that we can create a plantation, but not a natural forest. In West Bengal, we are trying to resuscitate the natural forest ecosystem with all its diversity and genetic resources. As foresters, we must ask ourselves whether we should destroy a thing which we cannot create. We should pool all the resources at our disposal to see that the entire forest system is reestablished and in the process a splendid job would have been done.

In West Bengal, we are currently trying to regenerate 259,000 ha. of sal forest under the Forest Protection Committee program. At the present time, above 1,266Forest Protection committes (FPCs) have been established in the Western Circle managing 152,000 ha. of land with the Forest Department, primarily in Midnapore, Bankura, and purulia Districts. In terms of the entire 427,000 ha. of forest area in the Western Circle, FPCs are looking after near 37 percent, and this has largely been achieved through community motivation. Further, it is estimated that at least 10,000 ha. of the FPC territory is well procected, with the degraded sal forests rapidly regenerating. The distribution of FPC coverage by district is given in Table 1:

Table 1: Forest Area and FPC Coverage by District

1)	Midnapore District*		
	i) Geographical area	1,408,100 ha.	
	ii) Forest area	170,189 ha.	(i.e. 12% only)
	iii) Area protected by FPCs	67,300 ha.	(i.e. 39.5%)
2.	Bankura District		
	i) Geographical area	688,200 ha.	
	ii) Forest area	139,729 ha.	(i.e. 20%)
	iii) Area protected by FPCs	49,315 ha.	(i.e. 35.29%)
3.	Purulia District**		
	i) Geographical area	625,900 ha.	
	ii) Forest area	92,254 ha.	(i.e. 14.8%)
	iii) Area protected by FPCs	38,500 ha.	(i.e. 38.5%)

* Most of the FPC protected Forest is in East Midnapore forest division.

** The social and economic situation is extremely difficult in purulia. If we can save purulia's forests, we can save the rest of Bengal.

The FPC program has accelerated rapidly over the past year, with the number of participating communities increasing from 660 to nearly 1300. The area under protection a year ago was 75,000 ha. and now it is more than 152,000 ha.

In closing, I would like to draw your attention to some major problems the programs faces:

- FPC Interactions: Problems arise from interaction between the FPC, between members of the same protection committee, between protection committees and the villagers outside the committees. The Forest Department is examining how best to facilitate dispute arbitration in such cases. There are also problems with the smooth flow and pricing of minor forest products and the interactions between the FPCs and such agencies as the West Bengal Tribal Development Corporation (WBTDC). The Forest Department must also consider the relationship of the FPC with the panchayat and the people outside FPC's. There is three-tier Panchayat system in West Bengal and the Forest Department staff needs to build rapport with every tier and gain their political support to ensure the survival and successful expansion of the program. We have to take the advice of the local panchayat government seriously in the larger interest of the FPC's.

- FPC Approval: While on the whole the Committees have functioned quite well over the years, for sometime the program was constrained by the lack of a government order recognizing the formation of the committees. However, on August 15th, 1989 the formal order was issued (See Appendix 1).

- Local Politics: In order for the FPCs to effectively represent the interests of all community members the Forest Department feels it is important that the committees remain apolitical. However, given the politicized nature of life today, this goal is not easy to achieve. The Forest Department must attempt to cut across all political lines to help committees reach a consensus regarding their actions and policies, thereby enhancing their stability. This will require a lot interaction between field staff and the community.

- Staff Capacity: The levels staff ability to interact with forest communities vary widely. The program's first priority was to motivate and train the Divisional Forest Officers (DFOs) to carry out this assignment. I am sure my DFO's are now highly motivated. Having done, so we have to motivate and train our field staff.

- Women's Participation: Our next priority is to improve the Department's interaction with women members of the forest communities. Women, in the form of fuelwood gatherers and head loaders, present a major problem for male field staff. Women are generally shy with field staff, so approaching them and discussing forest use problems is nearly impossible. The field staff must open to channels of communication with women forest users to better reach compromises and resolve conflicts over wood collecting and headloading.

- High Forest Dependency Families: The total dependence on forest resources of some families dwelling in or on the fringe dweller's the forest presents difficulties for the program. It is these families which suffer the most when forests are closed to cutting and grazing to allow regeneration to take place. Yet, the Department does not have the financial resources to compensate all such families for their lost income. There is some apprehension that these families, outof frustration and desperation, will continue to exploit the forest in an uncontrolled manner. This

has happened, especially in communities where FPC were formed without proper motivation and discussions. It is important that we better understand how to meet the needs of this sub-section of the population, to allow them to successfully participate and benefit from the program.

Microplans: Not everyone can prepare microplans well and the current methodology provides communities with little choice or opportunities for participation. Beat officers prepare the microplans, Range officer oversee that. The question is whether the beat officer really can make good microplans. We have to develop a strategy to improve the consistency and standards of microplans. We are handling public property and we have to optimize production. If we fail to optimize production, we will not only be cursed by the people, we will also be cursed by posterity. It is extrely important that the community participates. Resource materials must also be utilized to do a good job of the microplans.

FPC Authority: Many FPCs exhibit insecurity when members come in conflict with offenders. This is particularly a problem in border areas of the region where people come from distant areas to cut trees. When FPC members try to result, clashes ensure. In the Baghmundi hills in Purulia district, the bulk of the offenders come from the plains. When the FPC people living in the hills tried to push them back, it angered the plains people. Now, when the FPC members go out to the plains, reprisals take place. The FPCs are now seeking greater recognition, authority, and support from the Department in carrying out their protection duties and the Department needs to increase its capacity to respond in a supportive manner.

In the discussion group reports that follow, the District and Range Officers of the Western Circle provide their own perspectives on the problems confronting the FPC program and steps that must be taken to resolve these issues and strengthen this new approach to natural forest regeneration through community participation.

PART II

Discussion Group I

Subject: WBFD/FPC TRAINING AND EXTENSION

Discussion leader:	*S. Roy*
Members:	*P.K. Basu*
	A.B. Mahato
	R.R.P. Singh
	D.N. Shukla
	M. Kandu
	B. Manna
	Mitali Chatterjee

Discussion Questions

Q.1. *What types of communities and forest areas should receive priority attention under the FPC program?*

- Existing FPC's should receive priority attention to stabilize the working of these groups. After gaining experience and insights from these other FPCs be gradually introduced
- *FPC's comprised of economically disadvantaged Communities, in particular scheduled castes, scheduled tribes, landless laborer and marginal farmers, dependent on forest produce for subsistence should receive first priority.*
- Forest lands with comparatively better potential for coppice regeneration should get preference.
- Areas subjected to accelerated erosive processes and ecologically fragile areas and catchment areas should receive priority.

Q.2 How can WBFD field staff capacity to work with FPC's be increased?

- *Leadership of senior officers is essential to provide guidance in clear, coherent and unambiguous terms regarding the job to be done.*
- Frequent site visits of senior officers.
- Criticism for initial hesitant steps by field staff will not be useful. Instead they should be commended even for small successes and encouraged for local level problem- solving.
- Rewards and incentives, not necessarily in monetary terms, should be given to deserving forest officials. Some ways in which their work could receive attention and recognition are: (i) State\District level award or medal/prize for outstanding work, (ii) mention of the names of worthy field staff in reports/articles published in newspapers/journals, (iii) visit and laudatory

comments by national and international teams, and (iV) furnishing copy of report regarding meritorious work by superior officers.

- Improve mobility by providing motorcycles to field staff and jeeps to supervisory staff.
- Evolving a structured extension system to establish better contact with the FPC.
- Establish a regular schedule of FPC orientation courses in each division for all category of staff and some FPC members. The participants should be encouraged to talk and narrate problems they are facing. Without this process of feedback, participatory forest management system may degenerate into a straight jacket of stereotypes and cliches.
- Encourage staff to learn local dialects and cultural practices for better communication and rapport with FPCs.
- It should be categorically emphasized to the forest staff that the FPC members are partners in a mutually beneficial management system and that their views and knowledge should be respected while formulating management practices.
- Less talking, more listening and a change from I know best, to you know better approach should be adopted.

Q.3 How could the FPC program be adopted to meet the needs of different forest user groups, especially women?

- A detailed micro-level plans need to be developed to assess the plant biomass needs of the villagers and fringe area villages.
- Extent need based, site specific, inexpensive (economically viable) and appropriate technologies for non- wood forest produce.
- Emphasize on programs with potential for short-term yields through silvipasture, agro-forestry, kisan nursery for farm and summer forestry, sericulture, ground water rechanging, drinking water supply, and improved stoves.
- Assist women to arrange for local firewood and fodder collection; sanitary wells in the villages; establishment of women controlled nursery; improved stores; and supply of equipment for sal-plate making.

Q. 4. What issues need to be considered in determining the size and composition of the FPC and the forest area to be managed?

- Capacity of the local forest unit (Beat) to handle, taking into account other government works, to be done and the distance from the Beat office. On an average 2,000 ha. of forests with 10 FPC managed (200 ha. each) blocks with 100 members in each FPC is manageable. However, scattered bits of forest blocks with widely dispersed villages will require less staff.

- In economically homogeneous villages all families should be made members of FPC. In multi-ethnic villages, priority should be given to forest dependent communities.
- Productive potential of the area should determine man-forest ratio. In general it should not be less than 1 ha. per member.
- Forest blocks with blanks over more than 25 percent to be made productive by heavy investment for artificial regeneration should not immediately be brought under the fold of FPC control.
- In areas subjected to annual tribal hunts, larger FPC should be constituted.

Q.5. What set of economic incentives need to be created to facilitate the participation of communities in protecting and regenerating degraded forest land?

- Activities which promote immediate/short-term yields should be set in motion, e.g. silvipasture, agro-forestry, kisan nursery, sericulture, pisci-culture, quick yielding fruit trees like papaya, citrus, muringa etc.
- Facilitating linkage of benefit flow from other departmental schemes in the area through the panchayat.
- Facilitate bank credit for participating members.
- Provision of sal of forest produce at subsidized rate to neighbouring villagers who are not members of FPC to reduce conflict.

Q.6. What type of training activities would improve WBFD field staff ability to work with FPC's? What type of training activities would improve FPC ability to help manage forest lands?

Training of WBFD staff

- Exposure to Rapid Rural Appraisal (RRA) technique.
- On site micro-planning sessions involving small groups as a learning process.
- Arranging group meetings with FPC members to learn to interact and establish rapport.
- Regular schedules of orientation courses at Divisional level for all categories of staff up to Forest-majdoors (Labourers).
- Field visits to both success and failure areas to learn how the system works and how it fails.
- Production and use of training materials, e.g. posters, leaflets, booklets, slides, video-tapes etc.

Training for FPC members

- Intimately involving the FPC members while conducting RRA.
- Intimately involving the FPC members at all stages of micro level planning.

- Training sessions to make FPC members aware of the economic potential of the area an long-term ecological consequences.
- Narration of case studies (through slides and video tape wherever feasible) of success areas and arranging visits to those places.
- Technical training and information dissemination for nursery works, and marketing of local products and their use.
- Optimal utilization of local products by training the members how to use simple tools, e.g., *sabai rope making, sal leaf plate making, decortication of sal seeds, small plants* for extracting citronella, eucalyptus, mahua, sal oil, etc.
- Training programs for improving production system in the uplands for Arhar, peanut, kalai, soyabean etc.
- Keeping regular contact and arranging follow-up and evaluation sessions.

Discussion Group II

Subject: FPC PRODUCTION, PROCESSING AND MARKETING

Discussion leader:	Dr. A.K. Lahiri
Members:	P.K. Roy
	B.Ghosh
	Gordon Conway
	Niranjan Majumdar
	K.C. Malhotra

Discussion Questions

Q.1 What are the current problems faced by FPC in producing, processing and marketing forest products?

For the sake of brevity current problems faced by FPC are treated separately for the three aspects related to forest products i.e. production, processing and marketing.

A: Production of forest Product:

- Lack of awareness of the manifold advantages in protecting forests among the people.
- Lack of confidence and uncertainty in the scheme in terms of their share in yield after harvesting. This often leads to halfhearted participation.
- In many FPC alternate grazing lands for the village cattle are not available. In such cases the villagers often have no other alternative but to graze their animals in protected forest. This naturally effects forest productivity.
- The occasional Forest Fires caused accidentally or intentionally affect productivity.
- In some FPC, due to the non-availability of alternate source of employment to people dependant on forest product, it becomes difficult to seek their cooperation in protection of forests.
- Often adjacent villagers to a FPC lack biomass resources (especially fuel and fodder) to meet their basic needs. To meet these sometimes they use resources in protected forests.
- In some villages after the formation of FPC, the inhabitants do not get sufficient fuel and fodder.
- It is often seen that the people do not adopt appropriate pruning methods is collection of bidi leaves (Kendu). Adoption of these methods could enhance productivity by manifold.
- Lack of appropriate package to enable development and enrichment of soil, thereby increasing the productivity of utilizable biomass.

- Funds made available to several recently established FPC's are rather inadequate for optimum biomass returns.

B. Processing of forest produce:

- For each of the FPC data are not available in terms of the annual yields and seasonal fluctuations of non-wood forest products like mahua flowers, sal seeds, mushroom, kendu leaves and fruits, many types of oil seeds, honey, sal leaf, medical plants, aromatic grasses etc. This hampers setting up of processing units.
- Even where some data are available either due to lack of awareness or initiative such small-scale, economically viable processing units have not been set-up.

C. Marketing Problems:

- Non-availability of proper market outlets. In fact no systematic data are available for marketing outlets.
- Unorganized collection of the non-wood forest product.
- Completion with LAMP.

Q.2 What set of economic incentives need to be created to facilitate community participation in increasing the productivity of degraded forest land?

- Provision of employment in lean period i.e., November through March.
- Provision of intercultivation of suitable need based crops, e.g. fodder grasses like sabai.
- Cultivation of multipurpose trees (Such as bamboo) along with other forest crops.
- Plantation of tasar silk worms and lac hosts.
- Plantation of fast growing species for early return.
- To create assets for community use, e.g., irrigation bunds, drinking water, village approach road, store housed for forest produce, play grounds, recreational club etc.
- To increase intermediate yields from the forest.
- To provide saplings of fruit trees for summer gardens (Kitchen garden).

Q.3 How could the Forest Department assist communities to better market forest products?

- Undertake a systematic market survey to identify market outlets and niches for various forest produce in terms of demand, price etc.
- Help organize producers' societies.

- Improve to market channels through Forest and Tribal Development Corporation. The Corporation should be negotiated or persuaded to give a support price to the producers societies and be responsible for marketing the produce through their channels.

Q.4 What type of processing would allow FPC's to gain additional income for their forest products?

- Setting up of economically viable processing units where feasible for oil extraction of sal and mahua seeds, for making better quality of sal leaf plates, cashew-nut processing, mushroom packing, medicinal plant processing etc. This will generate employment and income for the villagres.

Q.5. What are the non-wood forest products (NWFP) important to forest communities especially tribal groups?

- Mahua flower and fruits (Consumed and marketed).
- Mushroom (Consumed and marketed).
- Kendu fruits and leaves (Consumed and marketed).
- Tasar (marketed).
- Oil seeds (Consumed and marketed).
- Honey (Consumed and marketed).
- Medicinal plants (consumed and marketed).
- Satamuli (marketed)
- Fruits of many trees like mango, Jackfruit, bel (Consumed).

Discussion Group III

Subject: FPC PROTECTION SYSTEMS

Discussion leader: K.C. Gayan

Members: R. Chowdhury
D.D Sarkar
M.S. Sultan
S.B. Roy
A.K. Basu

Discussion Questions

Q.1 What are the problems faced by FPC in protecting forest lands?

- A lack of motivation of some committees or among members of a committee.
- A lack of authority in discharging duties in the absence of formal recognition by the West Bengal Government. (editors note: the State Government formally approved the program on August 15, 1989.)
- Duties, rights and obligations of FPC's and their members that are not clearly defined.
- Varying sizes of the committees.
- ... ms arising out of intra-committee and inter- committee conflicts.
- Interference due to political interests and the varying role played by the panchayats in terms of initiatives and cooperations.
- Economic hardships faced by low income families in fringe areas due to forest area protection. Forest protection often results in bans on free grazing, shortage of fuelwood, and a decline in forest based income.
- Delay in flow of benefits, both intermediary and final yields.
- Conflicts and confusion arising out of functioning of other agencies like LAMP for collection of kendu leaves, sal seeds, pole extraction and pulp wood extraction.
- A lack of marketing facilities for non-wood forest produce which leads to exploitation of the villagers by middlemen.
- A lack of interest of other departments to extend their activities in the fringe areas and coordinated planning between different development agencies like agriculture, horticulture, irrigation, social forestry and the forest department.

Q.2. How could the protection system be made more effective?

- Immediate recognition of the FPC's by the W. Bengal Government. The Government should issue an order covering and defining various aspects such as duties, rights and obligations of

the members of FPC's the role of the Forest Department and the nature and extent of share of the forest produce, both intermediary and final yields, to be shared by the FPC's and forest department.

- A statutory order recognizing forest territory under protection committee management.
- Determine the optimal area of forest to be protected by a FPC to ensure a certain minimum per member returns of forest produce. Currently the distribution of size of the protected area varies considerably between FPC's and consequently between members of different committees.
- Undertake quick micro level planning surveys in all the existing (over 1,200) FPC's so that sustainable yields could be ensured to the people.
- The staff of the Forest Department should hold regular periodic meetings with FPCs.
- Possibilities should be explored to establish a model committee at beat or range level for better coordination between FPCs and FD. The model committee could forward suggestions to the concerned DFO through range officers.
- Maintenance of permanent records in the form of a register(s) at Range and Beat level incorporating maintenance of duty rosters, records of resolutions, work program activities, yields of forest produce, and sharing of produce and benefits accrued
- Need to define measures to be adopted in case of breach of conduct by FPCs.

Q.3. Why are some FPC more effective than others?

- Varying degree of motivation are found among participating FPC's. Some factors that may influence effectiveness of FPC's are size and ethnic composition of the village, economic condition of the members and villagers, the political affiliation of the villagers, the attitude of the panchayat regarding the scheme, literacy level of the villagers, distance from beat office and/or range office, the area under protection, and the type of forest products and their level of productivity.
- Differences in the efficiency of forest staff and their ability in establishing with the people and thereby motivating people.

Q.4. How could the Forest Department assist the FPCs in protecting land and allowing regeneration to take place?

- By ensuring that the protected area under each FPC is clearly demarcated and not too far from the village.
- Provide more support to back-up the regular patrolling of FPC's.

- Major forest offences are to be dealt with as per the provision of Indian Forest Act. Only minor offences and defaults committed by a member should be dealt with by the FPC's or the model committees.

- For all types of work in the protected area the Forest Department should give preference to the people of that FPC; only in case of labour shortages should labourers be taken from outside.

- Regular periodic meetings between FPC's and Forest Department should be held to assess progress and to sort out problems.

- In case of unsatisfactory performance by any committee or committee member, provision should be made for the dissolution of the committee or the cancellation of membership.

- Provision should be made regarding legal successor in case of death of a FPC member.

- The issue regarding who should collect the fine from defaulters i.e. FPC or FD needs further investigation.

Q.5. How can the West Bengal Forest Department help FPCs in protecting forests when conflicts arise with panchayats, other communities or with commercial forest users?

- The forest officials at all levels-Division, Range and Beat should keep constant contact with the Panchayats, and involve the Panchat at all levels in establishing committees and distributing intermediary forest produce and final yields. Panchayats should be represented in district committees.

- If the produce is supplied to commercial users like paper mills, etc., then 25 percent of the sale proceeds should be paid to the committee. Labourers for any operation by such agencies should be engaged from the FPC at wages fixed by the West Bengal Government.

Discussion Group IV

Subject: MICRO-MANAGEMENT PLANNING

Discussion Leader:	A.K . Raha
Members:	S. Dhandiyal
	R.K. Sengupta
	R. Banerjee
	Prasun Mukherjee
	B. Sarkar
	M. Poffenberger

Before presenting the discussion group's report it would be useful to note salient features of microplanning with reference to participatory resource management in southwest Bengal.

- All activities outlined in the microplan focus on natural resource system development such as aquaculture, duckery, piggery, sericulture, lac cultivation, bee cultivation, poultry, construction of bunds for groundwater recharging, wells for drinking water, cleaning of ponds, and the establishment of plantations around ponds to check siltation.

- A portion of the investment per hectare of sal forest being resuscitated by the FPC's is envisaged for supporting income generating and resource building activities in the forest and fringe area. However, provision should be made to adjust investment levels for a given area depending upon the quality of forest, economic status of the fringe dwellers, scope for resource-building activities. These decisions should be taken when the microplans are being finalized at the Division level.

Discussion Questions

Q.1 Why is micro planning necessary?

- To ensure people's participation in management of resources.
- To assess the needs (especially biomass related) of the participating community and scope for development of the region/resource.
- To identify and highlight the local resources, set priorities for resource development based o site conditions and available funds.
- To plan, project and regulate the benefit flow to the participants in consultation with them.

Q.2 What information and agreements should result from conducting micro-management plans

- Identification of FPC's and forest area to be protected.
- Collection and/or preparation of village and forest maps on 16 inches to a mile (1:4000) scal
- Collection of detailed socio-economic, and demographic data on

(a) Demographic - population, no. of families, ethnic composition, land holdings (rich and small farmers). Landless persons, artisan, distribution of households etc.

(b) Livestock - Number of animals and their distribution per household, animal husbandry practices including grazing, use of animals, animal products, diseases, mortality and morbidity, yields etc.

(c) Agriculture and horticulture - land use pattern, type of land, crops grown, seasonal variation, irrigation, manure, pesticides, marketing and storage of produce.

(d) Forest resource -crop composition, quality (degree of denudation), blanks, non-wood forest products, nature and extent of dependence on forest resources by the villagers especially the landless, marginal farmers and artisans.

(e) Village resources - Community wastelands, springs, roads, ponds, etc.

– Assessment of total biomass related needs for human and animals: fuel, fodder, wood, timber etc. through a sample survey.

Q.3. What process should be used in formulating and finalizing microplans to ensure community involvement and effective coordination between forest department staff?

– Explain the purpose of micor-planning to FPC in preliminary sessions.
– Identify resources on map with the help of villagers (both men, women and young people_.
– Beat officer (Bo) prepares a draft micro-plan in consultation with the villagers and on the basis of assessment of need and resources (existing and potential).
– The agreed draft plan between Bo and villagers is then sent to Range Officer (Ro), who compiles the sectorwise work programs and financial requirements and sends it to Divisional Forest Officer (D.F.O).
– The D.F.O should have a small committee manned by Additional DFO/AFO, one Fo, 2 Dr/FRS, one UDC and one CT for processing and finalization of all such plan allocation.
– The Committee make rangewise allocation of resource to cover the micro-plans, on the basic of proportinal requirement and total fund availability.
– At the Best level, a small committee comprising forest personnel and FPC/Panchayats.
– On the basis of allocations, the draft plans are recast/revised and sent back to the Beat level.
– The FPC and Beat officer then discusses the revised draft plan and finalizes it.
– One copy of the finalized microplan is then sent back to the Division Level committee for calculating income/benefit flow and then the same is communicated back to the Beat officers.
– The BO explains to the FPC/participants on the procedure the benefit flows expected.
– Training of staff and FPC members continuously at various levels in micro-planning methodology.
– Grassroot level committees to comprise FPC members/Panchayats and Forest personnel.

PART III

COMMUNITY FOREST MANAGEMENT IN WEST BENGAL: FPC CASE STUDIES

Dr. N. Satish Chandra and Dr. Mark Poffenberger

Introduction

The degradation of forest resources pose serious problems for human-environmental relations in India. Tens of millions of people live within or adjacent to forest land and depend on forest resources for their survival. The socio-economic and religious systems of these people are interwoven with the ecology of the forests, and as the forest is degraded the life of forest communities deteriorate.

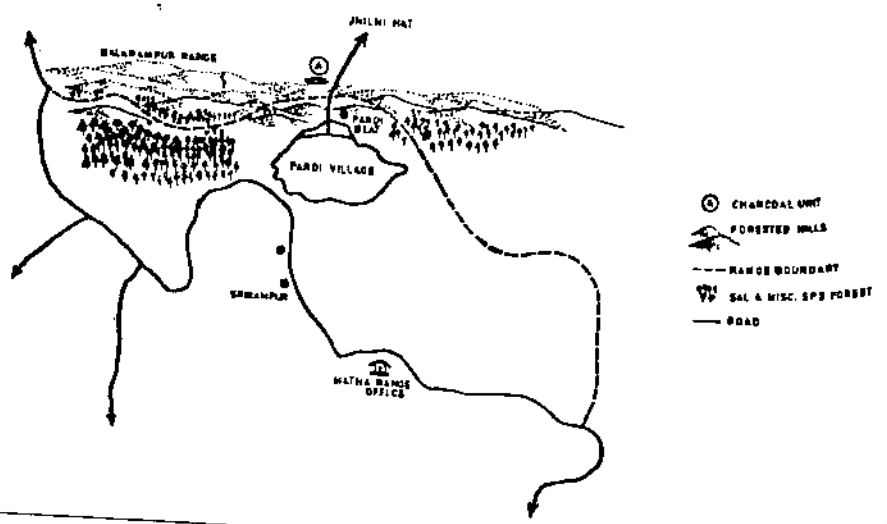
A recent satellite survey shows only 11% of India's land area under forest cover. In West Bengal extensive deforestation has occurred over the centuries. In 1989, out of the total area of 89,000 sq.km, forests covers less than 12,000 sq.km. or a little over 13% of the entire state. The National Commission of Agriculture in its report on Forestry submitted in 1976 has held the forest dwellers responsible for the disappearance of the forest. However, while forest communities are part of the deforestation problem, they are also a major asset in finding solutions to problem. Over the past decade the West Bengal Forest Department has developed a program with currently over 1,250 forest villages in southwest Bengal to regenerate 152,000 hectares of natural sal forests (See Figure 1). Forest Communities are encouraged toform protection committees, to guard against unauthorized cutting and grazing while the forest recovers. The rapidly coppicing Sal and companion species generate numerous minor forest products to which members have exclusive rights. This report documents the experience of selected Forest protection committees (FPCs)

The Original FPC: Experiences from the Arabari

The FPC program began in 1971-72, at Arabari Research Station. Arabari research range is located in East Midnapore Division, about 30 kms from Midnapore town and 200 km. west of Calcutta. The project covers an area of 1,272 ha. The Forest Protection Committee incorporates 11 villages surrounding the project area with a population of 618 households. The villages have a mixed composition of caste groups (except Brahmins) and tribals. Most community members have resided in the area for the past two generations. The villagers are primarily farmers, with small groups of artisans and pastoralists. There are also a substantial number of landless laboarers who periodically move to neighboring towns in search of better wages.

In 1972, the District Forest Officer (DFO), Dr. A.K. Banerjee realized that it was difficult to regenerate and protect the Arabari forest without the cooperation of the local inhabitants because of the dependency of the local inhabitants on the forests. He contacted the forest villagers and discussed the problem informally with them, gradually establishing rapport. Once he was accepted by the people he started analyzing the problems from their perspective. He found the villagers understood the devastating effects of deforestation, and that poverty was forcing them to overexploit the forests. As there was no readily accessible source of income for the landless labourers in the lean period, they sold the wood from the forest to generate cash. As overexploitation continued, forest productivity declined.

FIG. 5. LOCATION OF PARDI VILLAGE, UNDER PARDI BEAT, MATHA RANGE
ESTABLISHED IN 1986, AREA 200 h.a.



The DFO promissed to help solve their problem of livelihood in the lean period, provided they were ready to cooperate with him. This would allow the forests to recover and regain their productivity. With the assurance of the local people, he demarcated 1272 ha. of wasteland to be covered under the plantation scheme. The work was to be taken in full swing only in the lean period,all the local people were assured equal employment opportunities. All the villagers around this area were asked to form a committee. The committee was assured work under various labour generating schemes and given exclusive rights to all non-wood forest products (NWFPs), free of cost. Their immediate needs for fuel and fodder were also taken care.

While the committee was organized in 1972, it was not formalized until 1977, when the list of beneficiaries was checked by the forest department and the Panchayat. The demographic survey was conducted by the forest department, as well as the Indian Statistical Institute, as the initial list received from the Panchayat was biased. All the 618 families residing in and around the project area were included in the list. Only the head of each household was enrolled. The committee was headed by the President followed by secretary and council members, belonging to each member village.

When the committee started functioning, 22 persons from 11 participating villages guarded the forest in the day time; one man and one woman from each village. Along with the villagers some forest guards and van mazdoors (forest labourers) also accompanied them on patrol. The van mazdoors were landless labourers hired from all these 11 villages. Night guarding was not done as it was not considered necessary. If a person failed to turn up for his/her duty he was called for an explanation. Each member was assigned to patrol duty for one week, every two months.

If a person who is not a member of the committee is spotted destroying or cutting the wood from the forest, and he/she is caught by the villagers, the person may be fined or handed over to the forest department. Fines range from Rs. 2 to Rs. 5. The FPC feels that if a person is fined heavily, say Rs. 100/- to Rs. 500/-, it will be difficult for him/her to pay the fine and even if they manage to do so, they will recover the fine from the forest in retaliation.

If a member of the committee is at fault, the offender is presented before the committee. The members then tell him about the merits of conserving the forest and the sentiments of the villagers toward the forest. They listen to his problems and assure him work within the village, only if he promises to stop cutting the forest.

Protection provided by the forest villagers allowed the forests of Arabari to regenerate encouraging the West Bengal Forest Department to formalize the partnership through a special Governtment order which entitled communities to get 25% of the final yield from the sal pole timber at the end of the 10-15 year rotation. Hearing this some of the villagers from Chandmuda village under Gorebeta police station approached the department with a plea that they should also be included in the committee as they have also worked. As the forest department originally took only the villagers under keshpur police station they were not included in the list of participants. These villagers of chandmuda approached the court and were able to bring a stay order against the committee. Though the forest has matured and has been

partially felled, due to the stay order the villagers have not as yet received their share. The experience in Arabari demonstrated that communities, if given the rights, could effectively protect state forest land. However, the experience also indicated that more comprehensive discussions with all relevant forest communities need to be held before forest management allocation responsibilities are determined and finalized.

Second Generation FPCs: Formation and Protection

This study examines the composition of the five Forest Protection Committees (FPCs) and explores patterns of FPC formation, structure and function as the program expanded during the 1980's. The Forest Protection Committees were chosen from the three districts of southwest Bengal where the program is well established. In comparing the characteristics of the five FPCs studied, it is apparent that topographical and human-ecological features allow for the region to be divided into three zones (see Table 1 and Figure 2). In zone 1, the study FPCs of Sitarampur and Pardi are located in the southern sections of Purulia and Bankura District, where some of the densest sal forests are found on the edge of the chota Nagpur Plateau. The hilly tracts of this region are characterized by mostly rainfed rice fields in the lower valleys, with small settlements

FIG. 2. STUDY FPCS IN S.W. BENGAL AND SOCIO-ECOLOGICAL ZONES

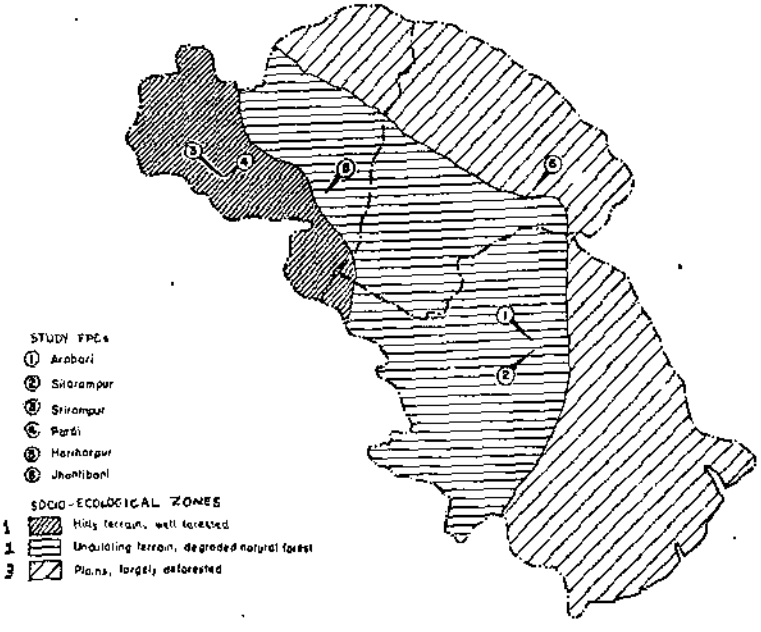


Table 1: Typology of socio-Environmental systems in southwest Bengal

-Characteristics	Zone1	Zone2	Zone3
Topography	Hilly tracts-extension of chotanagpur	Undulating terrain	Upland plains
Settlement pattern	Scattered in between the hills	Concentrated near natural water resources	Concentrated near towns and along
Forest ecology	Natural Sal	Agricultural land with Isolated natural forest	Agricultural land with some forest populations
Social Composition	Tribals 25-50% Caste popula-tion 50-75%	Hindu caste population 75-90% Tribals 10-25%	Hindu Caste Population90% Tribals > 10%
Local	i) Non-wood products	i) Fuel and fodder	i) Fuel and fodder
	ii) Swidden agriculture	ii) Non-Wood forest products	ii) Grazing

upslope, and forests along the ridge lines. These small communities, many of which are tribal, are heavily dependent on the forests for gathering and hunting.

Zone 2 is located to the north of Zone 1 in Bankura, purulia, and in southern Midnapur Districts. This area has a slightly undulating terrain, with patches of degraded natural sal forests, now recovering under FPC management. In this area the study FPCs of Arabari, srirampur, and Hariharpur are located. These communities are primarily dependent on the forests for fuel and fodder, though some communities are actively engaged in sal leaf plate making and other related forest enterprises.

In Zone 3, in the northern and eastern parts of the three districts, much of the natural sal forests have been completely destroyed. Population pressures are higher, and most land is under cultivation, with correspondingly greater urban and infrastructural development. In this Zone the FPC program focuses on establishing plantations. Jhati Bani FPC, in Bishnupur Range, is representative of the communities in this Zone.

In order to generate timely and accurate information, Rapid Rural Appraisal (RRA) techniques were used for data collection. RRA was designed to systematize learning about rural conditions in an

intensive, iterative and expeditious manner. To increase the reliability of the data, focus group interviews were conducted throughout the study. The researcher's intention was not to conduct a benchmark study with quantifiable data for future project evaluation, but to document existing experiences to better guide future research and action programmes.

Sitarampur Forest Protection Committee:

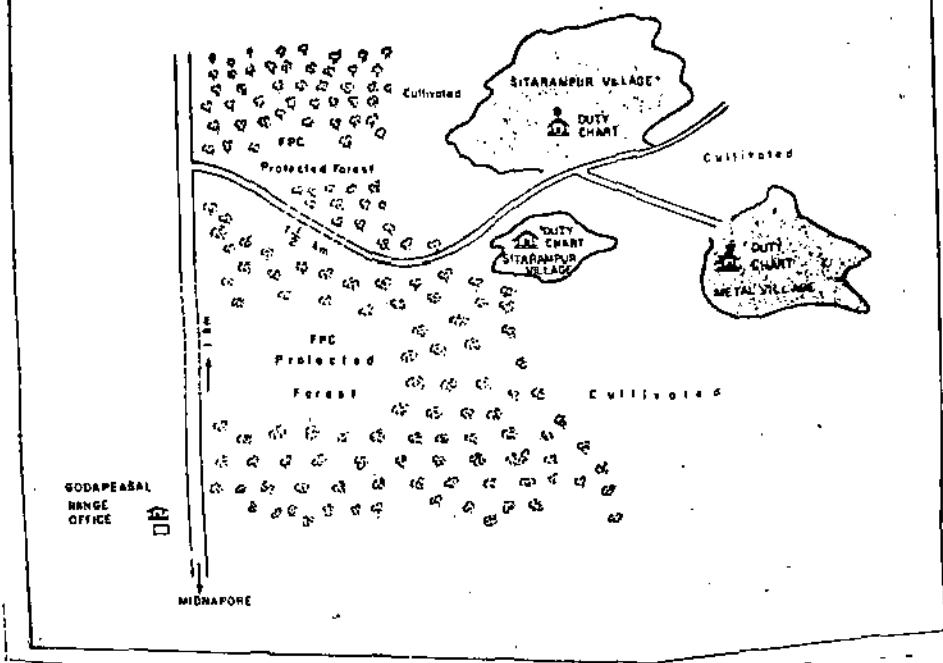
Sitarampur FPC falls under Godapeasal range in East Midnapore district, approximately 10 km. from Arabari. The FPC is about 3 kms from the range office, connected by a surfaced road. This committee is comprised of two villages:

Metal and sitarampur (see Figure 3). The 300 hectares of state forest was allocated to this committee for protection. The village has a mixed composition of castes, as well as tribals. The villagers claim they have resided there for the last 2 to 3 generations.

This committee has been strongly influenced by the Arabari Research Project and has a well organized protection system. They were awarded the Indira Priya Darshani Award for their achievement regenerating the degraded forest in 1989. The ranger was instrumental in forming the Sitarampur Protection Committee. He is accepted by the villagers and widely respected. After repeated meetings arranged by the ranger with the villagers, he was able to convince them to cooperate with the Forest Department in protecting the forest. Initially, the villagers were skeptical. Almost 20 such meetings were held in the village in the presence of the village headman (Pradhan) to discuss the programe and the rights and responsibilities of both parties. He placed before them all the benefits which could be generated if they protected the forest. Ultimately they agreed and a committee was formed in 1886. The villagers were asked to submit a list of participants which was cross checked by the pradhan. The committee has 99 members including the office bearers. The village, however has 105 households. The remaining six families were left out as they were away from the village when the committee was formed. A resolution was signed by all the members, countersigned by the forest officials and the pradhan. The villagers selected their President, secretary, Treasurer and 12 governing body members. These governing body members represented every caste group to avoid future conflicts.

In sitarampur, three persons go on patrol daily. However, if trouble occurs other villagers will assist the patrol. Each FPC member is supposed to do one day's duty per month. Members can send an alternate person if they have urgent work, but if they do it simply for earning their livelihood they are fined Rs. 12/-. They are ready to do night duty if necessary. The women are also members, but they are exempted from duty. Since its formation, the Committee has functioned well, without serious conflicts. If their own Committee member breaks the forest use rules they warn him and fine him Rs. 20 to Rs. 25, though this has seldom been necessary.

FIG. 3. MAP OF METAL- SITARAMPUR FPC
ESTABLISHED 1985, AREA 300 h.a.



When the patrols come across a person from outside their FPC stealing wood, initially he is given a simple warning and scolding. In case a non-member repeats an offence after the warning, he is handed over to the ranger for necessary action. The researcher witnessed such a case on August 16th, 1989, when a man from a neighbouring village was brought to the ranger's office by threemen,of Sitarampur FPC patrol. The patrol said they had warned him before about cutting live trees in the forest. Just as they approached the ranger's office, the offender tried to escape. The patrol beat him several times with their canes (lathe) and proceeded to take him before the ranger and tell their story. The ranger supported their action, but said the beating was punishment enough, and released the man with a further warning.

Srirampur Forest Protection Committee:

Srirampur FPC is located in Matha range and purulia district headquarters. The village is about 2 kms from the range office and about 50 kms from purulia town, on the Balarampur-Baghmundi route (see Figure 4). This committee is formed by the single village of Srirampur which is small both in area and population size. The forest area allocated to this committee is 150 hectares. The total number of households is 20. The village has no other caste groups except Mahato's. The basic occupation of the people is agriculture but in lean period they go out to work as labourers in adjoining areas. If they fail to get work in neighbouring areas, they are forced to sell their animals. The Mathto's of Srirampur migrated from different parts of the range and settled there due to the availability of land and a natural tank which they developed for irrigation. This Committee is functioning well and was instrumental in forming many other committees in the area. The villagers feel that once the forests of the area have been allocated to different committees, protection problems will be largely solved. The committee has opened bank account, which is operated by two senior persons of the community.

Srirampur FPC was the first to be formed in Matha range, in the rolling hills of tribal dominated south Purulia District. Though the literacy rate is high (85%) in this village, initially there were difficulties in mobilizing the people to form the FPC. The ranger was responsible for assisting the community to form a committee. He arranged meetings with the villagers and discussed the importance of forest with them. The villagers had perceived the effects of deforestation in the form of declining rainfalle, erosion of soil, rise in temperature and shortage of fuel and fodder. The ranger arranged a meeting with the villagers in the presence of the village headman (Pradhan). The villagers ultimately agreed to form a committee and the list of participants was drawn. A resolution was drawn which was signed by the forest officials and the Pradhan. In order to avoid the emergence of hierarchy in the committee, the members decided not to appoint office bearers.

In srirampur the FPC patrols the forest area with three person teams during the daytime. If a problem arises, everybody present in the village comes to help. An individual is supposed to participate in forest patrols four days a month. When necessary, night patrols are also conducted. As a small village where social pressure to perform ones duties are strong, few neglect their responsibilities. Mutual exchange of duty is possible, but only for a valid reason. If a person skips his duty without permission, he is required to perform an extra patrol as punishment.

FIG. 3. MAP OF METAL- SITARAMPUR FPC
ESTABLISHED 1988, AREA 300 h.a.

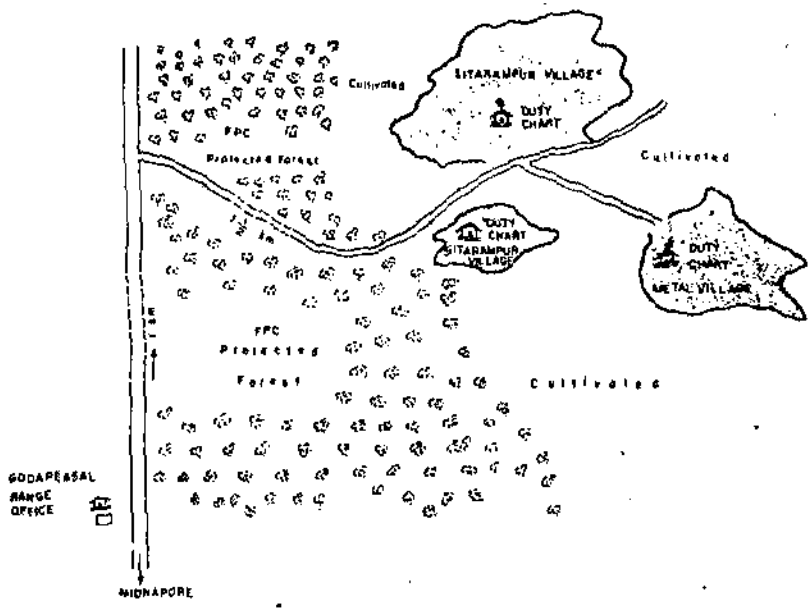


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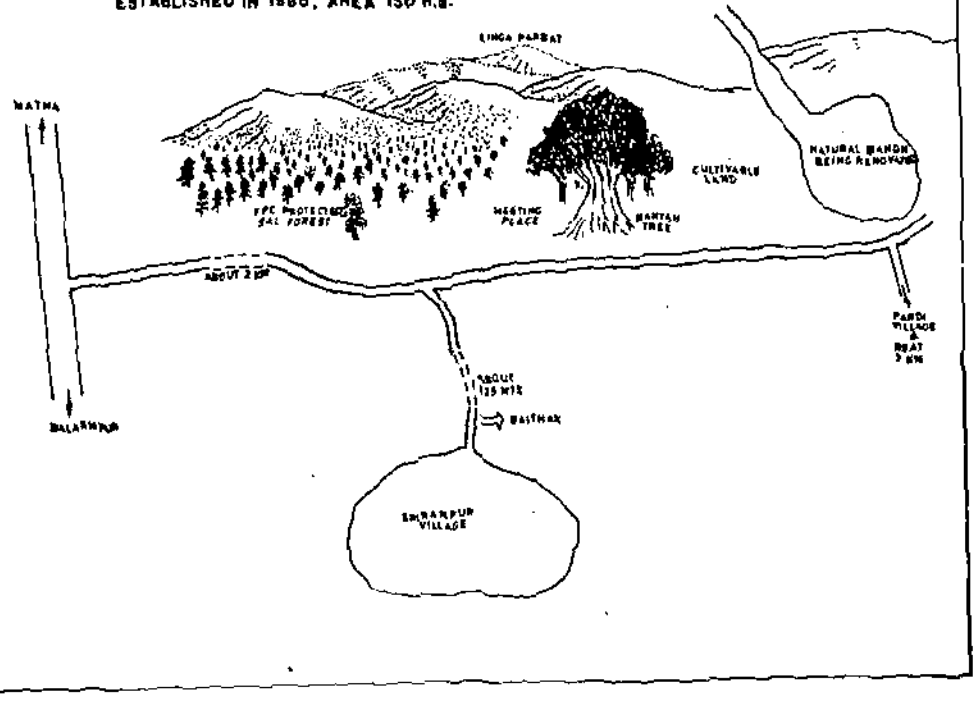
FIG. 4. LOCATION OF SRIRAMPUR FPC UNDER PARDI BEAT, MATHA RANGE
ESTABLISHED IN 1985, AREA 150 h.a.



The FPC has experienced few internal conflicts, however when they do catch an outsider taking wood, they will fine him or her or turn them over to the ranger. This FPC has been instrumental in motivating the neighbouring villages to form such committees, including Pardi village discussed below:

Pardi Forest Protection Committee:

The pardi FPC is situated in matha range, about 10 kms. from Srirampur FPC. The village is about 8 kms from the Matha range office, connected by a dirty road. The village is separated from Balarampur range by a small hillock and the beat office is within the village premises (See Figure 5). The committee was formed by Pardi village. The area allocated to this committee was 200ha. All of the 150 households in the village, are incorporated in the list of participants. The village has a mixed composition, which includes a number of caste groups, along with some tribals.

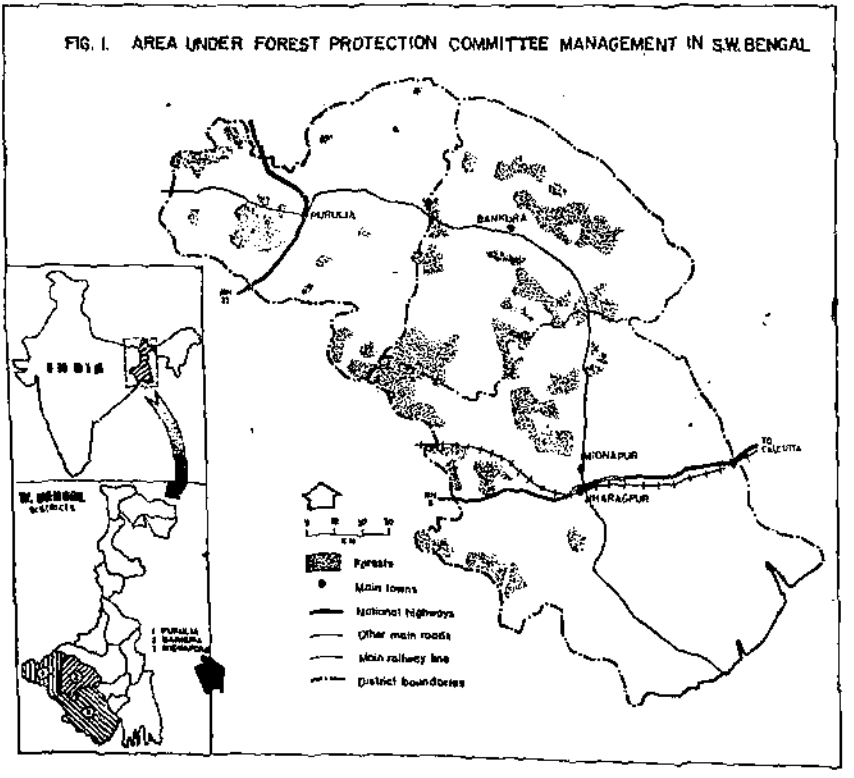
Though the basic occupation of the villagers is agriculture, more than 50% of the population are marginal farmers or landless labourers. In the past, the landless families from many villages in the area earned a significant part of their income through cutting wood from the forest and selling it to a charcoal dealer who operated in the area. As a consequence, any programe to regenerate the forest by temporarilly closing forest access threatened the livelihood of many families.

When the ranger approached the pardi villagers, they ignored him, some spreading the rumour that he had come for party politics. In encouraging the community to organize an FPC the ranger explained the importance of forest and its varied uses. However, the community remained uninterested until the people of neighbouring Srirampur came and encouraged them to form an FPC. Several meetings of these, village representatives were organized and finally the majority agreed to form a committee. All the 150 households were included in the list of participants and they signed the resolution in the presence of ranger and Pradhan in 1987. The villagers selected their president, secretary and 15 council members who were actively involved in the Committee work.

In pardi village community members are required to do day patrol every two months, usually with three to four others. The most difficult problem faced by the FPC was controlling the activities of neighbouring villagers working for the charcoal dealer. At one point a group of committee members from pardi went to the forest and dismantled the charcoal making pits, sternly warning the workers to stop the activity. The FPC had requested back-up from the beat and range officer, but it failed to arrive in time. The delay was due to the fact that the FPC was located in one forest range, while the forest area under their management was in another range. As a result, pardi FPC's authority was questioned by the 'charcoal' makers, some of the members on patrol were beaten and fined, and later, when traveling through the neighbouring village to the market, members of their family were harassed

The villagers generally felt that the forest department had purposefully withdrawn itself to avoid the conflict, saying that the area came under a different range. Later the ranger tried to solve the problem by contacting the police and the Balarampur ranger, but nothing materialized. At the time of the study the situation was hostile; the beat officer had been attacked and the FPC was not on talking terms with the ranger.

FIG. I. AREA UNDER FOREST PROTECTION COMMITTEE MANAGEMENT IN S.W. BENGAL



Hariharpur Forest Protection Committee:

Located in Manbazar range and Purulia district headquarters, Hariharpur FPC is about 40 kms from purulia town and is on the purulia-Manbazar road. The committee is that of Hariharpur village about 2 kms from the kenda beat office. The area allocated to this committee is 200 ha. The total number of households in the village are 277, however only 27 households are incorporated in the list of members.

The basic occupation of the villagers is agriculture and fishing to a lesser extent. Some of them sell milk products in the surrounding area. Around 20% of the population are labourers. This is the population most dependent on forest exploitation. During the agricultural cycle the villagers are occupied with farming activities, but in the lean period they earned their livelihood by selling wood. To form the committees in Manbazar range, the ranger held a meeting to inform all the nearby village gram panchayats of the programe. Village representative agreed to help beat officers to establish committees in their village. Soon after, a meeting was organized in the village by the panchayat members in the presence of beat officer. The villagers were asked to identify 10% of the households to be enrolled as members. Elections were held for the President, Secretary, and the other 25 members on 29th December 1987.

In Hariharpur, four landless members were allocated the job of forest guards as full-time, paid occupation. Each family in the village provides 5 shear of dhan (paddy) to the guards as payment, however those who cannot afford this, contribute lesser quantities. Everybody in the village has equal right over the yield and they are contributing in one form or the other to the functioning of the committee. The four guards officially appointed by the members of the committee guard the forest in the day time. Members are supposed to go on patrol periodically to ensure that the guards are doing their duty. The committee's overall performance is satisfactory. However, it appeared that the Hariharpur patrols were unable to completely stop the cutting of green wood, as the FPCs in Srirampur and Sitarampur had done.

According to the rules of the FPC, if the guards catch a person cutting wood, they take him to the beat officer, who fines him or turns him over to the police depending on the severity of the offence. If it is a mere headload, the beat officer is required to fine them and deposit the money in the Government treasury. If it is a cart or truck load, then they are handed over to the police. The villagers quoted two incidents, when they caught people carrying truck loads of wood, and had to involve the police.

The basic problem in Hariharpur is that some villagers are skeptical about the programe, and do not bother to stop persons carrying wood from the forest. This lack of interest may be related to the poor representation of most families on the committee, since it was formed by senior foresters and panchayat leaders and represents only 10% of the village families.

Jhanti Bani Forest Protection Committee:

The FPC of Jhanti Bani falls under Bishnupur range near the Bankura district headquarters. It is about 2 kms from Bishnupur town, very close to the range office. The main occupation of the villagers is rainfed agriculture. As the area receives very scanty rainfall, agricultural yields are low. In the off-season the primarily tribal labourers go to the neighbouring town in search of work. This village was

studied to see how an FPC performed when the natural forest was completely degraded and reforestation depended on plantation establishment. There is only one village involved in the committee. It has 120 households of various caste groups (except Brahmin) and tribals with a population of 700 individuals. There are three other Committees in the area formed in 1986, 1987 and 1988 coinciding with the years of plantation establishment. This was the first Committee of its kind in this area.

The local beat officer in Jhanti Bani, was instrumental in forming the Committee. He contacted the villagers frequently to discuss problems of deforestation. The villagers recalled that this whole area was covered with thick forests 15 to 20 years ago. At that time there was no problem,in collecting sufficient fuel and fodder. The community discussed how constant and uncontrolled exploitation had degraded the forests and eroded their productivity and many felt that forest loss may have stimulated the decline in the annual rainfall, which they seemed to be experiencing.

The villagers eventually decided to follow the suggestions of the beat officer and form a Committee and join the Forest Department in establishing a plantation on some very degraded forest land. The Committee was formed in the presence of the panchayat, the forest officials and the villagers. Everybody from the village signed the resolution which was countersigned by the panchayat, and forest officials. The total area of the Committee has a President, Secretary and a council of 15 members followed by 92 ordinary members; in all 107 members. The rest of the Villagers were included in a Committee formed later

In Jhanti Bani, a joint team of three to four persons of the FPC and the forest Department guard the area regularly. Each member of the FPC must guard the forest at least once a month in the day time and, if necessary, at night. A duty chart is prepared one month in advance. At the time of the study, no major conflicts had arisen within the Committee over forest use. This may be in part due to the extensive degradation of much of the forest land.

Review of FPCs Experience in Forest Protection:

Almost all the FPC's were formed in the mid-80's except for the Model FPC of Arabari, formed in 1977. Out of the six case studies, three FPCs are comprised of several Villages. Community Participation has been remarkably high in all the FPC's studied, except for Hariharpur, where only 10% of the population is involved. The custodial system is voluntary in all the FPC's studied, except for that of Hariharpur where guards are paid. Women are members in all the FPC's (see Table 2). The ratio of FPC members to forest land is more than one in all the FPC's, and ranges from 1.3 to 7.5 ha per member household.

In all five of these newly formed FPCs, the range or beat officers appeared to have played key roles in providing information about the programe and encouraging community participation. In some cases the field staff met with community participation. In some cases the field staff met with community groups up to twenty times to generate interest by pointing out both the environmental benefits as well as the economic potential of the forest, if actively protected. It is also apparent that communities have played an important role in spreading information about the FPC programe and helping neighbouring villages

to organize and reach similar agreements with the Forest Department. Communities which had recentl been given authority to exclude users from other villages, no doubt hoped that if the

Table 2: Characteristics of FPCs Studied

Year FPC formed	Arabari, 1977	Metal Sitarampur 1986	Srirampur 1985	Pardi 1987	hari harour 1987	Jhanti bani 1986
No. of villages in FPC	11	2	1	1	1	4
No. of families in FPC	618	99	20	150	27	107
% of village families involved in FPC	100%	94.2%	100%	100%	10%	89.1%
Forest area under the FPC in hectares	1272	300	150	200	200	130
Forest area per household	2.5ha	3ha	7.5ha	1.3ha	7.4ha	1.4ha
Custodial system	Voluntary	Voluntary	Voluntary	Voluntary	paid	Voluntary

neighbouring villages formed FPCs and had their own sources of fuel, fodder, and other products, they could avoid conflicts with them over their own forest territory. The geometric rate of growth of FPCs may reflect the high desire of forest communities to have their rights recognized during this period of authority reallocation.

In most cases, information regarding the programe came from the beat guard and neighbouring communities. Over a period of months communities reached a consensus to form an FPC. At that point, a list of all participating households was drawn up and the community selected a president, secretary, and treasurer. The organization and its production sharing rights and protection responsibilies were ratified through a meeting of all the villagers, the panchayat, and the range officer. This gradual, grass root approach to organizing, appears to have resulted in the broad-based participation of community members in most FPCs. Most FPCs studied had made a serious attempt to restrict forest access through volunteer day time patrols, often with striking success. In most cases all member families participated in these patrol activities. This participation appears to have stimulated effective cooperation in protecting the forest and following FPC rules by all member families in most of the committees studied. Peer group pressure, small fines, and scoldings were commonly used by FPCs, and ranger back-up relied on in more difficult situation. In dealing with non-FPC members who violated access rules, the Forest Department's authoritative support was often crucial. When it was not present, as in pardi, the protection rights of the FPC were questioned, often undermine the committee and even causing it to collapse. Many FPC members reported an interest in more formal recognition of their authority through identification cards and government documents.

Second Generation FPCs: Forest Production Systems

In Arabari, to gain community cooperation in protecting the forests the Forest Department created employment opportunities and offered minor forest product usufructs. Initially, villagers were allowed to cultivate dhan (rice), fodder, sabai grass, maize and groundnut on some of the deforested land. Honey beehives were established in Eucalyptus groves on an experimental basis for the villagers. Poles were provided to the villagers for house repairs, construction and making cots at subsidized rates (1\4th of market price). Participating forest communities were given exclusive rights to all minor products. These included dry leaves and twigs (for fuel), sal leaves (for thals/plates) and Kendu leaves (for bidis). Fruits growing in the forest, like mango, guava, jackfruit, bale, kendu fruit, and cashew fruit (only pulp) are also collected by the members of the Forest Protection Committee (FPC). Valuable medicinal plants are collected and sold in the market as well, including kalmeq, satmul, seeko, randatun, godeeshwar mod, sal plant dhuna, and mahua (flowers and fruit). The seeds of the mahua, subabul, sal and akashmani trees are also collected and sold by the villagers. Along with these NWFPs the villasgers earn a substantial amount when the shoots of the sal trees are cut. Non-wood products not consumed by the villagers are sold to the state Agricultural Multipurpose Cooperative Society (LAMP) or to middleman.

Like FPC members in Arabari, the villagers of Sitarampur also collect a wide range of products from the regenerating sal forest. Initially, during the establishment of the plantation, employment was generated by the Department, and once the forest began recovering families collected a growing number of non-wood forest products (NWFP), along with regular fuel supply of dry leaves and twigs. However, the villagers are dissatisfied with the marketing facilities of NWFP's, which depends either on the tribal marketing cooperative (LAMPS) or private middlemen.

The villagers acquire earning by cutting the unwanted sal coppice shoots, usually referred to as multiple-shoot cutting(MSC). To enhance the value of timber as the sal forest regenerates, all but one or two of the new coppicing shoots are cut from the stump (or stool). The timing of this activity coincides with a period of employment scarcity and is therefore much appreciated. At Rs. 21.70 per day, the MSC is a comparatively good source of income. Since the jobs are quite popular, opportunities are generally given out on a rotation basis among member families. MSC cutting not only generates employment, but helps meet fuel needs for six months since the community is allowed to keep the cuttings.

The sal is considered ready to be harvested after 10-12 years, but in sitarampur the forest is only seven years old. Consequently, the village will need to wait some years before they receive cash from the timber pole sales. In the interim the Forest Department attempts to provide employment opportunities at particularly difficult times for FPC member families. To assist the villagers, the Department is providing support to the community to renovate and increase the capacity of the existing earthen dam (bund).

Table 3 Presents the average annual FPC household income:

Table 3: Estimated Income from Forest Based Activities in Sitarampur and Arabari

Type of Activity	Value/Unit	Annual Income per Family	
		Sitarampur	Arabari
1. Fuelwood Collection (MSC. Twigs, leaves)	Rs. 15/head load	Rs. 360	Rs. 180
2. MSC Employment	Rs. 21.7/day	Rs. 168	Rs. 34
3. Mushrooms (Chatu)	Rs. 20/kg	Rs. 800	Rs. 60
4. Sal Plates (Thal)	Rs. 15/1000	Rs. 502	Rs. 282
5. Medicinals, Fruits and seeds	Rs. 500/tree	Rs.750	Rs. 49
6. Kendu leaves for Bidis	Rs. 4/1000	Rs. 360	Rs. 117
Total		Rs. 2940 (Rs. 245/month)	Rs. 722 (Rs. 60/month)

The estimated per month family income of Rs. 245 per month from forest based activities in Sitarampur is well above the Rs. 60 per month in Arabari, and is probably high for most FPCs. With rights to 300 hectares of vigorously regenerating natural sal forest, the 109 families of Sitarampur have nearly 3 hectares per family. By contrast, the neighbouring FPC at Arabari has only 2 hectares per family, much of which is under monoculture plantations which generate less income from non-wood forest products. The average daily income was estimated at Rs. 2 and Rs. 8.3 in Arabari and Sitarampur respectively.

A related study of an FPC in Pukuria village of Ranibandh Range, in south Bankura also brought out the importance of minor forest and non-wood products for committee members. From the Forest Department's perspective the primary product from sal forest regeneration is poles and firewood. Current market prices yield approximately Rs. 20,000 per hectare for poles and fuelwood from a regenerated sal forest after a ten year rotation. Villagers receiving a 25% share would earn approximately Rs. 5,000 on a rotation or Rs. 500 per hectare per year (see Table4). The forest Department would receive a 75% share yielding Rs. 15,000/hectare at the end of the rotation. Given the costs of natural sal coppice regeneration are only one-tenth the cost of replanting with sal, and one-twentieth the cost of other species (arjun, leucaena, cashew), this system provides the Forest Department with a very positive return on investment.

To the villagers dependent on forest lands for their survival however, the long term gestation time required for pole income to begin flowing, makes pole production systems of little immediate relevance. What does seem to be important is the rapid increase in productivity of a number of minor forest products as the sal forest regenerates. This Santal tribal community of Pukuria decided to protect a 130 hectare

tract of degraded sal forest in 1982. Over the past six years the forest has recovered, yielding substantial income in minor forest products (MFP) to the community's 93 families. While the men work small-holdings of rainfed paddy lands and migrate to Hoogly and Bardwan Districts for agricultural labor, the women of Pukuria spend four or more hours a day in the forest collecting a range of products including sal seeds, sal leaves, bidi leaves, tassar silk cocoons, mahua flowers for distillation, Kalmegh and other medicinal herbs, Bhurru fruit and gum, fodder grasses, and twigs and leaves for fuel. Sal seeds and leaves, and many other forest products need further processing in the home before they can be sold to the local buyer.

Rough estimates of income generated from all minor forest Products in the village indicate that an active women could obtain up to Rs. 2500-3500 per year or Rs. 7 to Rs.10 per day from one hectare of mixed sal forest after 3 to 4 years of regeneration. By contract, a 25% share of current prices would generate an average daily income of period. However, while minor forest products would appear to village women seem attracted to the MFPs because they are accessible on a continuous or seasonal basis.

In Pukuria village, women gather sal leaves at least four months a year to stitch them into plates (tali). Experienced women estimate they can produce 1000 plates in two days, while the village exports approximately 700,000 lead plates per month (two truck loads). While collecting sal leaves in August and September, and

Table 4: Estimated income from the Regenerated Sal Forests of Pukuria FPC

Product	Quantity/Ha. or family	Annual Value	Annual Income Per household**	Average Daily Income**
Sal Poles and FireWood	400 poles $25m^3$ fire-wood/ha (10 yr. rotation)	Rs. 2000 per ha.	Rs. 500 (Potential 25% share)	Rs. 1.4
Sal shoot cuttings	N.A	N.A	N.A	N.A
Sal seeds*	77 kgs/Ha (April)	Rs. 92/ha (Rs. 1.2./kg)	Rs. 92	
Tasar cocoons* (Sal Feed)	Up to 1280 cocoons (Aug-Sept/Dec/Jan) per family	Rs. 640	Rs. 640	
				Rs. 7.6
Sal leaf plates*	65000 plates per family (4 months/year)	Rs. 1040 (at Rs. 16/ 1000 plates)	Rs. 1040	
Bidi leaves*	10,000/day/ family (Apr-May)	Rs. 2/1000	Rs. 1000	
Total			Rs. 3272	Rs. 9/day

* Data based on income generated in Pukuria Village, Ranibandh Range November 1988. All figures are estimates made by a Minor Forest Product buyer and local people. In calculating the figures I used mid-range estimates.

** These estimates assume an average of one hectare of produce per household.

December and January, women may find up to 12 tassar cocoons in a day, which they sell for Rs. 0.5 to 1. Tassar growing naturally in the sal forest, apparently makes the best seed stock. Consequently it is said to bring 4 to 5 times the price of those cultured in Arjun tree plantations.

Bidi or Kendu leaf collection is also a major occupation of village women during April and May. They may collect up to 10,000 leaves in a day for which they receive Rs. 20. The Bidi plant is native to the sal forest, however its productivity is greatly enhanced by systimatic pruning. During April women are also involved in sal seed collection and processing. Each village family collects and processes 150 to 200 kilos of seed generating an income of Rs. 240 per season. The village currently exports a total of 10 metric tons of sal seed annually. In summary, minor forest products represent the primary occupation and most important source of income for Pukuria's tribal women, who are also assisted by children. When sal poles begin to be harvested, MFP income will be further supplemented by pole and fuelwood generation, and total income could average Rs. 9 per day. Given the low investment costs in establishing this regenerate sal forest productivity, combined with the benefits of protecting the upper ridge tracts where forests are located, this system seems to have considerable potential for increasing employment and income earning opportunities, while reducing soil erosion levels.

In areas where the sal forest has been very badly degraded, new production system must be established. For these contexts the Forest Department has developed a number of options. Table 5 reviews the potential yields and income generating capacity of quick growing species, cashew orchards, tassar silk management on arjun trees, intensive fodder production, and enrichment sal planting. Current estimates indicate these systems could generate between Rs. 860 and Rs. 2500 per hectare annually for the community. However, because the total area under any of the above production systems is likely to be limited to smaller plots (ie. 10 hectares), total income per household may be based on only 1/10th of a hectare or less. Further, because many of the production activities above require at least four years to come into production, villagers must invest considerable labour in protecting them before any benefits are forthcoming. Given the initial labour investment and the relatively small return, local enthusiasm for their implementation may be based more on forest department employment opportunities related to their establishment, rather than for the potential yields of the system. To further enhance the productivity and length of time required to receive benefits, it might be useful to consider short maturation activities, which could be integrated with the primary systems. These might include, intercropping papaya, bananas, or pineapple, beekeeping, and mushroom culture.

Once established, plantation systems like cashew, tassar, and fodder, could generate greater revenues per hectare for the Forest Department than regenerate sal forests. However, the costs of

establishing plantations are 20 times that of natural sal forest regeneration. As a result of the heavy capital investments required, the forest department can only afford to provide the

Table 5: Projected Output of Reforestation Production Systems*

Type	Yield/ha	Annual Value Rs.	Annual income income/household* (at 25% share) Rs.	Daily Household Earnings Rs.	Cost/ha. to Establish Rs.
Quick growing	30 MT Poles 15 MT Firewood (7 yr. Rot)	3,400 (600/MT) (400/MT)	860	2.4	5000
Cashew+	1000 kgs/yr. (after 4 yrs)	10,000 (10/kg)	2500	6.8	5000
Tassar+	15 Kahan/Yr. (after 4 yrs.)	6,000 (400/Kahan)	1500	4.1	5000
Fodder+	20 MT/Yr	10,000 (500/MT)	2500	6.8	5000
Enrichment + Sal plantation	400 poles/year 25m3 firewood	2,000**	500	1.4	2500
Multi-product Sal coppice system	See Table1	4,772**	3272 (includes 100% share of MFP)	9.0	250

\+ Calculation based on figures taken from W.B.F.D. (1988) project Report on Resuscitation of Sal Forests.

* Assuming income from 1 ha. of productive forest per household.

** Note: Sal pole estimates are based on recent market prices which have fallen significantly since Arabari project returns were calculated.

community with a 25% share of revenues generated. By contrast, the low cost regenerating sal forests allows the Forest Department to limit its 75% sal poles, while turning over MFP revenues to village committee members. Given this arrangement, the multiproduct sal coppice system appears to yield greater total income to village households than any other production system analyzed (see Table5). It is therefore appropriate that the Forest Department plans to bring the vast majority of community protection committee managed forests under the sal regeneration production system.

Equity:

In reviewing the variety of production systems currently being encouraged under the Forest Department's village protection Committee programe, a number of equity issues emerge. The first

question concerns how benefits generated by the programme are distributed within the village. Past research has indicated that low income, landless, and low caste or tribal group families are more dependent on forest lands for their subsistence than better off, land owning households. When a forest tract is closed to allow regeneration, it is these groups who are likely to experience the greatest decrease in income during the initial years. Current sharing arrangements for major forest products like sal poles, cashew nuts, etc. are premised on equal division of benefits among all village members. However, initial sacrifices, in the form of income lost, are heaviest among disadvantaged groups. The Forest Department has attempted to respond to this need by creating employment opportunities for community members while new production systems are maturing. However, studies need to be conducted to determine what other actions could be taken to compensate low income families who suffer most from initial losses due to forest protection.

Unlike the monoculture systems mentioned above, the multiple products from regenerated sal forests do not come in single harvests controlled by the committees, but are exploited on a continuous or seasonal basis by women. Low income households with low opportunity costs may gain additional benefits from these resources due to their ability to invest more time in their exploitation. Because women are directly involved in their collection and marketing, women have a better chance of capturing the benefits rather than having them distributed through male dominated FPC's. Also, due to the low investment costs in establishing the natural sal forests, the Forest Department has decided not to require a share of the revenues coming from these products. Consequently, this system appears to disproportionately benefit women and low income families.

Equity questions must also be raised in terms of inter- village distribution of production increases. Given financial and staffing constraints, the Forest Department has decided to focus its attention on those communities directly adjacent to forest land. However, even within this group, the area of forest under any committee varies immensely. Some communities now manage tracts of over 500 hectares, while others have less than 20 hectares available for use. The Forest Department has attempted to enhance equity by consolidating small FPCs into larger groups, so that total forest income can be divided evenly. However, equal division of revenues may not be justified if past forest dependency levels and family needs vary. Further study could be useful in developing distributive mechanisms which could respond to equity objectives, while considering the relative needs of disadvantaged communities. These need to be considered in the light of specific production systems and the social composition of the community (tribal, mixed, and Hindu). The flow of benefits should also be examined in terms of their distribution between community members, local elites, and outside entrepreneurs, especially in regards to marketing and pricing procedures.

Sustainability:

The natural sal forests of West Bengal have shown a remarkable ability to survive the intense exploitation pressures they have been under over the past century. With protection from village committees those forests with healthy root systems and stumps, are recovering at a rapid rate. By allowing the sal to recover, the root systems are further strengthened enhancing the soil-holding capacity

of the upper watersheds, while slowing run-or and raising residual moisture levels throughout the forest tracts and surrounding private agricultural lands. Regeneration of the natural forest also preserves the genetic resources of the ecosystem. Foresters and villagers who have witnessed the recovery of local forests over the past decade confirm these changes. Unfortunately, no systematic data has been collected to monitor improvements in bio-mass productivity, water levels, soil moisture, and erosion. Such data would be helpful in better understanding the process of forest regeneration and its impact on the agroecology of neighbouring farming systems.

While the sustainability of the native sal-forest seems reasonably good, provided the FPC continue to control access, the sustainability of optimal production levels is subject to a number of factors. One of the most important is the degree to which the cutting of unwanted shoots is carried-out in a proper and timely fashion. For optimal pole yields under the sal coppice system, all shoots, except for one or two, should be cut close to the base during the second year. If this is not done, nutrients will flow into all of the shoots reducing the value of the pole crop, while diminishing the height of the forest, and changing the relationships between species. However, since the most valuable forest product to many communities are the sal leaves for plate making, restricting Ms cutting allows for greater leaf production at lower heights, making leaves more abundant and collection easier. In one FPC, where most families derive substantial income from plate making throughout the six month dry season, members requested shoot cutting be halted.

Most important to the sustainability of all of the production systems currently being developed, is the extent to which communities perceive the forest to provide important benefits which will allow them to invest their time to manage the forest in a sustainable way. While the short term benefits of government subsidized work opportunities are unquestionable, and can be an important mechanism for supplementing lost income due to forest closure for a short period, it cannot be a long-term substitute for the need to increase the productivity of the forest.

Conclusion

This report presents the experiences of a few of the nearly 1300 forest protection committee's (FPC) currently active in southwest Bengal. Such committees have shown that the process of natural forest degradation can be reversed. The report supports the theory that local communities can be effective caretakers of the forest. Contrary to the report of the Indian Commision on Forestry, 1976, which stigmatized the forest dwellers for causing degradation, the West Bengal experience with FPCs indicates that forest communities may represent a key to resolving forest management problems.

In the cases discussed above foresters or other FPCs have been instrumental in generating broad-based participation among the study communities. At the same time, it is clear that these communities were concerned about the deteriorating condition of the forests and at varying stages of readiness to take on formal management responsibilities, whenoffered by the Department. In most cases, once the local commitment had crystallized and harmonious relationship established between the people and the forest department, the role of the department officials changed from policing to organizing and providing technical and custodial backstopping.

The study indicates that social composition, population density, and forest conditions influenced participation patterns and benefit flows. Areas with degraded, but viable forest cover regenerated quickly under effective protection and yielded increases in household income from Rs. 2/-to Rs. 9/- per day, within two to three years after protection was initiated.

The study also found that protection systems requiring volunteers, rather than paid guards, were more effective in protecting against improper exploitation. Volunteer systems were found to enhance local commitments to protect forest resources. The study also shows that in situations where forest officials are very active, local participation was strongest and heavy penalities imposed on trespassers or defaulters tended to be ineffective. In some cases heavy fine resulted in retaliation through illegal use of forests to pay-off the levied charge. FPCs found small fines sufficient to shame most offenders into changing their behavior.

The study found that the FPC programe, in West Bengal had been hindered by the delayed formalization of the program e by the state government, with particular reference to approving the sharing agreements between the state and the FPC. Since this was approved on August 15th, 1989, the programe should receive a new stimulus (see Apendix 1). The researchers suggest the following steps be taken to enhance the programe's further expansion. All FPCs should have a formal agreement signed with the forest department. Rules and regulations should not be standardized, leaving flexibility to allow members to design them to meet the need of the local polulation. To maintain effective operations, committees should remain relatively small, comprising no more than a few villages. Proper marketing facilities should be provided to streamline the sale of NWFP's and improve prices. The Forest Department should continue to provide income generating activities to dependent families in forest communities during the early phase of forest regeneration. Proper training should be provided to forest staff at all levels regarding processes to establish and support FPC forest management systems.

Government of West Bengal
Forest Department
Forest Branch.

No. 4461-For./D/1s-16/88. Calcutta, the 12th July, 1989.

RESOLUTION

WHEREAS the Forest Department has taken up a massive program for "Resuscitation of Sal Forests of South-West Bengal" with the objective to re-establish moribund sal and other hardwood forests, in the districts of Midnapore, Bankura, purulia, Burdwan and Birbhum, for converting the areas into productive forests.

WHEREAS active participation and involvement of local people are vital for regeneration, maintenance and protection of aforesaid forest/plantations and successful implementation of the programme;

NOW, THEREFORE, the Governor is pleased to decide that Forest Protection Committees shall be constituted for this purpose and beneficiaries acting as members of such committees shall be allowed, as a measure of incentive, 25% of the usufructs subject to observence of the conditions provided in the Resolution.

The composition duties and functions, the usufructuary benefits and restrictive measure pertaining to such protection committees shall be as follows:-

COMPOSITION:

1.(i) The Divisional Forest officer in consultation with "Bon-O-Bhumi Sanskar Sthayee Samiti" of the concerned Panchayat Samiti shall select beneficiaries for construction of the Forest Protection Committee (s), within their jurisdictions, and within the framework of this resolution;

(ii) The beneficiaries shall be identified from amongst the economically backward people living in vicinity of forests concerned;

(iii) The concerned Gram Panchayat (s) shall extend necessary support and help to such Committee(s) to ensure their smooth and proper functioning;

(iv) Each Forest Protection Committee shall have an Executive Committee to carry out the various activities assigned to the Committee;

(v) The composition of the Executive Committee shall be as follows:-

a) Subhapati or any member of the Bon-O-Bhumi Sanskar sthayee Samiti of the local Panchayat Samity ... ... Member

b) *Gram Pradhan or any member of local Gram Panchayat(s)* ... Member

c) Elected representatives of the beneficiaries (not exceeding 6) ... Members

d) *Concerned Beat Officer* ... Member-Secretary

The members of the Executive Committee shall elect the president in each meeting.

(vi) Constitution of the Forest Protection Committee including Executive Committee will be approved by the Divisional Forest Officer concerned on recommendation of the "Bon-O-Bhumi Sanskar Sthayee Samiti" of the concerned Panchayat Samity;

(vii) The "Ban-O-Bhumi Sanskar Sthayee Samiti" of the respective Zilla Parished will monitor, supervise and review functions of the Forest Protection Committee;

(viii) If any inclusion or change in the Committee/Executive Committee is necessiated, after initial constitution, the Executive Committee shall make suitable recommendation to the Divisional Forest Officer concerned, duly endorsed by the 'Bon-O-Bhumi Sanskar Sthayee Samiti' of local panchayat samiti, for approval;

(ix) The Beat Officer, as Member-Secretary shall convene the meetings of the Executive Committee as well as Forest Protection Committee, as per Scheduled Procedure;

(x) The representatives of the beneficiaries to the Executive Committee shall be elected in each year in Annual General Meeting of the Committee, where the concerned Range Officer shall be the observer;

DUTIES:

2.(i) The Forest Protection Committee shall maintain a Register showing necessary particulars of beneficiaries as well as members of the Committee, e.g. name, father's name, address, age, number of family members, name of nominee, etc. The nomination forms duly filled in and approved by the Executive Committee should be pasted in the Register. Such Registers are also to be maintained in the concerned Range offices of the Forest Deptt. for permanent record;

(ii) The Forest Protection Committees shall maintain a "Minutes Book" wherein proceedings of the meetings of the Executive Committee held from time to time as well as the proceedings of the Annual General Meeting of the Forest Protection Committee will be recorded under the signature of the President of the Committee and such Minutes duly attested shall be sent to the concerned Range Officer for record;

(iii) The Forest Protection Committee shall hold an Annual General Meeting once in every year where activities of the Committee as well as details of distribution of usufructory benefits are to be discussed, besides electing representatives of the beneficiaries to the Executive Committee.

FUNCTIONS:

3. (a)(i) To ensure protection of forest(s)/Plantation(s) through members of the Committee;

(ii) To protect the said forest(s)/plantation(s) with the members of the Committee;

(iii) To inform forest personnel of any person or persons attempting transspass and willfully or maliciously damaging the said forest(s)/plantation(s) or commit theft thereon;

(iv) To prevent such tresspass, encroachment, grazing, fire, theft or damage;

(v) To apprehend or assist the forest personnel in apprehension of such person or persons committing any of the offences mentioned above.

b (i) To ensure smooth and timely execution of all forestry works taken up in the area under protection by the Committee;

(ii) To involve every member of the Committee in the matter of protection of forest(s)/plantation(s) as well as other duties assigned to the Committee:

(iii) To assist the concerned Forest Officials in the matter of selecting/engaging of labourers required for forestry works.

(c) (i) To ensure smooth harvesting of the forest produce by the Forest Department;

(ii) To assist the concerned Forest Official in proper distribution of the earmarked portion (i.e. 25% of net sale proceeds) among the members of the Committee (as per list maintained by "Sthayee Samiti");

(iii) To ensure that usufructory rights allowed by the Govt.is not in any way misused by any of the members and forest/plantation sites are kept free from any encroachment whatsoever.

(d) (i) To prevent any activities in contravention of the provisions of Indian Forest Act of 1927 and any Acts and Rules made thereunder;

(ii) To report about activities of a particular member which are found prejudicial and detrimental to the interest of particular plantation and/or forest to the concerned Beat Officer/Range Officer, which may result in cancellation of membership of the erring member;

(d) (iii) To assist the Forest Officials to take action or proceed under Indian Forest Act of 1927 and any Acts and Rules made thereunder, against the offenders, including any erring member of the Committee found to be violating the Act or damaging the forest/plantation.

USUFRUCTORY BENEFITS:

4. (i) The members will have to protect the forest/plantation for at least 5 years to be eligible for sharing of usufructs under this programme;

(ii) The Forest Official in consultation with the Executive Committee and with the approval of the Bon-O-Bhumi Sanskar Sthayee Samity of the concerned Panchayet Samity will distribute the eligible members his proportionate share of usufructs from the harvesting, not before 10 years, upon satisfactory performance of functions detailed herein before;

(iii) The members shall be entitled to collect following items free of royalty without causing any damage to forests/plantations:-

(a) fallen twigs, grass, fruits, flowers, seeds (excluding cashew), etc.

(b) one fourth of the produce obtained as intermediate yield from R.D.F. coppicing, multiple shoot cutting, thinning etc. and also 25% of the net sale proceeds of cashew where available to be shared proportionately;

This will not in any manner, extinguish the rights and privileges already granted to the members of the Scheduled tribes by the State Government in their Order No. 2001-For. dated 20.4.81 and/or may be granted in future.

(iv) Entire sal seeds and kendu leaves so collected shall have to be deposited with the West Bengal Tribal Development Co-operative Corpn. Ltd., through the local LAMPS and lamps will pay the members, in approved tariff, against their individual collection;

(v) The concerned Forest Official shall set apart 25% of the net sale proceeds at every final harvesting of the concerned plantation/forests (i.e timber, pole, etc.) as I shall pay to all eligible members or his nominee their proportionate share out of the said earmarked funds, as per para 4(ii) of the Resolution.

TERMINATION OF MEMBERSHIP, DISSOLUTION OF COMMITTEE, APPEAL, ETC.

5. (i) Failure to comply with any of the conditions laid down herein before as well as contravention provisions of the Indian Forest Act of 1927, or Acts and/or Rules made thereunder, may entail cancellation of individual membership and/or dissolution of the Executive/Forest Protection Committee, as the case may be, by the Officers of the Forest Deptt. as stated below;

(ii) The concerned Divisional Forest Officer, shall be entitled to take appropriate action, even dissolution of any Executive/Forest Protection Committee, on the grounds stated above, on the recommendation of the 'Bon-O-Bhumi Sanskar Sthayee Samiti' of the concerned Panchayet Samiti.

(iii) The concerned Range Officer may be authorised by the Divisional Forest Officer to take proper action, even termination of an individual membership, on the above mentioned grounds, on the recommendation of the Executive Committee of Forest Protection Committee;

(iv) Appeal against any such penal action by the Range Officer may be preferred to the concerned Divisional Forest Officer through local Panchayat Samiti;

(v) Appeal against any such penal action by the Divisional Forest Officer may be prefered to the concerned Circle Conservator of Forests, through the concerned Panchayat Samiti and the Zilla Parishad, whose decision shall be final.

ORDER

Ordered that the Resolution be published in the calcutta Gazette and copy sent to all concerned.

By order of the Governor,

A.K. MITRA,
Jt. Secy. to the Govt. of West Bengal.

No. 4461/1(2)-For.

Cory forwarded to the:-

(1) Finance Deptt. of this Govt.;

(2) Accountant General, West Bengal; for information.

Calcutta,
the 12th July, 1989.

Joint Secretary to the
Government of West Bengal.

No. 4461/2-For.

Copy forwarded fo information to the Secretary to the Govt. of India, Ministry of Environment & Forests, National Wasteland Development Board, 4th B floor, Block-B, Paryavaran Bhawan, CGO Complex, Lodhi Road, New Delhi-110 003.

Calcutta,
The 12th July, 1989.

Joint Secretary to the
Government of West Bengal.

No. 4461/3(103)-For.

Copy forwarded for information and necessary action to the:-

(1) Principal Chief Conservator of Forest &E.O. Secretary, Forest Department., Govt. of West Bengal;
(2) Secretary to the Govt. of West Bengal, (all Departments)
(3) Divisional Commissioner,
(4) Director of Panchayats, West Bengal;
(5) District Magistrate, (all) Dist.
(6) Sabhadhipati, (all) Zilla Parishad.

Calcutta,
the 12th July, 1989.

Joint Secretary to the
Government of West Bengal.

SESSION I

TOPIC: COMMAND OVER RESOURCES OF THE TRIBAL PEOPLE IN THE CHANGING CONTEXT - A CONCEPTUAL FRAME.

Recommendations:

1. Avoid as far as possible displacement of tribals as it results in denial of the right to life guaranteed under Article 21 of the Constitution.

2. If displacement is inevitable, the compensation equation has to be so oriented as to provide stable means of livelihood to the displaced. In any kind of projects in tribal areas, the first beneficiaries should be only local tribals. Displacement should not be taken up against the wishes of the affected families. Similarly, the relocation and rehabilitation should be also planned and executed in consultation with oustees.

3. A Regulation by Governor may be promulgated to guarantee a comprehensive rehabilitation scheme for the displaced under the V scheduled of the Constitution.

4. In case of irrigation projects, the tribals who are likely to be displaced have to be assigned land in the command area of that project. In case Government land is not available, the land may be purchased from private individuals who own more land. The actual beneficiaries also may be made to part with a portion of land for the benefit of displaced persons as they are going to get incremental benefits. Giving cash compensation has to be totally discouraged except maintenance allowance till they get final crop.

5. Since the tribal is part and parcel of eco-system and has been living in symbiosis with forests, he must be made a partner in the management of eco-system including regeneration, protection and exploitation of forest wealth for various projects.

6. Provision of jobs to the displaced tribals at the rate of atleast one person per family should be made mandatory in the projects constructed in tribal areas in addition to land to (cultivable) land basis.

7. If skilled or semi-skilled candidates belonging to oustees families are not available, youth belonging to same families may be recruited and trained in particular skill or trade and be absorbed regularly.

8. The project authorities should make sufficient provision from its budget for taking up development activities in nearby tribal villages viz., establishment of schools, dispensaries and hospitals exclusively for the benefit of displaced families.

9. The above recommendations have to be followed not only in future projects but also in projects already implemented.

10. Knowledge of natural and human resources available and their scientific utilisation and management of the resources may be imparted to local tribals through various kinds of training programmes so as to increase the awareness and consequent command of the local resources.

SESSION II

TOPIC: PROJECTS CAUSING DISPLACEMENT - BASIC TYPOLOGIES AND THE NATURE OF ISSUES.

Recommendations:

1. While establishing projects in tribal areas, as far as possible, displacement should be avoided. In case displacement is unavoidable, then, the displacement needs to be minimal and with least hardship to tribals.

2. Total rehabilitation of the displaced is to be the first priority preceeding construction of actual project.

3. Like 'technical clearance cell' for a project, a 'Rehabilitation Cell' also needs to be created in the project with necessary finances and well defined role to play.

4. Rehabilitation measures are to be complimentary in nature but should not result in supplanting the tribal culture and ways of life.

5. The rehabilitation measures should under no circumstance lead to perpetual struggle for survival of the local tribal.

6. Regular livelihood for the displaced should be created near their original habitat only as far as possible or else near the vicinity so as to maintain their social and religious contacts with "matru-bhoomi".

7. In Wild Life Act, prohibition on the use of both traps and guns are included under one clause and this needs re- consideration and distinction is to be made permitting use of traditional modes of hunting as primitive technology is not capable of large scale elimination of species. It may actually help in the healthy pruning of species to keep them within desired levels of multiplication.

8. The displaced should be a sharer of the project benefits. A positive approach on 'total rehabilitation' is to be adopted rather than casual and negative approach. Since tribal means of livelihood patterns are simple and cannot cope up with the complexities of the technically advanced, the solutions should be simple and well suited to the traditional living of the tribal.

9. Cumbersome and complex procedures of paying compensation for the loss suffered either in terms of fixed assets or movable assets should be avoided and simple and easy procedures are to be laid down for the speedy redressal of grievances or the loss sustained by the tribal.

10. The land alienation problem and consequent dispossession should be solved on priority basis. The alienated land to non-tribals contrary to Regulation has to be restored to tribals. Targets and time limit have to be fixed for restoration of land in tribal areas.

SESSION III

TOPIC: COMPENSATION, RELOCATION AND DEVELOPMENTAL REHABILITATION.

Recommendations:

1. There should be a dialogue in humility with persons going to be affected and relocation &rehabilitation decided as per wishes of the people.
2. The development model for country should change, so that deprivation will not be there for any section of the population in the process of development.
3. The verdict of people is final, and therefore, their ideas should be considered before taking any decision about them.
4. Any displaced person should be able to earn better income on the resource to be provided to him in the new place. This should be done to meet the social costs of displacement.
5. Comprehensive guidelines for fixing up quantum of compensation have to be formulated taking into consideration the market value of land at current prices, house sites, houses and movable and immovable property and human costs involved in settling in new place etc.
6. Efforts should be made to train local people/youth so as to absorb the members of displaced families in the project construction and management. Employment of, atleast, one member of the affected family should be made mandatory in addition to compensation.

SESSION IV

TOPIC: PUBLIC PURPOSE, STYLE OF DEVELOPMENT AND PEOPLE'S PERSPECTIVE.

Recommendations:

1. The definition of public purpose in the Land Acquisition Act 1984 should be in the context of locally affected population. It should not be ignored that by public purpose, the Act also intends to cover the displaced public.

2. The persons after displacement and rehabilitation should be guaranteed better level and quality of life than they enjoyed besides some extra benefits to cover the human causes of uprootment.

3. While illiterates are to be settled in the same tribal setting i.e., within the local social system, the educated may be settled in towns and other urban centres after sufficient training and orientation.

4. A detailed plan of settlement should be put into action before actual starting of work on the main project. The execution of the rehabilitation project should be entrusted to a separate body.

5. Nurtition and health programme based on locally availabled natural foods and use of herbal medicines rather than introduction of synthetic nutrients from outside should be encouraged.

6. Selective animal harvesting should be undertaken in wildlife sanctuaries so as to eliminate useless and problematic animal population and consequent danger to surrounding human and domestic animal populations.

7. It should not be conceived that the presence of tribals in wildlife sanctuaries will be detrimental to the survival of the endangered animal species. Actually, the animals species can be better propagated if tribal is involved in cultivating animal population.

8. Either animal farming or tree farming is to be taken up as part of and in collaboration with tribal development without considering that the tribal development is detrimental to the promotion of animal and treespecies.

SESSION V

TOPIC: DISPLACEMENT AND REHABILITATION - *THE ANDHRA EXPERIENCE*

Recommendations:

1. It is necessary to identify the animal and plant species threatened by submergence or distruction in the wake of introducing major industrial, irrigation and hydro-electric projects and plan for perpetuation and propagation of the species.

2. The tribal should be trained to acquire new skills or improve the existing skills so as to make him to take advantage of the new enterprises that are introduced in his area.

3. Some of the ancillary units that are to be started as a consequence of introducing small, medium and major industries in tribal areas are to be reserved for Scheduled Tribe entrepreneurs.

4. To prepare the tribal to take advantage of the new industry or other projects, a survey has to be undertaken to identify the skill requirements of the project and prepare the tribal in advance by imparting him the necessary skills and knowledge. Under any circumstances the tribal should not be left unprepared to take advantage of the new avenues of employment even of skilled avocations.

5. All minor forest produce based processing industries are to be reserved for the tribal entrepreneuers only.

6. An integrated approach is to be adopted for the promotion of small units in tribal areas.

7. A part of the profits from the various industrial ventures are to be ploughed back to the tribal by way of implementing special programmes so as to enable him to derive the first and full benefits of the project.

8. Independent and autonomous organisations or Institutions may be requested to undertake the study of present condition of tribals already displaced due to construction of Machkund Hydro-electrical Project in Visakhapatnam district, varadarajaswamigudi Irrigation Project in Kurnool district, introduction of Satellite Launching Station at Sriharikota Island, Wild Life Sanctuary in Nallamalai Hills and other projects that caused displacement of tribals. Terms of reference should also include formulation of comprehensive plan of rehabilitation and relocation.

SESSION VI

TOPIC: PEOPLE'S PARTNERSHIP IN ECOLOGICALLY VIABLE AND SOCIALLY COMPATIBLE DEVELOPMENT.

Recommendations:

1. A model agency like Tribal Cultural Research and Training Institute should be entrusted with the planning of rehabilitation of tribals before any developmental projects causing displacement are taken up.

2. This should be followed up by continuous monitoring and follow up for the successful implementation of the rehabilitation in order to avoid situations that occured at Kottalacheruvu chenchu Rehabilitation scheme and Sriharikota Yanadi Rehabilitation Scheme.

3. All infrastructure facilities are to be provided before shifting them to the new place with the cooperation of all the implementing agencies.

4. The views of social scientists are to be taken into account before implementing rehabilitation work.

5. The periphery of the project Tiger area is to be allotted to tribals for rehabilitation, if necessary.

6. Afforestation work is to be taken up with minor forest produce species in order to stop denudation of forests and to create subsidiary source of income to local tribals.

7. The concept of participatory forestry has to be introduced in every State for ensuing economic and ecological benefits to the forest communities and to the society at large. The scheme of 'Forest Protection Committees' as done in West Bengal may be introduced in all the States.

8. The customary rights of tribal communities in grazing, collection of fuel wood, minor forest produce, timber for construction of houses, manufacture of agricultural implements etc. have to be codified and made available to tribals in regional languages in order to control exploitation.

GOVERNMENT OF ANDHRA PRADESH

ABSTRACT

Tribal Welfare - Rehabilitation - Displacement and dispossession of tribals due to project Industries, Mines, Wild life sanctuaries etc - Safeguards and rehabilitation thereof - *consolidate* instructions - Issued.

SOCIAL WELFARE (T) DEPARTMENT

G.O.Ms.No. 64

Dt. 18.4.90

Read:-

1. Govt. Memo. No. 34/Irr. VIII/86-1, Irr & C.A.D. Dept. dt.8.2.86
2. Govt. Memo. No. 560/Irr. VIII/86-2, Irr & C.A.D. Dept. dt. 25.6.86
3. *G.O.Ms. No. 406, Ind & Com (M.IV) Dept dt. 16.7.86*
4. G.O.Ms. NO. 310 F.A.F(For. III) dept. dt. 5.8.86
5. G.O.Ms. No. 145, Irr & C.A.D. (Proj. Wing) Dept.dt. 24.6.88.
6. *From the D.T.W. D.O.Lr.No. 11580/SPEL/TRI/TWD,86, dt. 1.10.87.*

-:-

ORDER

The tempo of economic development is increasing in the scheduled areas as the resource base o these areas acquired centrality in the new national economic frame. The dispossession and displacemen of tribals on numerous counts is mounting in these sensitive areas which is creating conditions o discontent and unrest in some of the scheduled areas.

2. The tribal people affected by some projects have been paid compensation for the land acquired in the tribal setting but some of the special features of tribal situation such as their association with the territory, their emphasis on community life and cooperation, non-monetised, self- sufficient and undifferentiated economy and self-governance have not been taken into consideration at the time of displacement and dispossession of the tribals while executing projects and establishing industries, wild life sanctuaries etc., so as to avoid social disorganisation and economic destitution of the affected tribals.

3. The Government have carefully considered the entire question of acquisition of land for public purposes and rehabilitation of tribal people in the scheduled Areas to ensure that the tribal people in

the scheduled areas enjoy the safeguards envisaged for them under the constitution of India and their interests are not compromised on any count whatsoever.

The following orders are issued covering all the instructions issued earlier:-

(i) There should no displacement of tribals nor any disturbance of tribal way of life for the purpose of execution of irrigation projects, mining activities, industries, establishment of wild life sanctuaries, etc.

(ii) The flora and fauna in tribal areas which help the tribal economy should not be disturbed.

(iii) Clearance of Tribal Welfare Department of the State shall be taken before taking up any schemes in the tribal areas of the state.

(iv) No new Irrigation Schemes should be taken up, areas where there will be submergence of tribal land. In such cases, construction of major and medium irrigation projects shall be avoided to the extent possible and small check dams, lift-irrigation schemes etc should be taken up.

(v) No projects including establishment of industries, mining projects wild life sanctuaries etc., shall be cleared in the scheduled areas unless detailed comprehensive plan for rehabilitation of the people adversely affected by the projects/including those directly displaced is prepared and the concerned authority satisfies the government that there is full administrative preparedness for the execution of the rehabilitation plan.

(vi) The plan for the rehabilitation of affected families shall be prepared in association with the people adversely affected and in accordance with the guidelines contained in the annexure to this G.O. It shall be approved by the ITDA concerned and it must be ensured that the people have not only been fully compensated for the loss of their economic base but are also rehabilitated completely.

(vii) The plan of rehabilitation shall form part of the Project Report and the entire cost of rehabilitation shall be the first charge on the project. If this cannot be done, the amount that is required for meeting the rehabilitation cost may be given by the Government either as grant or as equity depending upon the merits of each case.

(viii) Whereever it is unavoidable to take up scheme involving submergence of tribal lands, rehabilitation shall be taken up on land to land basis and even if the extent of land lost by a tribal family cannot be entirely made good by alternative land, it must be ensured that some land is provided so that the family is not completely uprooted from its traditional occupation.

(ix) If adequates land cannot be provided, employment should be provided atleast to one member of each family displaced. The list of displaced tribals and their dependents should be put on rolls of the project and if necessary, they should be sent for requisits training. If the displaced tribals cannot be accommodated within the projects, efforts shall be mad to find jobs for them in other sister projects as well as in the Govt.

(x) The rehabilitation plan shall be executed under the direct supervision of ITDAs concerned. The concerned department shall provide logistic support to the ITDA for implementation of the rehabilitation plan before dispossession and displacement of tribals.

(xi) In cases the establishment of major/medium industries in tribal areas becomes inevitable in the national interest, such industries shall be set up by Government or Government undertakings but not before exhausting the possibility of involving the tribals in setting up such industries with the help of Government/Institutional support and if necessary by reducing the size and cost of the project, as the case may be.

(xii) In case of acquisition of land in scheduled areas, the fixation of compensation may be based interalia on capitalised value of the income from the land and the preliminary valuation statement shall be approved by the Collector and Chairman of the ITDA concerned. The compensation paid may also be deposited in a bank preferably for a long term so as to enable the displaced families to derive certain income from the land compensation amount. In case the tribal family decides to buy land elsewhere, with the compensation money it should be given necessary assistance by there habilitation agency ensuring that the alternative becomes a source of sufficient income.

(xiii) Each land acquisition unit will have a rehabilitation cell which will work under the direct supervision of ITDA. This cell will identify the persons who are to be treated as dispossessed persons following the acquisition of land. The progress of rehabilitation of dispossessed and dispaced families will be monitored by the ITDA concerned and the Tribal Welfare Department of the State Government in the same manner as the implementation of the project is monitored.

(iv) A substantial training programme of enterpreneurial skills, with followup in helping and getting financial support, marketing outlets, supply of raw materials etc shall be built up at the time of execution of the projects, for the displaced and dispossessed tribals.

v) The displaced persons who come under the category of landless poor may be allowed to continue to cultivate the lands acquired at their own risk without detriment to the project as such if land acquired is not put to use by the requisitioning authority.

(xvi) In the event of accidental deaths or injuries which cause physical disability during the construction of a projector in attack by animals in wild life sanctuaries, sufficient compensation shall be paid to affected persons/families.

4. The above instructions will apply mutatis mutendis to all the irrigation projects, industries, mines wild life sanctuaries etc., which have already been either executed/established or in the process or execution/ establishment. The Commissioner of Tribal Welfare shall send proposals for rehabilitation of all such displaced families under such irrigation projects, mines industries, wild life sanctuaries etc., for which no rehabilitation scheme as such has been approved and implemented so far.

(BY ORDER AND IN THE NAME OF THE GOVERNOR OF ANDHRA PRADESH)

G. KUMARASWAMI REDDY
PRINCIPAL SECRETARY TO GOVERNMENT