

## **Soil and Water Conserved by Social Marketing Mechanism and Policy Reforming and Farmers Participation**

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**Abstract:** Ecological constructions on soil and water conservation do not are separated themselves from the investment of the governments and the masses, and at present the situation of our country decides that the mass is a principal part of environmental improvement and it's investment. Based on the continuous mechanism innovation of soil and water conservation on tenancy management, stock cooperation, "four wastelands" (barren mountain, barren slope, barren galley and uncultivated beach) auction and property right system reform of silt terra dam and so on, the paper pointed out if only we treat with the relations among responsibility, right and benefit, and take the relative measures, i.e. attracting the local people with favorable policies, retaining them with good property right relations, supporting them with program capital investment, helping them with technique services and richening them with economical benefit. That makes more farmers, cadres, institutions, groups, factories, mines and other enterprises take part in the actions for soil and water conservation. There is plenty of scope for soil and water conservation run by the local people.

**Keywords:** mechanism, policy, eco-construction, soil and water conserved by local people

The organization, investment, standard and effect of the eco-construction for soil and water conservation maintain close ties with the state property, economical strength, natural condition and degree of the mass participation. The social property with leading of public ownership and the situation of a developing country in china decide that the mass is a principal part of environmental controlling and it's investment, how to mobilize the mass's enthusiasm and go-aheadism is a key of success or failure for the eco-construction in China.

The farmers' problem for a populous and agricultural country is the problem of land, because it has closely concern with mass's authority and benefit. Along with the continuous deepening of reform and opening, perfecting of social marketing economic, and improving of synthetic national power, when the state increases investment for eco-construction, the measures of mechanism innovation and excellent policies from all levels of governments do greatly mobilize the mass' enthusiasm to participate in the eco-construction on soil and water conservation. The unoccupied high enthusiasm of the masses for eco-construction and rapid development for soil and water conservation let soil and water conservation run by the local people into a new historical development era.

### **1 Mechanism innovation and co-existing of different controlling forms for soil and water conservation**

#### **1.1 Family contracted responsibility system**

Before 1980 the running mechanism, which environment controlling for soil and water conservation was mostly invested much capital by the state and collective and labors by the masses under intervene of strongly government administration, made separations among responsibility, right and benefit and controlling, management and exploitation. At the beginning of the 80's, the contracted responsibility system with remuneration linked to output were at large put into extensive in the village of china because of the huge reform in the fields of the state politic and economic. The masses in the mid- reach of the Yellow River firstly set up the method controlling small watershed with the family contracted

responsibility system in 1982, the method swiftly were put into the whole country and applied up to the present.

### **1.2 Labor accumulated system**

Labor accumulated system appeared about 1984 and became a available means which all levels of governments mobilize and organize the masses labor accumulation and labor taking the place of money to control soil loss and exploit resources at large scale. The collaboration of labor exchanging labor for controlling soil loss was put into practice through the principle of equal mutual benefit and equivalence exchange.

### **1.3 Stock cooperation system and tenancy management system**

Stock cooperation system is to optimize and assemble the land, capital, material, technique, labor power and other production elements for the controlling and exploitation of “four wasteland”, and cut a melon according to stock, i.e. investment of labor and capital. Tenancy management system is to lease out the wastelands of the primary controlling, which are used through the management and further exploitation, the tenant should submits some rent to the land owner. The two forms mentioned above are relative small at scope.

### **1.4 “Four wastelands” auction system**

Under the condition of unchanged ownership, the usufruct of the “four wastelands” is over a long period of time handed in the farmers by auction. In 1992 Liliang Prefecture of Shanxi Province took the lead in selling the usufruct of the “four wastelands” at auction, which produced a good radiation effect in whole country of china. The Ministry of Water Resources convened the first on-the-spot meeting to sell the usufruct of the “four wastelands” at auction in Helongjiang Province in 1994, after this the measure has soon been extending into all china.

### **1.5 Property right system reform of silt terra dams**

In order to resolve the problems of ill and danger strictness, and disjoint between management and utilization of silt terra dam, in 1996 Yan’an Prefecture of Shaanxi Province put the various property right system reform of silt terra dams into practice such as the contracted with unite families, tenancy, auction and others. During 1998 to 2000 Shaanxi Province and Watershed Administrative Institutions together convoked three times of scene and experience intercommunion meetings, the experiences of controlling soil erosion and water loss was summed up in time and extended in the watershed of the Yellow River.

The above mentioned controlling forms of naissance in succession and co-existing made the running mechanism of the eco-construction for soil and water conservation to adapt uninterruptedly the deep development of our country economical society and the rural property right system reform. At currently, when the lightening farmers’ burdening and labor accumulated system comes under some limit, the four responsibility forms of contract, tenancy, stock coop and auction are furthermore able to materialize the willing rule of the respecting masses. The commonness of the four responsibility forms is to transfer the usufruct of the collective “four wastelands” in village. In particular, the auction by way of the continuing and development of controlling soil erosion contracted with families still made the controllers to obtain the stable and authority feeling of long-term possessing land usufruct, and to hold the achievement feeling of gaining harvest for income right, so the masses welcome this form.

## **2 Constituting the favorable policies and putting matching measures into effect and excavating the social potential**

The General Office of the State Department issued “the notice on controlling and developing the resources of the rural ‘four wastelands’ and furthermore strengthening soil and water conservation” in

June of 1996. December of 1998 the Water Resource Ministry issued the notice “on management method of controlling and developing the resources of the rural ‘four wastelands’”. All levels of the governments actively put the matching measures into practice and constitute the favorable policies, which makes the task of soil and water conservation enter into the standardized management path. The summary as follows:

### **2.1 Attracting the controllers with favorable policies**

The usufruct period of the “four wastelands” is determined 50 to 100 years according to the difficult or easy degree for controlling soil erosion. During the stated using period the usufruct of the “four wastelands” can be inherited and transferred. The castes, organ unites, individual families, employees, cadres and unemployed persons participate in controlling soil erosion is encouraged and welcomed, and development and controlling of the land resources across the administration district are allowed. The tax, deduction and special local product tax of agriculture and forestry are made free during 5 to 10 years, when the “four wastelands” are built the basic farmlands or planted fruit trees. The constructing production and management buildings at the “four wastelands” are permitted to develop the processing industries of the agricultural byproducts. The “four wastelands”, which the farmers buy, can un-participate in the controlling of uniting organization and can replace the labor accumulation. The favorable policies above mentioned greatly mobilize the enthusiasm of carrying out soil and water conservation from the social power. 761 enterprises and 4 842 employees in Shanxi Province have bought the “four wastelands”. 128 thousand families and 144 organ groups have bought the “four wastelands” and 5 524 family farmers, 72 cadres and 95 organ groups have taken part in the stock cooperation system in Liliang Prefecture of Shanxi Province. Some big enterprises and companies from the coastal cities bought the “four wastelands” in Inner Mongolia, Xinjiang, Helongjiang and other provinces to deal with controlling and exploiting and to set up industries.

### **2.2 Retaining the controllers with good property right relation**

The policies ordained the long-term unchanged usufruct of the “four wastelands”, “who buys or contracts, who controls, who exploits, who manages and who benefits”. The collective has right to take back and retreat the lands, which had been bought or contracted but not controlled or not done one’s best during the limited period. What makes clear the unification between the property right and responsibility-right-benefit not only retains the controllers but also promotes them increasing grandness.

### **2.3 Supporting the controllers with program capital investment**

The exploiting and controlling of the “four wastelands” need a mass of capital and material, but the economical strength of the masses in the poor hilly and mountainous regions has limit, so improving standards and quality of the eco-construction engineering needs the vigorous supporting from the governments. For some poor and type families, local governments should stand by the rule of “helping them up horse and accompanying them a distance” and give them some incline or encouragement of capital or material from the center government. Especially recent years, the policies of “the steep cultivated farmlands returned into woodlands or grasslands, closing hillsides to facilitate afforestation, individual contracts and grain being place of aid” entirely carry out execution, which resolve the food problem of masses and make the masses obtain some subsidy money.

### **2.4 Helping the controllers with technique services**

The government commits oneself to the environmental improvement of investment, the function of the professional sections pitches guide, service and coordination, and offers necessary information and techniques. The technical persons put the service with remuneration into practice is encouraged and it is hopeful that the long-term engaging relations between the controllers and technicians are set up. All wool and a yard wide service plays down at maximum the investment venture of controllers and make the technicians obtain boon. Some peasants and companies retain experts and consultants with most favorable treatment and carry effectively through controlling and exploiting on the sciences and technologies.

## 2.5 Richening the controllers with economical benefit

In the processing of soil and water conserved by the social power, a numbers of representatives onto the rich out the poor with the exploiting and controlling the “four wastelands” appear the whole country. For example, farmers YANG Feng-ping, WU Run-suo in Zhongyang County of Shanxi Province bought 274.2 hm<sup>2</sup> “four wastelands” and invested 1,460 thousand RMB Yuan from 36 families through stock system. So the Ministry of Water Resources commended 50 demonstration families of the controlling and exploiting “four wastelands” for the eco-construction of soil and water conservation from all nations in April of 2000. The demonstration families are too numerous to mention one by one, which is propagandized and commended in good time and plays good radiate and driving role in the eco-construction of soil and water conservation for the region up to the nation through viewing and emulating and investigating and studying each other.

## 3 Marked effect and vast foreground make the industry of soil and water conserved by farmers to be able to develop their ability to the full

The practice has proved that the controlling and exploiting “four wastelands” resources through the contract, auction and stock cooperation furthermore liberate the productivity, completely mobilize the activity from the hilly and mountainous region and all social circles for the controlling and exploiting “four wastelands” resources, attract and promote the social capital and technology and the talents into the controlling “four wastelands”, in order to provide the place of using force for surplus labor and time, to form the multiple ways of investment, to quicken the controlling speed, prevent and cure soil erosion, better the eco-environment, strengthen farmers’ marketing economical consciousness and pick the farmers into the rich out the poor up.

During recent 10 years the Central Government and local governments invested respectively 50 and 40 hundred million RMB Yuan in soil and water conservation, attracted the social investment 129 hundred million RMB Yuan, the masses invested 125 hundred million working days, which totally controlled the 380 thousand km<sup>2</sup> soil erosion area and is 46% of the accumulative total controlling area since liberation, among them from 1992 to 1997 the whole nation controlled the soil erosion area 180 thousand km<sup>2</sup>, the auction and contract and tenancy and stock cooperation accounted 24.7% for the total controlling area during the period. In particular, since 1998 the average annual controlling area exceeded over 50 thousand km<sup>2</sup>, it is one importance factor that the social power was sufficiently mobilized for the eco-construction of soil and water conservation in addition the nation increasing investment.

According to the relative statistic data, 21 provinces, autonomous regions and municipalities directly under the Central Government carried out the auction of the “four wastelands” usufruct till the beginning of 1998, auctioned the wastelands 3,779.3 thousand hm<sup>2</sup> and obtained money 7.9 hundred thousand RMB Yuan. There were 3,060 thousand families to participate in the auction, now the controlling area was up 1,900 thousand hm<sup>2</sup> and accounted 50.4% for the total auctioned area. Furthermore, the controlling contracted with farmers were 1,280 hundred families and contracted the controlling area 4,839 thousand hm<sup>2</sup>, 2,086 thousand hm<sup>2</sup> already controlled and occupied 43.1% of the total contracted area. The controlling area of the stock cooperation and tenancy were 465 and 944.6 thousand hm<sup>2</sup> respectively, and already controlled 220 and 185.3 thousand hm<sup>2</sup> respectively.

Very large population and few infield resources in China severely restrict the agricultural development. But there are rich resources of the “four wastelands” in the vast hilly and mountainous regions, according to the statistic more than 300 hundred thousand hm<sup>2</sup> is able to be exploited and utilized directly in the near future. The long-term unused valuable resources not only are reasonably exploited and utilized, but also happen to serious soil erosion and water loss to worsen the eco-environment. Therefore, the industry of soil and water conserved by farmers is able to develop their ability to the full, because there are rich resources of the “four wastelands” and the guarantee of the relative policies and rules, there are the state supporting and technical services, there are proud outstanding achievements and wide foreground.