

Chapter 3 Project Evaluation and Recommendations

3. Project Evaluation and Recommendations

3-1 Project Effect

The output of the project is an improvement of the rural infrastructures in three sectors of Irrigation, Rural Road and Rural Electrification in the study area “Nam Nam area” in Nam Dan District, Nghe An Province. The output attains to stabilize agricultural production, to ensure inhabitants easy access to city and/or to social services and to supply stabilized electricity to the inhabitants in Nam Nam area, whose life is very severe due to the natural disaster and the remote place. This project, as a visible cooperation, contributes to deepening the friendly relations between the two countries.

The present conditions and problems in Nam Nam area, project components/measures to solve the problems and expected project effects are summarized below.

Table 3-1.1 Present Problems, Measures and Project Effect

Present Condition and Problems	Measures/ Project Component	Project Effect
<p>1. <u>Irrigation Sector</u> :</p> <ul style="list-style-type: none"> ➤ The existing irrigation systems are deteriorated remarkably. ➤ The capacity of the irrigation systems has dropped down. ➤ The agricultural productivity, which supports all livelihood of the area, has reduced. ➤ The life of inhabitants is unstable <p>1-1 <u>Nam Trung Pump Irrigation System</u> :</p> <ul style="list-style-type: none"> ➤ The pumps and the house exceed their life and superannuated remarkably. ➤ The main canal also has many damages and it's command area has reduced from 470ha to 370 ha. <p>1-2 <u>Ho Thanh Reservoir Irrigation System</u> :</p> <ul style="list-style-type: none"> ➤ There are leakages through dam embankment and the conduit pipe of intake facilities due to the deterioration of the facilities. ➤ One of two main canals has deteriorated and the reservoir's irrigable area has reduced from 70ha to 40ha. 	<p>1-1 <u>Rehabilitation of Nam Trung Pump Irrigation System</u> :</p> <ul style="list-style-type: none"> ➤ To rehabilitate the pumping station ➤ To rehabilitate the main canal of 4.9km <p>1-2 <u>Rehabilitation of Ho Thanh Reservoir Irrigation System</u> :</p> <ul style="list-style-type: none"> ➤ To take measures against leakage ➤ To rehabilitate No.2 canal of 2.4 km 	<p>By 1-1;</p> <ul style="list-style-type: none"> ➤ The capacity of the Nam Trung Pump Irrigation System is recovered. ➤ Conveyance loss in the main canal is mitigated. ➤ Irrigable area is recovered to 470ha. <p>By 1-2;</p> <ul style="list-style-type: none"> ➤ Ineffective discharge from the reservoir is reduced. ➤ Conveyance loss in the main canal is mitigated. ➤ Irrigable area is recovered to 70ha(s). <p>By 1-1 & 1-2;</p> <ul style="list-style-type: none"> ➤ It is expectable that agricultural production in the farm land of 540ha, equivalent to about 30% of a total irrigation area in Nam Nam area, being stabilized. ➤ The livelihood of about 8,000 direct beneficiaries equivalent to about 20% of the inhabitants in Nam Nam area being stabilized and their living standard being improved. ➤ It contributes to vitalize the local economy in Nam Nam area, and to achieve the improvement of living condition in Nam Nam area.

<p><u>2. Rural Road Sector :</u></p> <ul style="list-style-type: none"> ➤ Insufficient of road network is the biggest problem in Nam Nam area. ➤ Under the present conditions of the road network, it is very difficult to access to urban area, market and/or outside of the area for the inhabitants. ➤ It is very difficult to get social services. ➤ The inhabitants have a shortage of well communication each other in the area, a shortage of information and commodities from outside and a shortage of employ opportunity. ➤ Inhabitants are forced to live in hard under the poor living conditions. <p><u>2-1 Route15A :</u></p> <ul style="list-style-type: none"> ➤ Blocking the road due to flood in rainy season ➤ Bad conditions for traveling due to unpaved and uneven road surface. ➤ Blocking the road by gully erosion at steep slope beside the road. <p><u>2-2 Nam Kim-Nam Phuc-Nam Cuong Road :</u></p> <ul style="list-style-type: none"> ➤ Bad conditions for traveling and farming activities due to very poor conditions such as lack of width, unpaved and uneven road surface. 	<p><u>2-1 Improvement of Route 15A :</u></p> <ul style="list-style-type: none"> ➤ To increase road elevation to secure year-round traffic and/or be all-weather road ➤ To pave road surface with asphalt in 15.7km length ➤ To construct 4 bridges and a box-culvert. ➤ To provide erosion control facilities at 3 gully erosion site. <p><u>2-2 Improvement of N. Kim – N. Phuc – N. Cuong Road</u></p> <ul style="list-style-type: none"> ➤ To pave road surface with asphalt in 4.3km and with concrete in the section inundated in rainy season of 2.6km. ➤ To construct a bridge and 4 box-culverts. 	<p>By 2-1;</p> <ul style="list-style-type: none"> ➤ Route 15A converts to year-round traffic and/or be all-weather road. ➤ The problems due to insufficient road network are solved and 36,000 inhabitants in Nam Nam area can access easily to urban area, market and outside of the area, and can get easily social services, information, commodities and employ opportunity. <p>By 2-2;</p> <ul style="list-style-type: none"> ➤ The inhabitants of about 15,000 in 3-comunes located in flood plain can have easily well communication each other and their life is improved. ➤ The conditions for farming activities around the road are improved. <p>By 2-1 & 2-2;</p> <ul style="list-style-type: none"> ➤ It contributes to vitalize the local economy in Nam Nam area, and to achieve the improvement of living condition in Nam Nam area. ➤ It contributes to mitigate the differential between the left-bank area and right-bank area of the Lam river.
<p><u>3. Rural Electrification Sector :</u></p> <ul style="list-style-type: none"> ➤ The proposed 3 sites include the non-power supplied area in the local development project area with resettlement plan (2001-2005) aiming at the poverty alleviation in Nam Dan District. Since resettled households have no power supply, the current electrification rate in the proposed 3 sites is 69% which is very lower than the average rate of 95% in Nam Dan District. The electrification rate in 2005 expected to fall to 58%. ➤ Due to the poor distribution facilities, the power supply is in extremely poor condition such as high percentage of power losses, frequent power outage, lowing voltage. ➤ The large amount of power losses has triggered higher electricity prices which is more than 1.5 times of the average in Nam Dan District average. 	<p><u>3. Extension of Rural Electrification</u></p> <ul style="list-style-type: none"> ➤ To construct three substations for the proposed 3 areas ➤ To install 10kv transmission line of 5.1km long in total. ➤ To install 0.4kv distribution line of 11.8km long in total 	<p>By 3;</p> <ul style="list-style-type: none"> ➤ The living standard of about 600 resettled households and about 100 existing inhabitants nit having power supply is improved. ➤ About 1,000 existing households can enjoy stabilized and better quality power supply and reasonable electricity prices, which are their eagerest desires. ➤ It supports the settlement plan aiming poverty reduction. ➤ It provides a condition for the minimum civilized life to the 1,700 households / 5,300 people. ➤ It contributes to mitigate the differential within the Nam Nam area.

3-2 Recommendations

In order to produce the project effects continuously after the project completion, Vietnamese side is requested to take an appropriate action for the following subjects;

- ① To provide continuously necessary personnel and budget for the continuous well O&M of the facilities constructed in the project.
- ② To hold explanatory meetings with the inhabitants in Nam Nam area in a series of stages of detailed design, construction and operation so that the inhabitants understand the project and put their mind to participate consciously to the project.
- ③ To guide the beneficiaries of the irrigation systems constructed in the project in that the water fee includes an expense for the future rehabilitation of the facilities with replacement of pumps and gates by themselves to secure sustainable operation of irrigation system.
- ④ To perform traffic safety education to inhabitants specially along Route 15A for preventing an increase of traffic accident.
- ⑤ To establish a public bus route between Nam Dan and Nam Cuong Commune via Route 15A and Nam Kim-Nam Phuc-Nam Cuong road.
- ⑥ To utilize the outputs from "South Nghe An Irrigation Project" with "Preparation of an Guideline of O&M for the project" being conducted by World Bank and "Model on Participatory Irrigation Management Sub-project" which will be carried out in near future for the O&M of the irrigation facilities constructed in the project to make more reliable continuous O&M.