

SOCIO-ECONOMIC IMPACT OF DRIP IRRIGATION SYSTEM
A Case Study of Dhikurpokhari V.D.C., Kaski

A Dissertation

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LETTER OF RECOMMENDATION

This is to certify that Mr. Krishna Prasad Bhandari has completed this dissertation entitled "**Socio–Economic Impact of Drip Irrigation System: A Case Study of Dhikurpokhari V.D.C., Kaski**" under my supervision and guidance. I, therefore, recommend and forward this dissertation for final approval and acceptance by the dissertation committee.

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LETTER OF ACCEPTANCE

The dissertation entitled "**Socio-Economic Impact of Drip Irrigation System: A Case Study of Dhikurpokhari V.D.C, Kaski**" Prepared and submitted by Mr. Krishna Prasad Bhandari has been accepted as Partial Fulfilment of the Master's Degree in Sociology by the dissertation evaluation committee comprised of :

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"Socio-Economic Impact of Drip Irrigation system: A Case Study of Dhikurpokhari V.D.C., Kaski" is a dissertation prepared in the partial fulfillment of Master Degree in Arts in the Department of Sociology/Anthropology. T.U., PNC., Pokhara, Nepal. It gives a feeling of great pleasure to see the research work in the form of a dissertation. But it is not an outcome of a single hand. Many hands have supported this work to bring it in this shape. I am grateful and thankful to all those helping hands.

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Date: August, 2010

Krishna Prasad Bhandari

EXECUTIVE SUMMARY

Fieldwork of this study entitled Socio-Economic Impact of Drip Irrigation System was carried out at ward no. 1, 2, 3, 4, 5 and 9 of Dhikurpokhari V.D.C. in Kaski district. The general objectives of this study were: to examine the performance of the drip irrigation system and to access the socio-economic impact of drip users with reference of Dhikurpokhari V.D.C. of Kaski district. The specific objectives of this study were: to analyze the impact of drip irrigation on social sector (Education, Health, Gender Relation, and Awareness) and to access the impact of drip irrigation system in economic sector.

The study covered a sample of 234 households of the ward no. 1, 2, 3, 4, 5 and 9 of Dhikurpokhari V.D.C. out of 234 households, 50 households, i.e.21 percent were selected as sampled HHs using simple random sampling method by lottery method. Hence, 50 sample households have been targeted and studied in detail to meet the research requirement.

The study followed a broad framework and focused on holistic approach to fulfill its objectives rather than just to follow a single method of collecting and analyzing data. Therefore, several tools and method such as a semi structured, interview with drip users, a focus group discussion with non-sampled drip users and farmers, interview with key informants and case studies were conducted to collect the essential information. Several meeting were also held with various stakeholders. Mainly quantitative data were collected from interviews schedule and qualitative data were collected using FGDs.

Drip irrigation has brought changes on the social sector of informants such as Education, Health, Gender Relation and Awareness. 26 informants i.e 52 percent have geared up their knowledge in the sector of education and got more information about modern agricultural tools and methods for farming by drip irrigation. Hence, their awareness has improved. Likewise, 35 informants, i.e 70 percent have improved their health status by taking fresh vegetables and

earning by selling them. The money is used by drip users in health, education and nutrition sector. Similarly, gender relation to drip irrigation for instance, 21 men, 15 women and 14 joint (by men and women) out of 50 are involved in decision making activities related to drip irrigation of gender.

Drip irrigation has brought drastic changes in the rural area in economic sector. Drip users have increased their income, saved their time, saved labour, generated employment opportunity, increased production and saved water by adopting Drip Irrigation. 18 informants, i.e 36 percent have earned yearly Rs. 5,000 to 10,000 by adopting Drip Irrigation. Similarly, 17 informants, i.e 34 percent, 9 informants, i.e 18 percent and 6 informants, i.e 12 percent are benefited to earn early Rs. 10,000/- to 15,000/-, Rs. 15,000/- to 20,000/-, Rs. 20,000/- and above respectively.

Applying drip irrigation system for irrigation is one of the best systems for irrigation. However, drip users have faced problems while constructing tunnel and other sector as well. 46 respondents, i.e. 92 percent, 48 respondents, i.e. 96 percent and 47 respondents, i.e.94 percent have faced general problems on drip irrigation system on the tunnel construction, natural disaster, diseases and pesticides respectively.

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LIST OF ACRONYMS

| | |
|--------|--|
| ADB | = Asian Development Bank. |
| ADB/N | = Agricultural Development Bank /Nepal |
| APROSC | = Agricultural Project Service Centre |
| CBS | = Central Bureau of Statistics |
| DCDO | = Dhikurpokhari Community Development Organization |
| DDC | = District Development Committee |
| FGD | = Focus Group Discussion |
| FMIS | = Farmer Managed Irrigation System |
| GDP | = Gross Domestic Product |
| HHS | = Households |
| ha | = hectare |
| INGO | = International Non-government Organization |
| IDE | = International Development Enterprises |
| IIME | = International Irrigation Management Institute |
| JT | = Junior Technician |
| JTA | = Junior Technical Assistant |
| NARC | = Nepal Agricultural Research Council |
| NPC | = National Planning Commission |
| NR | = Natural Resources |
| PDDP | = Participatory District Development Programme |
| PNC | = Prithvi Narayan Campus |
| SLC | = School Leaving Certificate |
| SDC | = Socially Disadvantaged Caste |
| TU | = Tribhuvan University |
| UG | = User Group |
| UNDP | = United Nations Development Programme |
| VDC | = Village Development Committee |
| WTO | = World Trade Organization |