SOCIO-ECONOMIC IMPACTS OF BIOGAS IN CHARPANE VDC OF JHAPA DISTRICT, NEPAL: A CASE STUDY

A Thesis

Submitted to the Central Department of Economics,

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in Partial Fulfillment of the Requirements

For the Degree of

MASTER OF ARTS

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Submitted

By

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LETTER OF RECOMMENDATION

This thesis entitled **"SOCIO-ECONOMIC IMPACTS OF BIOGAS IN CHARPANE VDC OF JHAPA DISTRICT, NEPAL: A CASE STUDY"** has been prepared by Mr. Sumit Poudyal under my supervision. I hereby recommend this thesis for examination to the Thesis Committee as a partial fulfillment of the requirements for the Degree of MASTER OF ARTS in ECONOMICS.

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APPROVAL SHEET

We clarify that this thesis entitled **"SOCIO ECONOMIC IMPACTS OF BIOGAS IN CHARPANE VDC OF JHAPA DISTRICT, NEPAL: A CASE STUDY"** submitted by Mr. Sumit Poudyal to the Central Department of Economics, Faculty of Humanities and Social Sciences, Tribhuvan University, in partial fulfillment of the requirements for the Degree of Masters of Arts in Economics has been found satisfactory in scope and quality. Therefore, we accept this thesis as a part of the said degree.

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I am alone responsible for any defects and errors in this study if any.

Sumit Poudyal

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ABBREVIATIONS AND ACRONYMS

AD	Anno Domini
ADB/N	Agriculture Development Bank of Nepal
AEPC	Alternative Energy Promotion Centre
ARI	Acute Respiratory Infection
Avg.	Average
BDC	Biogas Development Committee
BGC	Biogas Companies
BSP	Biogas Support Programme
CBOs	Community Based Organization
CBS	Central Bureau of Statistics
CDM	Clean Development Mechanism
CDMA	Code Division Multiple Access
CER	Certified Emission Reduction
CES	Centre for Energy Studies
CF	Community Forest
CFC	Chloro Floro Carbon
CFUG	Community Forest User Group
CMS	Consolidated Management Services Nepal
CO_2	Carbon di Oxide
cu. m.	Cubic Meter

DCS	Development and Consulting Services
DDC	District Development Committee
Dev.Part.	Development Partners Consultancy
EDR	Eastern Development Region
e.g.	Example Given
etc.	Etcetera
ERPA	Emission Reduction Purchase Agreement
ESAP	Energy Sector Assistance Program
Exp.	Expenditure/Expenses
FY	Fiscal Year
g-C	Gram Carbon
GDP	Gross Domestic Product
GGC	Gobar Gas Company
GHG	Greenhouse Gas
GoN	Government of Nepal
Ha	Hectare
HDI	Human Development Index
HMG	His Majesty Government
IEIA	Integrated Environment Impact Assessment
IoE	Institute of Engineering
INGO	International Non Governmental Organization
LDCs	Least Developed Countries

LPG	Liquefied Petroleum Gas
Ltd.	Limited
MDG	Millennium Development Goal
MoF	Ministry of Finance
MoST	Minstry of Science and Technology
m^3	Cubic Metre
NGO	Non-Government Organization
NHRC	Nepal Health Research Council
NLSS	Nepal Living Standard Survey
No.	Number
NPC	National Planning Commission
PAF	Poverty Alleviation Fund
PRSP	Poverty Reduction Strategy Paper
REDP	Rural Energy Development Programme
REPPON	Renewable Energy Perspective Plan of Nepal
RUDESA	Rural Development Study Associates
RWEP	Rural World Energy Programme

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