

**Impacts of Restoration of Ulpotha
Micro-cascade in Galkiriyakanda
Cascade on Environment and
Rural livelihood**

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DECLARATION

I declare that this is my own work and this dissertation does not incorporate without acknowledgement any material previously submitted for a degree or diploma in any other university or institute of higher learning and to the best of my knowledge and belief it does not contain any material previously published or written by another person except where the acknowledgement is made in the text.

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Abstract

This dissertation identifies and analyses the restoration efforts of Ulpotha micro-cascade located in the Galkiriyakanda cascade. The ‘Case Study’ methodology was used for the research. A Conceptual Framework has been established (with five independent variables and one dependent variable) based on five hypothesis developed. The research question mainly focused on ‘positive changes and possible gaps in the Ulpotha restoration efforts’. Analyses in the dissertation include changes in forest, environment, hydrology and other socio-economic impacts on Walathwewa and Ihala Thimbiriyawa village communities who are dependent on it for living and livelihoods.

The Galkiriyakanda cascade is located in the northern part of Kurunegala district. Galkiriyakanda stretches about 10 km and covers area of 1,106 hectares. There are about 1,500 households living around this cascade. Galkiriyakanda has many micro-cascades and Ulpotha is the major micro-cascade which is the main focus of this study. All most all communities live on agriculture and irrigated paddy is the main crop cultivate in the area. The cascade and communities faced many challenges during the recent past and degradation of cascade was the main threat to environment and rural livelihood.

Research discusses in detail the impacts made by the rehabilitation efforts done in Ulpotha micro-cascade during 2004 – 2011 through Sri Lanka Australia Natural Resource Management Program (SLANRMP). Required information and data were collected through a Likert scale questionnaire and SPSS system has been used to analyse the data collected. Relationships between independent variables and the dependent variable have been analysed under five main hypotheses. The results of this study indicate positive impacts of the Ulpothe micro-cascade rehabilitation towards physical environment, livelihood and rural economic development.

Findings of this study will help administrators, policy makers and rural development planners to expand and replicate this development model to other dry zone cascades as well. In addition, another important area of hydrology and indigenous irrigation in cascade was also identified as potential research areas for PhD studies.

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ACRONYMS

Ahas wewa	- Sky Tank
Chena	- Slash and Burn Cultivation
CBO	- Community Based Organisation
Drumstick	- A low country vegetable
Ellan Gava	- Hanging one after the other
FAO	- Food and Agricultural Organisation
FD	- Forest Department
GA	- Government Agent
GN	- Grama Niladhari (Village Administrator)
GOSL	- Government of Sri Lanka
Madu	- A local vegetable
Maha	- Main Rainy or Wet Season
Mana	- Grass variety that thrives in the area
NTFP	- Non Timber Forest Products
NWP	- North Western Province
PRA	- Participatory Rural Appraisal
SLANRMP	- Sri Lanka Australia Natural Resource Management Project
Wood Apple	- A Local (dry zone) Fruit Variety
Yala	- Minor Rain Season

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