

DRAFT SUMMARY OF

ECO VILLAGE DEVELOPMENT

FEASIBILITY STUDY FOR MATARA DISTRICT, SRI LANKA



Prepared by
Integrated Development Association (IDEA)

Sri Lanka

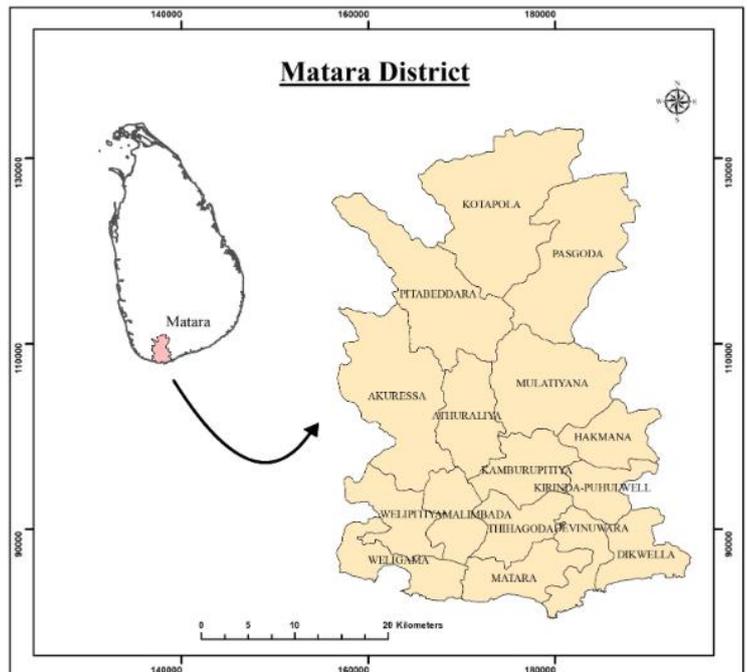
July 2020

1. Background and study location

Sri Lanka is highly vulnerable to the impacts of Climate change and according to the Global Climate Vulnerability index, Sri Lanka was ranked at 97 in 2015, 4th in 2016 and 2nd in 2017 in the list of countries which were most affected by the impacts of climate change. Prolonged droughts, intensive rainfall and related incidents could be identified as reasons for this vulnerability rankings. Thus, in tackling climate change, both climate mitigation and adaptation is emphasized nationally. At district level, all 25 districts in Sri Lanka are vulnerable to adversities at different levels. The village communities are affected the most with serious threats to their livelihoods.

“Matara district” which is the studied region for EVD feasibility is home to a fair share of village communities and is a coastal district which is highly impacted by the effects of climate change such as sea level rise, increased temperature and changes of rainfall. Matara is one of the three districts of Southern Province, bordering the Southwest coastline of Sri Lanka which falls in between 5.8 - 6.4 North Latitude and 80.4 -80.7 East Longitude. Geographically, Matara carries a lot of diversity including a wide coastline to bordering Sri Lanka’s most treasured rain forest “Sinharaja” from the north.

The district is divided in to sixteen divisions and consists over 1600 Villages. The total land area of the district is 1,282.5 km² where the total population is over 800,000. It is bounded on the South by the coastline, North by Ratnapura district, West by Galle district and East by Hambantota district. In terms of Natural resources, the Sinharaja forest and the 55km coastal belt are to be highlighted for the Matara district. At present, in terms of landuse share, estate plantation contributes the most. In terms of poverty indices, the percentage of poor households based on the official poverty line by district is 3.7% for Matara according to 2017 statistics (Source <http://www.statistics.gov.lk/Pocket%20Book/chap04.pdf>).



Source: <http://www.gsmb.gov.lk>

Climate

In terms of climate zones, the southern coastal region falls under dry zone. The central and northern parts of the district falls under low and mid country wet zone of Sri Lanka. The low and mid country wet zone occupies a major part of the district. The region belonging to the dry zone receives relatively low rainfall, 1500-2000mm annually. It is usually fed by South West monsoon during May-September. The regions belonging to the wet zone receives an annual rainfall of over 2500mm. Moths of March, April and May records the highest average monthly temperatures-30 centigrade- where November, December and January records the lowest- 26 centigrade.

2. Analysis of findings

Analysis of data and information were based on categorizing inputs from different stakeholders and sources (Beneficiaries, Practitioners/facilitators, National experts, Primary and secondary information collected through surveys and relevant publications) under the main feasibility criteria: Geography and Climate, Technical, Socio-economic, Organizations and Institutions, Policy and funding, systematically. Feasibility rankings were utilized depending on inputs-Quantitative and Qualitative- in an unbiased manner. In cases where there were contradictions, the inputs were re-discussed with relevant personnel/reviewed with reports for verification.

Feasibility Ranking			
No sufficient information	Low	Medium	High

Combinations used in rankings and their interpretation

Present status is low, however there is potential to achieve medium, given some conditions are fulfilled	
Low	Medium

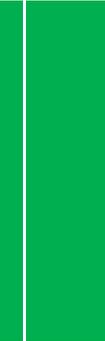
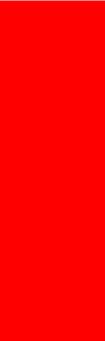
Initial reading is "medium" however more information is required to specify related aspects	
No Sufficient information	Medium

Initial reading is "High" however more information is required to specify related aspects	
Low	High

Initial reading is "Medium" however there is potential to achieve "High", if some conditions are fulfilled	
Medium	High

Scope and limitations

The analysis was based on a limited set of information gathered from various sources. Given the diversity and scope of area of Study region-Matara district, additional time and more comprehensive studies are required for specificity.

<p>regardless of policies, government support could be obtained.</p>											
<p>Biomass/solar drying/dehydration</p> <p>Overall feasibility is moderate. Highly applicable for the whole district catering a diverse set of industries. Dried fish in the near coast and fruits and vegetables going further in to the district. Knowledge on these solutions is low among the community. Technical parameters depend on the need. However there are not many with relevant technical expertise. There are few organizations who facilitate programmes. No specific policies for promotion. However with proper sensitization of officials, there is potential to obtain financial aid. Capital cost of the units at present is a concern as well.</p>											
<p>Rainwater Harvesting</p> <p>Appropriate for hilly areas where there is no access to water or where water is limited or discontinued. Socio-Economic benefits are high but the capital cost of units is not affordable unless cheaper units or subsidy schemes are available. No active policies to facilitate such interventions. There are previous projects which have been implemented both by government and NGOs which have successfully utilized.</p>											
<p>Brickmaking improvements through biomass</p> <p>Feasibility is moderate. Applicability high is given the resources and procedures undertaken by brickmakers. Technical ability to disseminate this knowledge is also high. The technology is affordable, however the socio-economic gains would depend on the nature of how the production is carried out- full time or part time. There are hardly any organizations which have technical capacity and facilitates these interventions. No specific programmes or policies in support but support could be gained under livelihood development initiatives.</p>											
<p>ICS Production- Anagi</p> <p>Feasibility could be moderate given that there is technical support to improve the processes. New, and easy ways such as using moulds could be an option to</p>											

overcome the pottery skills required-especially which the younger generation lack	Green	Yellow	Red	Yellow	Yellow	Red	Yellow	Red	Yellow
Biogas for Households Feasibility is low as a village level technology. Not many previously established units by different projects are successfully utilized. At times given the the nature of build, it could be labour intensive. Higher caputal costs which village communities could not afford, lack of funding and programmes to fund these activities is another concern.	Green	Dark Grey	Yellow	Red	Yellow	Yellow	Red	Yellow	Red

The Feasibility Study was made by IDEA in framework of an NGO cooperation Project titled “Strengthening the Eco-Village Development concept: Affordable local climate actions for sustainable development in South Asia” in September 2019 to July 2020.

The Project partners: INFORSE-South Asia coordinators: INSEDA in India, CRT-N in Nepal; IDEA in Sri Lanka; Grameen Shakti in Bangladesh; and CANSA, coordinated by INFORSE and DIB in Denmark. The Project was financially supported by CISU - Civil Society in Development, Denmark.

The feasibility study is based on the Eco-Village Development Concept described in the publication "Eco-Village Development as Climate Solution, Proposals from South Asia".

EVD Project’s web sites: www.inforse.org/asia/EVD.htm www.ecovillagedevelopment.net

IDEA’s web site: www.ideasrilanka.org