

## IPSI Collaborative Activity Proposal Form

The following form is for use when submitting proposed IPSI Collaborative Activities for consideration by the IPSI Steering Committee. See the Collaborative Activity Guidelines on p. 3 for more information.

Please return the completed form to the IPSI Secretariat ([isi@unu.edu](mailto:isi@unu.edu)).

*IPSI Collaborative Activities are the activities that shall be undertaken by more than one IPSI member and constitute an important part of IPSI activities with the purpose of fostering collaboration within the IPSI membership and implementing the IPSI Strategy and Plan of Action. The IPSI Collaborative Activities shall be developed and implemented with the endorsement of the Steering Committee in accordance with the Collaborative Activity Guidelines. Resource mobilization for IPSI collaborative activities shall be the responsibility of the implementing members in principle. – IPSI Operational Guidelines, Chapter 5.4*

<b>Date of Application:</b>	<b>17.05.2022 And Modified on 20.05.2022</b>
<b>Project title:</b>	
<b>Building Climate Resilient Socio Ecological Production Landscapes (SEPLs) in India</b>	
<b>Collaborating organizations (IPSI members):</b> (*Please underline the leading organization)	
<ol style="list-style-type: none"> <li>1. <u>M. S. Swaminathan Research Foundation-Community Agro-biodiversity Centre</u></li> <li>2. Tropical Institute of Ecological Sciences, Kottayam, Kerala</li> </ol>	
<b>Other contributing organization(s) (including IPSI non-members):</b>	
Departments of Plant Science and Zoology, Mananthavady campus, Kannur University	
<b>Expected term (e.g. 1 January 2014 – 31 December 2015):</b>	
June 1, 2022 to May 31 2023	
<b>IPSI strategic objective(s) addressed (tick all that apply; see p. 3 for more details):</b>	
X	1. Increase knowledge and understanding of SEPLS*
X	2. Address direct and underlying causes responsible for the decline or loss of SEPLS
X	3. Enhance benefits from SEPLS*
X	4. Enhance human, institutional and sustainable financial capacities

*Continued on next page.*

**Description of the activity:**

Please provide as much information as possible on:

- Background
- Activities (including site locations if applicable)
- Expected outcomes
- Actors and task sharing
- How the activity relates to the *IPSI Strategy* and *IPSI Plan of Action*
- Resources, funding
- Monitoring and reporting

This project proposal is to achieve the objective of “provide information, knowledge and skills in Climate change mitigation, adaptation, and disaster preparedness at Local Government’s and community level with a focus on the Socio Ecological Production Landscapes (SEPLs) for achieving Carbon-Neutral Development”

- **Background**

The project will be implemented in one of the most vulnerable High Land Areas(HLA) of Western Ghats, which experiences intense climate shocks for the past five to ten years. Kerala's 17% of the land is vulnerable to landslides, and for the HLA districts, this reckons to an average of 50%. This tiny state, sandwiched between the Arabian Sea and the Western Ghats, is a global Climate Hotspot with a dense population. IPCC-2018 reports projected increased flooding, frequent hurricanes and heavy rains in the Arabian Sea and the Western Ghats for the next 20 years. Since 2018, Kerala has been experiencing this forecast accurately and in severe magnitude, impacting millions of people's lives and livelihoods. Carbon Neutral development with Net-zero targets by 2040 and achieving the 17 SDGs by 2030 are the two high priority goals of India. However, the policies and plans often formed without effective role of Local Self Governments or participation of local communities who are most vulnerable to climate disasters.

- **The Plan of Action** is of a three-year time frame, with integrated actions in three Work Packages(WPs).

**First year (applying FY 2022)**

We will focus on the WP-1 by collecting and collating data driven content with mapping of the climate vulnerabilities and documentation of the best cases in Ecosystem based Adaptation (EbA) practices at local panchayath and SEPLs levels in the highland of Kerala. We will do the vulnerability mapping, and data collection pertain to climate change mitigation, adaptation and disaster preparedness, along with documentation of EbA practices. This will be done in combination of digital maps, local people’s knowledge, computer-graphics with GIS integrated data. The year also would see listing out of and selecting the most climate -vulnerable GramaPanchayaths along with community leaders, and other key institutions and individuals playing significant roles in the mitigation and adaptation planning and practices. The project will be of much help to achieve conservation and sustainable management of SEPLs of the interventions sites and contribute to improving the climate resilience.

**Second year**

The FY 2023 will be with development of a Mobile application (EbAAPP) by synthesising location-specific data in Agriculture and allied sectors, forestry and other land uses, transportation, energy, and waste management (See the activity charts for the details). The year also will be to strengthen actions in communication, capacity development, education and awareness, targeting students, farmers and public about climate disaster risk reduction and biodiversity conservation

**Third Year**

The WP-3 with activities such as strengthening the MSSRF facilitated multi-stakeholder platform and partnership building to promote carbon neutral actions through social media enabled public awareness, participation and policy instruments will be undertaken in the FY2024. We will concentrate on partnership building with the Local

Self Governments, local decision makers and practitioners for promoting the use of EbA methods by appropriate incentivisation like subsidies for nature based solutions. Besides, efforts will be taken to develop the partnership Networks and replicate the project successes through a diverse programmes. This approach will result in planners of the state start hearing, understanding, agreeing, mainstreaming and sustaining the climate actions effectively and feed into national policies and practices.

- **The expected outcomes** of the activities

### **First Year**

A well-trained group of youths as trainers in Carbon Neutral Development interventions in the area of Agriculture and allied sectors, energy and transportation. (i) methods and tools for soil productivity improvement and water use efficiency through soil organic carbon storage and with a consortium of suitable microbial inputs as well as micro weather information and drip irrigation technologies. The energy sector will be focused on (ii) efficiency improvement methods in the consumption of household energy including electricity, LPG and promotion of micro solar energy systems. (iii) The transportation area module to focus on the trend in the increase of diesel/petrol based motor vehicles, and the awareness generation for less usage of motor vehicles and promotion of bicycles among students and youth. (iv). The Biodiversity intervention module will focus on the methods and tools to improve degraded or abandoned production landscapes in particular the mountain ecosystems, edges of coffee, tea and rubber plantations, and other areas of important conservation measures. SEPLs level GIS enabled Climate Vulnerability and other natural disasters Maps

Case studies of the best practices at both community and the LSG level on Ecosystem based adaptation, Climate disaster risk reduction and preparedness. A comprehensive Database with the Vulnerability indices and Adaptation methods and technology details. Priority list of the most severe vulnerability areas and the best practices as well as technologies for attention and intervention.

### **Second Year**

A suitable and scalable Mobile App which provides all the necessary information, data and intervention methods for carbon neutral interventions relating to biodiversity enhancement, soil fertility improvement, water use and energy use efficiency interventions that were imparted through the training in the first year of the project. Trained volunteers and other interested groups who are engaged to facilitate a Campaign for Carbon neutral developmental interventions in agriculture, energy systems and transportation. Efforts will be taken for augmenting/restoring the degraded ecosystems and village forests/thickets with indigenous tree species which are of high conservation or cultural values. Case studies of the best practices at both community and the LSG level. Well-trained trainees for taking up village level interventions. (This will be an activity for the monitoring of the two year interventions)

### **Third Year**

Increased use of the mobile app by the planners which help them to mainstream climate concerns and biodiversity in the development project. Capacitated LSG body members in writing and implementing carbon neutral development and biodiversity conservation and ecosystem services protection projects. Funds are mobilized by showcasing the success stories and model project proposals. Detailed reports, policy papers, facebook, twitter and LinkedIn posts, and video films on the success stories. In addition to these methods field level demonstration classes, peer-learning avenues through collaborative actions.

- **Actors and task sharing**

The proposed activity plan will be taken up in collaboration with the Tropical Institute of Ecological Sciences (TIES), Kottayam, Kerala. Expertise of both the partners will be effectively utilized to achieve the objectives of the

project. The GIS mapping, vulnerability mapping, disaster preparedness mapping etc will be done by utilizing the expertise of TIES. All the other activities will be implemented by MSSRF CABc

- **How the activity relates to the *IPSI Strategy and IPSI Plan of Action***

The objectives and activities of the proposed project perfectly fall in line with the IPSI strategies and IPSI plan of action that is advancement of socio ecological production landscapes and seascapes for the benefit of the biodiversity and human well being. Scientifically documenting and mapping the climate vulnerabilities of the study region lead to the better understanding of the root causes of how the changes in the climate affects the lives and livelihood of the marginalized people. This will lead to develop action plan and recommendations to the authorities and ultimately lead to the well being of the biodiversity and human life.

- **Resources, funding**

The project budget is funded by Keidanren Nature Conservation Fund (KNCF), Japan.

Budget Heads	USD
Materials Goods Expenses	1260
Field Survey and Operation Expenses	2206
Meeting and Management Activity	2912
Personal Expenses	8321
Travelling Expenses	1225
Office Cost Others	630
<b>Grand Total</b>	<b>16554</b>

- **Monitoring and reporting**

An external monitoring committee will be constituted by integrating the experts from research institutions like Cochin University of Science and Technology (CUSAT), Kerala Agriculture University (KAU) and Indian Institute of Spices Research (IISR) and other eminent institutions in the country who works in line with the climate change and biodiversity conservation. This monitoring committee will meet once in every six months to monitor the progress of the project and also will utilize their expertise in wherever areas as possible to correct and advise the team. Reporting will be done once in every six months to the donor agency.