Layer farming for adaptation (LFA)

Cultivating and marketing high value crops to improve food security, enhance livelihoods and adapt to climate change in Nepal.

The Glacier Trust (TGT) has partnered with the Himalayan Community Development Forum (HICODEF) in south-central Nepal since 2009. Over the last three-year period, since June 2016, £27,655 has been spent to enable climate change adaptation in the remote mountain villages of the Siwalik range. This work has enabled 1,615 people to increase their resilience to the growing impacts of climate change.

Our new project, **Layer farming for adaptation (LFA),** will take our work to a higher altitude and more remote location. We will reach a further 1,901 people, across seven villages, in an area of dangerously low food security. Only 56 out of the 260 households have enough food to last nine months or more. Climate change and economic inequality are exacerbating these problems significantly.

This project will prioritise families with less than six months of food security and those most socially and economically disadvantaged - women, women-headed households (out-migrated husbands), the poor and those socially excluded by caste.

Coffee cultivation as a climate adaptation strategy

Across Nepal's Himalayan foothills, coffee is being grown as a climate change adaptation and livelihood improvement strategy. TGT's projects with Eco Himal Nepal in Solukhumbu (east Nepal) are already successfully working in this way. With support from the Marr Munning Trust, we have recently transferred this model to Kavrepalanchok (central Nepal). Through the LFA project we will introduce this methodology in Nawalparasi in partnership with HICODEF.

The model pioneered in Solukhumbu, has been refined to create the five-year LFA project tailored to Nawalparasi. The project has been designed by TGT and HICODEF in close collaboration with farmers in each of the seven villages and all relevant local government institutions. Eco Himal Nepal and Swiss INGO, HELVETAS have also provided expert advice and support.

Layer farming, Agro-Forestry and Education

Coffee will be grown using the organic 'layer farming' method, inter-cropped with fruits, vegetables and other high value crops to improve income, diet and resilience to climate change. Through this project, we will enable farmers in to grow coffee commercially for the first time.

We will also work with local primary school children and teachers to give them practical and theoretical knowledge of ecosystem-based adaptation and environmental conservation.

By the end of year five 35,000 coffee trees, with the potential to produce 5,000 tonnes of green coffee bean per year, will be planted. Farmers will be closely supported by one full time and two part-time staff as well as up to six agricultural apprentices.

Budget requirements

Phase one of this project will run for a minimum of two years, in three villages. It will cost **£12,208 in year one** and **£11,985 in year two**. We anticipate extending the project to the remaining four villages in year three, four and five at a cost of £12,500/year. We have secured £4,000 for this work from Orbis Pictus trust and a £2,000/year funding commitment through our partnership with UK based company Volley First. Donations from our regular individual supporters will provide further funding, currently projected to total £3,000/year.

We require a minimum of **£3,500/year of additional funding** to guarantee the project's success.

For more information and to support this project, please contact TGT Co-Director (UK), Dr. Morgan Phillips: morgan.phillips@theglaciertrust.org

Project partner:	HICODEF
Annual cost:	£12,500
Project location:	Nawalparasi, Nepal
Project length:	5 years
Remoteness:	Medium-high
Altitude:	800m – 1,350m
Land area:	243 hectares
Villages:	7
Households (HHs):	260
Female population:	1,018
Male population:	883
Food security:	Low
Up to 3 months:	89 HHs
Up to 6 months:	115 HHs
Up to 9 months:	43 HHs
12 months +:	13 HHs