Completed EAPs

Title of the Project	:	Monitoring of soil organic carbon under agroforestry, natural and
Dringing! Investigator		conventional farming systems in Tamil Nadu
Principal Investigator	:	Dr. A.C. Surya Prabha, Scientist-E
Co Investigators	:	Dr. C. Buvaneswaran, Scientist-G
Duration of Project	:	2022-2023
Objectives	:	 To monitor the dynamics of organic carbon status in soils under Agroforestry, natural and conventional (Nonagroforestry systems and chemical intensive systems) farming systems in Tamil Nadu. To assess basic soil parameters viz., EC, pH, texture and soil bulk density in the above sites under monitoring. To study the influence of different farming systems in practice on soil carbon sequestration and their role in climate change mitigation.
Funding agency	:	ISHA Outreach, Coimbatore
Summary/Achievements		 To monitor the dynamics of organic carbon status in soils under Agroforestry, natural and conventional (Non-agroforestry systems and chemical intensive systems) farming systems in Tamil Nadu, soil samples (968 nos.) collected from different land uses viz. Agroforestry (414 nos.), Non-agroforestry (414 nos.), Natural farming (70 nos.) and Conventional farming (70 nos.) at 30cm depth were analyzed for various physico-chemical properties. In the agro-forestry systems, the overall soil organic carbon content ranged between 0.06 % and 1.57%. Out of the 414 agroforestry samples, 22.95% of the samples were low, 38.65 % medium and 38.41% were high in organic carbon content. The results indicated a higher organic carbon content in agroforestry systems compared to non-agro forestry.