



PhD Project

Project Details

Project Title	What it takes to achieve Net Zero Emission status for an agrarian community.
Project Summary	This project aims to develop a simple but robust mechanism to quantify the impacts of various pathways to achieve net zero emission in a majorly agrarian community. Presently, there is no standard methodology to assign or account for the carbon status of a community. Carbon accounts, especially on material & energy use and its anticipated-transitions are derived from either 'top-down' or 'bottom-up' view on decentralization theory. To couple these two extreme approaches further involves the socio-economic factors of the community that will either push or pull such transition. Identification of the scope for a potential short, medium and long-term interventions to achieve net zero status for the community; and to quantify that to what extent does the transition to direct or derived renewable energy has on the overall carbon score of the community

PhD Supervisors

Role	Faculty	Academic Unit in IITD	Email ID
Supervisor 1	Priyanka Kaushal	CRDT	priyankak@rdat.iitd.ac.in
Supervisor 2	Prof. Rangan Banerjee	Director, IIT Delhi	rangan@admin.iitd.ac.in

Project requirements (Student qualifications, experience required, etc)

- Bachelor in Engineering or equivalent preferably in chemical/mechanical engineering or M Tech in Energy.
- Preference will be given to candidate with 1 years' work experience in the domain of energy, climate change, and community engagement.

Source of funding (IRD/FITT Project details, if any)

IRD project RP04184G

Role of Faculty Members involved:

PhD supervision and research facilitation