



### Energize Nepal Project

- Installation of SS piping for compressors systems.
- Preparation and Planning related to HSE in lab.
- Proposal writing and submission for Energize Nepal Extension Project.

### Fransed Project

- CFD analysis of Marshyandi Hydropower Project.
- PhD proposal defense by Mr. Prajwal Sapkota on 'Condition Monitoring of Hydropower Plants for Sediment Laden Waters'
- Paper publication in Wear by Mr. Saroj Gautam
- Deferred FranSed workshop (including CRHT and ATHT) due to corona outbreak
- Start of the design and CFD analysis of turbine of Lower and Middle Marsyangdi HPP
- Design of runner for Panauti HPP
- Preliminary design works for Istul Khola HPP (under new EnergizeNepal project carried out by Design Lab, KU)

### Energize Nepal RNEP-II Project (Micro Francis)

- Manufacturing Drawing has been dispatched.
- Contract has been signed with Thapa Engineering for manufacturing of Francis turbine  
Excavation for foundation of turbine has been started.

### Mai Beni Project

- Revision works submitted to client and preparation final closing meeting.

### Lab Activities

- Preparation for CRHT-X.
- Recruitment of Mr. Aashis Sedhai as intern in lab for design of Francis Turbine using Reverse Engineering.
- Interview conducted for hiring interns for IAHR and QAA related activities.
- Submission of proposal at NAST for making research foundation for pump as turbine (PAT).



### Progress of PhD and Masters Students

- Literature Review on optimization techniques for Francis Turbine. (Ram Lama).
- Paper publication in Wear Sediment erosion in low specific speed Francis turbine: A case study on effects and causes. (Saroj Gautam).
- Investigation of unsteady characteristics induced due to leakage flow in high head Francis turbine. (Saroj Gautam).
- Investigation of RSI with leakage flow and non-leakage flow for Jhimruk HPP. (Saroj Gautam).
- Acceptance of paper IAHR 2020 Conference on title "Numerical and experimental study of pump as turbine for sediment affected micro hydropower project in Nepal". (Nischal Pokharel).
- Preparation for second testing of PAT in sediment environment. (Nischal Pokharel).
- Installation of hydrocyclones and pipelines for closed loop testing is completed. (Aman Kapali).
- Fabrication of Cross flow Test rig is on progress (Aman Kapali).
- Testing procedure for quantitative measurement of erosion on blades is under development (Aman Kapali).