



Equipment Grant Recipient

MR. GANESH B. AGALAVE

Mr. Ganesh Agalave is an assistant professor and student branch advisor (SBA) of ASHRAE. He teaches courses as Refrigeration and Air-conditioning, Heat Transfer. He has been the ASRHAE SBA for over 4 years and motivate students for HVAC research. He has developed in house build HVAC lab.

TEAM MEMBERS

- Mr. Ganesh B. Agalave
- Sanket Maske, Shahbaz Mulla, Ritik Mande, Vrushabh Shah, Vaibhavsingh Pawar, Aditya, Rangrez, Samarth Pawar, Shrived Kurapati
- ASHRAE local chapter

FUNDING

ASHRAE Grant: \$4000

WIT Solapur Grant: \$3500

DURATION

12 months to design and build.

Design and Performance Evaluation of Hybrid Heat Exchanger used in Thermal Energy Storage (TES)

Walchand Institute of Technology, Solapur

OUR STORY

We as an engineering graduates always aim to serve the society with our knowledge and skills. So, we decided to work on a project with sustainable benefits towards the society. Discussions and debates in our group has brought us closer to our aim, and collectively work on a common topic of interest in thermal domain. This project in true sense has edified us to work as a team. And also to collaboratively work with the institute, organization and a professional working space.

OUR PROJECT

Our hybrid heat exchanger has a unique role to play in diverse concept of thermal energy storage system. The system mainly focuses on reducing the dependency on fossil fuels and using the renewable source of energy, like solar energy and residual heat energy from vapour compression system. The energy is stored in the form of latent heat using phase change material (PCM).

The design itself justifies its uniqueness and makes it stand out of the crowd, focusing on the design modifications and improvements has helped us to achieve its unique and first in segment features like 24/7 working and dual operating condition. The results are further evaluated using analysis software and data acquisition system which presents the real time results.

