

RMK COLLEGE OF ENGINEERING AND TECHNOLOGY RSM NAGAR, PUDUVOYAL-601206



Department of Mechanical Engineering

FUELS LAB

ABOUT THE LAB

The Department of Mechanical Engineering has constituted, the Centre for FUELS LAB and Testing to perform consultancy to the research/technical community in three parts.

EXTRACTION OF BIODIESEL

FUEL TESTING

PRODUCTION OF OIL

The FUELS LAB is equipped with bio-diesel set-up and pyrolysis set-up. The fuel can be tested to ascertain their required properties as per ASTM guidelines.

The centre is equipped with the following equipments and Componenets

Sohxlet Extractor

Biodiesel Set-up

Pyrolysis set-up

Engines with Data Acquisition



Pyrolysis is a thermochemical decomposition of organic material at elevated temperatures in the absence of oxygen .

Chemical recycling via pyrolysis process is one of the promising methods to recycle waste plastics which involve thermo chemical decomposition of organic and synthetic materials at elevated temperatures in the absence of oxygen to produce fuels.

Biodiesel refers to a vegetable oil- or animal fat-based diesel fuel consisting of long-chain alkyl (methyl, ethyl, or propyl) esters.

Sohxlet Extractor

Soxhlet extraction is used when the desired compound has a limited solubility in a solvent and the impurity is insoluble in that solvent. This method is suitable for both initial and bulk extraction. We also equipped with Redwood Viscometer and Flash and Fire Point Apparatus







BIO DIESEL - TRANESTERIFICATION





