

SYLLABUS :-

Measurement of thermal conductivity, thermal diffusivity, emissivity and absorptivity of solid and liquid foods. Flow properties of powders. Measurement of rupture angle and angle of intergranular friction of grains and powders. Food packaging material evaluation for water vapour transmission range, gas permeability (O₂, N₂ and CO₂), oil permeability, impact resistance, dry and wet strength. Particle size analysis and energy requirement in comminution. Milling of rice, wheat and pulses. Estimation of milling yield and performance characteristics of equipment used. Estimation and measurement of flow rate, power requirement and pressure developed in single screw and twin screw extruder. Homogenization of milk and measurement of size of fat globules before and after homogenization. Estimation and measurement of cutoff size of fat.