## Annexure I

Sr. No	Item Name	Specifications
1	Distillation Set-Up	1. Distillation Setup Distillation Column: Material Stainless Steel, Dia 110mm, Seven sieve trays. Pressure Gauge: Bourdon type, 0-2 kg/cm2. Rotameter: For cooling water flow rate measurement. Steam Generator: Made of Stainless Steel, provided with Pressure Gauge & Level Indicator, Safety valve & insulated with ceramic wool and cladding with Aluminium foil. Reflux Divider: Arrangement to change R/D ratio automatically. Condenser: Shell & Tube type: made of Stainless Steel. Bottom Product Tank: Made of Stainless Steel, capacity 5 Ltrs. Distillate Tank: Made of Stainless Steel, capacity 5 Ltrs. Heaters: Nichrome wire heater: Temp. Sensors: RTD PT-100 type Control panel comprises of: Digital Temp. Controller: PID Controller: 0-199.9°C, For Steam Reboiler Digital Temp. Indicator: 0-199.9°C, with multi-channel switch Reflux timer: For changing R/D ratio With Standard make on/off switch. Mains Indicator etc.
2	Evaporator Set-Up	Evaporator Setup: Evaporator (1st.) Shell Dia – 70 mm, Length - 500mm, Made of Stainless Steel Tubes ID 9.5 mm, OD 12.7 mm, Length - 500mm, Evaporator (2nd) Shell Dia – 70 mm, Length - 500mm, Made of Stainless Steel Tubes ID 9.5 mm, OD 12.7 mm, Length - 500mm, Feed Tank. Material Stainless Steel, Capacity 30 Ltrs. Flow measurement Rotameters (One each for feed & cold water), Steam Generator: Made of Stainless Steel provided with Pressure Gauge & Level Indicator, Safety valve and drain etc. & insulated with ceramic wool and cladding with Aluminium foil. Piping: Stainless Steel and PVC, size ½". Condenser: Shell & Tube type made of Stainless Steel Boltom product tank. Made of Stainless Steel, capacity 10 Ltrs. Water supply tank: Made of Stainless Steel, capacity 50 Ltrs. (for condenser) Pump; FHP capacity Heaters; Nichrome wire Heater. Control panel comprises of Digital Temp. Controller. PID Controller, 0-199.9°C. (For Steam Generator) Digital Temp. Indicator: 0-199.9°C, with multi-channel switch. Temp. Sensors. RTD PT-100 type-8Nos. With Standard make On/Off switch. Mains Indicator etc.
3	Crystallizers Set-Up	Batch Crystallizer Crystallizer Jacketed Type, Material Stainless Steel, Cap 2 Ltrs With conical bottom Stirrer FHP, Variable Speed Heater Nichrome wire heater Cooling Water Tank Material Stainless Steel, Capacity 30 litre fitted with Pump Flow measurement By Rotameter for cooling water. Pump FHP, Receiving Tank Material Stainless Steel, Capacity 2 litre with SS sieve Temp Sensors: RTD PT-100 type Control panel comprises of Digital Temp Indicator 0-199 9°C with multi-channel switch With Standard make on/off switch, Mains Indicator etc.
4	Dryers Set- Up	Rolary Dryer Drying Shell Material Stainless Steel Length 1.5 m, Dia 110 mm. Feed Hopper Material Stainless Steel Compatible Capacity Product Receiver Material Stainless Steel Compatible Capacity Rotating Action Using motor coupled with a Reduction Gear Box, Hot Air Circulation By forced draft fan Arrangement is done to vary the air flow rate. Heating

Chamber: Compatible capacity Heater: Nichrome wire heater Temperature Sensors: RTD PT-100 type. Control panel comprises of: Digital Temp. Controller: PID Controller: 0-199.9°C (For Hot Air)