## सीएसआईआर—उत्तरपूर्वविज्ञानएवंप्रोद्योगिकीसंस्थान, जोरहाट - 785006 असम,भारत

## CSIR - NORTH-EAST INSTITUTE OF SCIENCE AND TECHNOLOGY, JORHAT (ASSAM), INDIA

This is to inform that there is a change in quantity, in Sl. No. 1, in the tender for "Supply and Installation of Rotary Evaporator with Vacuum Pump, Solvent Recovery Unit and Chiller" having Tender ID "2020\_CSIR\_44349\_1". The same may be read as:

Sl.No.	Detailed specification of the stores		Quantity  02 Set	
1	Technical data of rotary evaporator including water bath			
	>	Lift and Display configuration:	Motor lift with LCD display	
	>	Heating Capacity:	1300 W or better	
	>	Type of cooling:	Vertical double spiral glass coil plastic coated	
	>	Cooling/condensing surface:1300 [cm <sup>2</sup> ] or higher		
	>	Speed range [rpm]:	20 - 280 or better	
	>	Heating temperature range: accuracy	Ambient to 180 °C (or higher) with $\pm 1 \text{K}/\pm 1$ °C	
	>	Heating bath volume:	4 L or higher	
	>	Diameter heating bath:	240 mm or higher	
	>	Bath material: Materi	al of construction of heating bath should	
	be SS/Aluminium/Electro-polished/ Teflon coated			
	>	Bath temperature display:	Digital display	
	>	Voltage [V]:	230/50Hz or better	
	>	Rotation speed setting/display:	Setting by dial/Digital display	
	>	Vacuum seal:	PTFE	
	>	Receiving Flask:	1 L or more round style	
	>	Minimum two number of spare vacuum seal/gasket for rotary should be provided		
	Technical data of pump			

Diaphragm-pump made of chemical resistant material and automatic vacuum control

Suction capacity: 1.3 m<sup>3</sup>/h or higher

➤ Ultimate suction Pressure: 5.0±2 mbar

Digital vacuum controller: Required

Supply voltage: 230/50 Hz

## **Technical data of chiller**

➤ Ideal chiller for bench top rotary evaporator having LCD/LED display

➤ Temp. Range: -10 °C (or less) to ambient temperature

 $\triangleright$  Temperature stability:  $\pm 0.5$ °C or better

➤ Cooling capacity: 300 watts or higher at 20 °C or comparable

Liquid capacity: 3 L or more

➤ All accessory inlet and outlet pipes with heat/cold insulation covering materials should be supplied.

## **Technical data of solvent recovery setup**

- A low temperature solvent recovery unit/trap need to be provided so that any solvent vapour released from rotavapour outlet does not enter the pump
- Condensation method should trap any range of organic and inorganic solvents.
- ➤ Collection volume minimum 500 mL and Waste liquid collection chamber should be reusable for multiple times
- The recovery unit should be independent of the rotavapor.

Note: The instrument should have ---

- Minimum 3 (Three) years warranty
- Rotavapor, pump and chiller should be from same manufacturer
- All electrical connections and plugs for rotavapor, chiller, recovery unit and pump need to be provided.