



Running Contract Details	
Equipment Name	Modular Cold chamber (Model B)
Running Contract Valid Till	25-10-2024
Tender Ref No	KMSCL/EP/T450/799B/2022
Tendered Quantity	20
Supplier Name	M/s ECO COOLING SOLUTIONS
GST No	32AOYPA3495F1ZS
Installation & Delivery Period	10 Week(s)
Up-time / PM vist	95% & 4 Visits per year
Warranty period	3 Years

Supplier`s Details		
Address	Contact Details	
10/646F 1st FLOOR MAROTTIKKALS AMINA TOWER MANJUMMEL P O COCHIN-683501	Contact Person	ANOOP V
	Phone	
	Mobile No	9846509954
	Email	anoop@ecoairconditions.com

Item-wise Price Details				
#	Item Details	Unit Rate (Incl.all taxes & charges)	Service Charges (Through KMSCL)	Grand Total
1	Four body unit for storage of cadavers	609255.24 Incl.GST :18%	42647.87	651903.11
2	Two body unit for staorge of cadavers	421378 Incl.GST :18%	29496.46	450874.46
3	Cost of dismantlting of existing mortury unit	19470 Incl.GST :18%	1362.9	20832.9
4	Cost of new concrete platform as per specifications for 6 body mortury cabinet	21240 Incl.GST :18%	1486.8	22726.8
5	Cost of new concrete platform as per specifications for 4 body mortury cabinet	16520 Incl.GST :18%	1156.4	17676.4
6	Rate/ one meter for the suitable drain pipe for mortury cabinet	472 Incl.GST :18%	33.04	505.04

Item-wise Price Details							
7	Cost of suitable exhaust fan including the fixing charges			12390 Incl.GST :18%	867.3	13257.3	
8	Standby compressor for six body			82364 Incl.GST :18%	5765.48	88129.48	
9	Cost of new concrete platform as per specifications for 2 body mortuary cabinet			14160 Incl.GST :18%	991.2	15151.2	
10	Air conditioning of the mortuary room (3 star Airconditioner, inverter type 2 ton with suitable stabilizer and should also include the installation charges)			70800.64 Incl.GST :28%	4568.85	75369.49	
11	Six body mortuary cabinet for storage of cadavers			811733.8 Incl.GST :18%	56821.37	868555.17	
				2079783.68	145197.67	2224981.35	
Annual / Comprehensive Maintenance Charges (Exl.Tax)							
Rate	4 th Year	5 th Year	6 th Year	7 th Year	8 th Year	9 th Year	10 th Year
Four body unit for storage of cadavers							
AMC	11,880.00	13,068.00	14,374.00	15,812.00	17,393.00	19,132.00	21,046.00
CAMC							
Two body unit for staorge of cadavers							
AMC	6,500.00	7,475.00	8,596.00	9,885.00	11,368.00	13,073.00	15,034.00
CAMC	12,650.00	14,547.00	16,729.00	19,239.00	22,124.00	25,443.00	29,260.00
Six body mortuary cabinet for storage of cadavers							
AMC	13,860.00	15,246.00	16,770.00	18,447.00	20,292.00	22,321.00	24,553.00
CAMC	24,200.00	26,620.00	29,282.00	32,210.00	35,431.00	38,974.00	42,871.00

Other terms & conditions

1. The supplier shall execute an agreement with the purchaser as per tender conditions (agreement format is given in the tender document).
2. The supplier shall submit performance security amounting to 5.00% of the value of the supply order.
3. The labour & comprehensive charges of equipment after the completion of warranty period is finalized by KMSCL as mentioned above.
4. Since discount rate is not applicable for equipment under Running Contract of KMSCL, purchase/supply order can be issued directly to supplier at the given rate with tax & other charges (exclusive of KMSCL service charges).
5. If purchase/supply order is issued directly to the supplier, KMSCL service charge need not be paid. But the copy of the said order may be forwarded to KMSCL for information.

Technical Specification

Equipment :Modular Cold chamber (Model B)

1. Purpose:

a. Mortuary units are specialized units designed for long storage of cadavers

2. Used by:

a. In hospitals for the storage of cadavers

3. Technical Charecteristics

1. Shall consist of three separate mortuary units of the following specifications and rate shall be quoted seprateley.

a. A six-body mortuary cabinet for storage of cadavers.

b. A four-body unit for storage of cadavers

c. A two-body unit exclusively for keeping decomposed bodies

2. Each unit shall have their individual, single cooling system to ensure the requisite temperature

3. All the units shall have a proper design ensuring best hygiene

4. All units shall be highly energy efficient

5. All units shall have a double wall with the gaps to be filled with high grade polyurethane insulation ensuring maximum thermal efficiency.

6. The puff used shall have a density of at least 40kg/m³

7. The external and internal body of the mortuary units shall be corrosion free

8. The inner and outer walls shall be made of SS-304 grade sheets

9. The doors of the unit shall also be made of stainless steel.

10. The doors shall be connected by sturdy heavy-duty chrome plate hinges and fitted with hard chrome plated lubricated latches for opening the door.

11. The doors shall have a heated perimeter to eliminate surface condensation

12. There shall be Individual standard key lock for each chamber

13. All the doors to be fitted with high quality triple point neoprene rubber gaskets for air tight fittings and lock.

14. The units shall have washable interiors with channel for water outlet that can be plugged with rodent resistant material.

15. The units shall have a water proof CFL lamp inside

16. The body trays used shall have telescopic sturdy castors and castor locks to prevent rolling out of the trays

17. The trays shall also be made of SS-304.
18. The units shall have a Microprocessor based temperature control.
19. The temperature range of the units shall be +2 to +8°C
20. The units shall have a digital LED display indicating the temperature of the unit.
21. There shall be audio-visual alarms in case of low/high temperatures, system malfunctions etc. An external temperature display and hooter outside the mortuary room shall be provided
22. The units shall have a touchpad for adjusting temperature and alarm settings.
23. The cooling units used shall be ISI certified high end ultra-mute CFC-free hermetically sealed compressors, conforming to latest international standards and guidelines.
24. The condenser units shall have an evaporating system so as to avoid condensation and formation of ice. The components of the refrigeration unit shall be suitably placed outside the chamber. There shall be no serviceable components inside the chamber.
25. Shall have a forced air circulation system
26. Shall have an automatic defrosting system

1. Dimensions (metric):

- 6 body: The dimensions each unit shall not exceed W 3200 x D 2410 x H 2400.
- 4 body: The dimensions each unit shall not exceed W 2120 x D 2410 x H 2400.
- 2 body: The dimensions each unit shall not exceed W 1200 x D 2410 x H 2400.

The units shall be suitable arranged to occupy the existing space in the available mortuary

5 Noise

- a. Each individual unit shall have a noise level less than 60dB

6 Heat Dissipation

- a. Should maintain nominal Temp and the heat should be disbursed through an cooling mechanism

7 Power Requirements:

1. Shall work on single phase 220-230V AC, 50-60 Hz
2. Shall be supplied with a voltage stabilizer of suitable rating for each unit/entire assembly

8 Protection:

1. Shall have resettable overcurrent breakers of suitable rating for electrical protection

9 Power consumption:

1. The power consumption of the entire unit shall be less than 1.8kW

10 Accessories & Spares: -

1. List of standard accessories and spares to be supplied along with the unit shall be detailed
2. A voltage stabilizer of suitable rating for individual units or for the entire unit

11 Certifications: -

1. Manufacturer should have ISO 45001:2018 certification with reference to manufacturing of air conditioning and refrigeration products

12 Warranty: -

1. Shall be provided with a comprehensive warranty of three years inclusive of all accessories supplied along with the unit which shall include the voltage stabilizer
2. The compressors shall have a replacement warranty of at least three years.

13 Service contract clauses, including prices: -

1. Any Contract (AMC/CMC/add-hoc) to be declared by the manufacturer for period of 7 years post warranty.

14 Operating manuals, service manuals, other manuals: -

1. User, technical and maintenance manuals to be supplied in English language along with machine diagrams.
2. List of equipment and procedures required for local calibration and routine maintenance;
3. Service and operation manuals (original, copy and a soft copy of the manual in pdf format)to be provided;

15 Other accompanying documents: -

1. Certificate of calibration to be provided.
2. List of essential spares and accessories, with their part numbers and cost

16 Service Support Contact details (Hierarchy Wise; including a toll free/ landline number): -

17 Recommendations or warnings: -

1. Any recommendations for best use and supplementary warning for safety should be declared

18 Others

1. The cost of installing a standby compressor for the six-body unit shall be quoted as optional.
2. The cost of air-conditioning the Mortuary room shall also be quoted as optional.

19 Turnkey

1. The existing mortuary unit in the hospital shall be dismantled and the components shall be handed over to the hospital authorities. The rate shall be quoted separately.
2. A concrete platform of suitable dimension shall be constructed for the placement of the new cabinets. The rate shall be quoted separately for concrete platforms of 2 body , 4 body and 6 body mortuaries.
3. The required power supply shall be provided at a single point in the user institution. The tenderer should provide the necessary power cables to connect the machine from the power supply terminated at a point by the institution. All cabling and wiring shall be done

as per standards and in consultation with the user department..

4. The drain of the individual units shall be routed through a central drain pipe to the outside of the room. The rate/ meter for the suitable pipe shall be quoted separately.

5. Exhaust fans shall be provided in the room to suck out the heat generated by the cooling units so as maintain the requisite ambient temperature. The rate for one exhaust fan and its fixing charges shall be quoted separately.