DEPARTMENT OF CHEMICAL ENGINEERING

INDIAN INSTITUTE OF TECHNOLOGY - DELHI

HAUZ KHAS, NEW DELHI - 110016

NOTICE INVITING QUOTATION (NIQ)

Sub: Floor model Ultracentrifuge

Sealed quotations in separate envelops of technical and commercial bid kept in <u>a one sealed outer envelop</u> are invited for purchase of a Floor model Ultracentrifuge as per specifications given below. Your sealed quotation should reach latest by 5 PM on **28.11.2011** to **Prof. S. Basu, Department of Chemical engineering, Indian Institute of Technology – Delhi (IIT Delhi), Hauz Khas, New Delhi - 110016**. Your quotation should be superscribed "Quotation for <u>Floor model Ultracentrifuge</u> due on <u>28.11.2011</u>

Minimum Specification: Floor model Ultracentrifuge

The Ultracentrifuge must have the following specifications:

- Should have maximum speed (rpm) of 100,000 or above
- Maximum RCF (x g) **7,50,000 or above**
- Maximum capacity 180 ml or above.
- Speed accuracy: ±50 **Rpm**
- Setting of RCF and RPM mode
- LCD panel and direct entry keyboard to provide real time control of operational parameters.
- Should have facility to automatically calculate and displays rotor data, programmed operation parameters and detailed error message.
- Powerful Imbalance protection for protection of rotor and shaft
- Acceleration/Deceleration profile: 9/10 or higher
- Rotor Temperature Control range (°C): 0 to +40
- Rotor cooling method-Thermo-module cooling system(HCF, CFC free)
- Timer: minimum One minute to 24 hrs., with a HOLD function ,with Real time control function
- Operation Noise(dBA) : <57dBA
- Powerful vacuum pump-Oil diffusion pump to reduce the time to half by optimized control

- **Should operate on Power** : single phase, AC 220/230/240 V ±10%, 30A,50Hz
- Standard accessories: instruction, manual, rotor cleaning bar, silicone grease

Rotors:

1. Fixed angle rotor for Ultracentrifuge, 8 x (12 – 14ml), Max. 58,000(rpm) or above Max. RCF 289,500 X g or above.

Terms & Conditions:

- 1. The quotations must have validity of at least three months.
- 2. Quotation must indicate the price as 'FOB' as well as 'CIF', New Delhi
- 3. The products will be used for educational purposes and research only. Any applicable academic institutional discounts should be stated clearly in the commercial bid.
- 4. Detailed Brochures should be accompanied in the technical bid.
- 5. If the bidder is an authorized dealer then the authorized Indian dealership certificate from the principles should be enclosed.
- 6. IEC certificate from the Ministry of Commerce may be enclosed along with the quotation in favour of Indian agent.
- 7. Minimum 3 years warranty required(preference will be given if additional warranty period provided)
- 8. Payment will be through irrevocable letter of Credit.
- 9. In case the items are proprietary products of the company, a "Proprietary item certificate" stating the same must be provided with the technical bid.
- 10. Training and installation should be provided free of cost at site.
- 11. List of end users should be provided.
- 12. Institute reserves the right to accept or reject any or all the quotations without assigning any reasons thereof.