Technical and price bids are invited for the purchase of a UV-VIS Spectrophotometer as per minimum specifications, terms and conditions given below.

Minimum Specifications for UV-VIS Spectrophotometer

- Double beam microprocessor based UV-VIS spectrophotometer
- In built high resolution LCD display
- Complete control through PC with standard software as well as kinetics software
- All operational modes as standard Photometric; Spectrum; Quantitation; Kinetics, Time Scan, DNA and Protein Quantitation in stand-alone and PC mode. Additionally multi-component measurement should be available in stand-alone mode.
- Minimum 4 USB ports for high speed PC and printer connectivity, data storage and transfer through USB pen drive
- Detailed print-out of test results --Test results printout with spectra and time course data after completion of the test items.
- Data should be read with commercial spreadsheet software.
- True double beam optics with aberration corrected concave blazed holographic grating for high quality monochromatic light
- Dual source high intensity Tungsten-Halogen and Deuterium lamp with automatic changeover
- High sensitivity matched pair Silicon Photodiode detector
- Wavelength range of 1,100 nm to 190 nm
- Spectral bandwidth of better than 1 nm over the complete range of 190 to 1,100 nm with compliance of high resolution with standard test of 0.02% v/v Toluene in Hexane.
- High stray light specification.
- Wavelength accuracy and reproducibility of  $\pm 0.1$  nm
- Variable wavelength scanning speed of 3,000 nm/min to 2 nm/min
- Wide Photometric range of -4 to +4 Abs and 0 to 400 % T
- High Photometric Accuracy of  $\pm 0.002$  Abs at 0.5 Abs
- Very low baseline drift of 0.0003 Abs/hour
- High baseline flatness of  $\pm 0.0006$  Abs over entire wavelength
- Ultra low Photometric noise of <0.00005 Abs
- Large sample compartment compatible with wide range of accessories
- Compact design with small footprint
- Thermoelectrically Temperature-Controlled Cell Holder
- Peltier based control for the sample and reference temperature.
- One cell each on sample & reference should be temperature controlled.
- Temperature range : 7 to 60 °C

- Temp. display accuracy (diff. from the true value) :  $\pm 0.5$  °C
- Temp. control precision (variation of temperature) :  $\pm 0.1$  °C
- Should not require any external water circulator OR chiller
- A pair of quartz cuvette of 10 mm path length, 3.5 ml volume
- A pair of quartz cuvette of 10 mm path length, 1.0 ml volume
- Branded Desktop PC with Monochrome LaserJet Printer and 1 KVA On Line UPS with 30 minutes back up.

## **Optional**

• 1 spare high intensity Tungsten-Halogen and Deuterium lamp each

## Terms & Conditions:

1. The quotations must have validity of at least three months.

2. Quotation must include insurance and air-freight charges, delivery period of the items addresses to The Indian Institute of Technology, Delhi, India(CIF, New Delhi).

3. The products will be used for educational purposes. Any applicable academic institution discounts should be offered and stated.

4. Detailed colour printed original brochure from the principles should accompany the offer.

5. If the bidder is an authorized dealer then the authorized Indian dealership certificate from the principles should be enclosed, clearly stating the validity.

- 6. Warranty details must be given.
- 7. Payment will be through irrevocable letter of Credit.

8. In case the items are proprietary products of the company, a proprietary item certificate stating the same must be provided.

9. Training should be provided.

10. Institute reserves the right to accept or reject any or all the quotations without assigning reasons thereof.

11. List of users should be provided with their email and phone nos. for verification (preferably IIT users).

The technical and price bids should be kept in separate sealed cover marked as "technical" and "price bids" on the top of the envelopes. Both the envelopes should be kept inside a bigger envelope marked as **Bids for UV-VIS Spectrophotometer**. The bids should be sent to Prof. S.K.Khare, Chemistry Dept. IIT Delhi, Hauz-Khas, New Delhi-110016 latest by Aug 25, 2014, 5.00 PM.