# Global Tender Notification for the Purchase of A Double Beam UV-Vis Spectrophotometer

## Summary

1.	Tender Number	OC/UM/2021/UV-Vis_Global
2.	Tender Date	2 <sup>nd</sup> June 2021
3.	Item Description	Double beam UV-VIS Spectrophotometer
4.	Tender Type	Two bid system:  (a) Technical Bid (Part A)  (b) Commercial Bid (Part B)
5.	Place of tender submission	Department Office, room 44 Department of Organic Chemistry Indian Institute of Sciences, Bengaluru 560012
6.	Last Date & Time for submission of tender	23 <sup>rd</sup> June 2021, 5:00 PM

#### To whom it may concern

This is a Global Tender Notification for procurement of **Double beam UV-VIS Spectrophotometer** at the Department of Organic Chemistry (OC), Indian Institute of Science, Bangalore.

All interested vendors shall submit a response demonstrating their capabilities to produce the requested equipment to the primary point of contact listed below.

The deadline for submission of proposals is 23<sup>rd</sup> June, 2021 by 5:00 PM. Proposals should arrive at the Department office, room 44, Department of Organic Chemistry, Indian Institute of Science, Bangalore, Karnataka 560012, India.

Direct all questions concerning the acquisition to Prof. Uday Maitra by email only at: maitra@iisc.ac.in

#### **General Terms and Conditions**

- 1. The bid should be submitted in the two-cover system, i.e. technical bid and commercial bid separately in sealed covers. The technical bid should contain all commercial terms and conditions, except the price. The bids should be valid for at least 90 days from the last date of submission of the quotation.
- 2. The technical bid must contain a point-by-point technical compliance document. The technical proposal should contain a compliance table that should describe your compliance in a "yes" or "no" response against each of the items in the table listed in this RFQ. If the response is "no", the second column should state the extent of deviation. The third column should state the reason for the deviation, if any. The fourth column can be used to compare your tool with that of your competitors or provide details as requested in the technical requirement table below.
- 3. The commercial bid must include the price of the instrument (CIF, Bangalore, applicable Custom Duty will be borne by the Institute) and all components including controller accessories indicating component-wise and itemized breakup. Provide certificates for country origin of manufacturing for each line items. Price of every line item in the commercial bid should be quoted along with the total quoted price for the instrument to be operational (installed and ready to use) in our facility.
- 4. The vendor should have qualified technical service personnel for the equipment based in India (preferably in Bangalore).
- 5. The lead time for the delivery of the equipment should not be more than 3 months from the date of receipt of our purchase order. It should be clearly mentioned in the technical and commercial bids.
- 6. All the quotations must be valid for at least 90 days from the last date of tender submission.
- 7. List of customers and references: The Bidder should have supplied similar equipment in Central Universities preferably in centrally Funded Technical Institutes (IITs, IISC, IISER, NIT). Please provide the details and contact information.
- 8. The Bidder must not be blacklisted/banned/suspended or have a record of any service-related dispute with any organization in India or elsewhere. A declaration to this effect should be provided.

- 9. Items in addition to that listed in the technical table that you would like to bring to our attention, such as data sheets, technical plots etc. can be listed at the end of the compliance table.
- 10. Vendors are encouraged to highlight the advantage of their tools over comparable tools from the competitors.
- 11. Mode of Shipment: the equipment must be shipped via air only, insured and transported to the installation site at IISc by the supplier.
- 12. If needed, a meeting for any technical clarifications can be scheduled with the undersigned by sending an email.
- 13. Warranty terms and additional warranty options is a must for all the components. Please specify the service plan like whether the local distributor will address the issue or the parent company.
- 14. Terms and conditions for the annual maintenance contract beyond the warranty period should be mentioned.
- 15. After the award of purchase order, the vendor must provide an Order Acknowledgement within 30 days from the receipt of the Purchase Order.
- 16. Tender documents that do not satisfy the "Terms and Conditions" listed herein will be disqualified.
- 17. The Institute reserves the right to accept or reject any bid, or to annul the bidding process and reject all bids, at any time prior to the award of contract without thereby incurring any liability of the affected bidder or bidders.

Technical requirements: Please note that the requirements listed below are only guidelines. Vendors are requested to quote for equipment that meet the criteria to the best extent possible and list deviations, if any. Deviations are NOT an automatic reason for disqualification. They will be discussed by a technical group prior to making an informed decision.

# Double Beam UV-Visible Spectrophotometer – technical specifications

Items	Specifications
Optics	Dual beam single monochromator (give option for double monochromator, if available)
Wavelength Range	185 to 800/900 nm with option of increase to 1400 nm with integrating sphere
Spectral Bandwidth	0.1-5 nm
Stray light	Less than 0.001% (220 nm NaI, 370 nm NaNO <sub>2</sub> )
Wavelength accuracy	±0.1 nm
Wavelength Repeatability	±0.01 nm
Scan Speed	0.5-4000 nm/min
Photometric Range	-5 to +5 Abs.
Photometric Accuracy	Less than 0.005 Abs (1.0 Abs)
Light Source(s)	Tungsten-Halogen and Deuterium Lamps
Noise level	Less than 0.00005 (500 nm)
Baseline Stability	Less than 0.0005 Abs/hr
Lamp interchange wavelength increment	Less than 0.1 nm
Detector	Industry standard PMT detector
Thermoelectric temperature control (appropriate cooling system/circulator to be included)	0 – 110°C with stirrer
Operating temperature/humidity	15-35°C/35-80% relative humidity (non-condensing)
Branded Fast Computer with 22" monitor Film holder attachment	Specify the brand(s) for the PC/Monitor. The PC should be able to fully control the system.  Specify sample size minimum/maximum
Integrating sphere	Angle of incidence of light: 0 to 8 degree Wavelength range 220- 1400 nm
Powder, Film and Liquid sample holder for integrating sphere	Standard (specify details)
Software	<ul> <li>Real-time display of measurement with parameters</li> <li>Adjust graph scale or use auto-scale</li> <li>Automatically analyze data after measurements (specify capabilities)</li> <li>Overlay spectral waveforms</li> <li>Conversion (smoothing, differentiation, etc.)</li> <li>Loadable on another PC for data processing</li> </ul>
10 mm path length quartz cells with stopper	Two matched pairs, one pair about 3 mL and the second pair < 1 mL capacity

Connectors/essential accessories	All cables and connectors to be provided for full
	operation of the system.
Multi cell holder	(give as option when available)
Additional warranty, AMC (give as	2 years and 2+2 years extended warranty (list
option)	separately)

## Other requirements:

1.	Compatible operating system(s) for the interface software should be specified. Suitable software drivers available should be specified.
2.	Please include other options currently available which can be added on in the future.
3.	Installation and Training: Should be provided free of cost.
4.	The cost of shipping to IISc should be included.
5.	List of acceptance tests for on-site (vendor) inspection and after installation at IISc.
6.	A set of basic experiments for performing routine checks of acceptable operation with clear instructions to be provided. A standard sample for checking the absorbance should be provided.
7.	The payment terms will be specified in the commercial proposal which should be consistent with IISc's domestic purchase policies.
8.	Please provide details of the number of trained personnel in India, number in southern region or in Bangalore who can service the instrument.

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