

REF: PH/PSA/17/2017-18

Date: 12<sup>th</sup> February 2018

Dear Sir,

Kindly send a quote for the following item on CIP Bangalore basis. Your quotation should clearly indicate the terms of delivery, delivery schedule, payment terms etc. The tender should be submitted in two separate sealed envelopes - one containing the technical bid and the other containing the commercial bid, both of which should reach us, duly signed on or before 1700 hours, 2<sup>nd</sup> March 2018.

**Please enclose a compliance certificate along with the technical bid.**

Yours Sincerely,

P S Anil Kumar

Department of Physics

### **Specifications for Optical Table**

Optical table system with active vibration isolation for optical experiments:

Specifications for Table Top:

Dimension: Length X Width X Height – 2400X1500X240 mm; Mention about the load capacity of the table top;

M6 threaded holes (sealed holes) with 25 mm grid pattern;

Honeycomb structure with very good damping arrangement (Please mention about the structure and damping arrangement);

Stainless Steel top and bottom skins with at least 4.8 mm thickness and surface flatness of at least  $\pm 0.1$  mm or better over 500X500 mm area or better. This is very important for optical alignment. Preference will be given to the table top which has large surface area flatness;

Other parameter: deflection under load  $< 1.5 \times 10^{-3}$  mm, relative motion  $< 3.0 \times 10^{-7}$  mm, Dynamic deflection coefficient  $< 1 \times 10^{-3}$  and provide other necessary parameters;

Specifications for Isolator legs:

Give information about the height and load capacity of the legs. We expect a minimum load capacity of 600 kg per leg; height adjustment of atleast 25 mm;

Settling time should be better than 2 sec (Preference will be given for shorter settling time);

Releveling accuracy : better than  $\pm 0.5$  mm

Horizontal damping preferably by oil

Horizontal Isolation: 5 Hz  $\geq$  85%; 10 Hz  $\geq$  95%; Horizontal Isolation Resonance  $\leq$  1.5 Hz;

Vertical Isolation: 5 Hz  $\geq$  90%; 10 Hz  $\geq$  95%; Vertical Isolation Resonance  $\leq$  1.0 Hz;

Horizontal and Vertical amplification at resonance: better than or equal to 10 dB;

Mention about other facilities and features with the isolators.

Compressor: Supply air compressor with suitable specifications for this optical table. Operating noise should be very less (Preference will be given for less noise compressor). Mention about the accessories which will be part of the compressor.