



**OPEN NOTICE:- 22 (2025-26)**

Subject: Purchase of Chlorophyll Meter (Make: Apogee Instruments Inc. USA, Model MC-100), Patent No. US 9733179 B1, for Department of Environmental Science & Technology on Proprietary/Nomination basis – Inviting comments reg.

An indent has been received from Department of Environmental Science & Technology, Central University of Punjab, Bathinda for procurement of Chlorophyll Meter Make: Apogee Instruments on proprietary/nomination basis through Green Spectrum Technology Pvt. Ltd.

S.No.	Patent No.	Description	Qty.
1.	US 9733179 B1	<p>Chlorophyll Meter (Make: Apogee Instruments, Model MC-100)</p> <ul style="list-style-type: none"> <li>• Portable &amp; designed to use in the field for In-Situ measurement of Chlorophyll Concentration</li> <li>• Patented instrument, non-destructive measurement of <b>chlorophyll concentration</b> (Patent US 9733179)</li> <li>• Should be able to measure Chlorophyll Concentration (<b>not index</b>)</li> <li>• Display output Unit/measurement unit: <math>\mu\text{mol}</math> of chlorophyll per <math>\text{m}^2</math> of leaf surface</li> <li>• Resolution: <math>\pm 10 \mu\text{mol m}^{-2}</math></li> <li>• Repeatability: <math>\pm 1\%</math></li> <li>• Measurement Area: <math>\geq 5\text{mm}</math> diameter (suitable for small leaf area) or better</li> <li>• Sample acquisition time: <math>&lt; 3</math> seconds</li> <li>• Temperature Range: <math>0 \text{ deg C} - 50 \text{ deg C}</math></li> <li>• Measurement System: Reflectance of 653 nm to 931 nm light equivalent or better</li> <li>• Storage capacity: 8 MB for up to 160000 data measurements; 94000 data measurements for GPS data entries</li> <li>• Data logger memory: 100,000 or better</li> <li>• <b>Inbuilt GPS</b> for field data to be geo-referenced and stored</li> <li>• <b>PAR- FAR sensor with logger</b> for light applications</li> <li>• System should have inbuilt battery and display.</li> <li>• Temperature drift minimized by fully temperature compensated source and detector circuitry</li> <li>• Accessories: Data downloading cable, Adapter/Ring for small leaf Area, Battery, carry case</li> </ul>	01

Departmental PAC certifications and others related documents are attached herewith.

The above document are being uploaded for open information and to invite objections, comments/offers if any, from any manufacturer/ supplier firm regarding proprietary nature of the item and availability of above equipment with required specifications within 10 days from the date of issuance of this notice giving Reference No. D-6, 21/11/2025. Objections/ Comments should reach Office of the Stores & Purchase Branch, Central University of Punjab, V.P.O- Ghudda, District Bathinda – 151 401 by post or through email [procurement@cup.edu.in](mailto:procurement@cup.edu.in) on or before 21.12.2025, failing which it will be presumed that no firm has any objection/ comment to the above offer and case will be decided on merits as per rules.

*M. Anil Kumar*  
11/12/25  
प्रभारी भंडार एवं क्रय शाखा)

I/c Stores & Purchase Branch  
(For and On behalf of Central University of Punjab)

Enclosure:

1. PAC Certificates
2. Detailed Specification