Department of Electrical Engineering

Enquiry No.: EE/AM/2017-18/NRDE

Opening Date: January 18, 2018 Closing Date: February 12, 2018

Sub.: Purchase of Numerical Relay Development Environment (NRDE)

We are interested in the purchase of a hardware simulator named Numerical Relay Development Environment (NRDE) for real time testing and implementation of any numeric protective relay algorithm. NRDE should be able to use software simulated data as relay inputs. It should also be to able to simulate data captured by other relays and disturbance recorders and work in HIL mode with any real time simulator such as RTDS. The following features are desirable

- 8 Analog Input Channels configurable as voltage and current channels
- 4 Digital Binary programmable I / O Channels
- 4 Relay based potential free programmable Outputs
- 4 LED based programmable indicators
- 3 Inbuilt Keys programmable
- In system hard reset option
- Programmable RS 232 communication port
- Programmable display through 4 X 20 LCD
- Power Supply Included
- DAC Setup for Lab based simulation
- Analysis Software Package
- CT PT Card for Real Scenario implementation
- Packaged Software Library with IDE (Downloadable)
- External dedicated ADC

Please send your **Sealed Quotation** inscribed with '<u>Quotation for NRDE</u>' to the undersigned for the same. The quoted price should be FOR Indian Institute of Technology Kanpur (IITK), India.

Note:

- 1. Your quotation shall contain a proprietary certificate from the manufacturer.
- 2. All quotations must reach the undersigned on or before 1700 hours (Indian Standard Time) of February 12, 2018.
- 3. Quotation must be valid for 90 days.
- 4. Delivery period should not be more than 10 weeks.
- 5. Send complete detail of the product.
- 6. Payments terms: 100% after successful installation.
- 7. IITK is exempted from excise/custom duty.

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