Universal Recorder

- Excellent **real-time digital filter characteristics**
- Minimum 24 channel, expandable to 32 channel with one wire synchronous
- Control and Communication Interfaces: 1 No. Standard RS-232, 9 Pin D; 2 Nos. 1000/100 Base –T Ethernet interface with Cat-5 cables, USB 2.0. port
- Automatic detection, calibration and synchronization with different sensors
- Input impedance – very high (10MΩ minimum)
- Input Range: ± 10 Volts, with programmable gains
- Sampling rate: minimum 25000 samples per sec, per channel
- Controller with inbuilt with CPU
- The operating software compatible with windows 7, 8 and 10 for operation, control, data processing, output and graphical configuration
- Power Supply 10 to 36 VDC, 33 VDC., DC power supply or AC adapter (Optional accessory)
- Input frequency 47 – 60 Hz
- Cooling: Filtered/Forced cooling should be provided for cooling the chassis.
- overvoltage Protection: -40 to 55V
- Resolution: 18 bit minimum
- Excitation outputs: Minimum one per channel, 0-10V DC Independently programmable
- All channels synchronous 10 kHz high-speed sampling
- Should have normal and dual sampling mode

Acquisition channels

- Conditioning cards for measuring LVDT, strain, voltage, Piezo electric acceleration, CAN signal and compatible with data acquisition system
- All channels synchronous sampling minimum 1 Hz to 100 kHz
Data Recording

- CF cards, 128 MB to 16 GB
- Maximum data file size, 4GB for 1-time measurement and 1GB for repetitive measurement for 2 times or more

Display Channel status display LED:

- Interfaces: USB (USB2.0 High Speed), Connector configuration, LAN (10/100BASE-T) 2 port, Connector configuration: RJ45 modular jack
- Synchronous Operation - With synchronization cable connection,
- Setting Conditions: Online: From the PC via LAN or USB port, Offline: By reading from the CF card which has measuring conditions

Measuring Modes: Manual measurement/trigger measurement/interval measurement

- Data collection through online using PC or offline
- Dynamic data acquisition software, Instruction manual
- The software should have proper standard operating procedures having capability to read, record, store and analyze connected instruments experimental test data’s.
- The software can able to produce graphical illustration on the stored results after experiments. Also, the software should be compatible with windows XP, Vista windows 7, 8 and other windows higher version

The system should be compatible to following sensors

- Waterproof acceleration transducers - ±5 G
- Small size pore pressure transducer – capacity 200 kPa
- Strain gages
- LVDT, Miniature Earth pressure cells

Others

1. 1 year comprehensive warranty.
2. Installation, Training and demonstration should be provided by the distributor/registered supplier/manufacturer at CSIR-CBRI Roorkee.