



**NATIONAL INSTITUTE OF TECHNOLOGY**

**ROURKELA-769008 (ODISHA)**

An Institute of National Importance under Ministry of HRD, GOI

## **NOTICE INVITING TENDER**

**Tender Notification No: NITR/PW/EC/2018/33**

**Dated: 19/06/2018**

The National Institute of Technology, Rourkela invites bids from the eligible bidders for procurement of **experiment board and testing – measurement equipment for IOT Lab** at NIT Rourkela.

**Last date of Submission of Bid : 10/07/2018 at 11:00 AM**

**Opening date of Technical Bid : 11/07/2018 at 11:00 AM**

**For Details:** [http://nitrkl.ac.in/OldWebsite/Jobs\\_Tenders/9Equipment/Default.aspx](http://nitrkl.ac.in/OldWebsite/Jobs_Tenders/9Equipment/Default.aspx)

**Contact:** Prof. D.P.Acharya (EC Dept); Ph. No: 0661-2462463;

Email: [dpacharya@nitrkl.ac.in](mailto:dpacharya@nitrkl.ac.in)

Bidding through: <https://eprocure.gov.in/eprocure/app>

**sd/  
REGISTRAR**



# NATIONAL INSTITUTE OF TECHNOLOGY ROURKELA- 769008, ODISHA

(TENDER NOTICE NO: NITR/PW/EC/2018/33

dated 19/06/2018)

(Purchase of experiment board and testing – measurement equipment for IOT Lab)

Sl. No.	Description of Goods/Service	Quantity
1.	Raspberry Pi 3 Model B - Complete Kit (RPi 3, Case, Adapter, NOOBS card, HDMI Cable, LAN Cable) (16GB NOOBS, Clear).	05
2.	STM32F4DISCOVERY ST STM32 STM32F4 STM32F407 MCU Discovery Evaluation Development Board kit embedded ST-LINK V2 debugger XYG	02
3.	Intel Edison with Mini Breakout Board Kit EDI1BB.AL.K	05
4.	MediaTekLinkIt ONE and Grove IoT Starter Kit Powered by AWS 11 Items	05
5.	Arduino Yun board	05
6.	Arduino UNO R3 board with DIP ATmega328P	10
7.	Beagleboard (Beaglebone Rev C) Starter Kit--includes Clear Case--Power Supply--Micro USB Cable	05
8.	BeagleBone Green and Grove IoT Starter Kit Powered by AWS	05
9.	Arduino Zero (Arduino M0)	10
10.	REES52 Arduino compatible IOT Internet of Things Kit with Arduino UNO R3&Ethernet Shield.	05
11.	MediaTekLinkIt ONE and Grove IoT Starter Kit	05
12.	Intel® Edison and Grove IoT Starter Kit Powered by AWS	05
13.	GPS Receiver Module original with GPS antenna	05
14.	GSM/GPRS TTL UART MODEM-SIM900	10
15.	XBee Pro S2C with UFL (Digi-USA) with antenna	10
16.	SOLDRON 878D STATION	02
17.	Nova PM Sensor SDS011 High Precision Laser PM2.5	02
18.	MQ7 Carbon Monoxide Gas Sensor Module	03
19.	MQ135 ( NH3, NOx, alcohol, benzene, smoke and CO2) sensor	02
20.	Arduino XBee Shield	03
21.	XBee Explorer Dongle	02
22.	SR401P Metal Gear Digital Servo 5kg.cm	03
23.	HC-06 Bluetooth Module with Base	02
24.	Lithium Polymer 3 Cell, 11.1V, 3300mAh, 20C discharge Battery	02

25.	ESP8266 ESP-01 Remote Serial Port WIFI Wireless Module	03
26.	2pcs/lot 868MHz, 100mW sx1276 chip long range 4Km RF Wireless LoRa Module LoRa1276	10
27.	REES52 FT232RL USB TO TTL 5V 3.3V Download Cable To Serial Adapter Module for Arduino	02
28.	Tracking Shield - GSM/GPRS/GPS (SIM900)	02
29.	NodeMCU v2 - Lua Based ESP8266 Development Kit	03
30.	Generic KG072 KitsGuru Micro SD Storage Board, Micro SD TF Card Memory Shield Module SPI, Micro SD Adapter- Arduino, ARM and Other MCU	02
31.	12V 1A SMPS Adaptor For Robotics	02
32.	D-Link DIR-615 Wireless-N300 Router (Black)	02
33.	KitsGuru DS3231 AT24C32 IIC Precision RTC Real Time Clock Memory Module For Arduino, ARM and Other MCU	03
34.	LM2596 DC-DC BUCK CONVERTER STEP-DOWN POWER MODULE MD0102	02
35.	L298 Stepper Motor Driver Board Module For Arduino Smart Car Robot For Arduino/Raspberry-Pi/Robotics	02
36.	NEMA17 STEPPER MOTOR 3KGCM WITH PULLEY	03
37.	FTDI Basic Breakout - 3V3 (rhydoLABZ)	02
38.	Seedstudio Grove Starter Kit for mbed	05
39.	Digital Multimeters	10
40.	Agilent DSO1052B Digital Storage Oscilloscope, 50MHz, 2 Channels	02
41.	Tektronix TDS2004C - 70MHz 4 Channel Digital Storage Oscilloscope	01
42.	Zybo Board with ( For internet Of Things Lab) based on CoreEL Technology.	10

- **Quantity required** : as mentioned above (All information provided in technical specification with name of board and testing – measurement equipment)
- **Delivery** : Within **30 days** from the date of purchase order
- **Last Date of submission of Bid** : **10/07/2018 at 11:00 AM**
- **Date of opening of Technical and Financial bid** : **11/07/2018 at 11:00 AM**
- The firm should not have been black listed at any time.
- The submission of following bids by the tenderer should be through <https://eprocure.gov.in/eprocure/app> Please follow the guidelines as per the portal.

**PURCHASE OF Experiment Board and Testing – Measurement Equipment for IOT Lab**

**(Tender Notice No: NITR/PW/EC/2018/33, dated 19/06/2018) Due on 10/07/2018 at 11:00 AM**

- Liquidated damage clause will be charged for any delay in supply of goods.
- The validity of the tender shall be **90 days** from the date of opening of the bids.
- Detailed advertisement including all tender documents is also available in our website at [http://nitrkl.ac.in/OldWebsite/Jobs\\_Tenders/9Equipment/Default.aspx](http://nitrkl.ac.in/OldWebsite/Jobs_Tenders/9Equipment/Default.aspx)
- NIT reserves the right to qualify or deny prequalification of any or all applicants without assigning any reasons.

**(REGISTRAR)**  
**NIT, Rourkela**  
**Fax No- 0661-2462022**  
**Ph. No -0661-247202**

**Specification and Accessories for Sr. No. 10, 11, 12, 38 & 42.**

**Sr. No 10. REES52 Arduino compatible IOT Internet of Things Kit with Arduino UNO R3&Ethernet Shield:-**

Package includes:

- 1) Arduino Uno R3(Original Italian Made) -1 PC
- 2) W5100 Ethernet Shield -1 PC
- 3) ESP 8266 WIFI Module -1 PC
- 4) Temperature Sensor (LM 35) -1 PC
- 5) Light Sensor (LDRS) -2 PCS
- 6) Bread Board 400 pins -1 PC
- 7) Jumper Wires M-M -20 PCS
- 8) Relay 5V - 1 PC
- 9) Trim Pot 10K -1 PC
- 10) Diode IN4007 -5 PCS
- 11) Resistor 220ohm,10k ohms - Each 10 PCS
- 12) LEDS (RED,GREEN,YELLOW) -Each 5 PCS
- 13) Network RJ 45 -1 PC
- 14) USB Cable(Type A-B) - 1 PC
- 15) Battery Holder - 1 PC
- 16) Breadboard Power Supply - 1 PC
- 17) NRF 24LO1 Module - 1 PC
- 18) RGB - 1 PC
- 19) HC SR-04 Ultrasonic Sensor - 1 PC
- 20) PIR Sensor - 1 PC
- 21) IR Sensor - 1 PC
- 22) Battery Snaps - 1 PC
- 23) Swithes - 5 PCS

**Sr. No. 11: MediaTekLinkIt ONE and Grove IoT Starter Kit Powered by AWS 11 Items:-**

. The kit contains: -

- MediaTekLinkIt ONE development board-MediaTekLinkIt ONE x1 Base Shield x1 Grove – 3-Axis Digital Accelerometer( 16g) x1
- Grove - Light Sensor x1 Grove LED Bar v2.0 x1
- Grove - Moisture Sensor x1
- Grove - Touch Sensor x1
- Grove - Temperature Sensor x1
- Grove - OLED Display 1.12" x1
- Grove-Loudness Sensor x1 Micro USB Cable - 48cm x1

**Sr. No. 12: Intel® Edison and Grove IoT Starter Kit Powered by AWS:-**

- Intel® Edison for Arduino x1
- Base Shield x1
- Grove – Temperature&Humidity Sensor (High-Accuracy & Mini) x1
- Grove - Moisture Sensor x1
- Grove - Light Sensor x1

- Grove - UV Sensor x1
- Grove - PIR Motion Sensor x1
- Grove - Encoder x1
- Grove - Button x1
- Grove - LCD RGB Backlight x1
- Grove - Relay x1
- Grove - Servo x1
- Grove - Buzzer x1
- USB Cable; 480mm-Black x1
- USB Wall Power Supply x1

**Sr. No. 38: Seeedstudio Grove Starter Kit for mbed: -**

- 1 x Grove - Button
- 1 x Grove - Buzzer
- 1 x Grove - Rotary Angle Sensor
- 1 x Grove - Temperature Sensor
- 1 x Grove - Light Sensor
- 1 x Grove - Infrared Emitter
- 1 x Grove - Infrared Receiver
- 1 x Grove - Chainable RGB LED
- 1 x Grove - 3-Axis Digital Accelerometer
- 1 x Grove - 4 Digit Display
- 1 x Base Shield
- 1 x Infrared remote control
- 5 x Grove Cable (24mm)
- 5 x Jumper Wire

**Sr. No. 42: Zybo Board with ( For internet Of Things Lab) based on CoreEL Technology.**

The Board Contains:

- PMOD Wi-Fi (Wi-Fi Wireless Module) – 1 No.
- PMOD ALS (Ambient Light Sensor) – 1 No.
- PMOD TMP3 (Temperature Sensor) – 1 No.
- PMOD LS1 (Infrared Light Sensor) – 1 No.
- PMOD GPS (GPS Receiver) – 1No.
- PMOD NAV (9-axis IMU plus Barometer) – 1 No.
- PMOD ACL2 (3-axis MEMS Accelerometer) – 1 No.
- PMOD BT2 (Blue Tooth Module) – 1 No.
- PMOD GYRO (3- axis Digital Gyroscope) – 1 No.
- PMOD MTDS( Multi – Touch Display System) – 1 No.
- OEM/Authorized Manufacturing Certificates required.

**Others**

- Warranty: 1 years' standard warranty from the date of delivery.
- Scanned copy of technical brochure and website reference of the same must be included in the bid.