

GOVERNMENT OF NAGALAND  
OFFICE OF THE PRINCIPAL, GOVERNMENT INDUSTRIAL TRAINING INSTITUTE  
KOHIMA, NAGALAND

NO. GITI/KMA/STRIVE-ELEC/2023/291      Dated Kohima the 20<sup>th</sup> December 2023.  
To,

**Subject: Request for Quotations - Supply of tools & equipments for "Electrician Trade" under STRIVE Project (RA-I)**

Dear Madam/Sir,

With reference to the subject cited above, you are hereby invited to submit your most competitive quotation in a sealed envelope for the tools & equipment to be procured for the "Electrician Trade" which is part of the STRIVE project (RA-I) as detailed in the enclosed Annexure.

**Terms of Reference:**

**1. Validity of registration:**

- a) The bidder should be registered with and holding the identity card of the All Nagaland Contractors & Supplier Union (NCSU). A copy of the NCSU registration and identity card should be submitted along with the quotation.

**2. Bid Price:**

- a) All duties, taxes, and other levies applicable including transportation, installation and commissioning to machinery, equipment, tools, raw materials, and components shall be included in the total price.
- b) GST related to the sale shall be shown separately.
- c) The price should be quoted for delivery at the Office of the Principal, Government Industrial Training Institute, Kohima Nagaland
- d) The bidder's rates should remain fixed for the contract's duration and shall not be subject to adjustment.
- e) Prices should be quoted in Indian Rupees only.

**3.** The brand/name of the manufacturer should be clearly indicated for each item.

**4.** Each Bidder is allowed to submit only one quotation.

**5.** Selected bidder shall have to furnish a security deposit amounting to 2% of the total contract value in the form of D.A.C valid up to January, 2025 in favour of the Directorate of Employment, Skill Development & Entrepreneurship, Nagaland, Kohima.

**6. Validity of Quotation:**

The quotation's validity should not be less than 60 days after the specified deadline for submission.

**7. Evaluation of Quotations:**

The Purchaser will evaluate and compare substantially responsive quotations that:

- a) Are properly signed and adhere to the terms, conditions, and specifications.
- b) Quotations will be evaluated collectively for all items.
- c) GST related to the sale of goods will not be considered in the evaluation.

**8. Award of Contract:**

- a) The contract will be awarded to the bidder with the substantially responsive quotation offering the lowest evaluated price.
- b) The Purchaser reserves the right to accept or reject any quotations and cancel the bidding process at any time before the contract award without prior notice.
- c) The invitation does not bind the purchaser to place purchase order to all the items indicated in the Annexure.
- d) The purchaser reserves the right place order for any of the item and in any quantities from the items.

**9. Commercial Warranty/Guarantee:**

Normal commercial warranty/guarantee shall be applicable to the supplied goods.

10. You are requested to provide your offer latest by 12:00 hours on 4<sup>th</sup> January, 2024.

11. The quotation shall be opened in 5<sup>th</sup> January, 2024 at 11:00 AM and the bidders should be present on the day

12. We look forward to receiving your quotations and thank you for your interest.

Handwritten signature in blue ink with the date 20/12/23 written below it.

**(Purchaser)**

Name: Shri. ENCHIBA LONGKUMER

Address: Principal

Govt. Industrial Training Institute

Kohima - 797001, Nagaland

Tel. No. +919612374813

Email: [itikma@rediffmail.com](mailto:itikma@rediffmail.com)

## List of tools and equipment

Place of Delivery: Govt. Industrial Training Institute Kohima Nagaland

Trade: Electrician

## ELECTRICIAN

Sl. No.	Item Name	Specification	Quantity	Unit
<b>A. LIST OF EQUIPMENT</b>				
1	Ohm Meter	Series type, Portable Box type. Range : 0-2000 Ohms Portable Box (Plastic Case) type	2	nos
2	Ohm Meter	Shunt type, Portable Box type. Portable Box (Plastic Case) type Range : 0-50 Ohms	2	nos
3	A.C. Voltmeter M.I	Analog, portable box type Multirange Range: 0-75/150/300/600 Volts AC Portable Box (Plastic Case) type Accuracy : +/- 1.0%	2	nos
4	Ammeter MC	Analog, Range : 0-500 mA DC Portable Box (Plastic Case) type Accuracy : +/- 1.0%	2	nos
5	Ammeter MC	Analog, Range : 0-5 Amps DC Portable Box (Plastic Case) type Accuracy : +/- 1.0%	2	nos
6	Ammeter MC	Analog Range : 0-25 Amps DC Portable Box (Plastic Case) type Accuracy : +/- 1.0%	2	nos
7	AC Ammeter MI	Analog Range : 0-1 Amps AC Portable Box (Plastic Case) type Accuracy : +/- 1.0%	2	nos
8	AC Ammeter MI	Analog Range : 0-25 Amps AC Portable Box (Plastic Case) type Accuracy : +/- 1.0%	2	nos
9	AC Ammeter MI	Analog Range : 0-25 Amps AC Portable Box (Plastic Case) type Accuracy : +/- 1.0%	2	nos
10	Kilo Wattmeter	analog 0-1.5 -3KW, pressure coil rating- 240v / 440v, Range : 0-1.5/3 KW (5/10A, 240/440V) Portable Box (Plastic Case) type Accuracy : +/- 1.0%	2	nos
11	Digital wattmeter	230V, 1KW, 50Hz Portable Digital Metere Sutaria/Veritek Make Digital 96Sq. meter mounted on Bakelite panel and fitted in Wooden case, Meter provided with insulated terminals and Mains Cord.	2	nos
12	A.C. Energy Meter	Single Phase, 10 A, 240 V Digital type	2	nos

13	Power Factor Meter	Digital,440V,20A,3 phase portable box type Portable Digital Power Factor Meter. (Wooden Case) Range : 20A. 440V, 3 Phase with CT 20/5A Sutaria/Veritek/Nippen Make Digital 96Sq. meter mounted on bakelite panel and fitted in Wooden case, Meter provided with Mains Cord	2	nos
14	Tong Tester / Clamp Meter	0 - 100 A (Digital Type)	2	nos
15	3- point D.C. Starter	for 2.5KW DC Motor	2	nos
16	Rotary Switch	16 A/440v	2	nos
17	Relay - set of 4			
	a. Cut out Relays	16A, 440V	2	nos
	b. Reverse current	16A, 440V	2	nos
	c. Over current	16A, 440V	2	nos
	d. Under voltage	360V-440V	2	nos
18	Rheostat	0- 25 Ohm, 2 Amp	1	nos
	Rheostat	0- 300 Ohm, 2 Amp	1	nos
	Rheostat	0 -1 Ohm, 10 Amp	1	nos
	Rheostat	0 -10 Ohm, Amp	1	nos
19	A.C. Energy Meter	Three Phase, 15 A , 440 V Digital type	2	nos
20	Power Factor Meter	Digital,440V,20A,3 phase portable box type Portable Digital Power Factor Meter. (Wooden Case) Range : 20A. 440V, 3 Phase with CT 20/5A Sutaria/Veritek/Nippen Make Digital 96Sq. meter mounted on bakelite panel and fitted in Wooden case, Meter provided with Mains Cord	2	nos
21	Oil Testing Kit	230 V, single phase 50 Hz 60 VA output 0-60 KV Variable	1	nos
22	Inverter with Battery	1 KVA with 12 V Battery Input- 12 volt DC, Output- 220 volt AC	1	nos
23	Phase Sequence Indicator	3 Phase, 415 V – Portable type – Wooden Case	2	nos
<b>B. SHOP MACHINERY</b>				

24	DC compound Motor with starter and switch	<p>SALIENT FEATURES</p> <ul style="list-style-type: none"> <li>• Each of following independent Applied PE trainer may need a few set of associated panels (4 nos. typically) which are mounted in a light weight sturdy aluminum flat demo panel system.</li> <li>• Facilitates easy and safe wiring by students due to 4mm sturdy shrouded banana patch cords and shrouded socket arrangement for high voltage circuits.</li> <li>• Each panel has ABS molded plastic sturdy enclosure, and colorful screwless overlays showing circuit diagram &amp; its connection tag numbers for easy understanding and connections.</li> <li>• Set of Instructor Guide &amp; Student Workbook.</li> </ul> <p>Technical Specifications</p> <p>1] Instrumentation Power supply cum Multi- channel DPM panel</p> <ul style="list-style-type: none"> <li>(a) DC Multi Output power supply</li> <li>(b) Supplies DC power to neighboring signal conditioning circuit panels through 20 pin FRC cable.</li> <li>(c) Provides 1 Ph. AC supply through 3 MCB's, 4A each to power up other panels in the rack.</li> </ul> <p>2] SCR Actuator (variable DC) cum sensor signal conditioning panel</p> <ul style="list-style-type: none"> <li>1. Full bridge SCR based 0V-195V / 12 Amp cosine firing with linear characteristics.</li> <li>2. Supports signal conditioning circuit for speed to give output 0-2.5Vdc (FS).</li> <li>3. 2 Nos. of these supplies required for DC Armature &amp; DC motor field.</li> </ul> <p>3] DC voltmeter and DC ammeter panel</p> <ul style="list-style-type: none"> <li>a) DC voltmeter (0-300V)</li> <li>b) DC Ammeter (0-5A) with polarity protection diode with circuit breaker</li> <li>c) Field failure relay to control Armature supply.</li> </ul> <p>4] DC voltmeter and DC ammeter panel</p> <ul style="list-style-type: none"> <li>a) DC voltmeter (0-300V)</li> <li>b) DC Ammeter (0-20A) with polarity protection diode</li> <li>c) 12A Circuit Breaker</li> </ul> <p>5] 1 Phase AC input Panel</p> <ul style="list-style-type: none"> <li>(a) 1 phase MCBs of 20A/4A 1 each</li> <li>(b) Lamp Load</li> </ul> <p>Motor Specifications</p>	1	nos
----	---	--	---	-----

		<p>220V/2.5KW/1500 rpm with Series, Shunt &amp; Compound windings, spring balance Loading Arrangement [25 Kg.] &amp; Electronics Tacho :1V/1000 rpm.</p> <p>List of Experiments</p> <p>1. Open loop torque speed characteristics.</p>		
25	DC Series Motor coupled with mechanical load	<p>DC Series Motor coupled with mechanical load</p> <p>SALIENT FEATURES</p> <ul style="list-style-type: none"> <li>• Each of following independent Applied PE trainer may need a few set of associated panels (4 nos. typically) which are mounted in a light weight sturdy aluminum flat demo panel system.</li> <li>• Facilitates easy and safe wiring by students due to 4mm sturdy shrouded banana patch cords and shrouded socket arrangement for high voltage circuits.</li> <li>• Each panel has ABS molded plastic sturdy enclosure, and colorful screwless overlays showing circuit diagram &amp; its connection tag numbers for easy understanding and connections.</li> <li>• Set of Instructor Guide &amp; Student Workbook.</li> </ul> <p>Technical Specifications</p> <p>1] Instrumentation Power supply cum Multi- channel DPM panel (a) DC Multi Output power supply (b) Supplies DC power to neighboring signal conditioning circuit panels through 20 pin FRC cable. c) Provides 1 Ph. AC supply through 3 MCB's, 4A each to power up other panels in the rack.</p> <p>2] SCR Actuator (variable DC) cum sensor signal conditioning panel</p> <ol style="list-style-type: none"> <li>1. Full bridge SCR based 0V-195V / 12 Amp cosine firing with linear characteristics.</li> <li>2. Supports signal conditioning circuit for speed to give output 0-2.5Vdc (FS).</li> <li>3. 2 Nos. of these supplies required for DC Armature &amp; DC motor field.</li> </ol> <p>3] DC voltmeter and DC ammeter panel</p> <ol style="list-style-type: none"> <li>a) DC voltmeter (0-300V)</li> <li>b) DC Ammeter (0-5A) with polarity</li> </ol>	1	nos

		<p>protection diode with circuit breaker c) Field failure relay to control Armature supply.</p> <p>4] DC voltmeter and DC ammeter panel a) DC voltmeter (0-300V)    b) DC Ammeter (0-20A) with polarity protection diode c) 12A Circuit Breaker</p> <p>5] 1 Phase AC input Panel (a) 1 phase MCBs of 20A/4A 1 each    (b) Lamp Load</p> <p>Motor Specifications 220V/2.5KW/1500 rpm with Series, Shunt &amp; Compound windings ,spring balance Loading Arrangement [25 Kg.] &amp; Electronics Tacho :1V/1000 rpm. List of Experiments 1. Open loop torque speed characteristics.</p>		
26	Single phase Transformer,	core type, air cooled	1	nos
27	Three phase transformer,	shell type oil cooled with Delta/ Star	1	nos
28	DC Shunt Motor		1	nos
29	Universal Motor with starter/switch		1	nos
30	Electrical Machine Trainer	A. DC Integrated machine    1 No. B. 1 Phase Synchronous m/c - 1 No. C. Salient Pole alternators:- 3 Phase - 1No. Voltage: 415VAC, 50Hz	2	nos
31	A.C. Series type Motorwith mechanical load.		1	nos
32	Single Phase Capacitor Motor with starter/switch.		1	nos