



(Invitation Identification Number: NEC/Catalogue Shopping/2076/77-01)

## Technical Specifications for Electric Vehicle SUV

### 1 General

This scope covers Supply and Delivery of Electric Vehicle SUV suitable for urban road conditions with an operating temperature of 0 to 40 deg. C, humidity up to 100% at 35 deg. C and altitude varying up to 2,000 m above mean sea level. The vehicle shall be right hand drive, electric motor ran, control on steering as per following technical specifications. Although all specific details may not be covered by the following "Technical Specifications" all accessories/facilities/options/available in the specific make and model of offered vehicles shall be supplied without any additional cost to NEA Engineering Company Ltd.(NEC).

### 2 Description:

Required Technical Specifications for the vehicles are given in the table below. Supplier shall fill up the description of their offered vehicle in the column provided on the table, below:

#### Required Technical Specification of Four-Wheel Electric Vehicle SUV

S.N.	Criteria	Client's Requirement	Offered Specification
1	Manufacturer		
2	Offered Model (Must be Specific)		
3	Country of Origin		
4	General	Right hand Drive model full-option with four wheels. Suitable for driving in on-road conditions needed for safe driving in rough, sandy, and hilly road conditions. The electric vehicle shall have seating capacity of at least 4 passengers	
5	Dimensions	a. Length $\geq 4100$ mm b. Width $\geq 1800$ mm c. Height $\geq 1500$ mm d. Wheelbase $\geq 2560$ mm	
6	Boot Space	$\geq 350$ liters	
7	Top Speed	$\geq 140$ kmph	
8	Minimum Ground Clearance	$\geq 155$ mm	
9	Range	$\geq 300$ km	
10	Suspension	MacPherson Strut, Gas type shock absorbers	



S.N.	Criteria	Client's Requirement	Offered Specification
11	Engine Type	Permanent Magnet Synchronous Motor type or Induction Motor	
12	Maximum Power	$\geq 80$ kW	
13	Battery type	Lithium	
14	Battery Capacity (kWh)	$\geq 40$ kWh	
15	Braking	Front and rear disc / Regenerative	
16	Slow Charging/ Fast Charging	Type 2, 1 phase or 3 phase / Combined Charging System	

Apart from the above

S.N.	Description	Remarks	Offered data
17	Maximum Torque		
18	Battery Power (kW)		
19	Battery Charging Time		
20	Battery Warranty (years)	Minimum 4 years	
21	AC Supply Voltage		
22	DC Charging Voltage		
23	Power Consumption		
24	Emission Standard	The vehicle shall be brand new and shall be zero CO <sub>2</sub> emission.	
25	Gauges	Fitted with all the gauges, indicators, signals as necessary for efficient operation, functional monitoring that includes, but not limited to, battery charge indicator, temperature, pressure, transmission gauge, etc.	
26	Transmission	Automatic Transmission with reverse system	
27	Wheel/Tires	Standard size alloy wheels	
28	Tire dimension		
29	Maximum turning radius		
30	Chassis and Frame	Steel, Heavy duty, with toe-hook	
31	Body/Cab	Four side doors and one luggage compartment at the rear of the car. All metallic cab with insulated roof, laminated tinted glass windscreen, washers and wipers, glass window on doors, through ventilation, comfortable and	



S.N.	Description	Remarks	Offered data
		adjustable seats for driver and co-passenger, dimming rear view mirror, adjustable side view mirror.	
32	Steering	Electric Power Steering	
33	Accessories	<p>The vehicle should be equipped with following in-built accessories from manufacturer:</p> <ol style="list-style-type: none"><li>1. Power Window</li><li>2. Electronic ORVM</li><li>3. Central Locking</li><li>4. Rear Parking Sensor</li><li>5. Automatic Air Conditioner</li><li>6. Heater</li><li>7. Full Fabric Seat</li><li>8. Front and Rear Seat Belt</li><li>9. Standard Toolset</li><li>10. Full wheel cap</li><li>11. ABS, EBD, ESP</li><li>12. Antitheft system with immobilizer</li><li>13. AM/FM CD USB 4 SPK with touch screen color display/blue tooth wireless technology</li><li>14. Cabin lights</li><li>15. Tachometer/Speedometer/Odometer</li><li>16. Front fog lamps</li><li>17. Heavy duty body colored front bumper</li><li>18. Suitable jack with handle</li><li>19. Multifunction Steering wheel with Bluetooth phone connectivity controls</li></ol>	





S.N.	Description	Remarks	Offered data
		20. Spare tire 21 Spare cord 22. Mats for driver and co-driver 23. Door visors 24. Seat Cover 25. Remote Keyless Entry 26. Child Lock 27. Side grab handle for driver and co-passengers 28. Front wind shield glass laminated 22. Minimum dual front air bag safety system To be equipped with all accessories offered in Full Option (Standard Model) but not limited to the above items	
34	Instructions	All signs instructions in the vehicle shall be in English	
35	Manuals	One copy of the Operator's and Owner's instructions and maintenance manual, spare parts catalogue and comprehensive workshop manual in English shall be supplied with each vehicle.	
36	Tools	A set of tools as required for general maintenance shall be supplied within a lockable toolbox free of cost with each unit	
37	Color	Color shall be chosen by the Client/Engineer during signing of the Contract.	
38	Proven Performance	1. Manufacturer year should be 2019. 2. The bidder shall provide the manufacturer's data of the performance of the unit to include the power consumption, performance curve of the engine/motor and production capacity of the unit.	
39	Warranty	Manufacturer shall provide a minimum	



S.N.	Description	Remarks	Offered data
		ofOne(1) year warranty after acceptance (Except Battery, For Battery as agreed in S.n 20)	
40	Initial Service	The supplier shall provide all the necessary filters and spare parts required for the first two services, after the vehicle has been commissioned and accepted.	
41	Delivery	3 months from the date of Contract signing	
42	Safety Features	The vehicle shall be equipped with safety features like side intrusion beams, crash protection crumple zones, fire retardant upholstery and a collapsible steering column.	

### 3 Spare Parts:

Spare parts for first 20000 km of operation with prices valid for a period of one year.

- One (1) clear copy of the standards governing fabrication and testing of the vehicles.
- One (1) clear copy of certified outline drawings for each showing dimensions, arrangements, and location of all parts.
- A clause by clause commentary on the specification, specifying compliance or deviation if any.
- The supplier should obtain pollution test certificate issued by Government Of Nepal.