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TURBINE PRICES 2024-25 (US\$)

ELSONIC WIND TURBINES- VERTICAL & HORIZONTAL AXIS







28 Kgs

30Kqs

43 Kgs

131 Kas

141 Kgs

215 Kgs

199 Kas

112-014SN

112-012SN

112-015N

112-013S

112-013P

US\$2250

US\$2438

US\$3063

US\$4000

US\$6167

US\$13549

US\$17300

US\$15855

I. Vertical Axis Wind Turbines (VAWT)+



. ELSONIC - OMNI-DIRECTIONAL VAWT (Vertical Axis Wind Turbine)

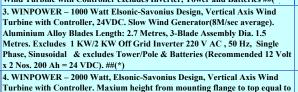
Low speed (Start-up wind Speed 1 to 1.5 M/sec- Average Speed 5 M/sec-100 to 300 RPM-full power), low noise, omni-directional Vertical Axis Wind Turbines (VAWT). These use high-energy Neodymium-Iron-Boron magnetic material & Magnetic Levitation material upto 10 KW rating. VAWT Blades are made of ultra-corrosion resistant & strong aluminium alloys. VAWTs' up to 2000 Watts (Peak) rating are now a combination of Elsonic's own unique proprietary design in combination with the classic Savonius design, as seen in the first two images. Higher capacities are usually referred to as H type. The turbines are normally supplied with blades, magnetic generator assembly, coupling flange and type-specific controllers & Inverters (Single Phase). VAWTs offer balanced, low-noise functioning & can therefore be mounted directly on rooftops even in residential areas. All wind turbine generators are designed with base flanges to which corresponding matching flanges on posts/towers can be bolted firmly. Wind generation plants are supplied without towers/posts & without batteries, excepting against prior firm orders. However, tower drawings can be furnished free of cost. Elsonic Inverters are preferable, for perfect matching & optimum performance. Batteries can be procured locally or supplied on request. #* (*)







1. WINPOWER -500 Watt (Peak) Elsonic-Savonius Design Vertical Axis Wind









x 2 Nos. 200 Ah = 24 VDC). ##(*)		
4. WINPOWER - 2000 Watt, Elsonic-Savonius Design, Vertical Axis Wind		
Turbine with Controller. Maxium height from mounting flange to top equal to		
or below 2.5 Metres, without Controller, 48VDC. Slow Wind Generator(10		
M/sec average). Aluminium Alloy Blades:3-Blade Assembly Dia. 2 Metres.	112-011SN	83 Kgs
Excludes 2 KW/3 KW Off Grid Inverter 220 V AC, 50 Hz, Single Phase,		
Sinusoidal & excludes Tower/Pole & Batteries (Recommended 12 Volt x 4		
Nos. 200 Ah or 400 Ah = 48 VDC). ##(*)		

5. WINPOWER - 3000 Watt, Elsonic-Savonius Design, Vertical Axis Wind Turbine with Controller, 48VDC, Aluminium Alloy Blades: Length 5 Metres, 3 Blade Assembly Dia, 2.5 Metres, Excludes 3 KW Off Grid Inverter 220 V AC. 50 Hz. Single Phase, Sinusoidal & excludes Tower/Pole & Batteries (Recommended 12 Volt x 4 Nos. 200 Ah or 400 Ah = 48 VDC). ##(*)

6. WINPOWER - 5000 Watt, H-Type Wind Turbine without 5 KW Inverter 220 V AC, 50 Hz, Single Phase, Sinusoidal & without Controller, 96VDC (110 V AC, 60 Hz version available). Aluminium Alloy Curved or Straight Blades: Length 5.5 Metres. 3-Blade Assembly Dia. 3.5 Metres. Excludes 5 KW/6 KW Off Grid Inverter 220 V AC, 50 Hz, Single Phase, Sinusoidal & excludes Tower/Pole & Batteries (Recommended 12 Volt x 8 Nos. 200 Ah or 400 Ah = 96

7. WINPOWER – 6000 Watt, H-Type Special Seashore & Extreme Weather Wind Turbine, Aluminium Alloy Blades: Length 6.5 to 7.5 M depending on site condtions. 3 to 6 Blade design Curved or Straight with Dia. 4 to 5 Metres, depending on site conditons, with Controller. Excludes 5 KW/6 KW Off Grid Inverter 220 V AC, 50 Hz, Single Phase, Sinusoidal & excludes Tower/Pole & Batteries (Recommended 12 Volt x 8 Nos. 200 Ah or 400 Ah = 96 VDC). ##

8. WINPOWER - 10,000 Watt, H-Type Wind Turbine Aluminium Alloy Curved or Straight Blades: Length 7.7 Metres. 3-Blade Assembly Dia. 4.5 Metres, without Controller, Excludes 10 KW Off-Grid Inverter 220 V AC , 50 Hz, 3- Phase, Sinusoidal & excludes Tower & Batteries (Recommended 12 x 20 Nos. 400 Ah = 240 VDC), ##(*)

NOTE:- In very low wind-speed & wind-volume areas, installing multiple Vertical Axis Wind Turbines is advisable.













I. ELSONIC- CONVENTIONAL HAWT (Horizontal Axis Wind Turbine)

Medium speed (160-360 RPM-full power), conventional propeller type wind turbine, using highly efficient copper-wound generator with high-energy Neodymium-Iron-Boron magnetic material. HAWT Blades are made of Glass Fibre-Reinforced-Plastic (FRP) that are corrosion resistant, very strong and not easily destroyed by strong winds. The turbines are normally supplied with blades, coupling flanges, generator and type-specific controllers & inverters (Single Phase). These wind turbines are mounted on rugged steel or concrete towers/posts uing matching flanges & are either designed as stand-alone towers or supported with guy wires. All wind turbine generator systems are supplied without towers/posts & batteries. Drawings for the towers will be furnished with the equipment, free of cost. Batteries can be procured locally or supplied on request. #* (**)

New N	1. TURBOPOWER - 1000 Watt Off-Grid Wind Turbine with Controller (nominal output 24 V DC) & Inverter. 3-Blade Diameter: 3.2 Metres. Rated Rotor Speed 360 rpm. Start-up Torque less than 0.6 N.m. Start-up Wind Speed 3 M/sec. Rated Wind Speed 8 M/sec. Noise level 25dB. Annual Power Generation: 1500 to 3000 KWh. Supplied without Tower & batteries (Recommended 12 x2 Nos. 200 Ah= 24 VDC). #*(*)	113-010	78 Kgs	US\$1962
大学をは	2. TURBOPOWER – 2000 Watt Wind Turbine with Controller (nominal output 48 V DC) & Inverter. 3-Blade Diameter: 3.8 Metres. Rated Rotor Speed 300 rpm. Start-up Torque less than 0.8 N.m. Start-up Wind Speed 3 M/sec. Rated Wind Speed 8 M/sec. Noise level 28dB. Annual Power Generation: 3000 to 6000 KWh. Supplied without Tower & batteries (Recommended 12 x 4 Nos. 200 Ah= 48 VDC).##(*)	113-011	125 Kgs	US\$2831
	3. TURBOPOWER – 3000 Watt Wind Turbine with Controller(nominal output 48 V DC) & Inverter. 3-Blade Diameter: 4.5 Metres. Rated Rotor Speed 240 rpm. Start-up Torque less than 1 N.m. Start-up Wind Speed 3 M/sec. Rated Wind Speed 9 M/sec. Noise level 32dB. Annual Power Generation: 4500 to 9000 KWh. Supplied without Tower & batteries (Recommended 12 x 4 Nos. 200 Ah= 48VDC). ##(*)	113-012	127 Kgs	US\$5138
	4. TURBOPOWER – 5000 Watt Wind Turbine with Controller (nominal output 96 V DC) & Inverter. 3-Blade Diameter: 5.0 Metres. Rated Rotor Speed 200 rpm. Start-up Torque less than 1.2 N.m. Start-up Wind Speed 3 M/sec. Rated Wind Speed 10 M/sec. Noise level 34dB. Annual Power Generation: 7500 to 15000 KWh. Supplied without Tower & batteries (Recommended 12 x 8 Nos. 200 Ah= 96 VDC). ##(*)	113-013	225 Kgs	US\$6650
	5. TURBOPOWER – 10,000 Watt Wind Turbine with Controller (nominal output 360 V DC) & Inverter. 3-Blade Diameter: 8.0 Metres. Rated Rotor Speed 160 rpm. Start-up Torque less than 1.3 N.m. Start-up Wind Speed 3 M/sec. Rated Wind Speed 10 M/sec. Noise level 34dB. Annual Power Generation: 17,000 to 37,500 KWh.Supplied without Tower & batteries (Recommended 12x 0 Nos. 200 Ah=360 VDC). ##(*)	113-014	575 Kgs	US\$10475
	MOUNTING POLES: Made to order using 4 inch (100 mm NB) and 6 inch (150mm NB) pre-galvanised steel pipes to suit the load and lateral forces applied after mounting the Turbines. Special Swing models, as seen alongside, are designed & manufactured especially for lighter turbines to avoid the use of cranes.	On order	Based on Requirement	US\$100-600 per pole

NOTE: Minimum order to avail discounts is US\$25,000. Polycrystalline High Efficiency Solar Cells are used in Solar Module Panels that are supplied for hybrid operation at US\$ 0.5 per Watt. Higher discounts are offered for minum 20 Nos. confirmed orders for 335 Watt Solar Module Panels. Solar Charge Controller-Regulators are supplied free of charge for composite orders of Wind Generator + Solar Inverter + Solar Module Panel.

NOTE: Outer appearance & technical features of the above models are subject to change without notice, due to R & D for product improvement

DELIVERY E. Stark of S. Wash

PAYMENT TERMS: - 70% Advance balance 30% on intimation that material is ready for inspection prior to despatch or 100% with priority fast delivery.

TAXES & LEVIES:- Nil for overseas sales in US Dollars.

US\$ PAYMENT MODE:- Acct: Acct: Santo (HK) Corpn.; Canara Bank, Viveknagar Branch, Bengaluru-47. Acct. No: 120001819801, SWIFT:CNRINBB790.

INSTALLATION & CALIBRATION: Installation including civil works, post/masts/towers as required & cranes/lifting equipment plus labour are on customer's account

PACKING & FORWARDING:- Actuals (about 5% extra depending on delivery location & mode of despatch)

WARRANTY:- 2 Years for all electronic equipment & Turbines, 5+5 years for Solar Module Panels & Manufacturer's Transfer Warranty for Batteries and Bulbs/Lamps

WHY BUY ELSONIC PRODUCTS?

- # A company established in 1974 with international markets and bases in multiple overseas locations, ensuring sourcing of the best components for the manufacture of reliable and durable products.
- # Elsonic Winpower range of turbines are precisely designed to work under slow wind conditions and matched to customer needs.
- # All turbines are connected to matching UPS systems through compatible charge controllers to charge through utility Mains Supply.

 Combo installations, with both Wind and Solar inputs charge automatically, selecting the best available alternate energy source.
- # Turbines are built with high efficiency generators using high power rare earth magnets and copper wound coils ensuring low losses.
- # All products offer battery back-up with well designed control circuits using Linear, PWM or MPPT charging technology providing both overcharge & excess discharge shut-off, thus ensuring long back-up & battery life.
- # Built-in circuit protection ensures low failure rate with large power systems of upto 50 KW installed over 10 years ago having had no failure to date. These are seen in the real site photos shown on our website, in this catalogue & elsewhere.