

SOLAR HOME ELECTRIFICATION

SOLAR AIR COOLER

Powerwin's Solar Air Coolers are similar to conventional air coolers but the only difference being that they run on Solar Power produced directly from the Solar Panels or from a battery. During daytime whenever sufficient sunlight is available the DC Current produced by the Solar panel directly powers the Air Cooler. In cases of low Sunshine & during the night times a battery backup is required to run the Cooler. The advantage of using such a type of cooler is that it is economical because it totally eliminates the consumption of AC power.

Applications

- Hotels.
- Lodges.
- Resorts.
- Office Cabins.
- Conference Halls



System Features

- Runs on Sun Light.
- Highly efficient.
- Eco – User friendly, Easy to Install & Operate.
- PWM charge controller with thermal Compensation.
- Adequate protections for load and battery.
- Available as per MNES & customized models.
- Highly Efficient – draws around 3A current at low speed and around 5A current at High speed.
- They are particularly effective in rooms of size 3m x 4m.
- IF the size of the room is bigger than more than 1 No. has to be installed or a higher capacity cooler can be designed.

SOLAR HOME SYSTEM

Powerwin Solar Home Lighting System is appreciated for its high performance and compact structure. Incorporating the latest solar technology, our solar home lighting system harnesses the power of the Sun to provide reliable, cost effective electricity wherever it is needed. This solar home lighting system supply electricity for lighting, entertainment and information to homes that are not connected to grids or where electric supply is quite erratic.

Features

- Easy to install and operate.
- Highly efficient electronics with PWM Charge Regulator.
- Adequate protections for load and battery.
- DC Fan (< 20W) , Portable TV, Tape Recorder can be used.
- Available in customized and MNES approved models.

Applications

- Domestic and commercial usage.
- Shops, Hospitals, Farm Houses.
- Remote village Electrification.
- Ashrams, NGO's Education Centres.
- Health centres, schools.



SOLAR REFRIGERATOR

Function

To store essential items such as medicine and vaccines at low temperature in stand-alone mode. A small capacity top opening refrigerator powered with SPV panel along with the battery bank, up to 3 days solar autonomy

Features

- DC Compressor : Danfoss make.
- Compressor Load : 60 W running.
- 500~600W/day : 10 hours per day operation.
- System volt : 12 / 24 V DC.
- Penal : 24V/180 Wp.
- Battery : 24V/130 Ah.
- CCU : 24V/10A.
- Capacity : 80/100/150 liter.
- Opening : Top opening.
- Usable size : 3'X 2' X 2.
- Period : 2 to 3 days



Advantages

- 12v or 24 DC with low voltage disconnect.
- Rugged scratch resistance galvanized steel/fiber exterior.
- Lockable lid with interior light.
- Easy to clean Interiors.
- Low-frost system.
- Automatic control with adjustable thermostat.
- Energy Efficient Refrigerator.

