

FCWG45



Free Cool
www.freecoolsystems.com



Technical Specs

The Free Cool atmospheric water generator	
Production capacity	45L/24hr.
Working Condition:	T:15-45°C RH:40-95%.
Power supply	220V/110V
Rated input	Water Generating :220V/400W.
Heating capacity	10L/H
Rated input(heating)	500W
Cooling capacity:.	4L/H
Filter system	PP+CTO+RO+T33+UV
Ozone generator, 24 hours cycle one time, ensure no bacteria in the water tank	





I . Introduction

Thank you for interested on free cool atmospheric water generator. It is an advanced drinking water equipment for household and office use, especially for water provision on the coastland, islands and ships. By making use of the most advanced technology, this water dispenser integrates the air water condensing system, water filtering and disinfecting system, and water heating and cooling system, which has greatly improved the water in taking by air and satisfying the water needs in pulic places and other environments.

This machine controled by microcomputer system,which makes sure all the parts of the machine working normally. With internal prevent interference function and filter system protection function moreover can stop work automatically when the machine filter system break down.

This machine has ultraviolet radiation sterilization system, to ensure the completely destroy the bacteria and microorganisms.

This machine uses the excellent components to ensure the operation reliability of the entire machine.

The filter system adopts the integrated module design, thus making change of the filter element more convenient.

II. Operating Principle.

A:This Free Cool machine mainly makes the water from the humidity in the air. In other words, it totally relies on the water vapour in the air to make water. The best water making can only be achieved under the ideal environment where the humidity is around 70%--80%. Water also can be made in places with low humidity, but the speed is slow. This is also the same case for places with high humidity and low temperature. So it is better to test the humidity of every position in a room before the machine placed. In a living house, positions near the kitchen or window, or spacious places, will see high humidity.

B:If the air water dispenser wants to reach the best operating state, the temperature of ambient environment is very important, with the ideal temperature of 24°C--29°C. However, this does not mean that the dispenser will fail to work in places where the temperature is higher or lower. More drinking water will be produced at faster speed under ideal temperature. So it is necessary to measure the indoor temperature before placing the dispenser.

C:As water is made by converting the water vapour in the air, this machine will become a very powerful humidity intaker. Therefore, for the sake of health, please use this machine only in rooms where the humidity is ensured, or when the window is opened and the indoor and outdoor air exchange is available.

D:Multi-Stage Filtration System

Our dedication to providing high-quality, great tasting water to our consumers is accomplished by our unique multi-stage filtration system.

- 1) Carbon Filter or Nanometer Molecular Sieve
Remove ammonia, chlorine residuals, organic compounds, soil particles, dirt, etc.
- 1) Sediment filter
Remove micro particles to protect water pump.
- 1) Reverse Osmosis Membrane
Remove dangerous bacteria, virus, mineral salt, heavy metal, organic compounds, etc.
- 1) Post-Carbon Filter
Remove volatile organic compounds and improve water taste and smell.
- 1) Top Tank UV Sterilization
Minimize bacteria level in top tank to the least amount.

E:Water Recirculation

Our patented exclusive technology ensures that stored water remains fresh and clean and avoids second pollution.

F:Overheat Protector

Overheat protector offers further protection for your machine. In case of overheat in hot pot during heating process, this protector will automatically shut off heating device.

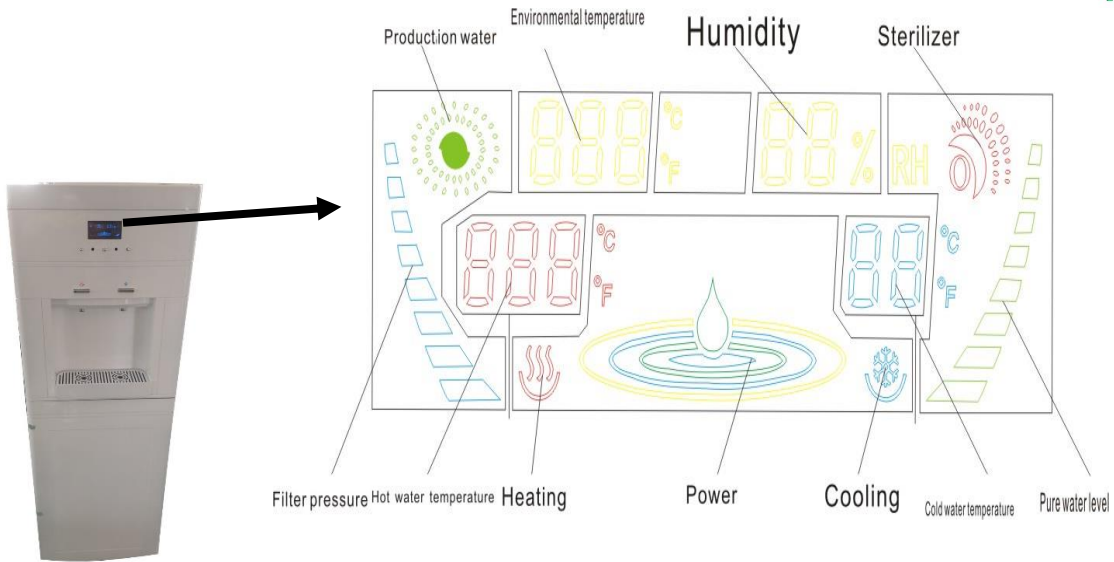
G:Novel and Noble Body

The Atmospheric Water Generator has a smaller and sleeker design compared to other Generators in the market. The unit is more compact and versatile. Advanced VFD display is added to make the operation, air humidity and water quality conditions more clearly and directly to understand.

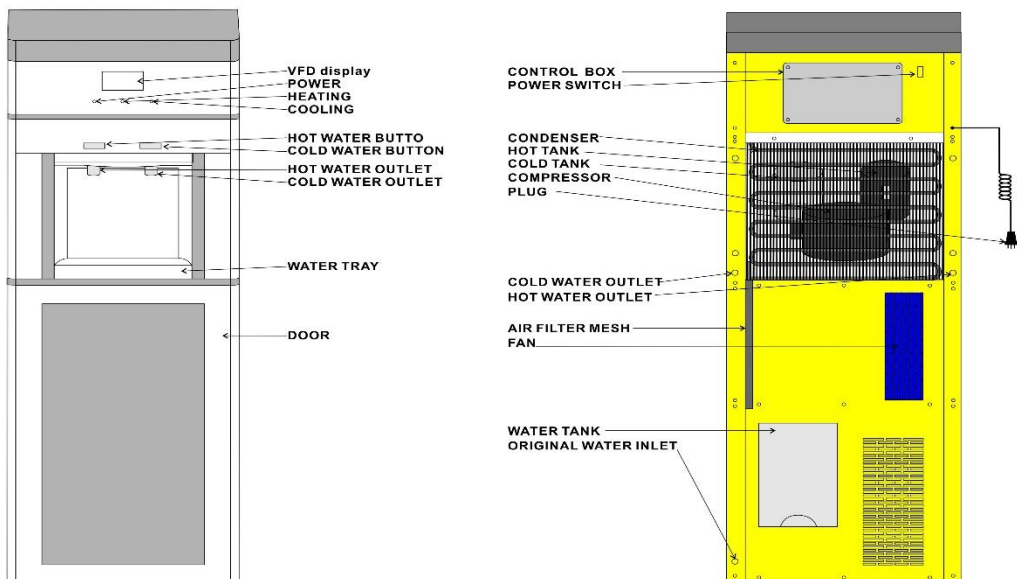
III. SAFETY NOTES

1. The socket should be equipped with reliable protection earthing.
2. Do not remove earthing terminal from the power cord.
3. Do not use extension plug nor extension adaptor.
4. Always keep the unit from poisonous gas and liquid.
5. Do not use damaged electrical plug or power cable.
6. Unplug power cord before maintenance.
7. Do not share the electrical socket with other high power consumption appliance.
8. Always use correct replacement parts.
9. Do not unplug power cord with wet hands.
10. Use the enclosed water pipe kids to connect with city water input. Do not use any old water pipelines to connect to the unit.
11. When moving the machine, please unplug the power cord and empty water in all tanks. Do not tilt the machine more than 20° during moving.

IV. VFD display screen



V. Parts illustration



VII. MAINTENANCE

1. Always keep the unit clean. Wipe the outer casing with soft, damp fabric to clean. Use water to clean, avoid using harsh cleaning agent.
2. Do not use cleaning agent to clean storage tanks.
3. Clean air filters regularly to ensure proper air flow.
4. Always drain out the remaining water from the tanks before a period of long inactivity.

CLEANING AND REPLACEMENT OF FILTERS

Recommended Timing for Filter Replacement (It might be verified according to different water consumption. The timing below is based on 10 liters water consumption per day):

Carbon Filter or Nanometer Molecular Sieve	3-6 months
Sediment filter	6 months
Reverse Osmosis Membrane	24 months
Post-Carbon Filter	6 months
UV bulb	12 months or upon UV fault warning

TECHNICAL SPECIFICATIONS

Protection against electric shock: Grade I

Power supply: 220V/50Hz or 110V/60Hz

Rated input (making water): 550W

Capability of water making: 45L/24H

Standard operating environment: Humidity: 75%; Temperature: 27°C

Normal operating environment: Humidity: 40%--90%; Temperature: 18°C--35°C

Capability of water cooling: 2L/H

Capability of water Heating: 5L/H

Filter system: PP+CTO+UDF+RO+T33+UV

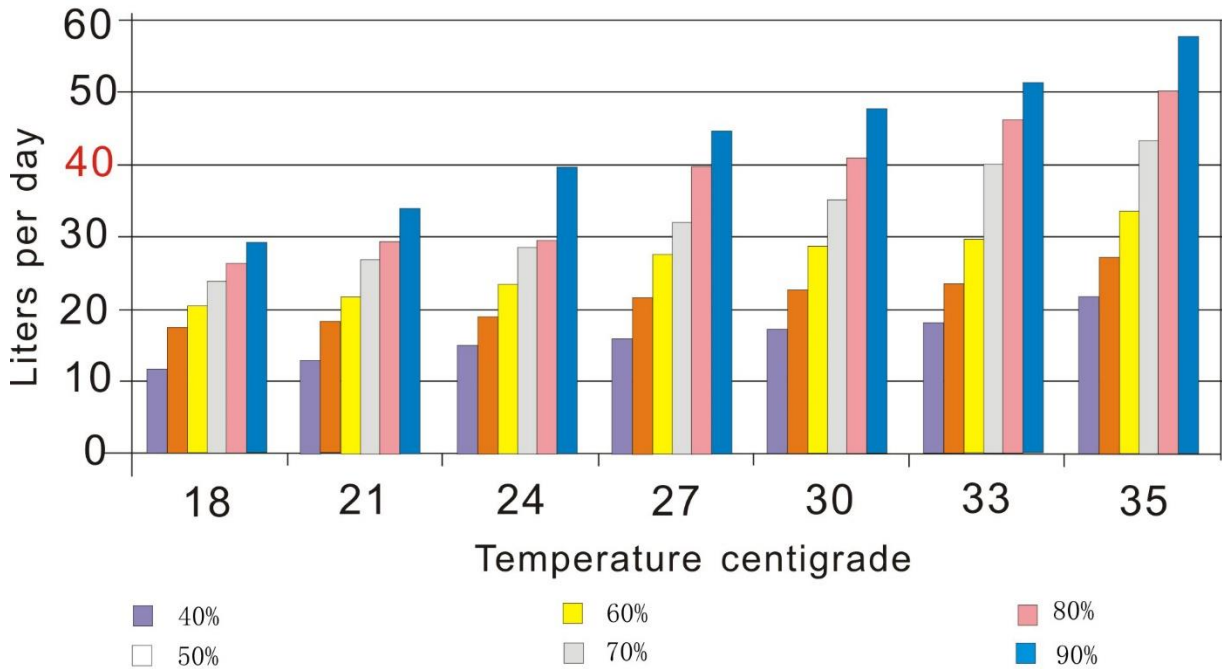
Packing size: 40 * 41 * 108CM 43*44*114CM

Qty(20'/40): 160/ 320 units

N.W: 53Kg. G.W: 55Kg

WATER PRODUCED CAPACITY FOR 24 HOURS

Water Production Chart



WATER FLOW DIAGRAM

