# High Efficiency Water Source Heat Pump For Hotels And Restaurants Stable

# **Basic Information**

Place of Origin: China

• Brand Name: horizontal-slurrypump.com

• Certification: CCC, ISO, CQC

Model Number: OEMMinimum Order Quantity: 1 setPrice: Negotiable

Packaging Details: Reinforced Carton box with wooden tray

Delivery Time: 1-2 weeks
Payment Terms: T/T
Supply Ability: 10 sets/day



# **Product Specification**

Product Name: Water Source Heat Pump

Feature: High Efficiency
 Oil Return: Stable And Reliable
 Application: Hotels And Restaurants

Advantages: Energy Saving

Working Fluid: Small

• Highlight: geothermal heat pump,

domestic ground source heat pump

## **Product Description**

#### High Efficiency Water Source Heat Pump For Hotels And Restaurants

### Water Source Heat Pump Introduction

Water-cooled screw water (ground) source heat pump unit

The water (ground) source heat pump unit uses underground shallow ground energy such as groundwater, soil, river water and lake water as the main energy source, and the electric energy is the auxiliary energy. The advanced water source heat pump central air conditioning system will be inexhaustible and kept at low temperature all the year round. The land energy resources within the scope are opened and utilized, making it a high-energy energy that can be used to meet the needs of building cooling and winter heating. The use of the unit is not affected by the environment and climate, and it is stable in operation. It is a new type of heat pump air conditioning system that utilizes renewable resources, is energy efficient, healthy and pollution free.

#### Scope of application

It can be widely used in hotels, hospitals, theaters, stadiums, entertainment centers, commercial buildings, office buildings, industrial and mining enterprises and other places to provide cold (hot) water for central air conditioning systems. At the same time, the unit can also recover the condensed waste heat during the cooling operation, economically produce the hot water needed by people, and improve the quality of human life.

#### Characteristics

- 1. High-end accessories, excellent performance, professional compressors, control valves and electronic control devices, reliable quality and stable performance.
- 2. The highly intelligent control system adopts industrial-grade programmable controller, which can monitor and analyze the various operating parameters of the unit in real time, so that the unit is always in the best running state.
- 3. The system is equipped with a full Chinese display, the interface is friendly and easy to operate.
- 4. Optional heat recovery device, using the exhaust heat of the compressor to produce domestic hot water of 45 ~ 55 °C. The water (ground) source heat pump system is an energy-efficient air-conditioning system that utilizes underground shallow geothermal resources (also known as ground energy, including groundwater, soil or surface water, etc.) and is both heat and cool. The system realizes the transfer of low-temperature heat energy to high temperature position by inputting a small amount of electric energy. The ground energy can be used as the heat source of heat pump heating in winter and the cold source of air conditioner in summer. The unit consumes 1kW of energy and obtains cold/heat of 4~5kW or more. Energy source In underground energy, the system does not discharge any waste gas, waste water and waste residue to the outside world. It is an ideal "green air conditioner" and can be widely used in office buildings, hotels, schools, dormitories, hospitals, restaurants, shopping malls, villas, residential and other fields. .

### Water Source Heat Pump Features:

High heat exchange efficiency.

The falling film evaporator used in the unit, the refrigerant is supplied from the upper part of the refrigerant, the internal heat exchange tubes are arranged according to a specific array, and the liquid supply distributor is arranged above the heat exchange tube. The refrigerant liquid is evenly dropped onto the heat exchange tube array, and a film is formed on the surface of the heat exchange tube, so that the refrigerant is in full contact with the heat exchange tube, and the vaporized gas is collected above the evaporator and passed through the passage. The suction pipe draws into the compressor. Therefore, the evaporation of the refrigerant in the falling film evaporator is more sufficient, and the heat exchange efficiency is higher. Compared with dry and full liquid evaporators, the heat transfer efficiency can be increased by about 10%.

2. The amount of working fluid is small and has obvious environmental benefits.

In the falling film evaporator, the refrigerant liquid can be fully evaporated by forming a film on the surface of the heat transfer tube. The refrigerant liquid in the flooded evaporator must be kept at a specified height to fully evaporate, and the refrigerant usage can be reduced by more than 20% compared with the full liquid evaporator. It has very important environmental significance.

3. The oil return is stable and reliable.

In the falling film evaporator, the frozen oil separated by the evaporation of the refrigerant is collected at the bottom of the evaporator, flows into the oil reservoir below the evaporator through the oil return pipe, and is sucked into the compressor through the oil return device to realize oil return. This oil return method is very stable and reliable, which ensures that the compressor is always operated under good lubrication, thus effectively extending the service life of the unit. It is difficult to return oil with the full liquid evaporator. The structure of the oil return system is complicated and the oil level is difficult to determine, which simplifies the design and effectively extends the service life of the unit. Therefore, the falling film heat pump unit has obvious energy saving effect and outstanding environmental protection effect.

## Water Source Heat Pump Application place:

Applicable to villas, hotels, restaurants, hospitals, factories, office buildings, theaters, stadiums, residential quarters, textiles, food, medicine, metallurgy, petroleum, chemical and boiler renovation projects.

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