LSS
ONCE-THROUGH STEAM BOILER
Fast-speed steam generation, compact structure, delicate appearance

- 3-5 mins steam generation
- Vertical spacing-saving structure
- Wide application
- Convenient installation

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Introduction

Once through steam boiler is a water tube boiler that the soft water passes through the membrane wall heated surface orderly, then turns to steam directly. It is composed of U shape upper and lower headers, membrane water wall, gas chamber, steam-water separator and other components.

Performance advantages

1. Super high efficiency
   Boiler proper: Adopt self-developed cold-reducing water pipe and membrane wall which is composed of special finned tubes as well as wide threaded tubes.
   Combustion mode: Adopt special reversal method.
   Waste heat recovery: Equipped with high efficiency stainless steel coil condenser which to recover the waste heat of the flue gas, and recover the residual heat of the boiler proper by air preheating, the thermal efficiency is up to 98%.

2. 3-5 minutes to produce steam
   The boiler is small in size and has a small amount of water. It takes only 3-5 minutes to start up the boiler and get the
steam with preset pressure, which saves a lot of preheating cost and time.

3. High safety
The boiler does not have the large volume steam pocket, the structure design can eliminate the hidden danger effectively, it adopts the advanced manufacture manufacturing technique and equips with safety protection device and high quality fitting, which guarantees 100% security.

4. Special flue gas process
The flue gas is dispersed into a plurality of small streams, the flame is distributed uniformly to avoid the local overheating of the furnace chamber and the radiation heat is utilized to the maximum extent. There is no dust accumulation dead angle in the gas duct, which can prevent dust accumulation and prolong the boiler service life.

5. Air Preheating
The cold air is heated to 50-60 DEG C through the furnace interlayer and the inlet air temperature is increased, hence boiler efficiency is effectively improved.
Flue gas condensation and feed water preheating
The high temperature flue gas and the low temperature feed water form the condensation heat exchange, thus it improves the feed water temperature and effectively utilizes the vaporization latent heat of water vapor in the flue gas and realizes the boiler efficiency to the maximization.

6. Concentrated sewage discharge function
The concentration of water in the boiler can be detected automatically, automatic sewage discharging will be carried out once it exceeds the standard, water concentration should always kept in the safe range, in order to prevent boiler fouling and steam water priming, hence prolong the long service life and ensures safety.

7. Water wall protection
Equipped with the heated surface wall sensor, detection of heated wall temperature will be performed to prevent overheating of the furnace body and ensure safety.

8. Modular operation mode
Multi sets installation instead of large capacity boiler, group control and distributed control can be realized, increase or decrease the boiler units automatically according to the load changes, "on the basis of timing, demand and amount” to supply required steam required, hence improves the boiler operation efficiency, so that the boiler can supply efficient, continuous and high quality steam under the best working conditions.
Product show
Application

Thermal oil boiler widely used in petroleum, chemical, pharmaceutical, textile printing and dyeing, light industry, building materials, food, road asphalt heating and other industries that need high temperature.
# LSS Once Through Steam Boiler Technical Data

## Boiler Item

<table>
<thead>
<tr>
<th>Boiler Item</th>
<th>LSS0.3</th>
<th>LSS0.5</th>
<th>LSS0.8</th>
<th>LSS1.0</th>
<th>LSS1.5</th>
<th>LSS2.0</th>
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<tbody>
<tr>
<td>Rated Output t/h</td>
<td>0.3</td>
<td>0.5</td>
<td>0.8</td>
<td>1.0</td>
<td>1.5</td>
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<tr>
<td>Rated Steam Pressure MPa</td>
<td></td>
<td></td>
<td></td>
<td>1.0,1.25,1.6,2.0,2.5</td>
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<tr>
<td>Steam Temperature °C</td>
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<td></td>
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<td>Feed Water Temperature °C</td>
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<td>Thermal Efficency %</td>
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<td>Fuel</td>
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<td>Diesel, Heavy Oil, Natural Gas</td>
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<td>Fuel Consumption Diesel kg/h</td>
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<td>Fuel Consumption Heavy Oil kg/h</td>
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<td>Fuel Consumption Natural Gas kg/h</td>
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<td>DN50</td>
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<td>DN20</td>
<td>DN25</td>
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<td>Electric power</td>
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<td>Chimney Diameter</td>
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<td>Boiler Weight</td>
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Remark: 1. Natural gas low calorific value 8500Kcal/NM³, Naphtha low calorific valve 10000Kcal/Kg, City gas low calorific valve 4000Kcal/Nm³.
2. The data and image in the table just as your refer, Huatai reserves the right to modify the data without notify the user since the product renews unceasingly.
3. Please get in touch with us to confirm the data to prefabricate, reserve and design the boiler room.
4. It is better to install condensing heat exchanger when the fuel is natural gas.
5. It is suitable to install economizer if the fuel is naphtha.

Related products

Our products are WNS oil&gas fired boiler, Condensing gas&oil fired boiler, Low NOx gas&oil fired boiler, Once-through boiler, Thermal oil boiler, Biomass fired boiler, Coal fired boiler and other boiler products.
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