



# Spiral Heat Exchangers

The simple choice for demanding liquids



**SONDEX**

**Spiral Heat Exchangers**

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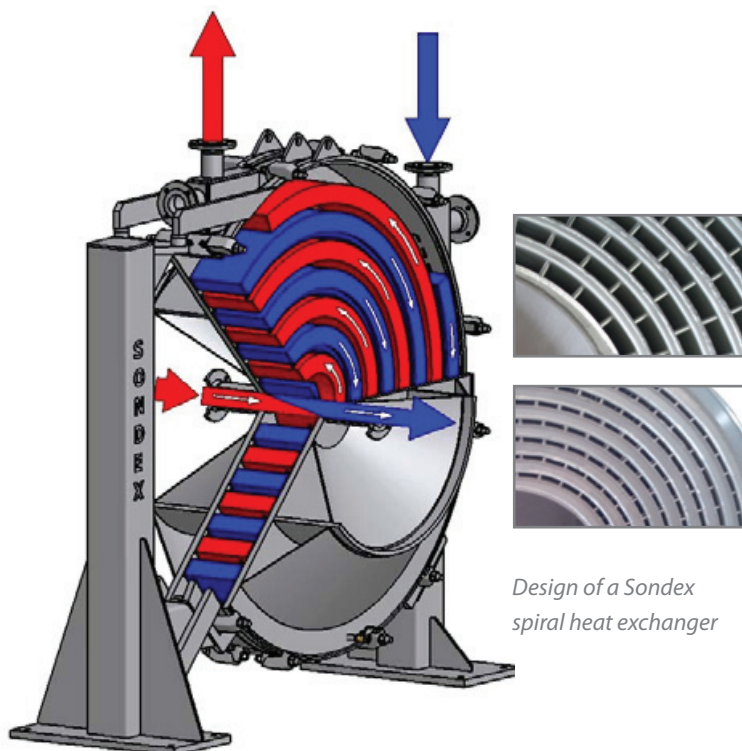
The perfect solution when plate and tubular heat exchangers are not sufficient for dirty medias!

## Design

The Sondex spiral heat exchanger is a circular heat exchanger with two spiral channels, each in one closed chamber ensuring that what comes in also comes out.

The flow of the two products is counter-current, which makes it possible to have a close temperature approach between the two medias being treated in the heat exchanger.

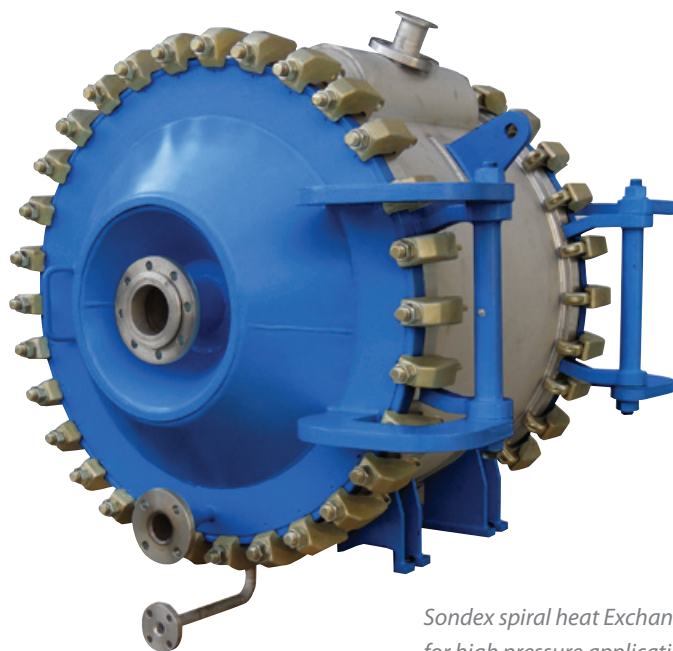
In the same spiral heat exchanger the design makes it possible to run free flow on the one side and standard flow on the other side.



*Design of a Sondex spiral heat exchanger*

## Medias and Applications

A large variety of fluids can be suitable for a spiral heat exchanger solution e.g. fouling liquids containing solids and fibres, waste water, slurries, mixtures with inert gases, cooling and heat recovery, vapour/liquid condenser and vacuum condenser with inert gases.



*Sondex spiral heat Exchanger for high pressure applications*

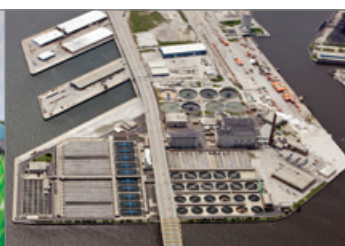
**Sondex spiral heat exchangers are used within the following industries**



*Refineries/Petrochemical*



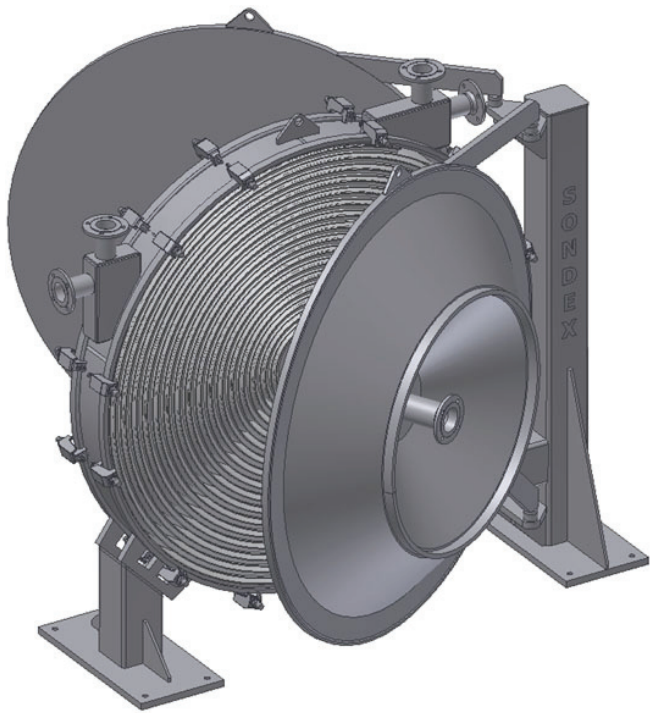
*Biogas*



*Waste water*



*Pulp and Paper*



### Easy maintenance

With a Sondex spiral heat exchanger there is easy access to the heat transmission area. Each side of the closed spirals can be accessed by opening the side frame of the heat exchanger without any special tools. When opening the side frame there will be full access to the heat transmission area on one side, which can be cleaned without getting in contact with the other side of the heat exchanger. The side frame is designed with hinges which make lifting equipment unnecessary.

### A very flexible pipe fitting solution

As an extra feature the flexible pipe connections make it possible to run CIP cleaning through the installation, when required.



Flexible pipe fittings



Long-life gasket solution

### Long-life gasket solution

The two gaskets placed on the side frames ensures a long-lasting solution. The opening and closing of the side frame increases wear of the gasket. Therefore the Sondex solution does not only have one gasket covering the whole side frame, but an edge gasket which can be easily replaced when wear occurs.

### Customized solutions

No application and duties are the same for a spiral heat exchanger meaning that all Sondex spiral heat exchangers are always customized according to the specifications from the customer.

### Saving valuable production area

The spiral heat exchanger is a compact solution. The design only requires a small space for installation compared to traditional heat exchanger solutions. This saves valuable production space and costs.



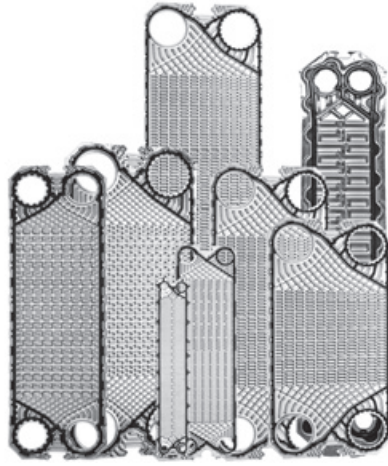
Sondex spiral heat exchanger at Linko Gas in Denmark

### Technical Specifications:

Standard Materials	Surface Area	Max. Working Pressure	Construction Standard	Connections	Additional Equipment
Spiral and connections in stainless steel or carbon steel. Frames in carbon steel	1-400m <sup>2</sup>	PN 6-10-16 Bar/ max. 200°C	PED 97/23/EC	According to all known standards	Floor mounting feet

It is wise  
to choose  
**SONDEX**  
solutions!

## Related Products



Sondex free flow plates



SIP/SMP pump  
for industrial and  
marine applications



Sondex PX pump for  
wastewater applications

## About Sondex

Sondex is specialized in development and production of plate heat exchangers for the industrial, marine, HVAC, refrigeration as well as the food and dairy industries.

Since the start in 1984 Sondex has expanded its activities in order to become one of the leading manufacturers of plate heat exchangers delivering the most extended plate portfolio for the heat transfer industries worldwide.

Besides the traditional plate heat exchangers with gaskets the plate program also includes brazed, semi-welded, all-welded plate heat exchangers, freshwater distillers and district heating units.

### Well-known for:

- High operation safety
- Exact energy transfer
- Low running costs
- Environmentally acceptable
- Energy saving

### Gasketed Plate Heat Exchangers

### Free Flow Plate Heat Exchangers

### Semi-Welded Plate Heat Exchangers

### Brazed Plate Heat Exchangers

### Steam Units



# SONDEX

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