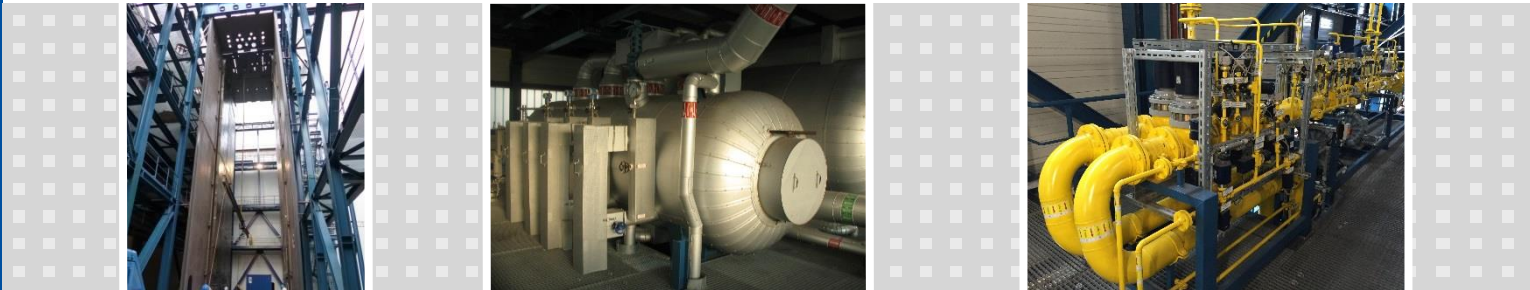


- HEAT RECOVERY
- BIOMASS
- PRIMARY FUELS
- SOLID RESIDUES
- LIQUID & GASEOUS RESIDUES

CHP PLANT FLENSBURG GERMANY



CHP PLANT FLENSBURG, GERMANY



Energy Source	GT Exhaust Gas
Gas Turbine Type	SGT-800B
GT-Exhaust Gas Flow	360,000 mn ³ /h
GT-Exhaust Gas Temperature	500 - 600 °C
GT-Electric Output	50 MW
Steam Capacity HP / LP	110 / 10 t/h
Steam Temperature HP / LP	525 / 190 °C
Steam Pressure HP / LP	75 / 8.5 bar
Feed Water Temperature	105 °C
FG Temp. Boiler Outlet	60 °C
Fuel AFS	Natural Gas
Year of Commissioning	2016

THE TASK

The municipal public utility Stadtwerke Flensburg GmbH has placed an order with Standardkessel Baumgarte for the construction of a heat recovery plant with ancillary trades. It is an integral part of the new combined cycle gas and steam-turbine plant that Stadtwerke Flensburg is constructing in its Flensburg power plant within the scope of the boiler No. 12 modernisation project.

The plant, with a total capacity of 75 MW_{el} and 75 MW_{th}, is to supply the required energy in an environmentally friendly way. The specific CO₂ emission decreases by approximately 40% in comparison with existing coal-fired boilers. The boiler plant is used for the generation of hot water for the district heat supply, as well as, of electricity in a cogeneration system for the city of Flensburg.

THE SOLUTION

The gas and steam turbine plant consists of a gas turbine with downstream heat recovery boiler, the live steam from which is passed on to a steam turbine. To increase the efficiency the steam is generated at two pressure levels and fed to the steam turbine.

The horizontal design of the heat recovery boiler plant, as well as, special design features additionally meet the extreme demands made on daily start-up and shut-down.

SCOPE OF SUPPLY

- 2-pressure Heat Recovery Boiler with District Heat Exchanger
- Feedwater System
- Electrical Systems
- Structural Steelwork, Stairs and Platforms
- Ancillary Plants and Equipment

SERVICES

- Approval Engineering
- Planning and Implementation Engineering
- Erection
- Commissioning

