

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

CCP PLANT MARL VI GERMANY



CCP PLANT MARL VI, GERMANY



Energy Source	Natural Gas
Number of Lines	2
GT-Exhaust Gas Flow	137.2 kg/s
GT-Exhaust Gas Temperature	569 °C
GT-Electrical Output	55 MW
ST-Electrical Output	37 MW
Steam Capacity	226 t/h
Steam Temperature	500 °C
Steam Pressure	80 bar
Feedwater Temperature	85 °C
FG Temp. Boiler Outlet	89 °C
RTI Aux. Firing System	181 MW
Fuel for Auxiliary Firing	Natural Gas, Production Residues (gaseous)
Year of Commissioning	2021

THE TASK

In order to safeguard the supply of electricity and steam to Marl Chemical Park and to ensure the utilization of various residual gases from the production of chemicals on an economical, ecological and future-proof basis, the existing power plant park is being modernized. Evonik is replacing the last coal-fired power plant at the location by two gas and steam turbine plants. From Siemens Gas and Power which, as the general contractor, is in charge of the planning and construction of the two combined cycle power plants, awarded Standardkessel Baumgarte the order for the supply of two identical steam generators with ancillary trades.

THE SOLUTION

The heat recovery boiler is of horizontal design and is suspended in the boiler steel structure. The burner system for the GT exhaust gas supply and for additional firing of the specified gases (natural gas, LPG, process gas, harbour gas, e gas, EOX cycle gas) consists of 3 burners that are integrated into the boiler front wall.

The new power plant units will be linked with the existing plants in such a way that in the event of failure or standstill of individual power plants an uninterrupted supply of steam to the chemical park is ensured.

SCOPE OF SUPPLY

- 2-Pressure Heat Recovery Boilers
- Combustion Air System
- Burners with Filter Stations and Fire-Fighting Fittings
- Insulation
- Stacks, Steelwork, Stairs and Platforms
- SCR (NO_x + CO Reduction)
- Sampling Station
- Dosing Station
- Ancillary facilities

ENGINEERING SERVICES

- Engineering
- Assembly
- Commissioning

