

COMPANY PROFILE

COMPANY INFORMATION

HEAT gas technologies GmbH is a medium sized company with its focus on customized solutions for our clients. Established in 1984 we have decades of experience in the natural gas and environmental business. 2020 HEAT gas technologies became part of RMA group in Rheinau / Germany with more than 800 employees and 160 Million Euro turnover in 2020.

HEAT gas technologies provides a wide range from Engineering - Procurement - Manufacturing - Construction - Commissioning - Service to complete Turn-Key Solutions.

For all HEAT gas technologies team members, it is our highest goal to serve our customers and to establish a partnership and long term cooperation with our clients and suppliers, to act safe and responsible with our various stakeholders and to protect the environment. With our engineering

team we design all equipment and process plants for our well proven natural gas and environmental technology plants. With our experienced workshop we manufacture products and components in our own facilities to ensure that engineering and manufacturing goes hand in hand. With our international proven project management team, we handle complex specifications and requirements from Industry, international EPC's, Oil and Gas Companies, Power plants as well as Transition Operators. With HEAT gas technologies one stop shop concept, our customers have one partner for process design, detail engineering, manufacturing, installation, commissioning and service.

This is why HEAT gas technologies GmbH is your best partner for gas systems in the gas distribution network and gas power plants:



**OFFICE BUILDING
AND FABRICATION WORKSHOP**

NATURAL GAS AS THE BRIDGE TO A SUSTAINABLE FUTURE

- 4 decades of Experience in the natural gas business
- Well experienced employee team
- Family-owned business with customer service at the heart of its mission statement
- Member of one of the strongest solution providers in Europe in the field of natural gas
- Full-service provider from the basic design engineering to commissioning and field service
- Offices and Agent network in 17 countries on three continents
- Delivery experience on 5 continents
- Flexible and customized solutions for the design and execution of the projects
- Manufacturing in own workshop and with cooperation partners for international business
- Design and manufacturing of all process critical components and the complete systems ensures full control of quality and performance.

HISTORY

1984

Founded in 1984, under the name of HEAT wärmetechnische Anlagen GmbH in Vienna, the company was started as an engineering provider with a small team of skilled engineers.

1996

1996 the company R+I Rohr- und Industrieanlagen GmbH, a pipeline and construction company was founded and is today a sister company within RMA group.

2011

In 2011 E.U.T. Anlagenbau GmbH was taken over by HEAT and the references and skills from the engineering team is today active in HEAT gas technologies department of environmental technology.

From the very beginning activities and market sales were developed international with the focus on Europe and neighboring countries. In the last ten years HEAT gas technologies developed more it's international business worldwide. Currently HEAT gas technologies plants and equipment are on all

1989

In 1989 in Biedermansdorf, close to Vienna a first production for vessels and gas devices was started. Customized engineering, development of new products and a high production and delivery quality ensured the growth of the company.

2004

In 2004 Combusta Engineering und Anlagenbau GmbH, a company active in the field of LPG plants and ammonia supply systems became part of HEAT and the products and services were developed further within the HEAT ammonia engineering team.

2020

Since October 2020 HEAT gas technologies is part of the worldwide active RMA group which in return supports our international activities and strengthen customers relationship.



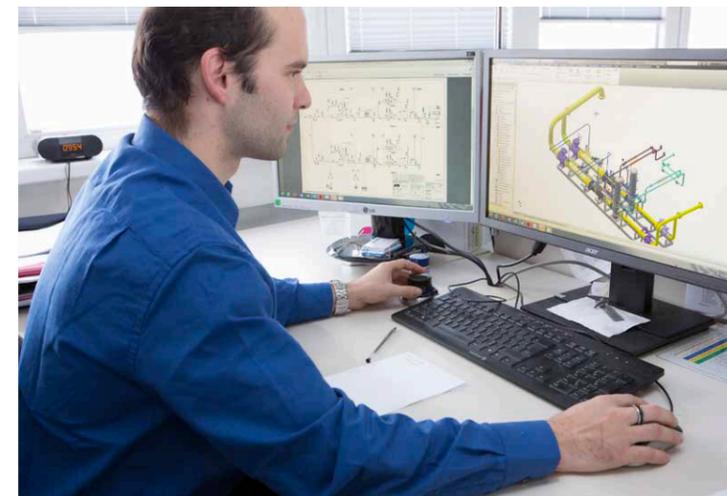
continents. Strong partnership and cooperation were reached with the most well-known corporates in the sector of power and energy systems and HEAT gas technologies is working and further strengthening the existing partnership and to develop new ones in the near future.

ENGINEERING



HEAT gas technologies offers the complete natural gas system engineering. We offer basic engineering including the process design for the equipment. HEAT is specialized in design of different separator and filter executions for various solutions to clean the gas from liquid and solid impurities. HEAT offers the process design calculations including the dimensions of equipment, piping, valves, heat exchangers. Depending on the gas composition and the impurities, the material for the equipment will be selected.

The basic design includes the Process Flow Diagram for the entire unit including mass and heat balance, the Piping and Instrumentation Diagram, Layout of the station, respectively the single skids, basic foundation drawings with loads and forces.



In the continuing detail engineering following the chosen design code we will offer the detailed manufacturing drawings of all equipment including part lists, data sheets for instrumentation and valves including hook up's drawings, pipe classes, stress calculations, static calculations of hot piping. The process descriptions and control concept will complete the detail design.

MANUFACTURING



HEAT gas technologies has its own manufacturing workshops for welding and assembling of skid mounted units and equipment manufacturing with an overall area of 2.500 m². Single equipment such as separators and preheaters can be manufactured up to 25 tons. The pipe spools will be prefabricated according to the applicable design codes. None-destructive testing of all welding will be performed with all standard test methods

and considering all common worldwide standards. The assembling of equipment and skids is performed in the workshop or at site for large components. Depending on the business area we cooperate with local manufacturing companies to reduce transportation costs, hence strengthen the local content of the projects which ensures short service distances to the customer.



CONTROL SYSTEM

LOOP CHECK



WORKSHOP

SKID FABRICATION



WELDING OF

PRESSURE VESSEL

GAS PRESSURE REGULATING AND METERING STATIONS / FUEL GAS SUPPLY SYSTEMS

HEAT gas technologies supplies all kind of pressure reduction and metering station for transmission operators as well fuel gas supply units for gas turbine and gas engine power plants.



Hamriyah (UAE) power plant Fuel gas supply system with hot water heating, 205 m³ buffer and Switch over buffer conditioning system

FLOW: 365.000 nm³/h
PIN: 24 - 52 barg
POUT: 42,2 barg



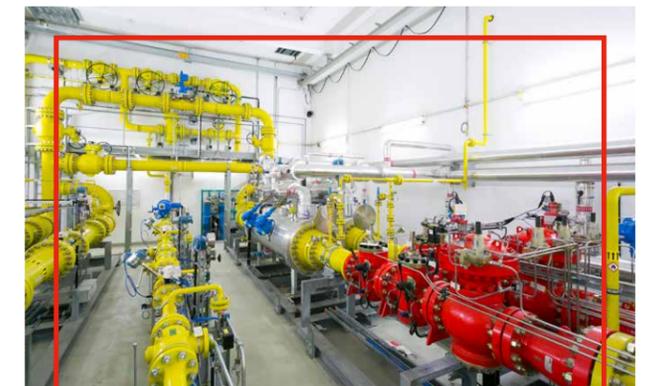
Layyah (UAE) power plant Fuel gas supply system at workshop FAT

FLOW: 198.500 nm³/h
PIN: 30 barg
POUT: 19,36 - 27 barg



Mobile modularized Steel Container PRMS with electrical heating and control panel:

FLOW: 12.500 nm³/h
PIN: 100 bar



FGSS on skid with erection at site in a concrete building with hot water heating:

FLOW: 150.000 nm³/h
PIN: 38 - 70 bar
POUT: 31 - 33 bar & 3 - 4 bar

GAS DEHYDRATION UNITS

HEAT gas technologies supplies dehydration solutions for natural gas production and underground gas storages to provide sales gas required water and hydrocarbon dewpoint. Depending on gas composition and technical parameters Absorption process with Triethylenglycol and Cold Separation technology can be supplied.

HEAT gas technologies provides the complete process design and execution of the systems. For TEG-Water dehydration systems absorbers with structural packages will be used. For the regeneration process different heating methods, like firing, hot oil processes and incineration of the off gases including heating of the regenerator can be provided. On cold separation processes for HC-dew point adjustment also wet gases with injection of glycol can be treated.



GDU on country border Compressor Station

GAS FLOW: 9.600.000 nm³/d
PIN: 35 - 70 bar
TEG-FLOW: 6.500 kg/h



GDU on Underground Gas Storage

GAS FLOW: 5.000.000 nm³/d
PIN: 45 - 87 bar
TEG-FLOW: 8.000 kg/h



LTS unit gas production plant

GAS FLOW: 2 x 1.000.000 nm³/d
PIN: 45 - 80 bar



LTS unit gas production plant

GAS FLOW: 1.000.000 nm³/h
PIN: 40 - 70 bar
TEG-FLOW: 1.000 kg/h

FILTER SEPARATORS, HEAT EXCHANGER & PIG TRAPS



Filter Separator SNH
 Gas Flow 350.000 nm³/h
 PN100



Quick Opening Closure
 DN 1300 (52")
 PN300



Gas Preheater WAT-LW
 Gas Flow 150.000 nm³/h
 PN70



Filter Separator SNP
 DN700/1600
 PN84

HEAT gas technologies supplies all vessel equipment for natural gas distribution systems, pipelines, underground gas storage and power plants. The production range is from standard filters to high pressure separators including HEAT own quick opening closure and tubular heat exchangers incl. double tube safety heat exchangers.



Double tube Safety HX WAT-SH
Gas Flow 30.000 nm³/h
PN40



Double tube Safety HX WAT-SH
Gas Flow 400.000 nm³/h
PN210



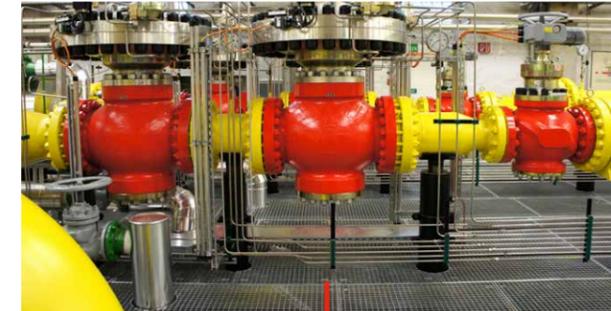
Filter Separator SNP
Gas Flow 280.000 nm³/h
PN84



Pig Trap with HEAT Quick Opening Closure
DN 1400/1600 (56"/64")
PN100

GAS PRESSURE REGULATORS / SAFETY SHUT OFF VALVES

HEAT gas technologies supplies gas devices for natural gas distribution systems, pipelines, underground gas storage and power plants. The production range is from small to large dimensions and for high pressure. In Austria we distribute further to HEAT also Itron gas devices and metering and all RMA products.



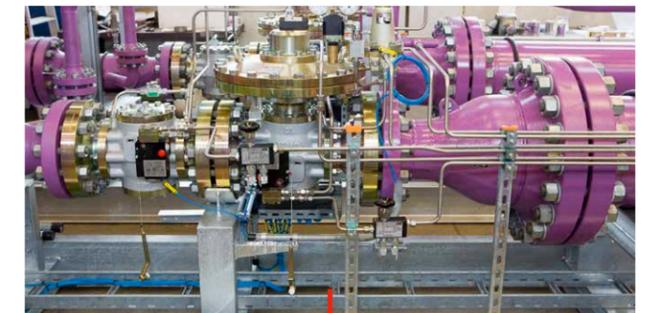
DN300 (12") PN100 -
Monitor Regulation for main gate city station



DN200 (10") PN100 -
Double SSV + Regulator for power plant



Warm Water Safety Shut Off Valves G42 -
1"-10" | PN40 - ANSI1500



National Gas Grid station for
low pressure net supply



SSV / Gas Pressure Regulator under hard
working conditions in cement factory



High Pressure Monitor Regulators for 150 bar
on underground gas storage

ENVIRONMENTAL TECHNOLOGIES

HEAT gas technologies supplies ammonia systems for NOx reduction process for a wide range of industry, power plants, refinery, steel mills and others. The scope of service includes process design, manufacturing, commissioning and service. Main parts are unloading and storage equipment, Ammonia evaporation systems, ammonia-air mixture and flow control units for aqueous and anhydrous Ammonia.



AMMONIA SUPPLY SYSTEMS



Aqueous ammonia vaporizer skids for refinery



Aqueous ammonia storage tanks for coal power plant



Ammonia anhydrous vaporizer skids for a power plant in Turkey



Aqueous ammonia vaporizer, dilution air and mixing skids



Aqueous ammonia storage tanks 2x 1.100 m³ double walled (WHG) - site manufacturing



Aqueous ammonia ship unloading facility for a coal power plant

BIOGAS / BIOMETHANE – GRID INJECTION COMPRESSOR UNITS



Compressor Unit in concrete container
350 Nm³/h, discharge pressure 11 - 69 bar

HEAT gas technologies supplies compressor systems for Biogas / Biomethane plants as well grid operators, who want to inject into some higher pressure gas grid. The scope of service includes design, manufacturing, commissioning spare parts and maintenance service as "plug&play" solutions. We are in partnership with an oil-free, well referenced, compressor manufacturer.

Compact container solutions, out of metal or concrete, workshop assembled and control systems as well peripheral systems like cooling system, pressure regulating and/or metering options, but not limited too.



HYDROGEN (H₂) BLENDING UNITS

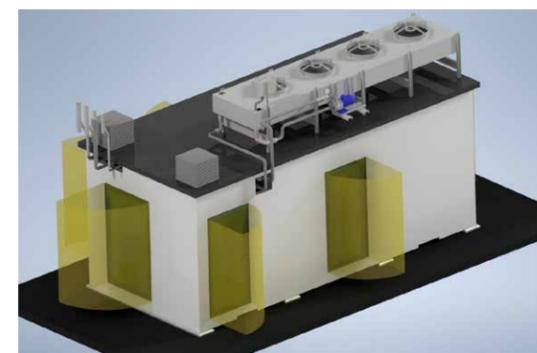


HEAT gas technologies is one of the leading companies in development of applications for transferring the natural gas infrastructure to future demands with hydrogen service. For all equipment we serve our client with solutions for natural gas with hydrogen, usually content up to 30 % and with solutions for 100 % H₂ Service.

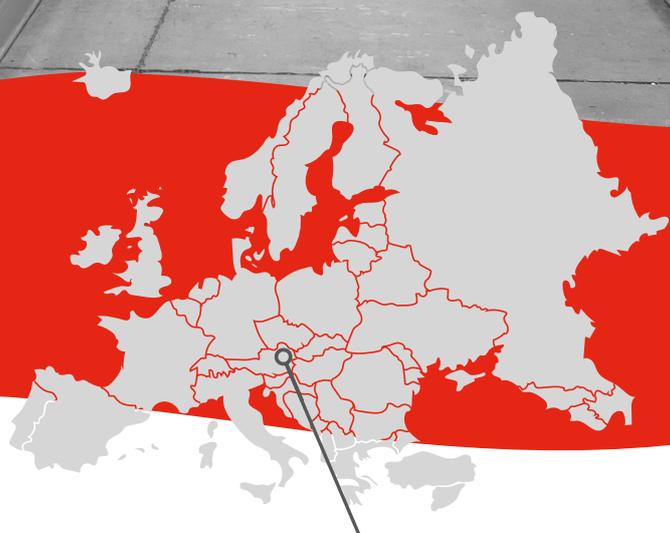
Test our team and their experience for hydrogen feeding stations, hydrogen pressure reducing stations, filter-separators, heat exchangers and gas devices.

We could offer:

- H₂ ready components (valves, separators, etc)
- direct H₂ grid injection
- bypass H₂ grid injection (Blending Stations)



WE WILL DEVELOP
YOUR CUSTOMIZED
SOLUTION.



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