

Holistic energy concept increases efficiency of paper mills in Germany

- **Maximizing performance and efficiency with innovative drives solution**
- **Three power plants will be equipped with latest-generation power generation equipment**

The current increase of packaging and pulp demand in the fiber industry is accompanied by numerous challenges, including fluctuating costs of energy and raw materials. Siemens energy-efficient concepts and solutions are designed to help the paper industry set new global standards for efficiency, performance, and sustainability. A recent example is a project in Germany, where Siemens will help paper and packaging producer Palm increase its plant efficiency by providing a holistic energy concept. This includes the electrification of a new paper-machine production line and a new power plant equipped with the latest-generation gas turbine.

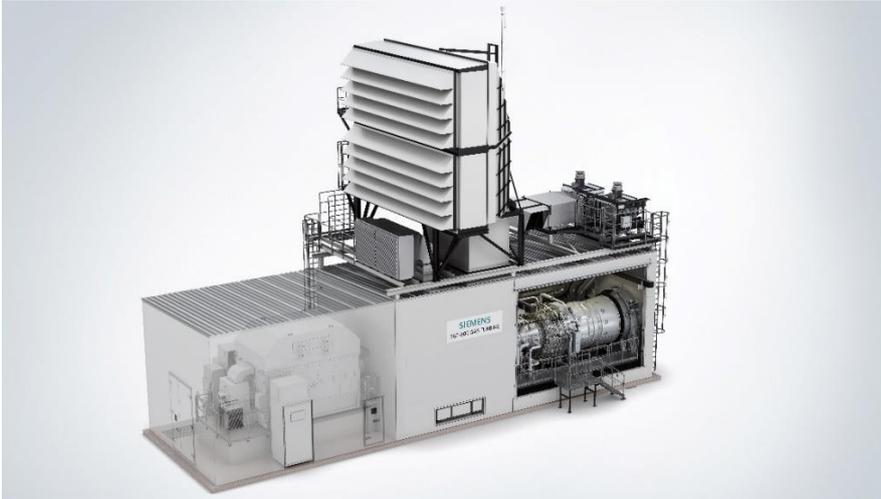
Siemens secured the order earlier this year and will supply the complete electrification for Palm's new paper-machine 5 production line at the paper mill site in Aalen (Baden-Wuerttemberg) – from gas-insulated medium-voltage switchgears type 8DA10 and Sivacon S8 motor control centers to power transformers from 25 MVA to 112 MVA, Sivacon 8 PS busbar trunking systems, and Siemens' innovative drive technology. The drive technology supplied will include 350 drives with sectional drives for the paper machine. The order also comprises the delivery of a SGT-800 gas turbine at the latest 62 megawatt (MW) rating and a SST-300 steam turbine for a new combined heat and power plant (CHP) at the site. "We are pleased to be expanding our global SGT-800 gas turbine fleet, this time in Germany. We have more than 370 units sold worldwide with a strong record of successful installations" said Karim Amin, CEO of Power Generation at Siemens Gas and Power.

At the customer's existing paper mills at the Eltmann site in Bavaria and the Wörth site in Rhinland-Palatinate, Siemens will replace older SGT-800 gas turbines with a lower rating with upgraded SGT-800 gas turbines and deliver a SST-300 steam turbine for each site. The new gas turbines will provide an additional 17 MW per site. The installed power is specified at approximately 70 MW per site and commissioning of the three power plants is planned for mid-2021. Palm signed long-term service contracts to ensure top reliability and efficiency for many years to come.

"All of our customers have their unique demands for power supply," said Thorbjörn Fors, CEO, Service Distributed Generation and O&G at Siemens Gas and Power. "I'm delighted to see how, by delivering the latest technology and industry know-how, we can provide our customers with higher levels of efficiency and significant CO₂ reduction per Mwh that will benefit both them and the societies they serve."

The high efficiency of the SGT-800 combined with its fulfillment of the customer's NOx requirement (below 15 ppm) ensures a low environmental footprint. The ongoing evolutionary development of the proven SGT-800 gas turbine means optimal reliability and is a future-proof investment for the continued sustainable operation of the paper mills. The three combined heat and power plants will generate sufficient power and steam to the mills and will also supply surplus power to the national grid.

Papierfabrik Palm GmbH & Co. KG, founded in 1872, is a leading manufacturer of newsprint and corrugated base paper. It operates two recycling companies, five paper mills, and 28 corrugated plants with a total workforce of approximately 4,000.



Siemens will deliver three SGT-800 gas turbines to customer Palm. Two of the gas turbines will replace older gas turbines with a lower rating at the paper mills at the Eltmann and Wörth sites, while the third SGT-800 unit will be a new-built installation for the new combined heat and power plant at the Aalen paper mill site.

This press release and a press picture are available at

<https://sie.ag/2pv21Lx>

For further information on Siemens Gas and Power, please see

www.siemens.com/energy

For further information on Siemens and the fiber industry, please see

<https://new.siemens.com/global/en/markets/fiber-industry.html>

For further information on energy solutions for the fiber industry, please see

<https://new.siemens.com/global/en/products/energy/power-generation/steam-turbines/fiber-industry.html>

Contact for journalists

Christina Huemmer

Phone: +49 9131 17-45722; E-mail: christina.huemmer@siemens.com

Follow us on Twitter at: www.twitter.com/siemens_energy

Siemens Gas and Power (GP) is a global pacesetter in energy, helping customers to meet the evolving demands of today's industries and societies. GP comprises broad competencies across the entire energy value chain and offers a uniquely comprehensive portfolio for utilities, independent power producers, transmission system operators, the oil and gas industry and other energy intensive industries. Products, solutions, systems and services address the extraction, processing and the transport of oil and gas as well as power and heat generation in central and distributed thermal power plants, power transmission and grid stability, as well as energy transition technologies including storage. With global headquarters in Houston in the U.S. and around 63,000 employees in over 80 countries, Siemens Gas and Power has a presence across the globe and is a leading innovator for the energy systems of today and tomorrow, as it has been for more than 150 years.

Siemens AG (Berlin and Munich) is a global technology powerhouse that has stood for engineering excellence, innovation, quality, reliability and internationality for more than 170 years. The company is active around the globe, focusing on the areas of power generation and distribution, intelligent infrastructure for buildings and distributed energy systems, and automation and digitalization in the process and manufacturing industries. Through the separately managed company Siemens Mobility, a leading supplier of smart mobility solutions for rail and road transport, Siemens is shaping the world market for passenger and freight services. Due to its majority stakes in the publicly listed companies Siemens Healthineers AG and Siemens Gamesa Renewable Energy, Siemens is also a world-leading supplier of medical technology and digital healthcare services as well as environmentally friendly solutions for onshore and offshore wind power generation. In fiscal 2019, which ended on September 30, 2019, Siemens generated revenue of €86.8 billion and net income of €5.6 billion. At the end of September 2019, the company had around 385,000 employees worldwide. Further information is available on the Internet at www.siemens.com.