

# GETEC GREEN STEAM



GETEC

Paper industry:  
Pfleiderer Teisnach (Germany, Bavaria)

ENERGY FOR MORE.



Supported by:



Federal Ministry  
for Economic Affairs  
and Climate Action

on the basis of a decision  
by the German Bundestag





Boiler house with biomass boiler.



Process steam distribution and combustion air fan.

## THE CUSTOMER

The medium-sized traditional company Pfeleiderer Teisnach GmbH & Co. KG produces around 40,000 tons of paper annually in Teisnach, Bavaria. The product range includes specialty papers for the food industry, for decoration and packaging as well as for technical applications.

## THE CHALLENGE

Energy efficiency and the responsible use of raw materials play an important role for Pfeleiderer Teisnach. The aim was to develop a highly efficient steam supply system based on biomass that meets the requirements for a sustainable energy supply at the Teisnach site and at the same time contributes to the success of the energy transition. A site-wide steam network supplies all production facilities with process heat. The pulverized lignite-fired boiler previously used for steam generation can provide process steam quantities of up to 24 tons per hour (approx. 68 GWh per year). The energy content of lignite used for this amounts to 78 GWh per year. The boiler is operated on the premises of Pfeleiderer Teisnach GmbH as part of our energy contracting.

## THE SOLUTION

In the project, the existing lignite-fired boiler will be decommissioned and the paper mill's future process steam supply will be converted to a biomass-fired steam boiler to generate process steam. The new biomass plant will be fired with wood chips and waste wood.

An optimized technical design is also intended to achieve better utilization of the system and thus a higher degree of efficiency. The primary energy input of the fuel can thus be reduced from 78 GWh to 76 GWh. Together with the fuel conversion, this will avoid more than 27,000 tons of CO<sub>2</sub> emissions per year with the same steam production.

## SCOPE OF SUPPLY AND SERVICES

- Project Development
- Permitting
- Engineering and plant installation
- Financing
- Inspection, maintenance, repair and emergency service
- Fuel management

### PLANT DATA

Supply with:	Process steam
Energy source:	Biomass (Waste wood A1-A2, wood chips) Light heating oil (Redundancy)
Components:	Steam boiler Fuel feeding and -conveying
Installed Capacity:	14,5 MW <sub>th</sub> (Biomass) 14,5 MW <sub>th</sub> (Light heating oil)