A Case study from Heat Management

Zellstoff Pöls Austria

Name: Heinzel Group, Zellstoff Pöls AG
Application: Black Liquor Recovery Boiler
Efficiency solution: High Impact Sootblowing System (HISS™)
Cleaning area: Superheater (SH), Boiler bank (BB), and economizer (ECO)

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General info

Plant: Pulp mill
Boiler: Andritz
Fuel: Black liquor
Capacity: 2 600 ton DS/day

Installation

Type: HISS™ Advanced
No of sootblowers: 86
Year of installation: 2021

Situation description

Zellstoff Pöls has a new Andritz recovery boiler equipped with 86 steam sootblowers from Clyde Bergemann. The mill has a capacity of 460 000 tons of bleached sulphate pulp for packaging products annually and is discussing the possibility to increase the capacity to 500 000 tons annually.

The goal with the installation of HISS was to reduce sootblowing steam consumption by at least 30%, using the saved steam to supply 1/3 of the increased demand for PM3.

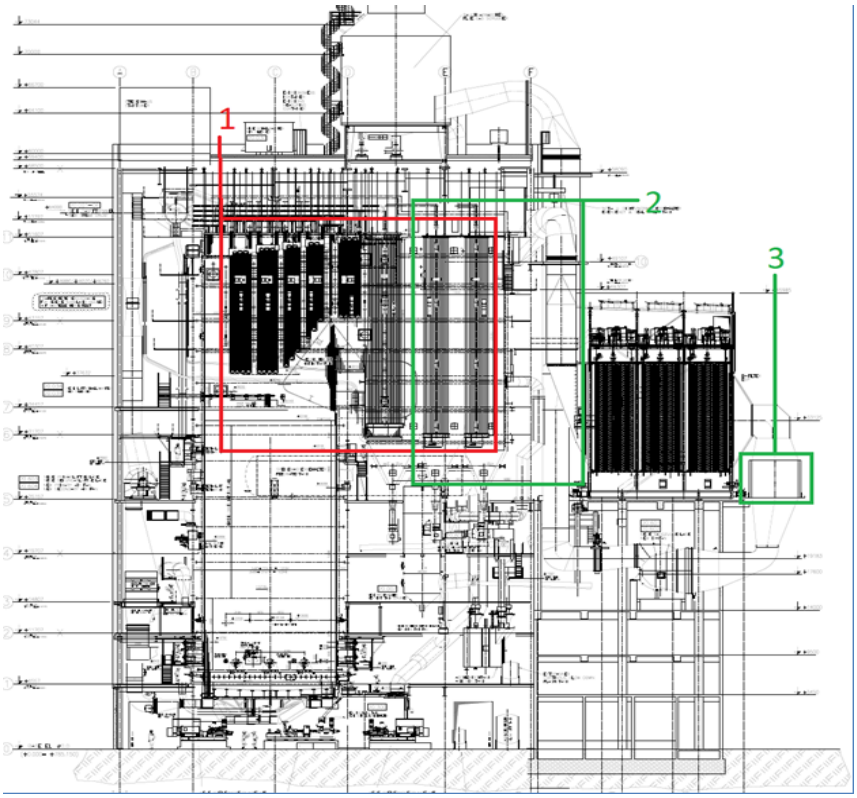


Figure 1. Boiler design

Results

HISS was installed on 86 sootblowers 2021, and generated the following results:

- 36-41% reduced sootblowing steam consumption. The goal was to save 30% sootblowing steam, corresponding to 6 ton/h.
- 1,5MW increased electricity generation, which corresponds to 12,75 GWh annually.



Figures 2-4. Installation photos from Zellstoff Pöls

In the final evaluation of the HISS™ system, we have been able to measure results that with a good margin supersedes the guaranteed values, making it easier to reach sustainability goals while also taking our production of renewable power to new lengths

says Christian Perschler, Project Manager for Zellstoff Pöls

Heat Management

Heat Management was founded in 2016 following a merger between Infrafone AB and Soottech AB. The purpose of the merger was to create a world-leading cleantech company with a superior product portfolio in energy conversion adapted for industrial boilers and incinerators.

Heat Management's primary customers include power and heat plants as well as pulp mills and marine companies. Today, Heat Management has patented solutions installed in a large number of applications around the world.

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