

CONNECTING
EXPERTS.

CHILLVENTA eSPECIAL

Refrigeration | AC & Ventilation | Heat Pumps

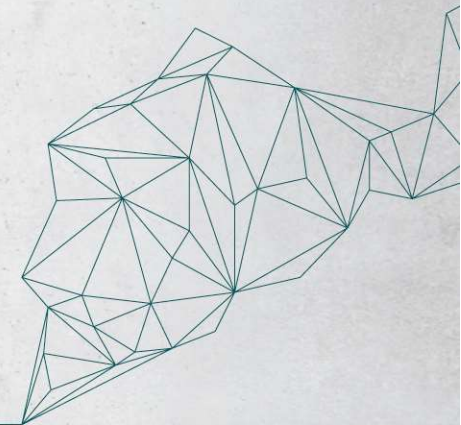
13.–15.10.2020

NÜRNBERG MESSE

An Introduction to Howden's manufacturing capabilities



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An Introduction to Howden's manufacturing capabilities

Content Overview



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World Leaders in Screw Compressors

Howden Group



Howden Compressors
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Howden Compressors

160⁺ Years of
engineering
experience



Howden people live to improve our products and services and for over 160 years our world has revolved around our customers. This dedication means our air and gas handling equipment adds maximum value to your operations. We have innovation in our hearts and every day we focus on providing you with the best solutions for your vital operations.

40,000 Screw compressors
installed world wide

340 Skilled
associates



Upstream



Midstream



Power



Chemical



Petrochemical



Water



Industrial

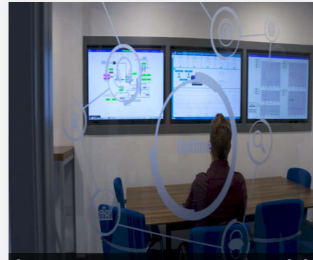


Refinery

Industries Served Globally

Howden Compressors

Renfrew Manufacturing Facility



Howden's head office and operational base is in Renfrew, Scotland.

The Renfrew Manufacturing Campus opened in 1987 and remains the global headquarters for screw compressor technology.



World Leaders in Twin Screw Compression

Site Area: 65,000 m²

Factory Area: 10,500 m²

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Customer Experience

Digital Test Suite



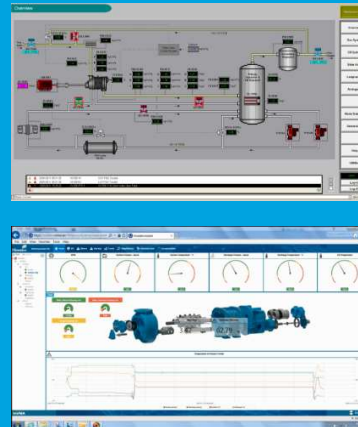
Embracing **data and digital technologies** to enhance our **Customer** experience.



The clients can now inspect the machine prior to start then relax in the comfort of the studio while witnessing the test and removing the need to be in a high risk environment.



Deployed digital infrastructure, including wi-fi enabled cameras, to get the test beds measuring and recording live.



As the platform is hosted on the cloud the client could dial in and watch the test from their own desk.



Assembly and Manufacturing

Renfrew Operations



COE Factory Standards



- ISO 9001, ISO 14001 and OHSAS 18001.
- First of its kind Screw Compressor certified ISO class 8 Clean room assembly environment now operational in Renfrew.



World Class manufacturing



- Rotors manufactured to the highest grade and surface finishes on our 5 axis grinding machines.
- Casing quality verified by our on-site CMM ensuring the micron tolerance accuracy.



Smart Factory

Cyber-physical systems

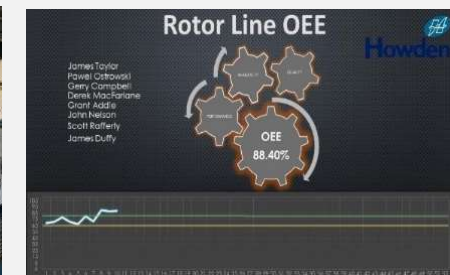
TPM

- Integrated Uptime to monitor and improve performance.
- Planned, predictive maintenance to ensure Customer commitments.



OEE

- Real-time visibility over Rotor and Casing manufacturing stages.
- Optimising machine tool quality, availability and performance.



The Operations Experience

The benefits of our Operations Improvements



Plan and schedule Resources in line with Customer Demand



Daily Management of our Customer metrics at the Gemba



Maximise Value Add activity throughout the process



Serve our Internal and External Customers



Deliver and repeat with lifetime commitment



Monday	Tuesday	Wednesday	Thursday	Friday

**Thank you for your
attention.**

**CONNECTING
EXPERTS.**

