



# PROJECT PROFILE

## Ventilation audit & engineering study supports business growth

### The Situation

A loyal Schust foundry customer found themselves in a predicament that we all want. The business was growing. They were adding to their production and needed to also increase their evacuation or dust collection capabilities. But they were unsure how the new emissions would affect how they were going to maintain a healthy air environment for employees to work in.

### The Solution

Schust technical experts performed a plant ventilation audit to catalog and understand how the current ventilation system was performing with the three furnaces and existing ventilation. The audit was also used to perform an engineering study.

### PROJECT IN BRIEF:

#### EQUIPMENT & SERVICE

- Plant Ventilation Audit
- Engineering Study
- Engineering
- Turnkey
- Installation
- Commissioning
- Dust Collector
- Ductwork

#### INDUSTRY

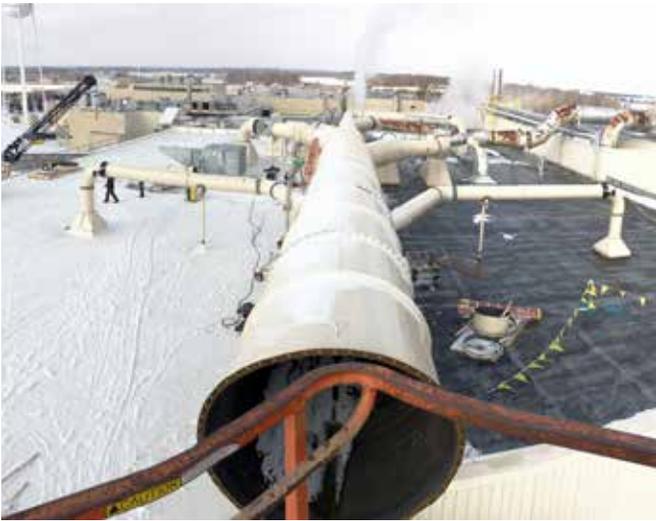
- Foundry

#### APPLICATION

- Emission Control
- Process Exhaust

Engineers that performed the study recommended process changes and upgrades to the dust collection and air make-up systems. The engineering study also helped to ensure that the facility did not experience too much negative pressure on doors which are typically kept closed.

The study calculated that a 60,000 acfm fresh air make-up unit could recirculate the air to help reduce the energy costs the facility was experiencing. This solution required a significant amount of roof penetrations that required rough reinforcing and a build-up to accommodate additional roof loads. The air make-up system comes down from the roof and offsets are kept in a tight space behind the crane rail.



This foundry has 22 dust collectors throughout the facility, equipment consistency was made a requirement. The foundry purchased the European-based dust collector with recommended air-to-cloth ratios defined by Schust in the engineering study and Schust installed it when installing the other air make-up and ventilation systems components. As a member of the Austrian-based Scheuch Group, Schust has an advantage to supporting such installs that can cause problems due to imperial and metric fasteners.

## Follow-up

As a single-source supplier to the foundry, Schust takes 3-4 days to perform bi-annual inspections of all 22 dust collectors throughout the facility.

The Schust maintenance team makes small changes and suggests other larger changes to the equipment if needed. This allows the foundry and Schust to get ahead on projects and isolate any problem areas quickly.

**Contact Schust to learn more about this project.**

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