# **Case Study**

## BHA® Spunbond Cartridges & BHA Neutralite® SR Conditioning Agent extends filter life at Bronze Manufacturer

### Challenge

The zinc process has a cartridge style dust collector that starts up at 2" Differential Pressure rising substantially within 3 to 4 weeks to 5" to 8" in less than 3 months. The dust is a very sticky dust that conglomerates and sticks to the paper media cartridge filters blinding them, not cleaning down to acceptable air flows. They were replacing 112 expensive filters every 3 months and not getting designed production.

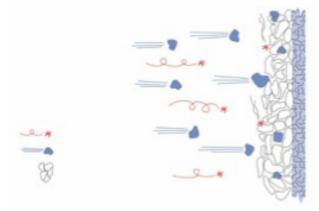
#### Solution

Parker Hannifin recommended changing to Spunbond Polyester Cartridge media and an initial conditioning coat and daily addition of BHA Neutralite SR Spark Resistant Conditioning Agent to the collector. Neutralite SR is a light-density, neutral aluminum silicate powder that helps extinguish hot sparks on contact. The powder consists of microscopic particles of varying shapes. Injected into a baghouse, BHA Neutralite SR creates a porous dustcake layer on the outer surface of the filter bags that increases filtering efficiency, improves airflow, absorbs moisture and hydrocarbons, and extinguishes sparks that carry over to the baghouse. Customer would be pleased with 20% longer filter life. The Spunbond Polyester cartridges were installed to run a side by side comparison with paper cartridges for analysis. Parker Hannifin recommended switching to a Clean on Demand.

#### Result

- Extending filter life more than 2x with existing paper cartridges decreased the need for costly baghouse change outs
- Production has increased and maintenance activity is reduced with this collector by at least 50% due to differential pressure staying consistent at 4".
- Testing for 4 months now and the paper cartridges look plugged and a change out is needed. The BHA spunbond polyester cartridges look brand new.

#### Benefits of BHA Neutralite SR



BHA Neutralite SR conditioning agent provides a protective coating on the fabric surface that extinguishes hot sparks before they can damage filters. The artificial dustcake diffuses airflow through the millions of passages between particles, resulting in reduced differential pressure. The protective coating also helps prevents particle impingement, fabric airflow blockage, and contamination by hydrocarbons and moisture.



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