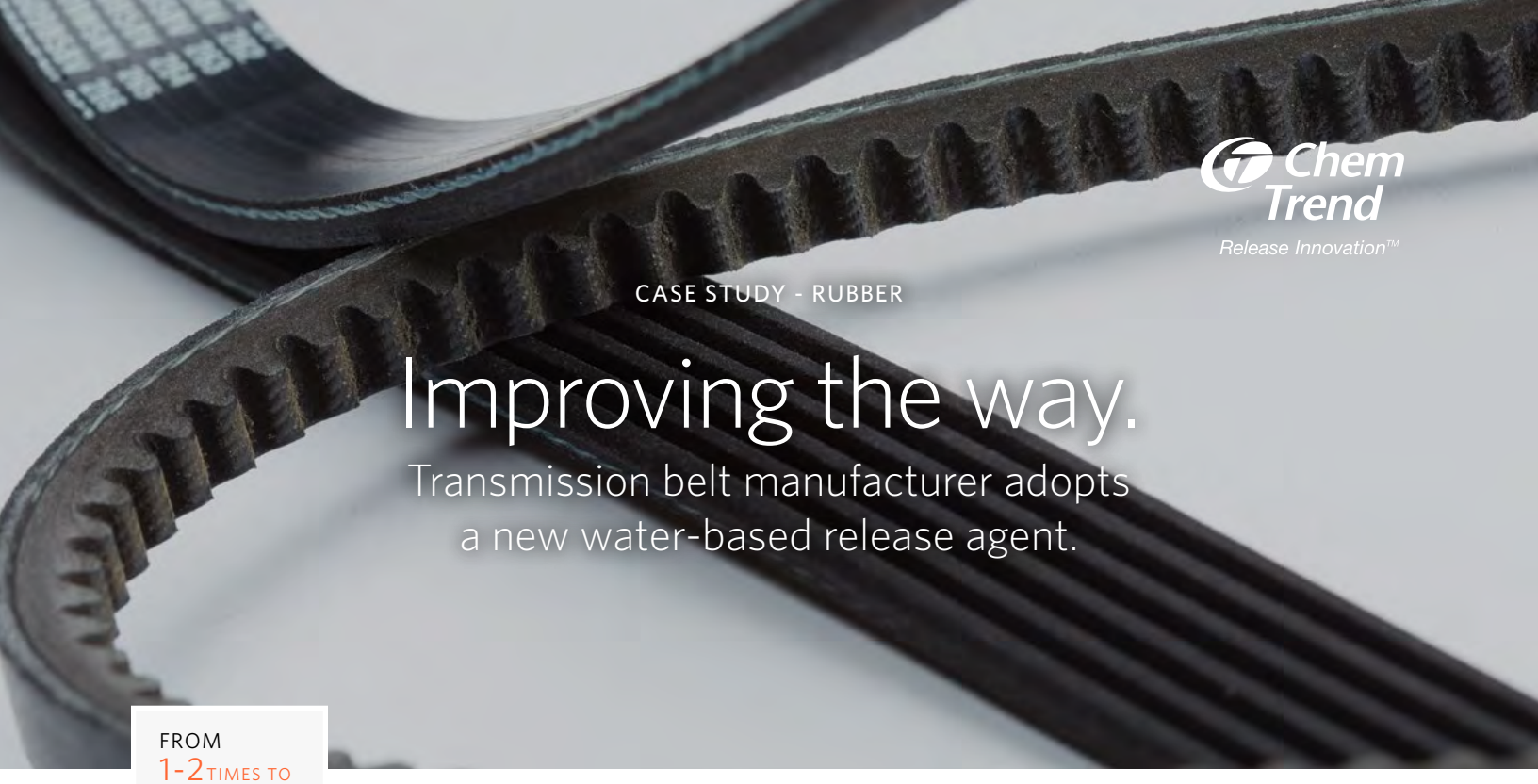


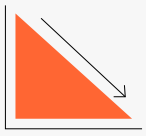
Chem Trend
Release Innovation™

CASE STUDY - RUBBER

Improving the way.

Transmission belt manufacturer adopts a new water-based release agent.

FROM
1-2 TIMES TO
1 TIME
PER SHIFT



REDUCTION
IN MOLD
CLEANING

FROM
20-30 SEC
TO <15 SEC

REDUCTION
IN MOLD
RELEASE TIME

WHAT WE ACHIEVED.

Chem-Trend's research and development team designed a new water-based release agent for a major transmission belt manufacturer. Compared with traditional water-based release agents, the new product is capable of prolonging the time necessary between mold cleanings, shortening the mold release time, and significantly improving the appearance of the produced belt.

By reducing mold cleanings to once per shift, we were able to increase time between cleanings by 50% or more, greatly improving efficiency and productivity across their multiple mold production lines throughout their three-shift operation. In addition, we decreased the release duration to less than 15 seconds, further increasing output and overall speed of manufacturing.

HOW WE GOT THERE.

Prior to the development of our new product, customers commented that the other mold release products available in the market cause the mold to experience rapid buildup, and the release performance is not ideal. This customer began having release-ease issues when they changed their production process. The competitor product they attempted to remedy the issues with created new problems — molds became dirty quickly, and release time increased.

In addition, the surface of the released part was relatively greasy, with a compromised texture. That always led to failure in achieving the ideal production efficiency and yield rate.

The Chem-Trend team worked to craft a product that helped resolve not one, but all of these issues.

OUR SOLUTION.

Working closely with the company, we developed a thorough understanding of the customer's needs and processes. Chem-Trend's technical experts worked iteratively to create a solution that met or exceeded our collective goals for release ease, mold buildup, and release agent transfer from mold to part.

We were able to achieve greater speed, better reliability, increased productivity and improved belt surface quality. Through the development of a single new formula, we were able to systematically improve all facets of the process.

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For more information about our rubber capabilities, our innovations, or other stories, visit CHEMTREND.COM

HANDPRINT IMPACT

At Chem-Trend, we pride ourselves on our long history of sustainability efforts. However, it is our effect on our customers' processes that provides the greatest impact. It goes beyond our global Footprint; it is our even wider Handprint.

Here, we achieved the following:

- Reduced cleaning needs, leading to reduced waste
- Greater product quality, leading to reduced scrap rate and less rework
- Less energy wasted due to less downtime and a reduced part production cycle