Olin | SUSTAINABILITY
STRONG ROOTS. STRONG FUTURE.

OPTIMIZING VESSEL TANK CLEANING WASTEWATER TREATMENT

This sustainability story is one of many that shows how Olin products, technologies, ideas, and people are having a positive impact on our world.

SUSTAINABILITY **CHALLENGE**

- After transporting Liquid Epoxy Resin (LER) by ship from the US to Olin's site in Zhangjagang, China, emptied tanks are cleaned with warm water.
- After cleaning, the mixture of LER and water is collected in containers and sent for off-site disposal by truck to a supplier for further handling.
- Olin looked for ways to optimize the waste treatment, reduce the volume of the waste, and avoid unnecessary transport of the waste.

OLIN'S **SOLUTION**

- Olin tested and analyzed the Chemical Oxygen Demand (COD) level of the top layer water, identified the root cause of high COD, and modified the procedure, in compliance with the requirements of relevant authorities, including Maritime Bureau, and the Environmental Protection Bureau.
- A process to separate the mixture by precipitation was developed, allowing to separate the top layer water and LER residue at the bottom.
- The new solution was implemented after trial runs and official approvals.

POSITIVE **IMPACT**

- The top layer water (~90% of the total volume) could be directly routed by pipe to local onsite wastewater treatment for further handling.
- 90% of previous waste can be avoided, with the total volume reaching up to 123 MT only for the first half of 2022.
- Energy consumption and chemical agent usage could be reduced, as well as emissions during the waste treatment and diversion.
- Truck transportation to the supplier for further treatment was significantly reduced, resulting in additional reduction in energy consumption and emissions.

DID YOU KNOW?

Liquid Epoxy Resins are used in many relevant every-day end uses, contributing to today's needs, such as the production of energy by wind, laminates for board circuits in mobile phones or coatings for cars and ships.

We invite you to follow our Sustainability Journey on www.Olin.com

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