

Puraglobe Invests A High Double-Digit Million Sum

CIRCULAR ECONOMY. The world's largest site for used oil re-refining at Zeitz Chemical Park.



BY HOLGER LINKE

TRÖGLITZ. Puraglobe Deutschland GmbH has been operating several used oil re-refining plants at Zeitz Chemical Park. Puraglobe is the only manufacturer of API Group III & III+ base oils based on waste oil across the globe. Because of the high quality and the reduced CO₂ footprint, there is a high demand for these base oils on the market. Therefore, the customer invested a very high double-digit million euro amount to install a new plant, the third HyLube plant. It was completed in early 2024 and has since started operating as intended. Thus, this site is the largest of its kind in the world. EDL had already engineered the HyLube2 plant and later converted this plant by integrating an additional process stage.



During project implementation, around 200 equipment items, approx. 430 tons of piping/support material, approx. 50 kilometers of cable, approx. 1,200 measuring devices were installed as well as around 10,000 tons of concrete and approx. 1,000 tons of structural steel were used.

Holger Linke
Project Manager EDL

the two companies continued in 2021 when EDL was awarded the contract for detail engineering and construction management by specialist engineers for the HyLube3 plant following preparatory work as part of an early work program.

Compared to the previous projects, this time, there were new challenges for everyone involved in the project:

The first challenge was the execution structure: not EPC, but EPCm.

The second challenge was considerably more limited space for assembly. As a result, detailed planning and installation scheduling had to consider the limited pre-assembly options and delivery of equipment on the necessary assembly dates. Example: the 47m high fractionation column. In the HyLube2 project, the

column was pre-assembled horizontally and then lifted into place. In the HyLube3 project, the column was installed first, and scaffolding was put up. Finally, the column was completed step-by-step with steel platforms, pipelines, etc.

Third challenge: Problems arose due to the change of the political situation in February 2022. Equipment manufacturers were explicitly affected by this situation in terms of material procurement.

However, everyone involved accepted these challenges with a positive attitude, and solutions and decisions were found together. Despite necessary adjustments to the installation process, the plant was

USED OIL RE-REFINING AT PURAGLOBE

Puraglobe processes used engine oil. The oil is treated in a complicated process and led through 16 catalysts at high pressure and temperatures. In this multi-stage process, all impurities are removed from the oil. Thus, used oil can be reprocessed several times - without losing quality. Puraglobe says this technology can save around 180,000 tons of CO₂ annually.

mechanically completed and successfully put into operation on the scheduled date. One of the reasons for this success was that suppliers and installation companies, some of which had already been involved in previous projects, were commissioned. Based on their experience, they contributed to the success of this project. ■

New challenges with HyLube3

The successful cooperation between

