

## WASTEWATER TREATMENT IN A CONTAINER CLEANING COMPANY WITH AN MBR (VALENCIA)



Lavamiranda, S.L. is a company dedicated to the washing of industrial tanks and containers that have contained chemicals or food

The wastewaters from this type of companies present an extreme variability in loading and nature of contaminants that include substances of very slow biodegradation. The company requires a robust technical solution allowing to degrade the wide variety of substances contained in the water. Also due to its location, the company requires to occupy as less space as possible.

So, the company decided to install an MBR treatment, as it provides a high capacity with a minimum space occupied. On the other hand, the technology of ultrafiltration MBRable®, thanks to its smaller pore size (0.02 microns) that allows to effectively keep all kinds of colloidal particles in the system, was the selected ultrafiltration technology to provide the ultrafiltration unit of the MBR to ensure a more efficient degradation of contaminants. Ease of cleaning of cassettes is also especially of interest to the company given the characteristics of the effluents to be treated.

The treatment plant consists of several stages: grinding, physical-chemical, homogenization and MBR biological treatment. The MBR installed has a treatment capacity of 100 m<sup>3</sup>/day, for which Europe Membrane provided a unit MBRable Train equipped with a cassette of 2 layers with 1008 m<sup>2</sup> of membranes installed along with all equipment needed: automation, instrumentation and elements of control and security necessary for the proper operation



Year: 2014  
Sector: Chemical  
Flow: 100 m<sup>3</sup>/d  
BOD<sub>5</sub> influent 18000 mg/l  
BOD<sub>5</sub> effluent: <500 mg/l

