

SLG-F

Sludge thickening



The **SLG-F** product is a combination of the SLG conditioning solution and the Flosep, an Orege proprietary product for the separation and thickening of sludge



Unrivalled
thickening
performance with
an unprecedented
return on
investment and
helping reduce
carbon footprint

Working principle

- The **SLG (Solid Liquid Gas) conditioning** generates an emulsion which floats naturally, inducing a rapid separation of sludge and water.
- Polymer is added during the **flocculation** stage to stabilize and facilitate a clean water/sludge separation and a **degassing** stage evacuates excess air.
- The flocculated sludge is drained over a rotary screen, the **Flosep**, resulting in rapid and improved thickening with high quality filtrate.

The SLG-F is suitable for **all sludge types from municipal and industrial wastewater treatment plants including:** Waste Activated Sludge (WAS), mixed sludge, co-settled sludge, digested sludge, P removal and even septic sludge.

Applications

The SLG-F replaces conventional thickening equipment (Gravity Belt Thickeners, Drums, Centrifuges) for :

- Superior thickening (up to 10%DS) to **reduce transport and disposal costs of liquid sludge**
- Superior thickening to **boost your Anaerobic / Aerobic Digestion process** (increase digester hydraulic retention time, increase biogas production)
- Thickening step prior to existing dewatering equipment to **increase the volumetric throughput and reduce operating hours**

Main benefits

- Reduce sludge volumes up to 90%
- Reduce hauling and elimination costs
- Reduce CO₂ & GHG emissions
- Improve sludge rheological properties; the "SLG sludge" remains pumpable up to 7% or 8%DS
- Improve filtrate quality (P and N concentrations are reduced in comparison with conventional thickening equipment)

Additional benefits

- Reduce polymer consumption in comparison with conventional thickening equipment
- Reduce odours and corrosive gas emissions
- Increase existing sludge equipment treatment capacity

Why choose SLG-F ?

- Guaranteed sludge thickening of at least 6%DS
- Help to meet your Sustainable Development Goals by reducing your carbon footprint and Greenhouse Gas Emissions:



- Compact fully-integrated thickening solution (ancillaries included)
- Avoid typical construction requirements for traditional thickening systems (installed, commissioned and operational in a few days)
- Low operation and maintenance costs
- Easy to operate
- Reduce washwater requirement

Several product versions are available to meet your needs :



SLG-F mobile



SLG-F container



SLG-F skid