Operating and maintenance instructions

Lamella separator

1. Use
The lamella separator cleanses surface water/rainwater, from larger paved areas such as parking lots, harbor areas and roads, for oil and solid particles.

Under normal rainwater conditions the surface water is cleansed to class I (oil separator), and in extreme rain the surface water is cleansed to class II (oil separator) or below.

2. Starting
The lamella separator must be filled with water prior to starting.
Filling of water is done during installation (refer to Installation instruction Method 4).
Make a review of the system for a good understanding of the function.
A sand trap is typically installed in front of a lamella separator, and a sampling well installed after.
Covers must be fitted with a rubber sealing for density (fumes).
If the system is equipped with alarms, these are tested according to the operating instructions for them.

3. Operating
During operating the surface water is led through a lamella filter, which reduces the flow of water and causes friction.
Hereby particles settle, and oil adheres to the lamellas/ribs of the filter, where larger drops of oil are created and flows to the surface.
Due to the construction of the lamella separator the settled particles and oil is contained, which subsequent can be discharged and disposed in an environmentally sound manner.
The cleansing effect of the lamella separator is reduced as the load increases.
At large rainfall and cloudbursts the slurry trap of the lamella separator is at risk for filling and must be emptied as soon as possible.
A log of operations can be kept with an advantage, for registering and documentation of special operating conditions and maintenance.

4. Control
The lamella separator system must be checked according to need, and always after a heavy rainfall/cloudburst.

Lamella filter
The lamella filter is hoisted and flushed, if sediments are found.

Alarms
If the system is equipped with alarms (level, collected volume of oil, fumes), the functionality of the alarms is checked.

Oil
It is checked how large a volume of oil is collected. Use a measuring rod. If the layer of oil is greater than 300 mm, an emptying must be done.

Particles
It is controlled how large an amount of particles is collected. Use a measuring rod. If the layer of sedimentation is greater than 300 mm, an emptying must be done.

Fumes
If the system smells of explosive fumes, access barring must be done immediately, and a fire authority is called.

5. Emptying
Emptying is done when needed.
A log should be kept, where time and amount of emptying is stored.
Emptying must be done by a vacuum tank company, which in addition ensures that disposal is done in an environmentally sound and legal manner.
Oil is sucked first, and then the settled particles. If sediments are found, these are flushed away.

6. Important
Descending into the lamella separator may only occur when work health regulations according to this are maintained.