



FREYLIT WASH WATER RECYCLING SYSTEMS

**SINCE 1983 FREYLIT HAS BEEN DEVELOPING PRODUCING AND INSTALLING
A WIDE RANGE OF WASH WATER RECYCLING SYSTEMS**

**SPECIAL FEATURES and SPECIAL CHARACTERISTICS of FREYLIT WASH WATER
RECYCLING SYSTEMS COMPARED to OTHER METHODS and COMPETITORS :**

TECHNOLOGIES

COMPETITORS

Most of FREYLIT'S competitors are manufacturing Sand Filters and Biological Systems

SAND FILTER

- 1) All sand filters are equipped with an automatic back washing system.
95% of all systems are using fresh water for back washing.
This back washing cycle will be conducted several times a day and large quantities of fresh water will be used, wasted and discharged to sewer
- 2) The really final output of the filtered water is between 150 – 250 Micron
- 3) Disinfect and Sterilize process with Ozone , Chlorine or Hydrogen Peroxide
Adding **Ozone** is difficult to control. If you add to much of Ozone ,Ozone gets free (comes out of the water) and destroys all rubber parts both in the underground container and on the carwash equipment (seals, flanges etc.) after a period of time .
If you add to little the water will start stinking (growing of anaerobic bacteria)
Adding **Chlorine** is dangerous because if you add to much, all iron parts on the washing equipment will start to corrode.
If you add to little the water will start stinking (growing of anaerobic bacteria)
Adding **Hydrogen Peroxide** is difficult to control because if you add to much the walls in the wash bay and the brushes becomes brown and this could assist and provoke the breaking of the brushes ,which can then scratch vehicles.
If you add to little the water will start stinking (growing of anaerobic bacteria)
- 4) After a while the sand in the sand filter must be changed

Biological Systems

- 1) Biological Systems clean the water with the aid of bacteria and oxygen like a normal wastewater treatment plant
- 2) The bacteria are very sensitive. You will kill a big part of the bacteria if you clean the walls and tiles in the wash bay with acidic detergents or if you change the wash chemicals to another chemical supplier. Bacteria are extreme pH sensitive.
- 3) Bacteria destroy a big part of the Shampoo which will be used for the wash cycle. For this reason you always have to add more shampoo as necessary.
- 4) By the injection of oxygen, the anaerobic bacteria will be destroyed. However at the same time, this multiple the growth of aerobic bacteria.
The aerobic bacteria as well as the anaerobic bacteria are germs and harmful.
- 5) **With Biological Systems you do not destroy aerobic bacteria and these germs are growing in the system and are harmful.**
- 6) From time to time new bacteria must be added in the recycling process

FREYLIT RECYCLING UNITS

- 1) **The FREYLIT Recycling Units do not work with wear parts like sand or bacteria**
- 2) The **CHVTP Units** does not need any additional fresh water for back washing because on this units, NO additional filter is installed which needs this back wash cycle.
- 3) The **ECOLIT- MF** units (with additional fine filter) does not need any additional fresh water for back washing because the back washing is be done with recycling water and air pressure.
- 4) Disinfect and Sterilize process with our proprietary systems :
Waterstabilizer and High Voltage Electrode.
The Waterstabilizer works on a permanent magnet base without any cost (life time 15 years)
The High Voltage Electrode needs only 300 milliamp during operation
- 5) **NO OZONE, CHLORINE OR HYDROGEN PEROXIDE IS NEEDED**
- 6) The system does not remove Shampoo out of the recycling water
This means a reduction of cost of Shampoo down to 50% during one year

MORE ADVANTAGES OF FREYLIT WASH WATER RECYCLING SYSTEMS

- 1) **SUITABLE FOR ALL TYPES OF VEHICLE WASHING MACHINES ON THE WORLD MARKET**
- 2) **90 % FRESH WATER SAVINGS WITH OUR RECYCLING SYSTEM**
- 3) **WATERTREATMENT "WITHOUT CHEMICALS" BY USING AN ELECTRICAL-PHYSICAL PRINCIPLE**
- 4) **CAPACITY : FROM 30 litres/min. TO 1000 litres/min**
- 5) **MINIMUM MAINTENANCE INVESTMENT (2 times per year) MAX. 60 MINUTES PER MAINTENANCE**