

# Solvent degreasing machines FLUOMATIC



High  
quality cleaning  
and drying in full  
compliance with  
environment  
protections  
rules by use of  
the new HFE or  
HFO solvents

- Machines with one, two or three treatment baths;
- Baths volume variable between 10 and 1000 liters;
- Possibility of working with an ultrasonic system at different frequencies (from 25 to 132 KHz);
- No special permit required when working with type HFE or HFO solvents;
- High quality cleaning and effective in removing soil from complex-shaped components with blind and/or capillary holes;
- Reduced footprint;
- Possibility of choice between several optional systems (solvent distillation system, automated baskets loading/unloading, automatic solvent refill system...);
- Low economic impact;
- Compliance with the most stringent safety and environment protection regulations;
- These machines, entirely made of AISI 304 or 316L stainless steel, can perform several type of processes with the use of a single or multiple bath configuration.

## Ultrasonic technology

Perfect cleaning and drying thanks to the high frequency sound waves.

The FLUOMATIC machine is able to reach any cavity: the ultrasonic system allows for removal of soil even from the toughest components to clean. Thanks to the ultrasounds, the solvent is able to penetrate capillary holes thus ensuring that soil is removed by the mechanic action generated by the high frequency sound waves. These high frequency sound waves, while propagating in a liquid media, produce the "cavitation" effect which is extremely effective in surface cleaning operations.

## Reduced emissions to the air

Respect for the environment and benefits for the end-user

The FLUOMATIC machines are safe and reliable as far as the environment protection is concerned.

The peculiar closed circuit solvent condensation system is able to reduce at the minimum solvent losses to the atmosphere. The presence of covers for the baths, which can be automated, help to further reduce the emissions of solvent to the air.

## Low consumptions and reduced expenses

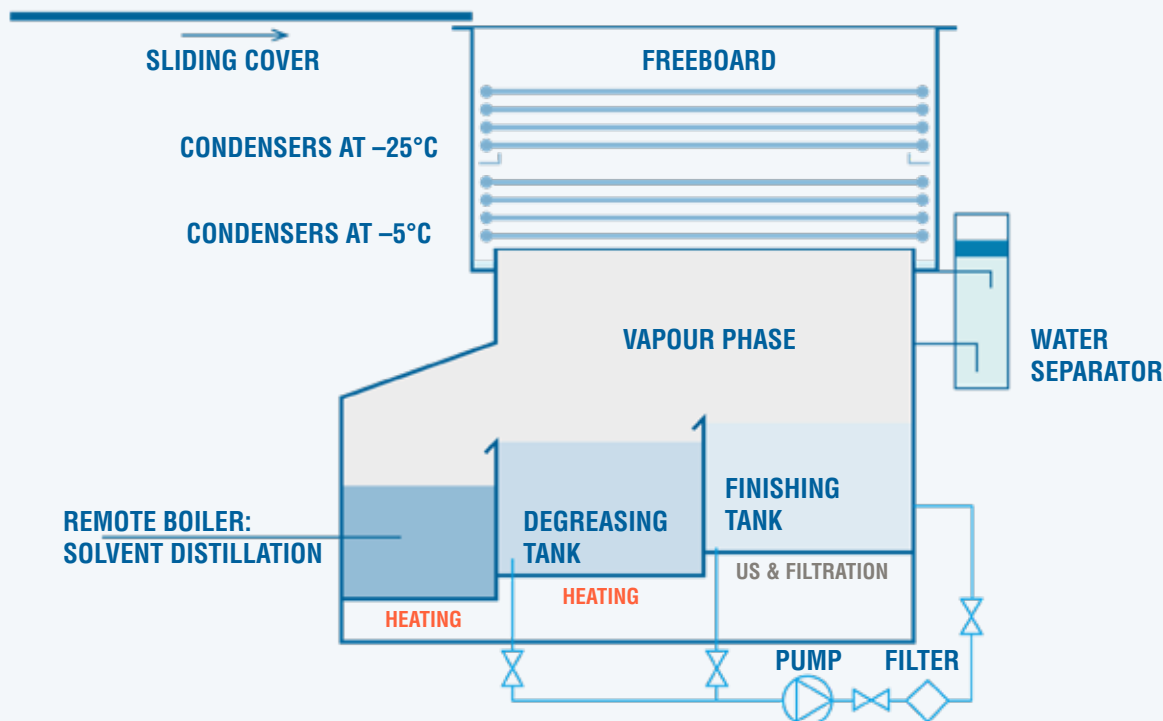
The FLUOMATIC machines guarantee a very low electric energy consumption for heating, thanks to the installation of an effective thermal insulation layer on all heated baths.

## High productivity

The degreasing FLUOMATIC machine can treat one or more baskets per cycle which translates into a very high productivity especially if the machine is fitted with an automatic loading/unloading system which also manage the automatic baths cover operations.

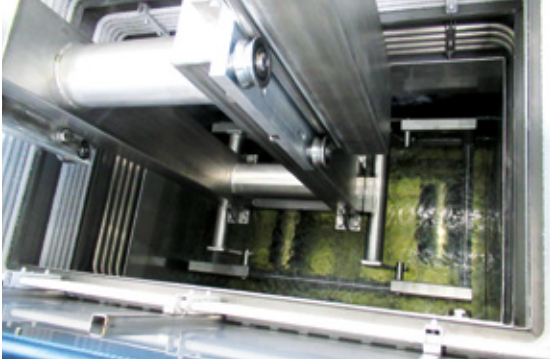


## DEGREASING

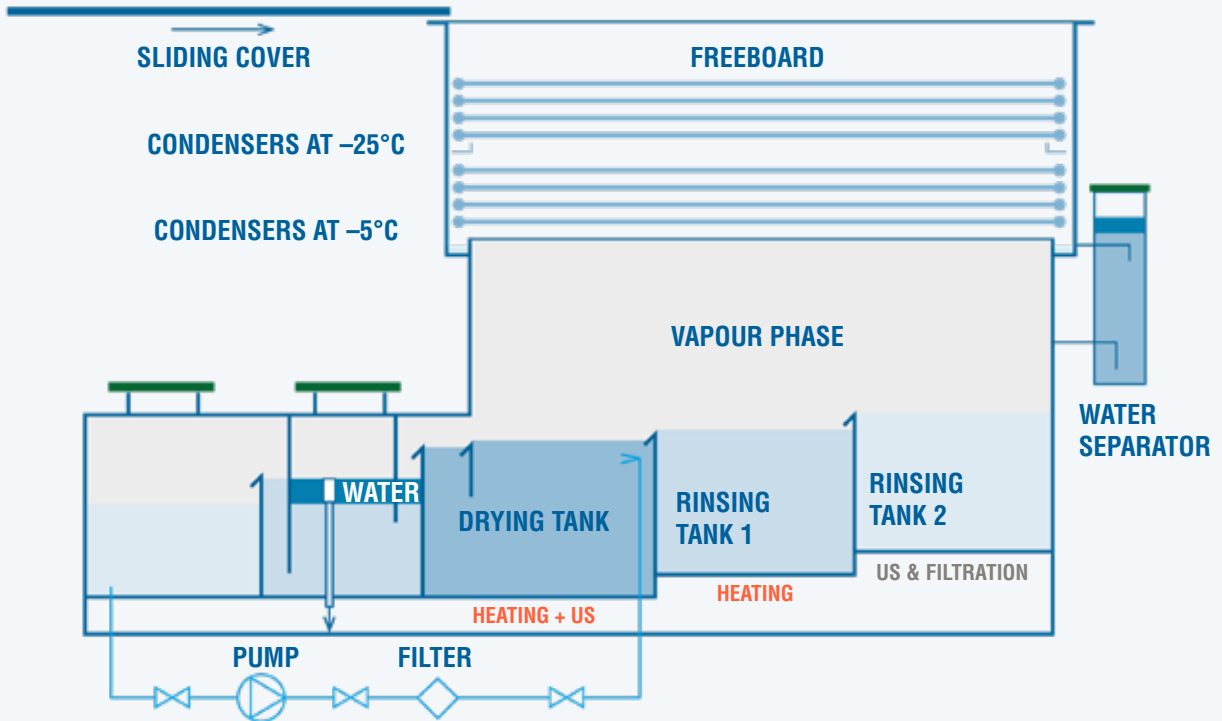


## EXAMPLE OF HYBRID PROCESS

<b>WASHING</b> US:40KHz 10 to 15W/L conc: 3-5% temp: 65°C time: 3-5'	<b>WASHING</b> US:40KHz 10 to 15W/L conc: 2-3% temp: 65°C time: 3-5'	<b>RINSING</b> TAP WATER temp: 20-30°C time: 3-5'	<b>WASHING</b> US:40KHz 10W/L conc: 3-5% temp: 65°C time: 3-5'	<b>TAP WATER</b> RINSING temp: 20-30°C time: 3-5'	<b>TAP WATER</b> RINSING temp: 20-30°C time: 3-5'	<b>DEWATERING</b> temp: amb. time: 3-5'	<b>CO-SOLVENT</b> temp: amb. time: 3-5'	<b>VAPOUR</b> <b>PHASE</b> <b>SOLVENT</b> temp: 47°C time: 3-5'	<b>SOLVENT</b> temp: 35°C time: 2-4'	<b>SOLVENT</b> temp: 35°C time: 2-4'
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## SOLVENT DRYING



## PROCESS EXAMPLE

<b>WASHING</b> US:40KHz 10 to 15W/L conc: 3-5% temp: 65°C time: 3-5'	<b>WASHING</b> US:40KHz 10 to 15W/L conc: 2-3% temp: 65°C time: 3-5'	<b>RINSING TAP WATER</b> temp: 20-30°C time: 3-5'	<b>WASHING</b> US:40KHz 10W/L conc: 3-5% temp: 65°C time: 3-5'	<b>RINSING TAP WATER</b> temp: 20-30°C time: 3-5'	<b>RINSING TAP WATER</b> temp: 20-30°C time: 3-5'	<b>SOLVENT + ADDITIVE</b> temp: 47°C time: 3-5'	<b>SOLVENT</b> temp: 35°C time: 2-4'	<b>SOLVENT</b> temp: 35°C time: 2-4'
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