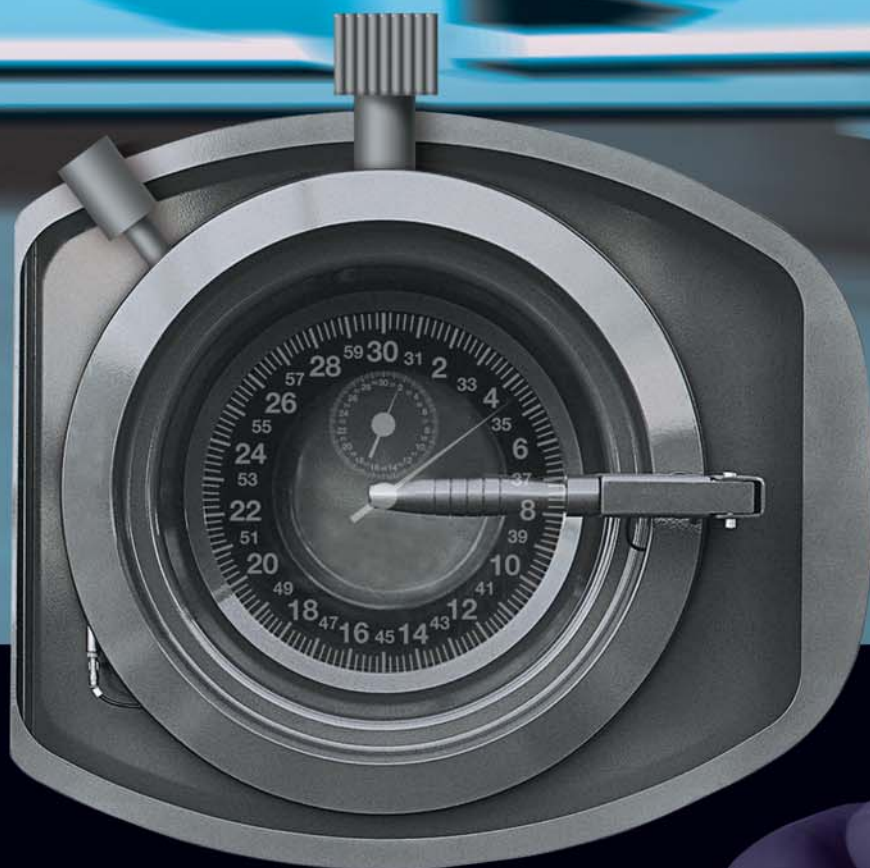
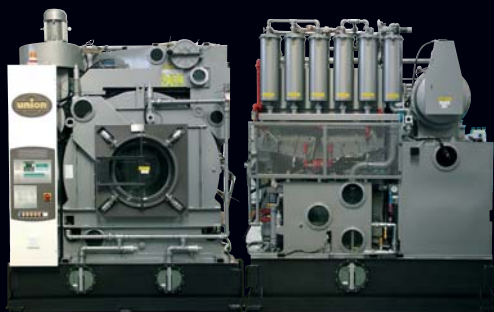


Fast. Smart. Clean.



UNION ML-MD SERIES



The Ideal Drycleaning System



We know what it takes to be first



Since its foundation in 1976, **UNION** has been the benchmark by which all other dry cleaning systems are measured.

UNION lead the field in high-quality design and construction, incorporating continual advances in technology made possible by the industry's most creative and visionary research team.

The company boasts by an expert managerial and a innovative industrial team with an eye for cutting edge technology able to manufacture the most up to date systems.

The vast **UNION** manufacturing and assembly complex houses CAD-CAM based design services, a state of the art research and development department, and production facilities, such as laser cutting and robot welding, assembly and quality control, as well as in-house training available at all times.

Over 90% of machine components are made in-house to assure the company is self-sufficient.

Each component is produced and certified within the company in order to ensure the highest quality level in every **UNION** product.

Today, **UNION** dry-cleaning machines can be found in over 90 countries, sold and serviced by more that 275 factory – authorized dealers worldwide.

At **UNION** we know what it takes to be first and are fully aware of our responsibilities...our commitment allows us to help your business be first at the finish line in dry cleaning quality and profits

HISTORY
QUALITY
TECHNOLOGY
RESEARCH
INNOVATION
SAFETY

ML-MD 800 Series



The ideal drycleaning systems

The result of **UNION**'s three decade leadership in the dry cleaning industry is an unprecedented level of innovation and safety that can be found in the **UNION ML-MD SERIES**innovation and safety which translate into faster production, better results, reliability, easy operation and an ecologically superior performance. These are the characteristics which make **UNION ML-MD** series machines **IDEAL** for the professional cleaner.

New quality standards have been reached through advanced design, the result of years of research and development taking in maximum available technology, all intended for workshops where efficiency plays a key role.

From the innovative **DIALOG** computer to the advanced **IDROMATIC** environmentally safe still cleaning, the **UNION ML-MD** Series gives new meaning to the words **Fast, Smart and Clean.**

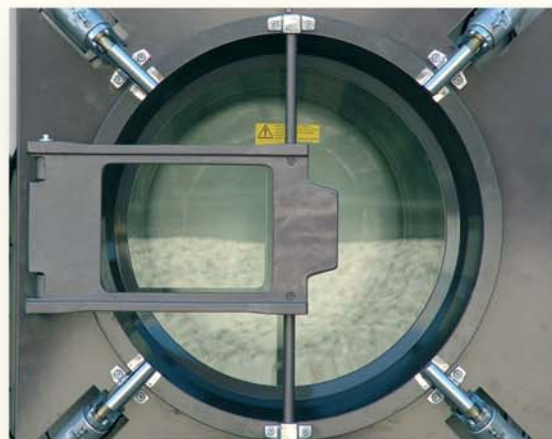
Whatever model or version you decide to choose from the new **UNION ML-MD** Series, be sure it will be the ideal system for you.



Advanced Technology For Greater Performance



Our new **DIALOG** computer has various programs to handle virtually every cleaning need no matter which type of alternative solvent you choose to use. All programs can be customized on-site thanks to simple to follow manual override instructions. All control parameters of the system are clearly and continuously reported on the computer display.



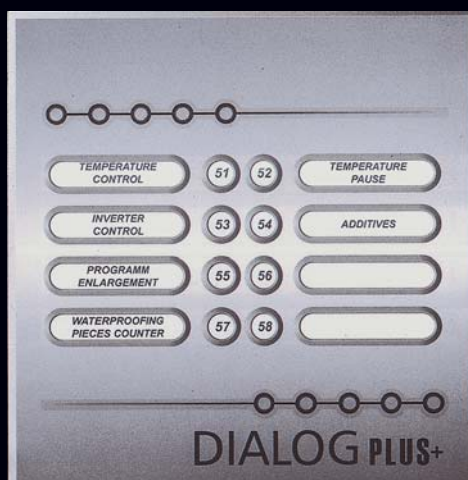
Extra large aluminium loading door computer **DIALOG** controlled lock which prevents doors opening until final cycle is completed. The opening angle is optimized in order to simplify as much as possible all garments loading and unloading operations.



In order to simplify the installation of the tandem version, the majority of the connections are factory pre-set in order to avoid any connection mistakes. These connectors are equipped with security locks.



For an exact control of the mechanical action and rotation speed of the basket, the cleaning modules are equipped with an electronic control **VARIO SPEED** which allows you to select the best rotation speed both during the cleaning and extraction phase, as well as during drying.



*The integrated control **DIALOG PLUS** is the latest advance in computerized operation technology for dry-cleaning. The big bright display on the **DIALOG** computer reports information about the working of the program and on the components of the machine. The **DIALOG** computer is also set with to show **PROGRAMMED MAINTENANCE OPERATIONS** which remind the operator of the maintenance which must not be forgotten in order to obtain maximum results, simplifying the operator's work; today this revolutionary system is used on every model of the new **UNION ML SERIES**.*

*With **DIALOG PLUS** you can run multiple programs without having to change temperature settings or inverter drive speeds. Once the individual programs are entered, **DIALOG PLUS** automatically remembers the settings for you, reproducing the same cycle every time in exactly the same way.*

*With computer **DIALOG PLUS** you can carry out a cleaning cycle at the standard temperatures and immediately after select a "delicate program" with a **LOWER** solvent temperature or with a lower mechanical action without having to remember to manually modify the settings. **DIALOG PLUS** allows you to check and monitor individually all useful temperatures for a correct working of the cleaning solvent, of the drying temperatures in the different phases of the program, of the cooling water temperature and many others.*

***DIALOG PLUS** also allows at the beginning of every cycle to hold until the correct pre-set temperature is reached, it automatically controls the correct quantity of soaps and additives to add and, with a simple control gives you the possibility of manually extending any phase of the program you are running.*

*That's why we call it **PLUS**. You'll call it indispensable!*

Advanced Technology For Greater Performance



The system **RECUPER R240S** is fully independent and equipped with a control panel to program the equipment operation, including automatic system regeneration.



The **RECUPER R240S** system designed for working together with two cleaning modules, is compact and will occupy a very reduced space in the workshop; the machine can be placed on the side of the modules but also to the rear, if necessary.



In order to further reduce solvent emissions, the cleaning modules of the **ML SERIES** can be equipped with the active coal absorption unit **RECUPER**.

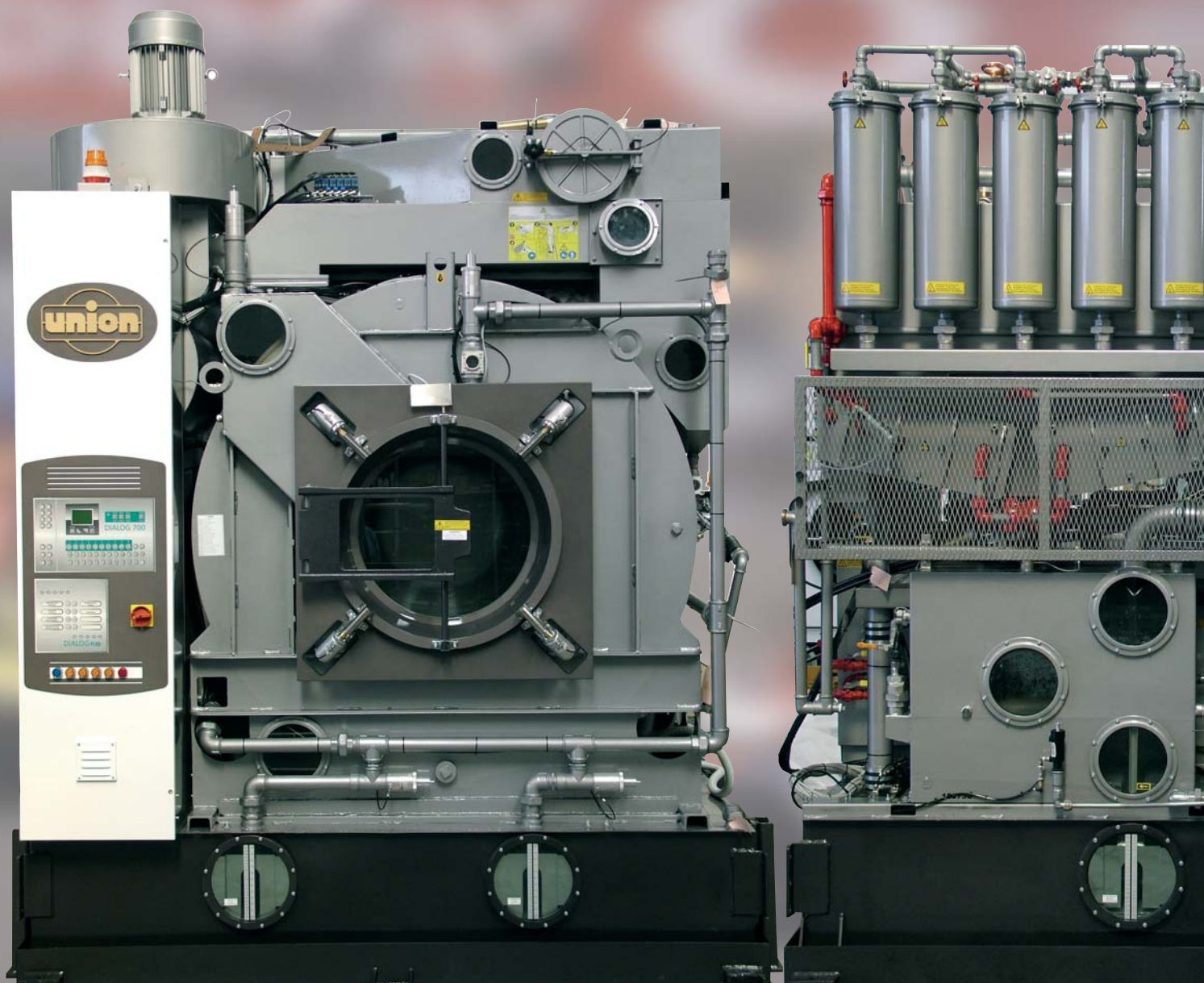
In models **ML880** and **ML890** the **RECUPER** unit can be built into the modules while for models **ML8135**, **ML8165** and **ML8200** external active coal **RECUPER** units are available.

The **RECUPER** units, according to models and requirements, can be requested as model **R1200** with such performances in order to complete the operation of the cleaning modules (in this case it is necessary, for the regeneration of active coal, to use the cleaning unit itself), or as a fully independent unit in which case they are equipped with an independent **RECUPER** system (equipped with its own refrigerator unit) such as models **R120S** and **R240S**.



The Ideal Drycleaning System

UNION ML-MD FAST. SMART. CLEAN.



ML8165

The **ML** and **MD** series models represent the best for the dry cleaning of large quantities of working garments, carpets, leathers, furs and others. The **ML-MD** series is extremely versatile, ideal where a continuous work and high efficiency is required.

As to dimensions, models of the **ML** and **MD Series** are planned as modular components to be placed in combinations according to the requested project.

The **ML** and **MD Series** include numerous cleaning modules, several distillation modules and a complete range of accessories, including a whole series of active coal absorption systems, to help reduce emissions into the air.

Efficiency in design allows easy access to the large air filters and button trap filters.

The button trap filter is self cleaning, with mechanical traction brushes, standard on models **ML8135**, **ML8165** and **ML8200**.



The Ideal Drycleaning System

UNION ML-MD FAST. SMART. CLEAN.



MD50

ML8165

All main module components such as basket, button trap, base solvent tanks still units, separators and distillation condensers are all built in stainless steel as is the basket housing of the cleaning modules **ML8135**, **ML8165** and **ML8200** (in the smaller cleaning modules **ML880** and **ML890** the tanks in stainless steel are optional).

According to the chosen distillation module it is possible to use up to three cleaning modules in the same configuration. For easier access during normal maintenance operations, all access doors are of large dimensions and oversized if compared with similar ones of other manufacturers; in order to guarantee maximum operating safety all access points are protected against accidental openings through electromechanical controls and equipped with pneumatic and automatic door security locking.



The Ideal Drycleaning System

UNION ML-MD FAST. SMART. CLEAN.



ML8165 front view

The cleaning modules of the **ML series** are available in various versions, dimensions and loading capacities, in order to satisfy any requirement. Models **ML880 (32 kg)**, **ML890 (40 kg)**, **ML8135(60kg)**, **ML8165 (80 kg)** and model **ML8200 (100 kg)** are available

The **DIALOG 700** computer in **DIALOG PLUS** version controls the cleaning modules.

All cleaning modules of the ML series have as standard features the electronic speed control with programmable basket rotation speed inverter **VARIO-SPEED**. This system allows you to select with absolute precision the desired basket rotation speed, during the cleaning and extraction phase; also during drying it is possible to select different rotation speeds according to your requirements.

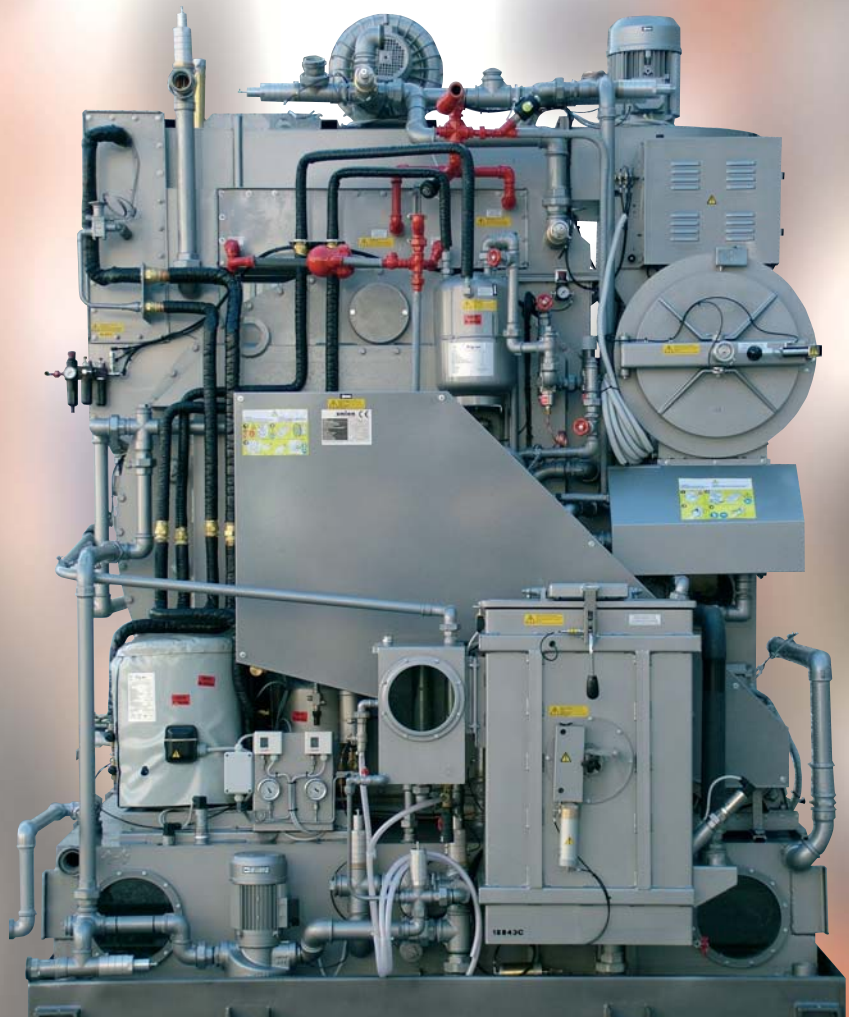
The microprocessor **DIALOG PLUS** also offers the exclusive **VARIO TEMP** function by which temperatures during the drying phase are programmable at different levels, particularly suitable for dealing with garments which are very sensitive to temperature, such as furs.

The special design of the basket allows you to optimize the air volume in circulation and to facilitate temperature control on the garments to obtain faster drying and a more efficient final cool-down.



The Ideal Drycleaning System

UNION ML-MD FAST. SMART. CLEAN.



ML8165 rear view



The gravitational water separator is available in two separation phases, complete with sight glass and level control

The control panel is concentrated in the front part of the machine, inside the electric panel. Inside you will find all the necessary components

The refrigerator condensation battery and the heating battery, when present, are equipped with quick connections which allow easy maintenance avoiding the loss of freon gas into the air.

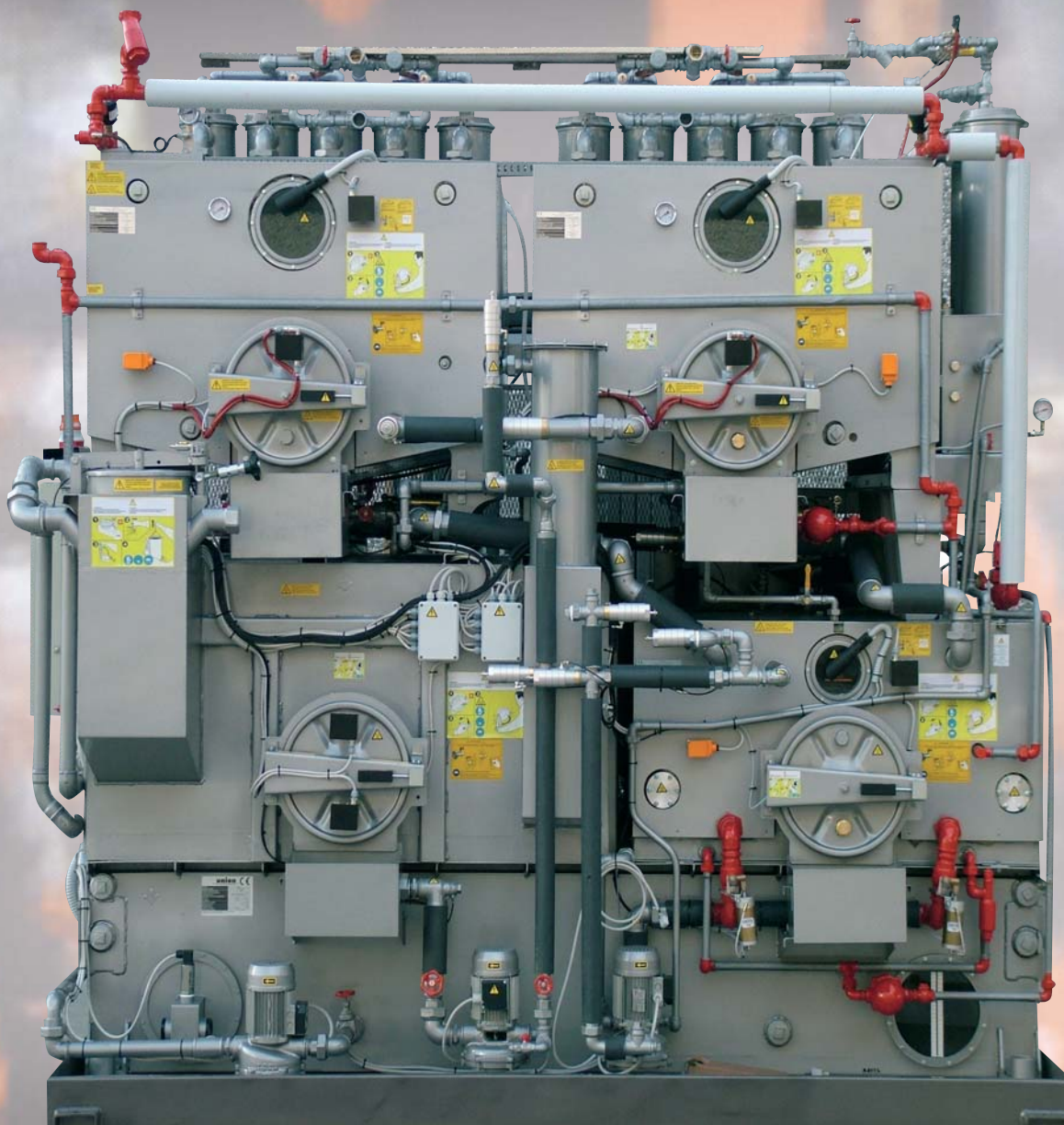
All models are equipped with the automatic button trap drying system **TURBO FAN**, for perfect drying inside the filters.

The automatic cleaning of the basket rear allows the removal of lint, assuring maximum performance over a longer life



The Ideal Drycleaning System

UNION ML-MD FAST. SMART. CLEAN.



ML80 front view

The **MD Series** is composed of a complete range of distillation modules planned to work at best with cleaning modules of the **ML Series**. The components of the distillation modules of the **MD Series** such as stills, condensers, contact water separators and solvent tanks and waiting tanks are all built in stainless steel.

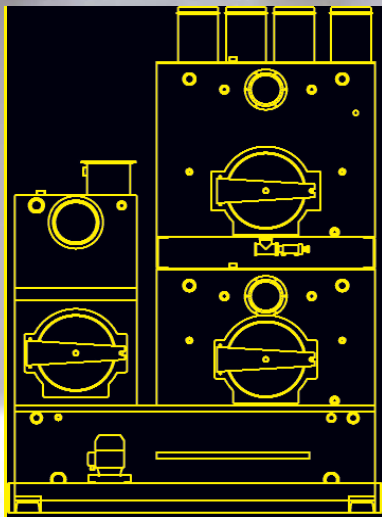
The distillation modules of the **MD Series** are designed for high efficiency and can distil large volumes of solvent after having washed working garments, gloves and leather.

The **MD Series** offers different solutions in order to satisfy all different working requirements, offering distillation systems with single or double still, with the possibility of a large range of accessories such as an automatic cleaning system of the still or different filtration systems

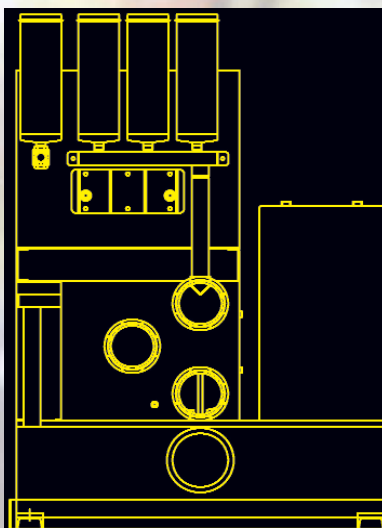


The Ideal Drycleaning System

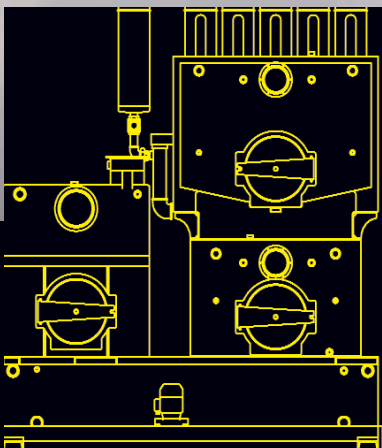
UNION ML-MD FAST. SMART. CLEAN.



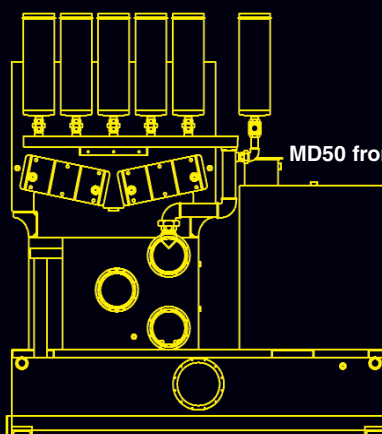
MD30 rear view



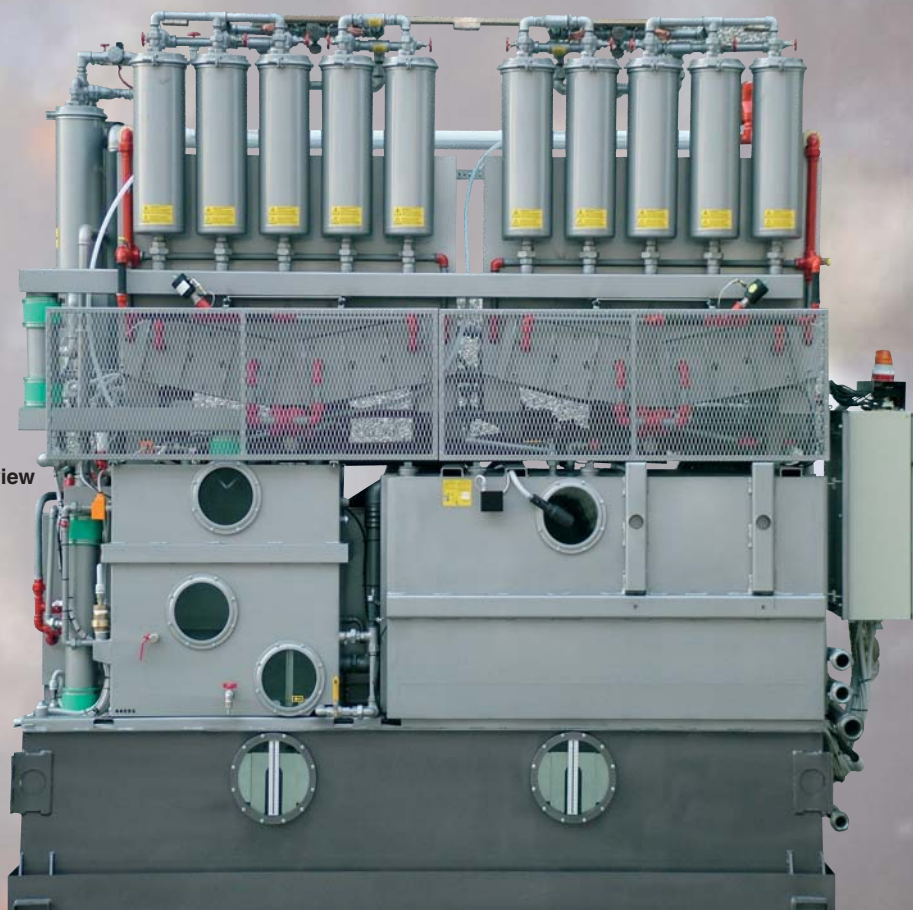
MD30 front view



MD50 rear view



MD50 front view



MD80 rear view

These are the main characteristics of the MD Series distillation modules:

- **MD-10:** equipped with base solvent tank, with 800 litre capacity and single still with volume 1000 litres.
- **MD-30:** equipped with base solvent tank, with 780 litre capacity, waiting tank 650 litres, primary still 520 litres and secondary still 330 litres
- **MD-50:** equipped with base solvent tank, with 1000 litre capacity, waiting tank 1000 litres, primary still 1000 litres and secondary still 550 litres
- **MD-80:** equipped with base solvent tank, with 1800 litre capacity, waiting tank 1800 litres, two primary stills 1000 litres each and secondary still 550 litres



The Ideal Drycleaning System

Technical Specifications

Model		ML-880	ML-890	ML-8135	ML-8165	ML-8200	MD-10	MD-30	MD-50	MD-80
BASKET										
LOAD CAPACITY	kg	32 - 34	40 - 42	60 - 64	75 - 80	95 - 105	-	-	-	-
Diameter	mm	1200	1200	1400	1550	1550	-	-	-	-
Depth	mm	570	710	780	800	1000	-	-	-	-
Wash speed	rpm	28	28	-	-	-	-	-	-	-
Extraction speed 1	rpm	165	165	-	-	-	-	-	-	-
Extraction speed 2	rpm	340	340	-	-	-	-	-	-	-
Inverter	rpm	-	-	24 - 320	14 - 300	14 - 300	-	-	-	-
Door opening	mm	500	600	700	700	700	-	-	-	-
TANKS										
Tank 1	Lt.	240	240	432	530	530	800	780	1000	1800
Tank 2	Lt.	240	240	432	530	530	-	-	-	-
Waiting tank	Lt.	-	-	-	-	-	-	650	1000	1800
STILL 1										
Capacity	Lt.	-	-	-	-	-	1000	520	1000	2 x 1000
STILL 2										
Capacity	Lt.	-	-	-	-	-	-	330	550	520
ELECTRIC POWER										
Washing	hp	2.5	2.5	-	-	-	-	-	-	-
Extraction	hp	6 - 8	6 - 8	-	-	-	-	-	-	-
Inverter	hp	10	10	20	25	25	-	-	-	-
Pump	hp	1.5	1.5	3	3	3	-	-	-	-
Ventilator	hp	3	3	7.5	7.5	7.5	-	-	-	-
Refrigerator	hp	5.5	5.5	10.2	10.2	10.2	-	-	-	-
Installed power (steam)	kW	9	9	26	30	30	-	-	-	-
CONNECTIONS										
Air	Ø	1/4"	1/4"	1/4"	1/4"	1/4"	-	-	-	-
water in	Ø	1"	1"	1"	1"	1"	1"	1 1/4"	1 1/2"	1 1/2"
water out	Ø	1"	1"	1"	1"	1"	1"	1 1/4"	1 1/2"	1 1/2"
steam in	Ø	3/4"	3/4"	3/4"	3/4"	3/4"	1"	1"	1"	1"
condensation out	Ø	1/2"	1/2"	1/2"	1/2"	1/2"	1"	1"	1"	1"
WEIGHT										
empty	kg	2905	2905	3500	3950	3950	1910	2280	2530	2880
with solvent	kg	3675	3675	4370	5710	5710	3190	3528	4130	5760
DIMENSIONS										
height	mm	2485	2485	2836	3160	3160	2750	2560	2470	2850
width	mm	1600	1600	2140	2370	2370	1710	1710	2260	2860
depth	mm	2025	2025	2420	2420	2420	2420	2420	2420	2420

Note: machine noise output level is less than 70 dB (A)

Technical details and dimensions may be subject to modification without prior notice.



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