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washing disinfection  
catalogue

washing disinfection machines  
in the hospital sector



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Today, the Smeg Group represents excellence Made in Italy with almost 2000 employees and 15 main offices all over the world. Smeg has made a name for itself with its unique profile as a manufacturer of domestic and professional appliances that always pays close attention to the quality, technological content and design of its products.

Smeg Instruments has been demonstrating these values for over 25 years in the medical appliance sector, providing the added value of know-how that comes from the experience of its collaboration with professional operators in more than 30 countries worldwide. With a complete structure that ranges from project design to after-sales service, Smeg Instruments offers the hospital disinfection and sterilization sector state-of-the-art products, personalized solutions, and flexible and efficient service.





**MADE  
IN ITALY**

OVER 25 YEARS SERVICE, TECHNOLOGY AND SAFETY

### SERVICE

Smeg takes care of its customers even during the life of the product through its numerous highly specialized technical assistance centers that are spread all over the national territory and worldwide. Smeg handles installation, testing and personnel training directly. A toll-free number also guarantees constant and qualified support for every possible need.

Placing trust in Smeg means having an after-sales service with a 5,000 m.sq. warehouse capable of delivering spare parts in 24 hours through easy and complete web management (Smeg Tech).

### INNOVATION

A team of expert designers supported by the most modern equipment creates high quality products conforming to the most recent directives and standards with the collaboration of market sector experts. The entire new series of Washer Disinfectors completely satisfy all the requirements indicated by the EN15883 standard. Smeg's objective is to always be one step ahead in innovation and set new standards in the sector.

### QUALITY

Impeccable washing and disinfection results are Smeg's and its customers' committed goal. With thousands of machines installed in Italy and worldwide, Smeg can claim a consolidated and profound experience in the field that deals with medical instruments. Smeg possesses ISO9001:2008 and ISO 13485:2012 quality certifications as a company, while all its thermal disinfection washers that are classified as class IIb medical devices are certified according to the 93/42/CEE European Community directive and conform to the EN15883 standard.

### RELIABILITY

All Smeg's products are created with valuable materials and the best components present on the market today. In particular, Smeg distinguishes itself for the special care it takes in selecting the steel used in its products and the skill used in working with it. In addition, an articulated quality and control system is used for 100% of its productions. Simulating use for 10 years then makes a static control of all the machines in the warehouse. Smeg has been a reliable partner to the main hospitals and private clinics in Italy and all over the world for over 25 years.

### MISSION

We deal with prepared customers who work and live in extremely complex organizations. They require professional solutions that guarantee impeccable performance, perfect efficiency and the highest reliability. Smeg's mission is to offer these solutions and win over our customers' trust.

### VISION

Maximum performance levels are always required on the job. If the job involves the health and life of others, even more so. Compromise is unacceptable. Those working in this sector know the value and actually see the results of their efforts and competence every day. They give and expect the most of themselves. Therefore, they are also aware that the instruments they use are an integral part of their professional performance. Their job success, as well as their personal job satisfaction and, most importantly, the health of others also depend on these instruments. We offer these individuals the tranquility of knowing that when they choose Smeg, they will receive the best level of performance possible: complete conformity to the

standards, absolute safety for the operators, extraordinary results and maximum reliability. We at Smeg know that it is not easy to reach these results and maintain this level of excellence. It requires continuous investment in research and technology, innovation and creativity when creating products, continuous attention to customers, dedication and personal effort. This we ask of our collaborators and ourselves, this is what Smeg offers its customers.



### DUAL TEMPERATURE SENSOR

Dual temperature control using PT1000 probes placed on the bottom of the washing well with temperature crosschecking. The probes can be set on the display and calibrated directly on the machine

### DETERGENT DOSAGE SYSTEM WITH REDUNDANT CONTROL

One of the most important points of the EN15883 standard explains the importance of using the correct dosage of detergent in the machines to provide effective thermal disinfection of the medical device treated. The Smeg WD series provides 4 redundant dosage controls through the use of flow meters, level sensors, current sensing, timed control.

### TECHNOLOGY AND CONNECTIVITY

The new Smeg WD generation is equipped with a sophisticated 4-microprocessor system capable of monitoring all the thermal disinfection functions in real time. It communicates with the outside world through a RS232 serial and a high speed LAN connection. This allows the device to interface directly with the company network.

### GRAPHIC BACKLIT LCD DISPLAY

The goal of the WD models is to clearly and effectively communicate to the operators all the information needed to assure good management of the thermal disinfection machines. Thanks to a 128 x 64 pixel graphic display, the working temperature, reference temperature, A0 parameter value created, activated program, time remaining until program end and other important parameters are always displayed.

### SMALL AND ERGONOMIC

Great importance must be given to space management in environments dedicated to instrument decontamination. Keeping this mind, Smeg thermal disinfection machines integrate into the classic 45, 60 and 90cm width dimensions all the options and accessories available without the need of external applications or dedicated systems. In particular, the WD4060 model provides a compact solution with active drying and 2 integrated washing pumps.

AT THE SERVICE OF PROFESSIONALS WORLDWIDE FOR OVER 25 YEARS

The WD series is the result of over 25 years of experience in the washing and disinfecting sector. It combines the most modern technology and most reliable project solutions with complete compliance to the new standards of the market sector (EN 15883).

Smeg's professional thermal disinfection machines have been conceived and created with one prime objective: to guarantee the best in terms of reliability, safety and performance. Highly valuable materials and special components must be selected to achieve this objective. The wash chamber and door are created exclusively in AISI acid resistant chrome-nickel-molybdenum stainless steel, while the external panels are made of AISI 304 stainless steel.

All the plastic materials are heat-resistant and capable of resisting corrosive substances and organic solvents. The instrument washer is controlled by a 4-microprocessor system that makes it possible to monitor and record operations

performed by the device. In addition, complete electronic control makes a large selection of programs available, allows up to 250 executed cycles to be saved in the memory buffer and sets night cycles using the clock option. It also displays all the necessary parameters and executes a complete diagnostic of the device.

High performance has traditionally defined Smeg products. All 60 cm and 90 cm models offer a washing work surface of up to 1 m<sup>2</sup> (on 4 levels with sprayers for each level), while large dimension models can reach over 2 m<sup>2</sup>. High precision detergent dosages and water input control using flow meters minimizes waste and significantly reduces the impact on the environment. Electric consumption has been largely reduced thanks to "smart" electric water heating, a detailed study of washing programs and the use of a very efficient forced air drying system. The system consists of a filtered hot air generator (HEPA filter 99.99% DOP) connected to the hydraulic unit through an air/water

separator valve that works together with an effective vapor condenser.

The WD-TRACE remote control and traceability management software makes the new Smeg range of professional instrument washers unique. Thanks to a LAN network connection, this exclusive program can load control software updates from the machine (firmware upload) without authorized technicians having to disassemble and reassemble machine components. It also remotely controls the progress of the thermal disinfection cycle being performed in real time and all the important machine operating parameters, as well as setting and/or changing new washing cycles from a PC. In doing so, the cycles performed are saved and downloaded into the PC. Lastly, the software checks the obtained A0 parameter value in real time by drawing a time/temperature graph of one of the thermal disinfection cycles performed.

Numerous thermal disinfection applications exist in the hospital sector. In sterilization and sub-sterilization centers, machine washing and disinfecting using a time and temperature combination is an essential step in obtaining effective critical and non-critical medical device decontamination. Professional instrument washers are absolutely necessary even for treating shoes used in the operating rooms and for washing and sanitizing baby bottles and nipples in the infant formula room. Smeg professional thermal disinfection washers are therefore synonymous with flexibility and versatility.



**SURGICAL INSTRUMENT WASHER**

Smeg thermal disinfection washers are a must to guarantee successful thermal washing and disinfecting of operating room instruments from orthopedic and general surgery instruments to the more delicate sets used in laparoscopy, minimal invasive and eye surgeries.



**SURGICAL SHOE WASHERS**

Thanks to special supports, the new generation of Smeg thermal disinfection washers are the professional solution for accurately and systematically treating heat-resistant shoes used by medical and paramedical staff in the operating room.



**BABY BOTTLE WASHERS**

The new Washer Disinfector models provide special programs for washing baby bottles and nipples in the infant ward of the hospital. This guarantees that all possible sources of infection on the surfaces are eliminated.



**THERMAL DISINFECTION DISHWASHERS**

Possible cross infections can be eliminated in environments such as SERT, infectious disease wards and private clinics through the control and proper disinfection of dishes used for serving meals. For this reason, the use of a thermal disinfection washer is indispensable.



**UNDERCOUNTER OR STAND ALONE**



**STAND ALONE (FOR CSSD)**

**STANDARD DIMENSION MACHINES (45/60/90CM)**

WD2050					
WD1160					
WD4060					
WD4190					
WD3060					
WD5090T					

**LARGE DIMENSION MACHINES**

WD6090BDS				
WD7000				

## WIDE CHOICE IN WASHING VOLUMES – BASIC LINE

Smeg's WD2050 and WD1160 Basic Line represent the smart generation of thermal disinfection washers. This series features newly designed display which is not only easy to use, but also shows important informations on the machine operation and its programs to the user. The entire Smeg range has been developed respecting the technical requirements enforced by the EN15883 standard. Each and every part of Smeg's thermal disinfection washers was put under scrupulous re-design studies and thousands of tests, on the field and off, to pass these new strict parameters. The results were extraordinary! In terms of performance, reliability, productivity and safety, they were the best that the market has to offer regarding current standards.

This is what makes Smeg's products unique.

## WIDE CHOICE IN WASHING VOLUMES – BASIC LINE

Smeg's WD4060 Basic Line represents a new generation machine of instruments washing and disinfection. Even if in a compact space it presents the more advanced technologies as drying system with forced air and integrated peristaltic pumps for automatic detergent dosing.

In only 60cm width and 60cm depth, this model can reprocess up to 8 DIN basket of medical instruments according to the disinfection standards EN15883. This washer disinfector is the perfect choice for small sterilization or sub-sterilization departments where reduced space is required.

Smeg completes its Basic Line with the new WD4190 washer disinfector. In fact, then new sophisticated, yet easy to use electronics of the 2013 Basic Line, is now combined with a 90cm structure, thus allowing to properly accommodate the detergents in a side cabinet made in stainless steel.

### WD2050



WD2050 is an instrument washer disinfector with reduced dimensions projected to work at 2 washing levels. Washing chamber 380x480x580 mm (105 l). Possibility of washing and thermal disinfection (up to 95°C).



### WD1160



WD1160 is an instrument washer disinfector projected to work with 4 washing levels (up to 8 DIN baskets). Washing chamber 520x515x545 mm (146 l). Possibility of washing and thermal disinfection (up to 95°C).



### WD4060



WD4060 is designed to work with 2 to 4 washing levels (up to 8 DIN baskets). Washing chamber 520x515x545 mm (146 l). Possibility of washing, chemical disinfection, thermal disinfection (up to 95°C) and active drying with Hepa filter.



### WD4190



WD4190 is designed to work with 2 to 4 washing levels (up to 8 DIN baskets). Built in detergent cabinet. Washing chamber 520x515x545mm (146 l). Possibility of washing, chemical disinfection and thermal disinfection (up to 95°C) and active drying system with Hepa filter.



**WIDE CHOICE IN WASHING VOLUMES – PROFESSIONAL LINE**

Smeg's WD3060 and WD5090T represent the evolution of thermal disinfection washers. The technology used to create the series is considered a point of reference in the washing and disinfecting machine sector. The entire Smeg range has been developed respecting the technical requirements enforced by the EN15883 standard. This generation of washers are meant to be a technological reference from the point of view of washing parameter control. Its electric control communicates with the end user in his/her own language and allows the technical service to access into the machine by an Ethernet port (teleservice).

This is what makes Smeg's products unique.

**WD3060**



WD3060 is designed to work with 2 to 4 washing levels (up to 8 DIN baskets). Professional electronic control with graphic and full text display, able to check the washing quality and connect to Local Area Network. Washing chamber 520x515x545 mm (146 l). Possibility of washing, chemical disinfection, thermal disinfection ( up to 95°C).



**WD5090T**



WD5090T is designed to work with 2 to 4 washing levels (up to 8 DIN baskets). Professional electronic control with graphic and full text display, able to check the washing quality and connect to Local Area Network. Built in detergent cabinet. Washing chamber 520x515x545 mm (146 l). Possibility of washing, chemical disinfection, thermal disinfection ( up to 95°C) and active drying with Hepa filter.



**WIDE CHOICE IN WASHING VOLUMES – CSSD LINE**

The new CSSD thermal disinfector guarantees excellent performance and the highest reliability. Simple use, maximum security and state-of-the-art technology define this ideal device for hospitals that desire automating their washing and disinfecting processes completely to respect the sector standards (EN15883). Smeg's thermal disinfectors allow a uniform temperature control system in the wash chamber, intersecting anti-contamination washing pumps, FDS (foam detection system) and PRC (perfect rinse control). Energy consumption has been decreased significantly thanks to "intelligent" management provided by the electric and steam heating system employed. Precise detergent and additives dosages, as well as water input control also minimize waste.

**WD6090BDS**



WD6090BDS is designed to work with 4 washing levels (up to 8 EXTRA LARGE baskets equivalent to 10 DIN baskets). Single door. Professional electronic control . Built in detergent cabinet. Washing chamber 670x650x835 mm (363 l). Possibility of washing, chemical disinfection, thermal disinfection ( up to 95°C) and active drying with Hepa filter.



**WD7000**



WD7000 is designed to work in CSSD areas where double door is required. Up 5 washing levels 15 DIN baskets. PLC electronic control for total automation of washing process. Built in detergent cabinet. Washing chamber 671x818x639 mm (350 l). Possibility of washing, chemical disinfection, thermal disinfection ( up to 95°C) and active drying with Hepa filter.





**VAPOR CONDENSER**

The vapor condenser system removes saturated vapor quickly, which develops when the washing water is heated, especially during the thermal disinfection phase. This device prevents condensation from forming near the instrument washer and fumes in humid environments. In addition, if heat dispersion from the instrument washer is limited in air-conditioned areas, the air-conditioning system's workload is reduced significantly, decreasing electric energy consumption and inconvenient changes in temperature.



**DRYING SYSTEM**

The forced air "Drying System" consisting of an effective hot air generator and powerful blower fan, provides extremely efficient and quick drying. The programmer manages the system directly to set the activation and work times. The microprocessor guarantees "smart" management of the drying circuit by automatically adjusting the fan speed according to the temperature found in the wash chamber. Air is collected through dual filtering, firstly by a class C pre-filter with 98% efficiency, and then by a class S HEPA absolute filter with 99.999% efficiency. An indication on the display recommends changing the filters when they no longer work effectively. This assures maximum sterility of the blown air on the treated instruments at all times.



**FLOW METER/ DETERGENT DOSAGE**

The new EN15883 standard stresses the importance of using the correct dosage of additives in the thermal disinfection wash cycle. Therefore, Smeg also decided to use flow meters on each supply tube in the chamber. The device allows the amount of detergent put in the wash chamber to be measured with less than a 5% error factor (such as in point 5.17.12 of the standard) and signals possible working anomalies or product failure on the display.



**PERISTALTIC PUMPS: DETERGENTS AND NEUTRALIZERS**

All Smeg models provide 2 series of peristaltic pumps dedicated to providing the correct alkaline detergent dosage during the cleaning phase and acid-based neutralizer during the neutralization phase. Each pump includes a level sensor to be inserted directly into the cans of products used.



**ADDITIONAL PERISTALTIC PUMPS**

The WD3060, WD4060, WD4190 WD5090T, WD6090BDS and WD7000 can mount additional peristaltic pumps. The pumps provide correct dosage of alkaline detergent during the cleaning phase, the correct dosage of acid-based neutralizer during the neu-

tralization phase, and the correct dosage of disinfectant when the operator performs a thermal chemical disinfection cycle for thermolabile substances. The pumps also provide the correct dosage of lubricant to guarantee long-life for the treated instruments. Each pump includes a level sensor to be inserted directly into the cans of products used.



**DETERGENT, NEUTRALIZER, DISINFECTION AND LUBRICANT**

Ergonomic and practical with reduced dimensions. Keeping in mind these needs, Smeg has designed a detergent cabinet for the WD4190, WD5090T series and larger WD6090 series. The cabinet, placed inside the small dimension instrument washers, can hold up to 4 5-liter cans of detergent. There is no need for external cabinets or tubes for collecting the products outside the thermal disinfection washer volume, as 2 practical removable can holder baskets make cleaning easy.



**PROGRAMMABLE**

The heart of the new generation of Smeg thermal disinfection washers is the innovative microprocessor management system, capable of controlling each task performed. It also monitors the entire flow of information processed by the device using redundant systems. The professional WD system offers users the possibility of programming all desired Washer Disinfector washing parameters using a multifunctional membrane keyboard or the PC, thanks to

the dedicated software. All important parameters can be set, such as: execution time, run time, quantity of additives, number of phases, etc. Management operation access is filtered by a system of 4 user passwords (features by professional line available).



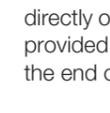
**EN15883**

The recent EN15883 standard indicates the technical requirements for product and process quality assurance. In terms of performance, this guarantees controllable washing and disinfecting cycles that can be verified and repeated. All the latest generation Smeg WD series of Washer Disinfectors is in complete accordance with this standard and every technical solution applied completely comply with the points indicated in the standard (certified by external and neutral company).



**A0 PARAMETER**

A0 is probably the most important new concept introduced in the EN15883 standard. A0 is a numeric value resulting from an equation that puts 2 fundamental thermal disinfection parameters in direct relation with each other: temperature and time. In short, the A0 value expresses to what degree the temperature released by the thermal disinfection process proves "lethal" to medical devices (in seconds). The new Smeg range offers a vast selection of programs with different thermal disinfection solutions. It is also capable of calculating the A0 parameter value in real time. This value is shown



**PRINTER**

The importance of tracing the washing and disinfection cycles performed in professional instrument washers is essential for verifying whether the operations executed were successful or not. A printer is a necessary accessory, as it can provide a detailed report containing all the information regarding cycles that have already been executed.



**RS232 CONNECTION**

One of the most important points required by the EN15833 standard is being able to make a complete check of the executed thermal disinfection process using professional instrument washers. Therefore, the new generation of devices must include the equipment necessary for communicating all executed process information. The new generation WD range includes a RS232 output for PC connection. This permits all the executed washing and disinfection program information to be downloaded.



**LAN CONNECTION**

The Smeg Washer Disinfectors are available with and optional "WD-LAN,". This accessory consists of a data communication card that can connect the

thermal disinfection washers directly to your company's data network. Thanks to LAN connection and Smeg's dedicated softwares, each piece of equipment can be seen as a terminal providing all the machine data directly on the PC. It is possible to dialog directly with the thermal disinfection washer microprocessors, for example, by changing the cycle parameters, rather than displaying a diagram of the temperature created in the wash chamber on an Excel bar graph.



**PERFECT WASH**

During the installation will be set the washing quality required by the user as a conductivity value (µS) according the DEMI water available. When the machine detects impurity during the final rinse, further rinses will be activated (up to 3), and if still remain some dirty, the operator will be warned. All warnings or further rinses will be saved on the machine data archive or printed.



**ACQUASTOP**

The new WD series has an optional "Acquastop" system. this system detects if there is a leakage coming from the machine. If there is water in the chamber, the drain pump automatically switches on.



WD2050



<b>WD2050 TECHNICAL FEATURES</b>	All versions
Electronic control	Microprocessor
Standard programs stored	8
Customisable programs	2
Display with segments and warning light	yes
Clock and calendar	yes
Reprogrammable phases	8
Phase parameters	type of water, detergent quantity, target temperature, extension time in minutes, temperature
Tank internal temperature	from room temperature to 95°C
Accuracy	0,1°C
Temperature sensors in tank	2 x PT 1000 CLASS B IEC 60751
Display	2 digits
Detergent dosing system	2 liquid pumps
Detergent level sensor	optional
Pump to dispense acid neutralized liquid	yes
Pump to dispense alkaline liquid detergent	yes
Safety lock	yes, with electromagnetic release
Safety devices	safety thermostats, door interlock
Alarm display	30
Troubleshooting menu	yes, using PC connection
Programme editing	yes, using 2 spare programmes
<b>AUXILIARY FUNCTIONS</b>	
Traceability	storage of data for 100 most recently run programmes
RS232 serial port for PC connection	yes
RS232 serial port for printer	yes
Cycle storage	yes, WD-TRACE®/Excel format
Cycle file download	yes, WD-TRACE® format
<b>WATER SUPPLY (PRESSURE 1,5-5 BAR)</b>	
Cold water inlet	yes, max 42° F hardness
Demineralised water inlet	no
Demineralised water booster pump	no
Water softener incorporated	yes
Recirculation pump	200 l/min
<b>WATER HEATING</b>	
Electrical	3,0 kW max
<b>STEAM CONDENSER</b>	yes
<b>DIMENSIONS LxDxH mm</b>	
Outside (with built-in top)	450x620x850 (830)
Inside	380x480x590
Net weight (Kg)	61
<b>STAINLESS STEEL</b>	
Wash tank	AISI 316L
Exterior covering	AISI 304
<b>ELECTRICAL POWER SUPPLY</b>	
Max. voltage/power	1/N/PE 230V ~ 50Hz 3,3 kW
<b>NOISE LEVEL</b>	max 50 dB



WD1160



<b>WD1160 TECHNICAL FEATURES</b>	All versions
Electronic control	Microprocessor
Standard programs stores	15
Customisable programs	6
Display with segments and communication led icons	yes
Clock and calendar	yes
Reprogrammable phases	8
Phase parameters	type of water, detergent quantity, target temperature, extension time in minutes and time
Tank internal temperature	from room temperature to 95°C
Accuracy	0,1°C
Temperature sensors in tank	2 x PT 1000 CLASS B IEC 60751
Display	4 digits
Detergent dosing system	max. 3 liquid pumps
Detergent level sensor	yes
Pump to dispense acid neutralized liquid	yes
Pump to dispense alkaline liquid detergent	yes
Safety lock	yes, with electromagnetic release and automatic opening
Safety devices	safety thermostats, door interlock
Alarm display	30
Troubleshooting menu	yes, using PC connection
Programme editing	yes, using 6 spare programs
<b>AUXILIARY FUNCTIONS</b>	
Traceability	storage of data for 100 most recently run programs
RS232 serial port for PC connection	yes
RS232 serial port for printer	yes
Cycle storage	yes, TRACELOG /Excel format
Cycle file download	yes, TRACELOG format
<b>WATER SUPPLY (PRESSURE 1,5-5 BAR)</b>	
Cold water inlet	yes
Demineralised water inlet	yes, < 20 µS/cm
Demineralised water booster pump	optional
Water softener incorporated	yes
Recirculation pump	400 l/min
<b>WATER HEATING</b>	
Electrical	6,3 kW on tri-phase version, 2,3 kW on mono-phase version
<b>STEAM CONDENSER</b>	yes
<b>DIMENSIONS LXDXH MM</b>	
Outside (with built-in top)	600x605x850 (830)
Inside	520x515x545
Net weight (Kg)	74
<b>STAINLESS STEEL</b>	
Wash tank	AISI 316L
Exterior covering	AISI 304
<b>ELECTRICAL POWER SUPPLY</b>	
Max. voltage/power	1/N/PE 230V ~ 50Hz 2,8 kW    3/N/PE 400V - 50 Hz 7,0 kW
<b>NOISE LEVEL</b>	max 50 dB



WD4060



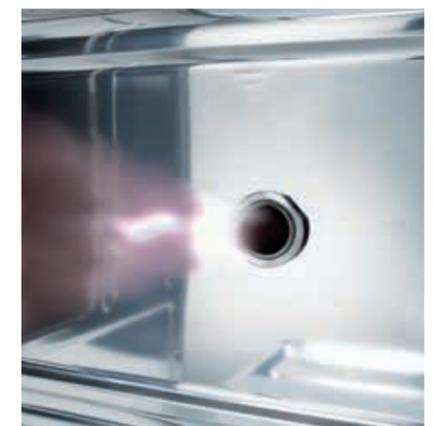
<b>WD4060 TECHNICAL FEATURES</b>	All versions
Electronic control	Microprocessor
Standard programs stored	15
Customisable programs	6
Display with segments and communication led icons	yes
Clock and calendar	yes
Reprogrammable phases	8
Phase parameters	type of water, detergent quantity, target temperature, extension time in minutes, drying temperature and time
Tank internal temperature	from room temperature to 95°C
Accuracy	0,1°C
Temperature sensors in tank	2 x PT 1000 CLASS B IEC 60751
Display	4 digits
Detergent dosing system	max. 3 liquid pumps
Detergent level sensor	yes
Pump to dispense acid neutralized liquid	yes
Pump to dispense alkaline liquid detergent	yes
Safety lock	yes, with electromagnetic release and automatic opening
Safety devices	safety thermostats, door interlock
Alarm display	30
Troubleshooting menu	yes, using PC connection
Programme editing	yes, using 6 spare programs
<b>AUXILIARY FUNCTIONS</b>	
Traceability	storage of data for 100 most recently run programs
RS232 serial port for PC connection	yes
RS232 serial port for printer	yes
Cycle storage	yes, TRACELOG /Excel format
Cycle file download	yes, TRACELOG format
<b>DRYING SYSTEM</b>	
Drying fan	yes
Drying heating element	0,8 kW
Prefilter class C 98%	yes
HEPA filter Class S 99.999%	yes
<b>WATER SUPPLY (PRESSURE 1,5-5 BAR)</b>	
Cold water inlet	yes
Demineralised water inlet	yes, < 20 µS/cm
Demineralised water booster pump	optional
Water softener incorporated	yes
Recirculation pump	400 l/min
<b>WATER HEATING</b>	
Electrical	6,3 kW on tri-phase version, 2,3 kW on mono-phase version
<b>STEAM CONDENSER</b>	yes
<b>DIMENSIONS LxDxH mm</b>	
Outside (with built-in top)	600x605x850 (830)
Inside	520x515x545
Net weight (Kg)	77
<b>STAINLESS STEEL</b>	
Wash tank	AISI 316L
Exterior covering	AISI 304
<b>ELECTRICAL POWER SUPPLY</b>	
Max. voltage/power	1/N/PE 230V ~ 50Hz 2,8 kW 3/N/PE 400V - 50 Hz 7,0 kW
<b>NOISE LEVEL</b>	max 50 dB



WD4190



<b>WD4190 TECHNICAL FEATURES</b>	All versions
Electronic control	Microprocessor
Standard programs stores	15
Customisable programs	6
Display with segments and communication led icons	yes
Clock and calendar	yes
Reprogrammable phases	8
Phase parameters	type of water, detergent quantity, target temperature, extension time in minutes, drying temperature and time
Tank internal temperature	from room temperature to 95°C
Accuracy	0,1°C
Temperature sensors in tank	PT 1000 CLASS B IEC 60751
Display	4 digits
Detergent dosing system	max. 3 liquid pumps
Detergent level sensor	yes
Pump to dispense acid neutralized liquid	yes
Pump to dispense alkaline liquid detergent	yes
Safety lock	yes, with electromagnetic release and automatic opening
Safety devices	safety thermostats, door interlock
Alarm display	30
Troubleshooting menu	yes, using PC connection
Programme editing	yes, using 6 spare programs
<b>AUXILIARY FUNCTIONS</b>	
Traceability	storage of data for 100 most recently run programs
RS232 serial port for PC connection	yes
RS232 serial port for printer	yes
Cycle storage	yes, TRACELOG /Excel format
Cycle file download	yes, TRACELOG format
<b>DRYING SYSTEM</b>	
Drying fan	yes
Drying heating element	0,8 kW
Prefilter class C 98%	yes
HEPA filter Class S 99.999%	yes
<b>WATER SUPPLY (PRESSURE 1,5-5 BAR)</b>	
Cold water inlet	yes
Demineralised water inlet	yes, < 20 µS/cm
Demineralised water booster pump	optional
Water softener incorporated	yes
Recirculation pump	400 l/min
<b>WATER HEATING</b>	
Electrical	6,3 kW on tri-phase version, 2,3 kW on mono-phase version
<b>STEAM CONDENSER</b>	yes
<b>DIMENSIONS LXXH MM</b>	
Outside (with built-in top)	900x605x850 (830)
Inside	520x515x545
Net weight (Kg)	83
<b>STAINLESS STEEL</b>	
Wash tank	AISI 316L
Exterior covering	AISI 304
<b>ELECTRICAL POWER SUPPLY</b>	
Max. voltage/power	1/N/PE 230V ~ 50Hz 2,8 kW - 3/N/PE 400V - 50 Hz 7,0 kW
<b>NOISE LEVEL</b>	max 50 dB



WD3060



WD3060 TECHNICAL FEATURES		All versions
Electronic control	3 microprocessors +1 (optional communication card)	
Standard programs stored	20	
Customisable programs	10 (expandable to 50)	
Backlit graphic LCD display	128 x 64 pixels	
Clock and calendar	yes	
Reprogrammable phases	10	
Phase parameters	type of water, detergent quantity, target temperature, extension time	
Tank internal temperature	from room temperature to 95° C	
Accuracy	0.1°C	
Temperature sensors in tank	2 x PT 1000 CLASS B IEC 60751	
Detergent level sensor	yes	
Detergent pumps	4 max	
Safety lock	yes, with electromagnetic release and automatic opening	
Safety devices	safety thermostats, door interlock	
Alarm display	80	
Troubleshooting menu	yes	
Program editing	yes (via password)	
Password	4 levels	
Display languages	Italian, English, French, German, Russian, Spanish, Turkish and others on request	
<b>AUXILIARY FUNCTIONS</b>		
External sensor duct	optional	
Traceability	Storage of data for 100 most recently run programs	
Waste water separation solenoid valve control	optional	
RS232 serial port for PC connection	yes	
RS232 serial port for printer	yes	
Cycle storage	yes, WD-TRACE®/Excel format	
Cycle file download	yes, WD-TRACE® format	
<b>WATER SUPPLY (PRESSURE 1.5-5 BAR)</b>		
Cold/hot water inlet	yes, 42 °F hardness	
Demineralised water inlet	yes, <20µS/cm	
Demineralised water booster pump	optional	
Water softener incorporated	yes	
Recirculation pump	400 l/min	
<b>WATER HEATING</b>		
Electrical	6.3 kW max	
Water pre-heating via boiler	optional	
<b>STEAM CONDENSER</b>		
	yes	
<b>DIMENSIONS LxDxH mm</b>		
Outside (with built-in top)	600x640x850 (830)	
Inside	520x515x545	
Net weight (kg)	76	
<b>STAINLESS STEEL</b>		
Wash tank	AISI 316L	
Exterior covering	AISI 304	
<b>ELECTRICAL POWER SUPPLY</b>		
Max. voltage/power	1/N/PE 230V ~ 50Hz 2.8 kW 3/N/PE 400V ~ 50Hz 7.0 kW	
<b>NOISE LEVEL</b>		
	max 50 dB	



WD5090T



**WD5090T TECHNICAL FEATURES**

Electronic control	3 microprocessors +1 (optional communication card)
Standard programs stored	20
Customisable programs	10 (expandable to 50)
Backlit graphic LCD display	128 x 64 pixels
Clock and calendar	yes
Reprogrammable phases	10
Phase parameters	type of water, detergent quantity, target temperature, extension time in minutes, drying temperature and time
Tank internal temperature	from room temperature to 95° C
Accuracy	0.1°C
Temperature sensors in tank	2 x PT 1000 CLASS B IEC 60751
Detergent level sensor	yes
Detergent pumps	4 max
Safety lock	yes, with electromagnetic release and automatic opening
Safety devices	safety thermostats, door interlock
Alarm display	80
Troubleshooting menu	yes
Program editing	yes (via password)
Password	4 levels
Display languages	Italian, English, French, German, Russian, Spanish, Turkish and others on request
<b>AUXILIARY FUNCTIONS</b>	
External sensor duct	optional
Traceability	Storage of data for 100 most recently run programs
Waste water separation solenoid valve control	optional
RS232 serial port for PC connection	yes
RS232 serial port for printer	yes
Cycle storage	yes, WD-TRACE®/Excel format
Cycle file download	yes, WD-TRACE® format
<b>DRYING SYSTEM</b>	
Drying fan	yes
Drying heating element	2 kW
Prefilter class C 98%	yes
HEPA filter Class S 99.999%	yes
<b>WATER SUPPLY (PRESSURE 1.5-5 BAR)</b>	
Cold/hot water inlet	yes, max 42°F hardness
Demineralised water inlet	yes, <20µS/cm
Demineralised water booster pump	optional
Water softener incorporated	yes
Recirculation pump	400 l/min
<b>WATER HEATING</b>	
Electrical	6.3 kW max
Water pre-heating via boiler	optional
<b>STEAM CONDENSER</b>	
	yes
<b>DIMENSIONS LxDxH mm</b>	
Outside (with built-in top)	900x640x850 (830)
Inside	520x515x545
Net weight (kg)	83
<b>STAINLESS STEEL</b>	
Wash tank	AISI 316L
Exterior covering	AISI 304
<b>ELECTRICAL POWER SUPPLY</b>	
Max. voltage/power	1/N/PE 230V ~ 50Hz 2.8 kW 3/N/PE 400V ~ 50Hz 7.0 kW
<b>NOISE LEVEL</b>	
	max 50 dB



**MACHINE OPTIONALS**



**DISINFECTANT DOSAGE PUMP**

Additional peristaltic pump for liquid disinfectant dosage complete with a level sensor. The device's microprocessor manages the quantity of detergent released by the pump.



**LUBRICANT DOSAGE PUMP**

Additional peristaltic pump for lubricant dosage complete with a level sensor. The device's microprocessor manages the quantity of detergent released by the pump.



**IC5090**

On the basis of demineralized water conductivity used during the last rinse phase, it allows to detect any impurities and to activate also further rinse phases for achieving a perfect rinse with low conductivity



**TANKBSK**

Can holder basket with guides designed to hold up to 2 additional 5-liter cans inside model cabinet. This accessory is needed if the additional WD-AD5HT and WD-AD6HT pumps are purchased



**WD-VDS**

Double discharge valve that allows separating and ducting the polluted wastewater from the first washing cycles from the final rinsing water. This wastewater separation device is composed of 1 and 1/2" valves with Viton membrane and valve opening is controlled by the machine microprocessor.

**TRACEABILITY OPTIONALS**



**WD-PRINT**

External 24-character impact matrix printer with real-time clock function. Complete with thermal paper roll.

**WD-PAPER** Thermal paper roll. Diameter 50 mm, width 57 mm.



**WD-LAN**

All models of Smeg's Washer Disinfectors may be provided with an optional data communication card including a LAN port to connect the thermal disinfection washer to the local network. The connection provides remote communication with the device due to the dedicated software, which then displays all the information given by thermal disinfection washer on your PC. All the operating parameters can also be changed without having to do so directly on the machine.



**STAINLESS STEEL BASES AND FRAMES**



**B9040L**

Base for 90 cm wide models only. The frame allows bringing the machine loading level up to an ergonomic height approximately 70 cm from the ground. Entirely made of stainless steel. A detergent compartment with anti-drip bottom and front door with push-pull opening is integrated in the base. Dimensions l x d x h = 900x530x400 mm  
**B6040L** (not shown in the photo): for 60 cm wide models only. Dimensions l x d x h = 600x530x400 mm



**B9040QWC**

Base with integrated demineralised water boiler. For 90 cm wide models only. A boiler is housed in the base to preheat the demineralised water to get fastest cycles. Dimensions: l x d x h = 900x530x400 mm



**T9040**

Frame for 90 cm wide models only. The frame allows bringing the machine loading level up to an ergonomic height approximately 70 cm from the ground. The frame also facilitates cleaning the machine underneath. Entirely made of stainless steel. Dimensions l x d x h = 900x530x400 mm  
**T6040** (not shown in the photo): frame for 60cm models only. Dimensions l x p x h = 600x530x400 cm

**TROLLEYS WITH RAILS**



**D-CS1** UPPER LEVEL SURGICAL INSTRUMENT TROLLEY  
Basic upper trolley with sprayer for the WD2050 series. It holds baskets and supports for surgical instrument treatment.



**D-CS2** LOWER LEVEL SURGICAL INSTRUMENT TROLLEY  
Basic lower trolley for the WD2050 series. It holds baskets and supports for surgical instrument treatment.



**CS1-1** UPPER LEVEL SURGICAL INSTRUMENT TROLLEY  
Basic upper trolley with sprayer. It holds baskets and supports for surgical instrument treatment.



**CS2** LOWER LEVEL SURGICAL INSTRUMENT TROLLEY  
Basic lower trolley. It holds baskets and supports for surgical instrument treatment.

**TROLLEYS WITHOUT RAILS**



**CSK4B** 2-LEVEL SURGICAL INSTRUMENT TROLLEY  
Suitable for treating standard and large-sized surgical instruments. Two washing levels served by an incorporated sprayer and a sprayer on the bottom of the machine. Minimum working height 165 mm. To be fitted with 4 CSK DIN baskets.



**CSK6B** 3-LEVEL SURGICAL INSTRUMENT TROLLEY  
Suitable for treating large quantities of standard-sized surgical instruments. Three washing levels served by two incorporated sprayers and one sprayer on the bottom of the machine. Minimum working height 75 mm. To be fitted with 6 CSK DIN baskets.



**CSK8B** 4-LEVEL SURGICAL INSTRUMENT TROLLEY  
Suitable for treating a large quantity of and standard-sized surgical instruments. Four washing levels served by three incorporated sprayers and one sprayer on the bottom of the machine. Minimum working height 64 mm. To be fitted with 8 CSK DIN baskets. This last solution is particularly suited to treating a large quantity of instruments coming from different sources that need to be separated.



**CSK1** 1-LEVEL SURGICAL INSTRUMENT BASKET

Suitable for large-sized surgical instruments (ex. abdominal retractors, self-retaining retractors, lateral valves, etc.).

Dimensions: L x D x H 450 x 450 x 55mm, mesh 5 x 5mm  
Space needed: entire washer level



**CSK2** HALF-LEVEL SURGICAL INSTRUMENT BASKET

Suitable for medium-sized surgical instruments (ex. clamps, haemostatic forceps, scissors, suture instruments, etc.).

Dimensions: L x D x H 450 x 225 x 50mm, mesh 5 x 5mm  
Space needed: half of a washer level



**CSKDIN** HALF-LEVEL SURGICAL INSTRUMENT BASKET

Suitable for medium-sized surgical instruments (ex. clamps, haemostatic forceps, scissors, suture instruments, etc.).  
Can only be used with a CSK6 support trolley.

Dimensions: L x D x H 480 x 245 x 50mm, mesh 5 x 5mm  
Space needed: half of a washer level



**CSK2/3** 2/3-LEVEL SURGICAL INSTRUMENT BASKET

Suitable for medium or large-sized surgical instruments (ex. abdominal retractors, self-retaining retractors, lateral valves, etc.).

Dimensions: L x D x H 435 x 310 x 50mm, mesh 5 x 5mm  
Space needed: two thirds of a washer level



**CSK1/3** 1/3-LEVEL SURGICAL INSTRUMENT BASKET

Suitable for medium-sized surgical instruments (ex. clamps, haemostatic forceps, scissors, suture instruments, etc.).

Dimensions: L x D x H 435 x 160 x 50mm, mesh 5 x 5mm  
Space needed: one third of a washer level



**CSK 1/6** 1/6-LEVEL SURGICAL INSTRUMENT BASKET

Suitable for various small-sized surgical instruments (ex. scalpels, surgical scissors, small forceps, etc.).

Dimensions: L x D x H 130 x 225 x 50mm  
Mesh: cover 5 x 5mm, basket 3 x 3 mm  
Space needed: one sixth of a washer level



**D-CM1** HIGH BASKET WITH HANDLES

Basket with handles and high sides.

Dimensions: L x D x H 300 x 155 x 115 mm,  
basket mesh 3 x 3 mm  
Suitable for various small and medium-sized instruments.



**D-SV** VERTICAL BASKET

Suitable for holding various surgical instruments in the vertical position (ex. Forceps, probes, swab holders, spatulas, osteotomies, chisels, etc.).  
Divided into multiple compartments and a central inclined tub for washing water drainage.

Dimensions: L x D x H 300 x 160 x 150 mm,  
basket mesh 3 x 3 mm



**CSMICRO1** TINY SURGICAL INSTRUMENT BASKET

Surgical instrument basket with handles and lid.

Dimensions: L x D x H 240 x 235 x 55 mm,  
basket mesh 3 x 3 mm  
Space needed: 1/4 of a washer level  
Suitable for various tiny instruments or very small instruments in general.



**CSMICRO2** TINY SURGICAL INSTRUMENT BASKET

Surgical instrument basket with lid.

Dimensions: L x D x H 100 x 80 x 45 mm, basket mesh in micro-stretched netting.  
Suitable for very small instruments in general.

Also available model **CSMICRO3**  
Dimensions: L x D x H 280x168x45 mm,  
basket mesh in micro-stretched netting.



**SA3** KIDNEY BOWL SUPPORT

Basin and kidney bowl support.

Holds 4 kidney bowls  
Space needed: half washer level of a CS3 trolley



**SL6** OPTICAL PLATES

Suitable for 6 optical lense plates support (Olympus type)

Dimensions: L x D x H 490 x 145 x 80 mm  
Space needed: 1/3 washer level

**MINI-INVASIVE SURGERY TROLLEY**



**EF2 RIGID VIDEOLAPAROSCOPE AND ENDOSCOPE TROLLEY**

Injection trolley for washing and drying rigid endoscope and video laparoscope instruments. The special injectors and quick-connecting couplings inject the detergent and disinfectant solutions in the internal channels of the instruments. A sprayer arm at the bottom of the wash chamber guarantees external washing. Direct connection to the hydraulic unit is made using a quick-coupling self-adjusting system.



**EF2DS**  
Trolley equipped with a connector with the Drying System coupling valve.

Equipped with:

- 38 injectors of various diameters for endoscope cable instruments (to place when disassembled), such as cannulas, set of rigid endoscopes, video-laparoscopes and trocars.
- 10 special connectors for treating hollow instruments with a max. length of 550 mm.
- 2 CSMICRO1 baskets for very small rubber instruments and small components.
- 1 open CSK2 basket for placing endoscope mechanical components and S-MIC locks



**EF4 SPECIAL MINI-INVASIVE SURGERY TROLLEY**

Injection trolley for washing and drying the internal parts of mini-invasive surgical hollow instruments. Two external collectors provide quick-connecting luer locks for placing medium/small-sized instruments such as MIC dismountable instruments in a vertical position. Two internal rows providing ULB couplings placed in an oblique position allow large-sized cannulas (max. 500mm) to be inserted. Direct connection to the hydraulic unit is made through a quick-coupling self-adjusting system.



**EF4DS**  
Trolley equipped with a connector with the Drying System coupling valve.

Equipped with:

- 20 injectors and luer lock quick connectors
- 20 ULB supports for tubular instruments with diameters of 7 and 3 mm
- 1 CSK2 basket for medium-sized instruments and S-MIC locks
- 3 CSK1/6 baskets provided with special silicone-rubber locks for tiny delicate instruments



**EF3 SPECIAL OPHTHAMOLOGY TROLLEY**

Smeg has created, for washing and disinfecting the tiny fragile instruments used in the ophthalmology departments, a trolley with specific injection systems, quick connectors for all hollow instrument and cannula connection and a set of basins with special locks to prevent the force of the water jets from scattering the treated medical devices. Direct connection to the hydraulic unit is made through a quick-coupling self-adjusting system.



**EF3DS**  
Trolley equipped with a connector with the Drying System coupling valve.

Equipped with:

- 12 male connectors with diameters of 6, 4, 3 mm used for hollow instrument and tube injection washing.
- 9 female connectors with diameters of 7 and 4 mm
- 2 spring check valves with respective clamps for external washing of delicate tubular instruments
- 5 hollow supports with diameters of 7 and 4 mm for internal and external washing of cannulas
- 2 CSK2 baskets
- 4 CSK1/6 baskets provided with S-MIC locks for tiny delicate instruments

**SPECIAL TROLLEYS**



**AE2DS ANESTHESIA TROLLEY**

Trolley for treating anesthesia instruments. It is equipped with an injection system for cleaning the inside of corrugated tubes with 10 nozzles (3 mm diameter) and 3 injectors (6 mm diameter). Direct connection to the hydraulic unit is made through a quick-coupling self-adjusting system.

Equipped with:

- 8 injection supports for corrugated tubes with a max. length of 150mm
- 13 nozzles for catheters
- 3 balloon nozzles
- 4 supports for masks and accessories



**CM3 MASK WASHING TROLLEY**

Two-level trolley for washing and treating various types of masks. It holds up to 24 masks. Specifically, 8 masks can be placed on the top level and 16 on the bottom level. Uniform mask spraying is guaranteed by the sprayer on the bottom of the wash chamber and by the second sprayer arm placed between the 2 washing levels. Direct connection to the hydraulic unit is made through a quick-coupling self-adjusting system.



**CPC1 CONTAINER TROLLEY**

Trolley for washing 2 containers and 2 lids with max. dimensions of 300 x 300 x 150mm (LxDxH). Complete container cleaning is guaranteed by a sprayer arm on the bottom of the wash chamber and by the second one placed on the trolley. Direct connection to the hydraulic unit is made through a quick-coupling self-adjusting system.

**DISHWASHER TROLLEY**



**CSKSTOV DISHWASHER TROLLEYS WD1160 MODEL**

Upper and lower trolleys for the WD1160 and WD4060 model. They are used for treating a max. of 14 dish sets.



**BASIC SHOES ACCESSORIES**



**ZCS3 OPERATING ROOM SHOE TROLLEY**

Trolley with two washing levels for treating operating room shoes. It can hold 12 pairs of shoes. Specifically, 4 pairs of shoes can be placed on the top level and 8 pairs on the bottom level. The specially configured shoe support hooks has been designed to prevent possible rubber deformation due to the high temperatures reached in the wash chamber. Uniform shoe spraying is guaranteed by a sprayer on the bottom of the wash chamber and by the second sprayer arm placed between the two washing levels. Direct connection to the hydraulic unit is made through a quick-coupling self-adjusting system. Made in stainless steel.



**ZCS1 UPPER SURGICAL SHOE TROLLEY**

Upper shoe trolley with sprayer. It holds 4 pairs of shoes.

**D-ZCS1 UPPER SURGICAL SHOE TROLLEY (not in photo)**

Upper shoe trolley with sprayer. It holds 3 pairs of shoes.



**ZCS2 LOWER SURGICAL SHOE TROLLEY**

Lower shoe trolley for the WD1160 series. It holds 8 pairs of shoes.

**D-ZCS2 LOWER SURGICAL SHOE TROLLEY (not in photo)**

Lower shoe trolley for the WD2050 series. It holds 4 pairs of shoes.



**CS3 UNIVERSAL SUPPORT TROLLEY**

Two-level universal support trolley with an incorporated sprayer and a sprayer on the bottom of the machine. Direct connection to the hydraulic unit is made through a quick-coupling self-adjusting system. It is suitable for positioning baby bottle baskets or for supports and various baskets. Made in stainless steel.



**BABY BOTTLE CONTAINER**

Container for 18 baby bottles with lids. Positioning on a standard CS3 trolley or CS1-1/CS2 in machines with rails. Space needed: half a rack for each level. Made in stainless steel.

- CB18** for 250 ml baby bottles  
Dimensions: 210 x 425 x 195 mm (L x D x H)
- CB18/120** for 120 ml baby bottles  
Dimensions: 210 x 425 x 125 mm (L x D x H)
- CB18/100** for 100 ml baby bottles  
Dimensions: 210 x 425 x 115 mm (L x D x H)



**CPS20 CONTAINER FOR 20 PACIFIERS**

Metal-netted container with lid. Positioned on a standard CS3 trolley. Two baskets can be overlapped to increase the surgical instrument load capacity. Made in stainless steel. Space needed: half a rack for each level. Dimensions: 430 x 190 x 60 mm (L x D x H). Mesh 5 x 5 mm.



WD6090BDS



WD6090BDS TECHNICAL FEATURES

Electronic control	3 microprocessors +1 (optional communication card)
Standard programs stored	20
Customisable programs	10 (expandable to 50)
Backlit graphic LCD display	128 x 64 pixels
Clock and calendar	yes
Reprogrammable phases	10
Phase parameters	type of water, detergent quantity, target temperature, extension time, drying temperature and time
Tank internal temperature	from room temperature to 95° C
Accuracy	0.1° C
Temperature sensors in tank	2 x PT 1000 CLASS B IEC 60751
Dosing pumps	5 max
Detergent level sensor	yes
Safety lock	yes, with electromagnetic lock and automatic opening
Safety devices	safety thermostats, door interlock
Alarm display	80
Troubleshooting menu	yes
Program editing	yes (via password)
Password	4 levels
Display languages	Italian, English, French, German, Russian and others on request
<b>AUXILIARY FUNCTIONS</b>	
External sensor duct	optional
Traceability	Storage of data for 100 most recently run programs
Waste water separation solenoid valve control	optional
RS232 serial port for PC connection	yes
RS232 serial port for printer	yes
Water quality check	optional
Cycle storage	yes, WD-TRACE®/Excel format
Cycle file download	yes, WD-TRACE® format
<b>DRYING SYSTEM</b>	
Double drying fan	yes, 2 motors variable speed
Drying heating element	4 kW
Prefilter class C 98%	yes
HEPA filter Class S 99.999%	yes
<b>WATER SUPPLY (PRESSURE 1.5-5 BAR)</b>	
Cold/hot water inlet	yes, max 42° F hardness
Demineralised water inlet	yes, <20µS/cm
Demineralised water booster pump	optional
External water softener	optional
Recirculation pump	2 pumps of 400 l/min
<b>WATER HEATING</b>	
Electrical	17.7 kW max
Water pre-heating via boiler	yes
<b>DIMENSIONS LxDxH mm</b>	
Outside	900x801x2000
Inside	670x650x835
Net weight (kg)	282
<b>STAINLESS STEEL</b>	
Wash tank	AISI 316L
Exterior covering	AISI 304
<b>ELECTRICAL POWER SUPPLY</b>	
Max. voltage/power	3/N/PE 400V ~ 50Hz 18.5 kW
<b>NOISE LEVEL</b>	
	max 50 dB



**MACHINE OPTIONS**



**IC6000**

Digital indicator capable of monitoring drain water conductivity. This is especially useful when demineralized water is used for final rinsing. If the drain water quality provides high conductivity values, additional rinsing cycles are recommended. The measurement range goes from 0 to 20 µa/cm. The values are shown on a backlit LCD display. Visual indications are given for detecting out-of-scale parameters. Installed inside the machine's front panel.

**DIS-GW6** WD6090BDS SERIES RELEASE TROLLEY

Trolley used for loading and unloading trolleys to be positioned on the lower level of the machine. It is equipped with 4 rotating and lockable wheels, handle for movement, and a safety system for locking the trolleys. The trolley includes a lower level for holding supports or other trolleys.

**CBS1** BASIC 1ST LEVEL TROLLEY FOR 2ND/3RD/4TH LEVEL

Basic trolley with sprayer. Can be used for 2nd/3rd/4th level washing. Suitable for holding support structures and surgical instrument baskets. Holds 2 CSKL surgical instrument baskets. The trolley includes a lower level for holding supports or other trolleys.

**CBS2** BASIC 1ST LEVEL TROLLEY FOR 1ST LEVEL

Basic trolley without sprayer. Can be used for 1st level washing (an incorporated sprayer on the bottom of the machine is used). Suitable for holding support structures and surgical instrument baskets. One trolley max. per machine.

**CSKL** LARGE-SIZED BASKET FOR SURGICAL INSTRUMENTS

Basket for surgical instruments with handles. Suitable for holding medium/large-sized surgical instruments. Space needed: half a level of the CBS1 and CBS2 support structure.

Dimensions: 280 x 600 x 55 mm (L x D x H). Mesh 5 mm.

**SCN1** UPPER SUPPORT STRUCTURE FOR CONTAINER WASHING

Support structure for washing 1 sterilization unit container (max. dimensions: 600 x 300 x 300 mm (L x D x H)) and 3 lids. It can only be placed on the CBS1 support structure.

**SCN2** LOWER SUPPORT STRUCTURE FOR CONTAINER WASHING

Support structure for washing 2 sterilization unit containers (max. dimensions: 600 x 300 x 300 mm (L x D x H)). It can only be placed on the CBS2 support structure.

**SZ1** SHOE WASHING SUPPORT STRUCTURE

Support structure for washing 15 pairs of operating room shoes to be placed on the CBS basic series of trolleys. The specially configured shoe support hooks has been designed to prevent possible rubber deformation due to the high temperatures reached in the wash chamber. There is a maximum of 2 support structures for each machine (1st and 3rd level) for a total of 30 pairs of shoes.

**AE6** ANESTHESIA SET WASHING TROLLEY

Trolley for washing anesthesia instruments. It is equipped with an injection system for cleaning the inside of corrugated tubes with 26 nozzles (3 mm diameter) and 6 injectors (6 mm diameter). Direct connection to the hydraulic unit is made through a quick-coupling self-adjusting system. It holds 18 corrugated tubes with a max. length of 150mm, 26 catheters, 6 flasks and 8 masks. It is placed on the lower level.



**SURGICAL INSTRUMENTS WASHING**

LEVELS	BASIC TROLLEYS	BASKETS
1ST LEVEL	CBS2	CSKL (2 BASKETS)
2ND LEVEL	CBS1	CSKL (2 BASKETS)
3RD LEVEL	CBS1	CSKL (2 BASKETS)
4TH LEVEL	CBS1	CSKL (2 BASKETS)



**SHOE WASHING**

LEVELS	BASIC TROLLEYS	BASKETS
1ST LEVEL	CBS2	SZ1
2ND LEVEL	-	-
3RD LEVEL	CBS1	SZ1
4TH LEVEL	-	-



**CONTAINER WASHING**

LEVELS	BASIC TROLLEYS	BASKETS
1ST LEVEL	CBS2	SCN2
2ND LEVEL	-	-
3RD LEVEL	CBS1	SCN1
4TH LEVEL	-	-



**ANESTHESIA SET WASHING**

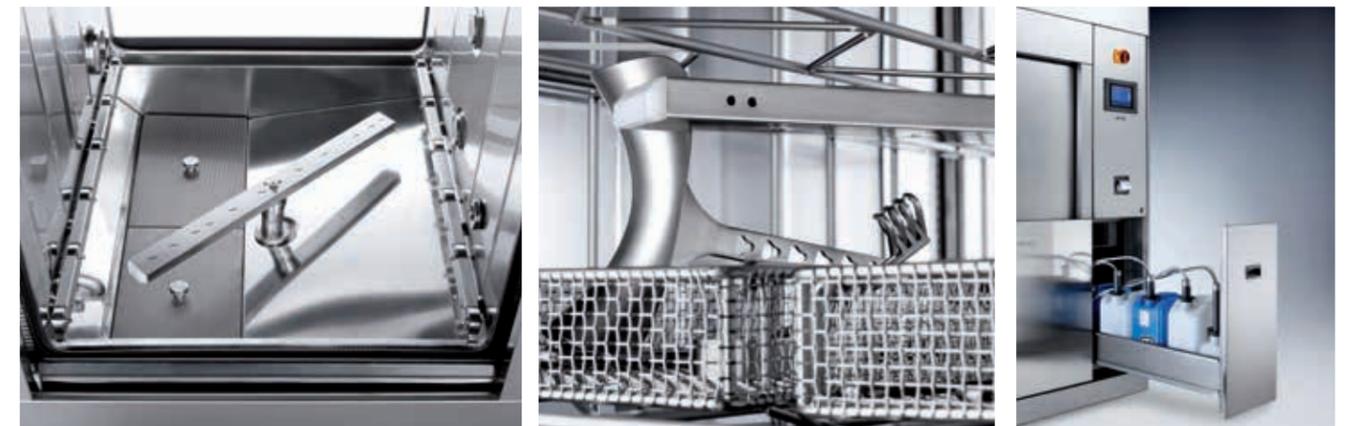
LEVELS	BASIC TROLLEYS	BASKETS
1ST LEVEL	AE6	-
2ND LEVEL	-	-
3RD LEVEL	-	-
4TH LEVEL	-	-

WD7000



**WD7000 TECHNICAL FEATURES**

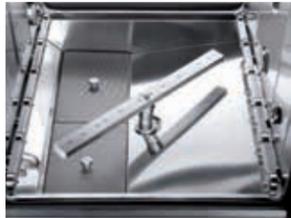
Electronic control	PLC for control automation
Standard programs stored	20
Customisable programs	20
Backlit graphic LCD display	5.7 inches touch control
Clock and calendar	yes
Reprogrammable phases	10
Phase parameters	type of water, detergent quantity, target temperature, extension time, drying temperature and time
Tank internal temperature	from room temperature to 95° C
Accuracy	0.1°C
Temperature sensors in tank	3 x PT 1000 CLASS B IEC 60751
Dosing pumps	5 max
Detergent level sensor	yes
Safety lock	yes, with electromagnetic lock and automatic opening
Safety devices	safety thermostats, door interlock
Alarm display	95
Troubleshooting menu	yes
Program editing	yes (via password)
Password	4 levels
Display languages	Italian, English, French, German, Russian and others on request
<b>AUXILIARY FUNCTIONS</b>	
External sensor duct	optional
Traceability	Storage of data for 100 most recently run programs - direct download to USB key
Washing baskets bar code scanner	optional
RS232 serial port for PC connection	yes
RS232 serial port for printer	yes
Water quality check	optional
Cycle storage	yes, USB port/Excel format
Cycle file download	yes, USB port
<b>DRYING SYSTEM</b>	
Double drying fan	2 motors variable speed
Drying heating element	5 kW
Prefilter class C 98%	yes
HEPA filter Class S 99.999%	yes
<b>WATER SUPPLY (PRESSURE 1.5-5 BAR)</b>	
Cold/hot water inlet	yes, max 42° F hardness
Demineralised water inlet	yes, <20µS/cm
Demineralised water booster pump	optional
External water softener	optional
Recirculation pump	2 pumps of 400 l/min
<b>WATER HEATING</b>	
Electrical	18 kW max
Water pre-heating via boiler	yes demi - optional for tap water
<b>DIMENSIONS LxDxH mm</b>	
Outside	1150x990x2000
Inside 6	671x818x639
Net weight (kg)	680
<b>STAINLESS STEEL</b>	
Wash tank	AISI 316L
Exterior covering	AISI 304
<b>ELECTRICAL POWER SUPPLY</b>	
Max. voltage/power	3/N/PE 400V ~ 50Hz 22 kW
NOISE level	max 50 dB



## MACHINE OPTIONS

**PERFECT RINSING**

A conductivity sensor evaluates the drain water quality. The device allows additional washing cycles to be programmed if contaminated substances remain on the treated material. The WD7000 thermal disinfectant therefore guarantees perfect rinsing that eliminates residue completely. The checks made by the sensor can also be visualized on the display and documented.

**EASY INSPECTION**

Optimum internal visibility is guaranteed by the powered white leds providing illumination. The glass doors also allow the wash chamber to be seen from the outside so the wash load can be checked at any moment. In addition, external probes can be inserted in the inspection ducts allowing process performance to be checked and validated.

**REMOTE CONNECTION**

The Ethernet connection feature allows operating data to be downloaded remotely and a complete diagnostic of the equipment to be made, by interacting with the machine settings when needed. Smeg Instruments' thermal disinfectant can also send e-mails containing various types of information by computer or pocket PC, such as signaling the end of a washing cycle or possible malfunctions or alarms. The RS232 serial port provides authorized technicians with access to machine maintenance through a PC connection to the thermal disinfectant.

**PROCESS TRACEABILITY**

Up to 2 printers can be connected to the WD7000 thermal disinfectant to collect all the information regarding washing and disinfecting cycles on paper, whereas the data management software provides the alternative of tracing cycles in electronic format. The bar code scanner provided recognizes the exact location of the washing baskets in the decontamination process. In cases where connection is limited, the WD7000 also offers the possibility of using a USB port to download information onto a pen drive.

## MACHINE ACCESSORIES

**CSK12 MULTIFUNCTION WASHING TROLLEY UP TO 4 LEVELS**

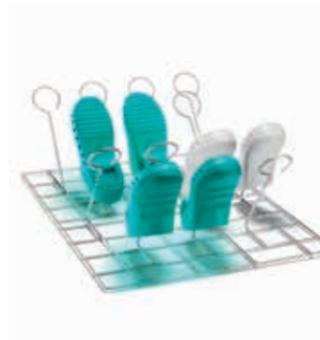
Multifunction washing trolley which allows to combine general instruments washing and direct injection system for MIC instruments (2 levels available for MIC direct injection system with baskets CSKFLEX) From 2 to 4 washing levels with 4 direct injection dismantable rotary arms on each level. Maximum height between levels 70 mm. Load capacity: max. 12 type din baskets. Made in stainless steel AISI 304.

**CSK15 MULTIFUNCTION WASHING TROLLEY UP TO 5 LEVELS (not in photo)**

Multifunction washing trolley which allows to combine general instruments washing and direct injection system for MIC instruments (2 levels available for MIC direct injection system with baskets CSKFLEX) From 2 to 5 washing levels with 4 direct injection dismantable rotary arms on each level. Maximum height between levels 70 mm. Load capacity: max. 15 type din baskets. Made in stainless steel AISI 304.

**CSKFLEX MIC WASHING BASKET FOR HOLLOW INSTRUMENTS**

Include 2 DIN baskets with direct injection system. Made in stainless steel AISI 304. Capacity: 10 hollow instruments inserts 400 mm length. Luerlock connectors to be configured according to users' necessity.

**SCLOG7 OPERATION THEATER SHOES WASHING TROLLEY**

Load capacity: max. 14 shoes. To be positioned onto CSK12 (max. 2). Made in stainless steel AISI 304.

**DIS-WD7 RELEASE TROLLEY FOR LARGE DIMENSION MACHINES**

Loading trolley with block system to load washing material into the washer disinfectant. Anti drop system to collect sinking water from load material. Wheels able to be blocked. Anti upside down system for security transport. Ergonomic handle and design. Made in stainless steel AISI 304.

N.B. A large choice of accessories like anesthetic trolleys, containers, baby bottles, ophthalmology instruments, glassware etc. are especially designed to meet different users' needs.

Correctly treated water must be used to obtain high quality washing standards. Softened water is always recommended in the pre-washing, washing and neutralization phases. All undercounter models provide an efficient integrated calcium carbonate remover that reduces water supply hardness to prevent the formation of the classic white-colored stains inside the washing chamber and on the treated instruments. The WD6090BDS and WD7000 series however requires an external treatment system as it uses a large amount of water during the cleaning phases.

Therefore, Smeg proposes the WS series of high performance softeners with small dimensions, which are easy to install. Another important aspect to remember is instrument rinsing with demineralized water to remove all the contaminated residual elements that may remain in the washing chamber. Smeg offers the WP3000 compact and efficient demineralizer with mixed bed resins to take care of this aspect. The RO osmosis system series is also available.



**WP3000 RESIN COLUMN WATER PURIFIER**

The WP3000 water purifier is used to produce deionised water at 0.8-1 µS/cm, suitable for the final rinsing of instrument washers. The system uses mixed bed resins (disposable) which can also retain silica. When the resins run out, they can simply be replaced with the MI700WP kit. The resin cartridge is made out of stainless steel, as is the entire machine.

↗ Net capacity of cartridge: 15 litres.  
↘ Dimensions: l x d x h = 300x600x850 mm.

**MI700WP**

Anion/cation mixed bed resins kit for the WP3000 water purifier. Total exchange capacity 42700 litres/°F\* end of cycle at 5µS/cm (\*Hardness in French degrees).  
Supplied with used resin disposal bag.



**WS9E, WS11E, WS14E, WS17E WATER TREATMENT SYSTEMS**

The WSE series of appliances are technological water softeners capable of completely eliminating lime from water. The resins are regenerated using normal sodium chloride. Available in versions with flow rates of up to 2700 litres/hour. The models are fitted with an electronically controlled head which can be programmed depending on the hardness of the water. They provide backflow regeneration based on the volume of water (bearing in mind the resin saturation rate) and proportional brine in order to optimise water and salt consumption.

	WS9E	WS11E	WS14E	WS17E
MAXIMUM FLOW RATE	1600 l/h (16.7 l/min)	1800 l/h (43 l/min)	2000 l/h (43 l/min)	2200 l/h (43 l/min)
NOMINAL FLOW RATE	1000 l/h (16.7 l/min)	1500 l/h (43 l/min)	1600 l/h (43 l/min)	1800 l/h (43 l/min)
RESIN CAPACITY IN LITRES	9	11	14	17
EXCHANGE CAPACITY (m3/°F)	54	66	84	102
CYCLE CAPACITY AT 40°F	1350	1650	2250	2700
PROGRAMMABLE RESIDUAL HARDNESS	0-10° F	0-10° F	0-10° F	0-10° F
REGENERATING AGENT TYPE	NaCl SALT	NaCl SALT	NaCl SALT	NaCl SALT
REGENERATING AGENT CONSUMPTION	0.9 kg/cycle	1.0 kg/cycle	1.2 kg/cycle	1.8 kg/cycle
DIMENSIONS ØxH (mm)	300 x 470 x 540	300 x 470 x 660	300 x 470 x 815	300 x 470 x 1070
SALT TANK DIMENSIONS L x P x H (mm)	integrated	integrated	integrated	integrated
CAPACITY LITRES (SALT)	about 15	about 20	about 30	about 40
CONNECTIONS	1"	1"	1"	1"



Specific detergents are needed to obtain accurate washing and the most effective thermal disinfection of the treated medical instruments with professional instrument washers. Smeg offers a complete range of alkaline detergents (to be used during the washing phase) and acid neutralizers (to be used during the neutralization phase) that are specially designed to guarantee efficient cleaning, so much so, that it favors a temperature disinfection action in the final thermal disinfection phase. Smeg also offers numerous disinfectants used for treating thermolabile instruments and anesthesia instruments to be used in the machine during the thermal chemical procedure. Special lubricants and additives that prolong the life of medical devices are available as well.

**ALKALINE DETERGENTS**

Detergents used for washing surgical instruments, anesthesia instruments, OR shoes and other technical medical instruments such as baby bottles, in hospitals and medical offices.

**DETERLIQUID C**  
Strong universal liquid alkaline detergent.  
5-liter container.

**EMODET**  
Slightly alkaline low foaming detergent used in instrument washers. It removes biological residue.  
5-liter container.

**DETERLIQUID C2**  
Universal liquid alkaline detergent.  
5-liter container, phosphate-free.

**ENDOCLEAN**  
Neutral liquid detergent for washing flexible endoscopes, bronchoscopes, catheters and delicate material in professional surgical instrument washers.  
5-liter container.

**ACID NEUTRALIZERS**

Neutralizing acid detergents used for neutralizing alkaline residue during the neutralization phase and/or acid pre-washing phase when treating surgical instruments, anesthesia instruments, containers, OR shoes and baby bottles, as well as other medical instruments used in the hospital sector.

**ACIDGLASS C**  
Strong neutralizing acid detergent.  
5-liter container, phosphate-free.

**ACIDGLASS C2**  
Neutralizing acid detergent.  
5-liter container, phosphate-free.

**DISINFECTANTS**

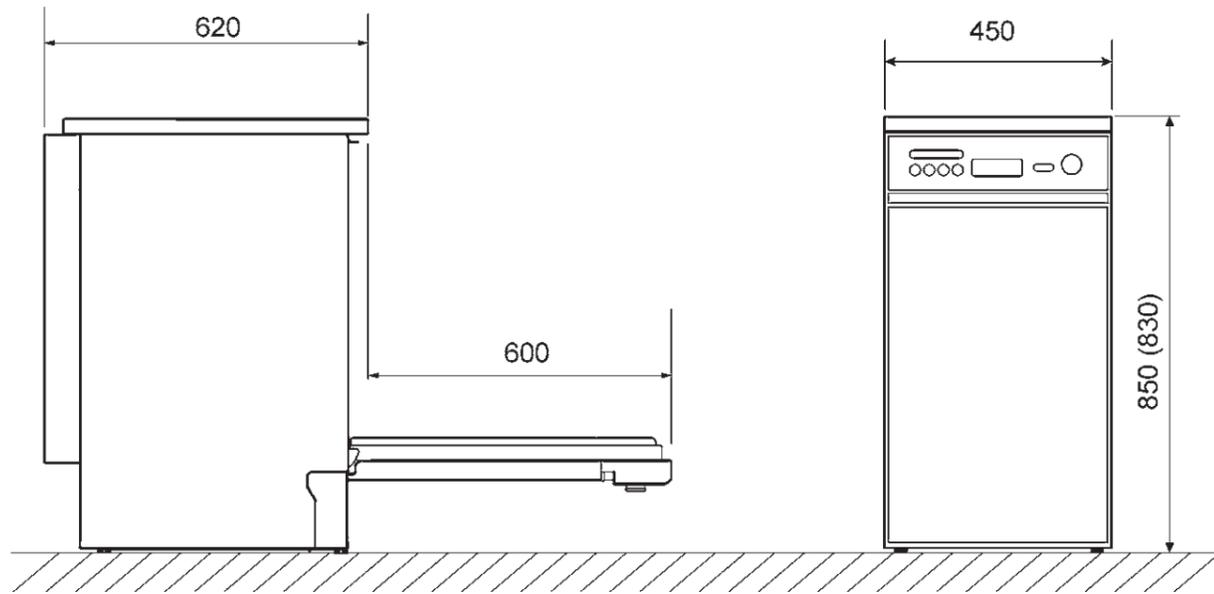
**STREPTOBAT**  
Alkaline disinfectant for thermolabile instrument disinfection cycles and anesthesia instruments during the thermal chemical procedure.  
5-liter container, phosphate-free.

**LUBRICANTS AND SURFACE ACTIVATORS**

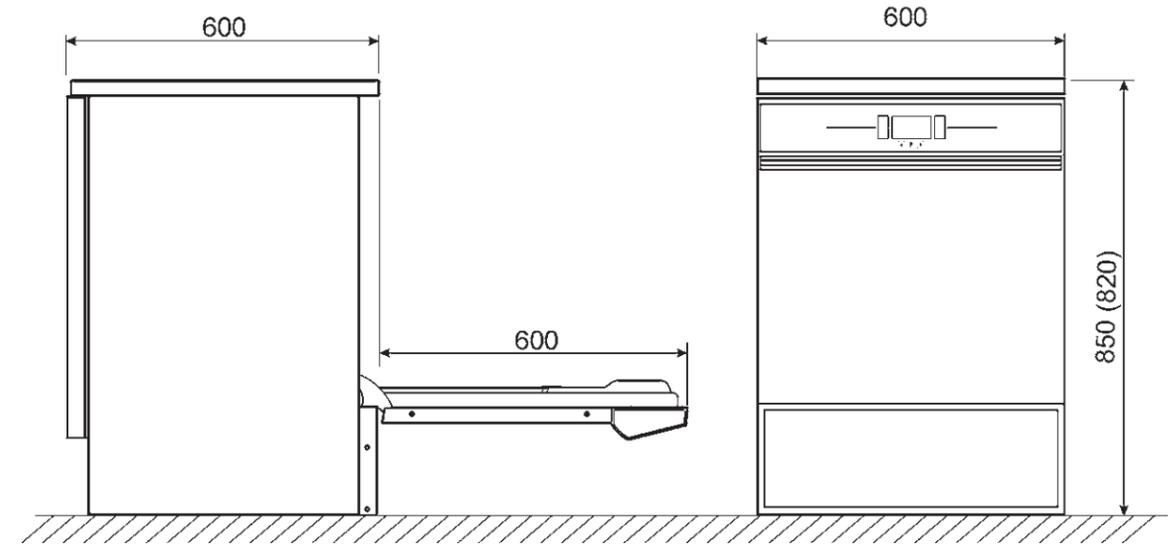
**LUB MILK**  
Protective lubricant for stainless steel instruments used in professional surgical instrument washers.  
5-liter container, phosphate-free.

**LUB SPRAY**  
Lubricant for surgical instruments to be used after machine washing.  
0.4-liter spray container. (Available until stock lasts)

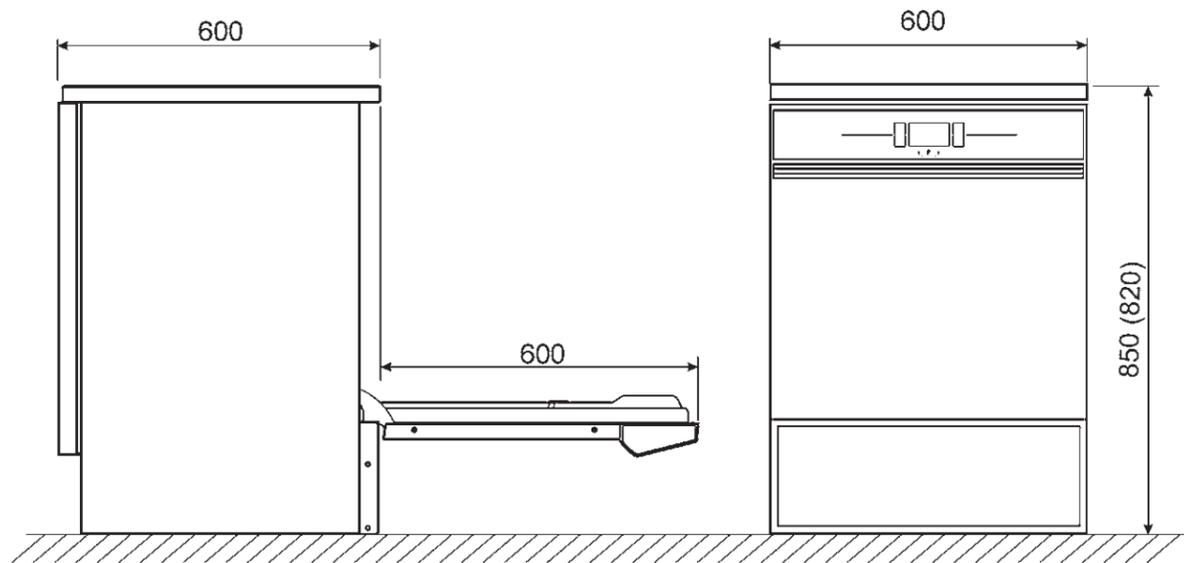
WD2050



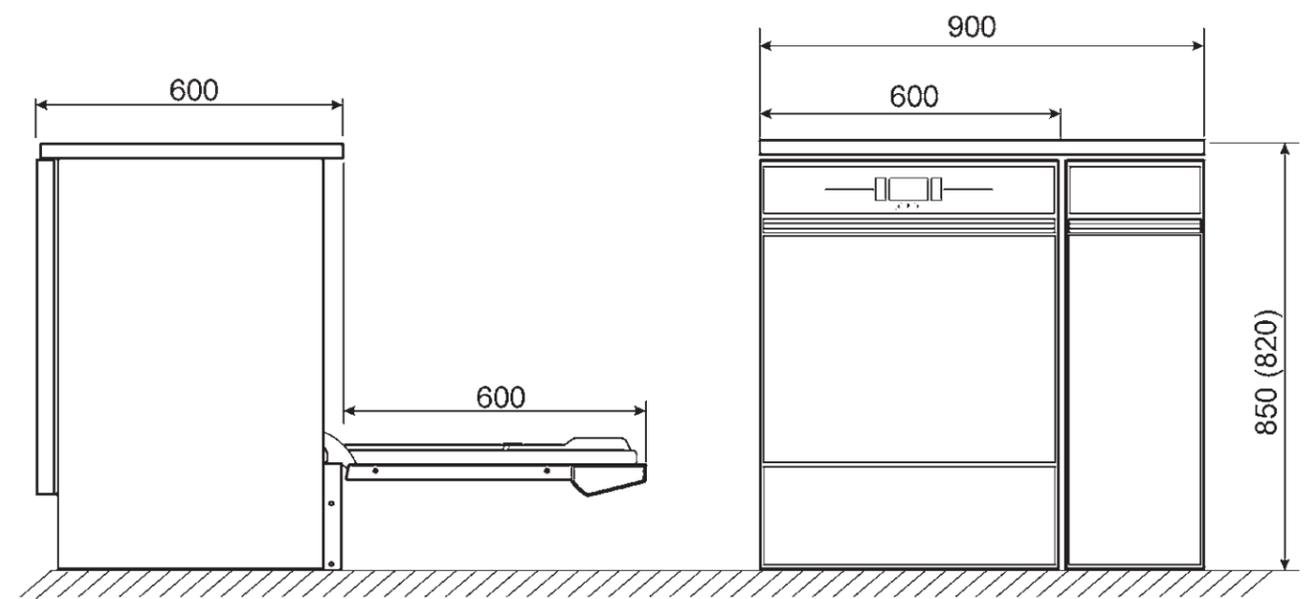
WD4060



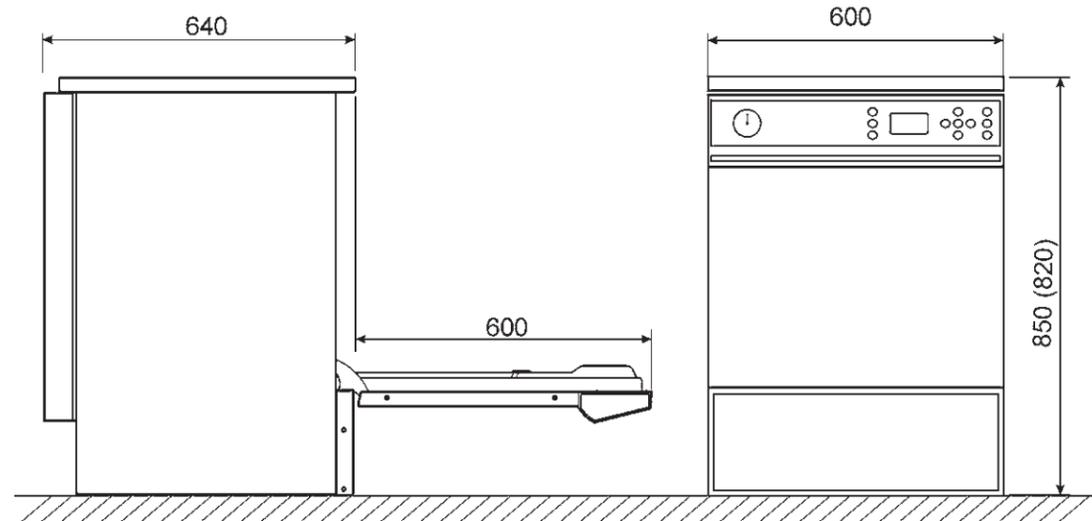
WD1160



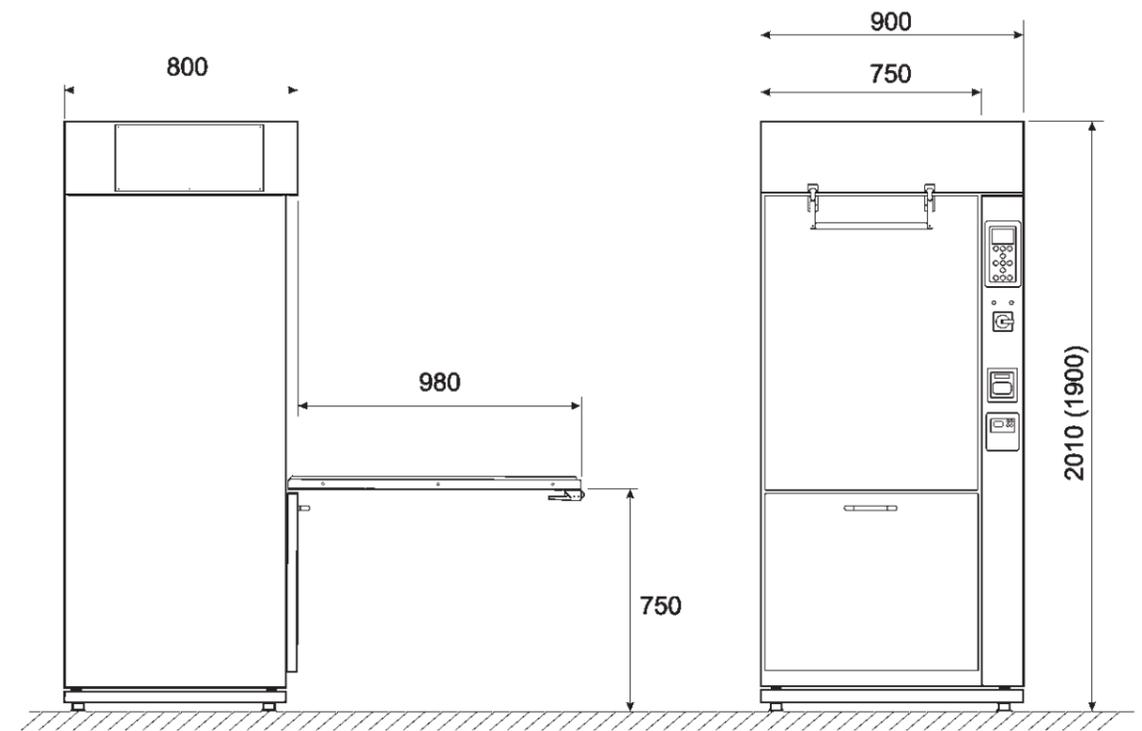
WD4190



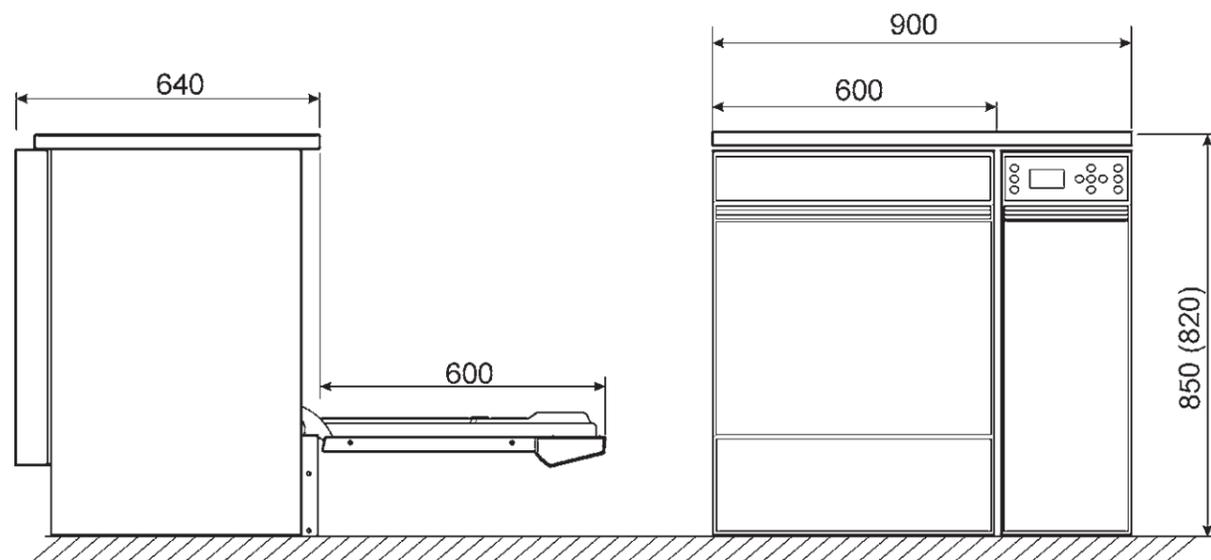
WD3060



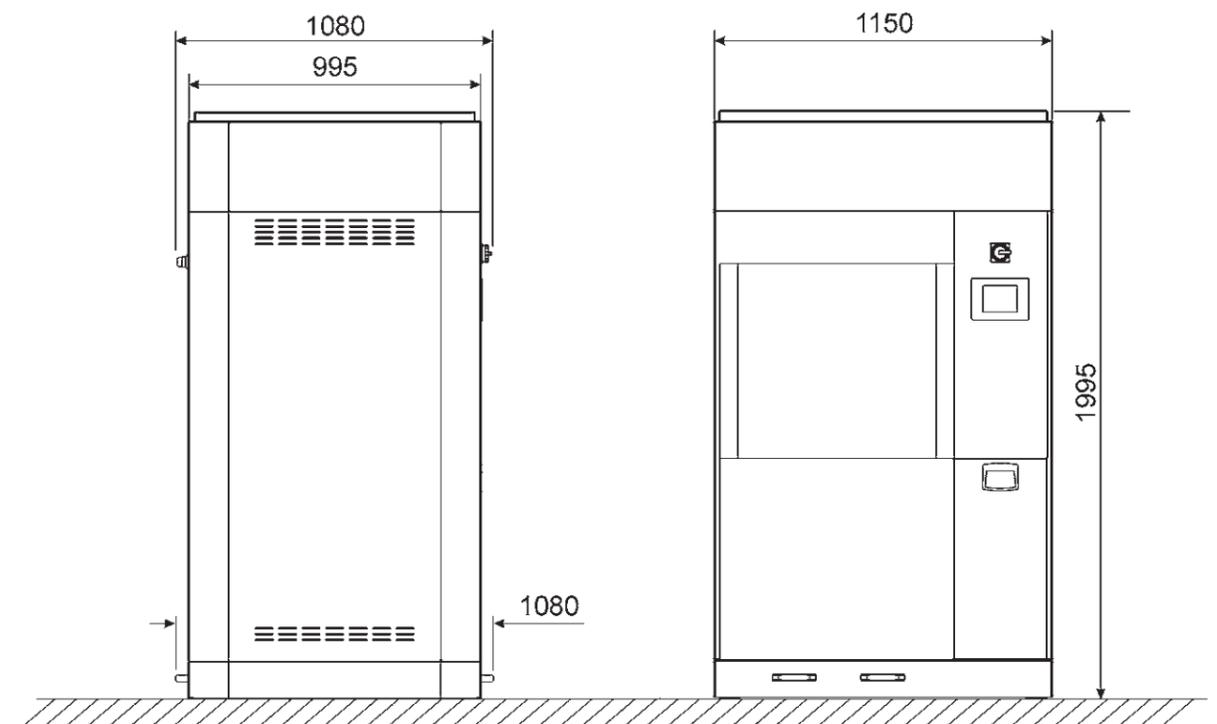
WD6090BDS



WD5090T



WD7000



**MACHINE TECHNICAL FEATURES - BASIC LINE**

	WD2050	WD1160	WD4060	WD4190
<b>Internal dimensions (LxDxH mm)</b>	380x480x590	520x515x545	520x515x545	520x515x545
<b>External dimensions (LxDxH mm)</b>	450x620x850 (830 with built-in top)	600x605x850 (830 with built-in top)	600x605x850 (830 with built-in top)	900x605x850 (830 with built-in top)
<b>Standard programmes stored</b>	6	9	9	9
<b>Modifiable programs</b>	2	6	6	6
<b>Detergent dosing system</b>	Peristaltic pumps	Peristaltic pumps	Peristaltic pumps	Peristaltic pump
<b>Neutralizing dosing pump type</b>	Peristaltic pump	Peristaltic pump	Peristaltic pump	Peristaltic pump
<b>Max nr. of dosing pumps</b>	2	3	3	3
<b>Volumetric detergent control</b>	n.a.	yes	yes	yes
<b>Detergent cabinet</b>	n.a.	n.a.	n.a.	yes
<b>Display</b>	With segments and warning light	With segments and communication led icons	With segments and communication led icons	With segments and communication led icons
<b>Control panel</b>	Control buttons and program selector knob on the panel	Membrane keyboard	Membrane keyboard	Membrane keyboard
<b>Printer</b>	optional	optional	optional	optional
<b>Boiler</b>	n.a.	n.a.	n.a.	n.a.
<b>Drying system</b>	Thermodynamic	Thermodynamic	Forced hot air through "drying system"	Forced hot air through "drying system"
<b>Pre-filter class C</b>	n.a.	n.a.	yes	yes
<b>HEPA filter class S 99,999%</b>	n.a.	n.a.	yes	yes
<b>Cold water supply</b>	yes	yes	yes	yes
<b>Hot water supply</b>	no	no	no	no
<b>Demineralized water supply</b>	no	yes	yes	yes
<b>Integrated water softener</b>	yes	yes	yes	yes
<b>Washing pump</b>	200l/min	400l/min	400l/min	400l/min
<b>Conductivity control</b>	n.a.	n.a.	n.a.	n.a.
<b>Door interlock</b>	yes	yes	yes	yes
<b>Net weight (kg)</b>	61	74	77	83
<b>Conformity</b>	2006/95/CEE, 93/68/CEE, 2004/108/CEE	2006/95/CEE, 93/68/CEE, 2004/108/CEE	2006/95/CEE, 93/68/CEE, 2004/108/CEE	2006/95/CEE, 93/68/CEE, 2004/108/CEE
<b>Supply/Max Power</b>	1/N/PE/230V- 50Hz- 2,8kW	1/N/PE/230V- 50Hz- 2,8kW As an alternative: 3/N/PE/400V- 50Hz- 7,0kW	1/N/PE/230V- 50Hz- 2,8kW As an alternative: 3/N/PE/400V- 50Hz- 7,0kW	1/N/PE/230V- 50Hz- 2,8kW As an alternative: 3/N/PE/400V- 50Hz- 7,0kW
<b>Possibility of 60Hz supply</b>	yes	yes	yes	yes
<b>Equipped with plug</b>	yes	no	no	no

**MACHINE TECHNICAL FEATURES - PROFESSIONAL LINE**

	WD3060	WD5090T	WD6090BDS	WD7000
<b>Internal dimensions (LxDxH mm)</b>	520x515x545	520x515x545	670x650x835	671x815x639
<b>External dimensions (LxDxH mm)</b>	600x640x850 (830 with built-in top)	900x640x850 (830 with built-in top)	900x800x2000	1150x995x2000
<b>Standard programmes stored</b>	20	20	20	20
<b>Modifiable programs</b>	10 (expandable to 50)	10 (expandable to 50)	10 (expandable to 50)	20 (expandable to 50)
<b>Detergent dosing system</b>	Peristaltic pump	Peristaltic pump	Peristaltic pump	Peristaltic pump
<b>Neutralizing dosing pump type</b>	Peristaltic pump	Peristaltic pump	Peristaltic pump	Peristaltic pump
<b>Max nr. of dosing pumps</b>	4	5	5	5
<b>Volumetric detergent control</b>	optional	optional	yes	optional
<b>Detergent cabinet</b>	n.a.	yes	yes	yes
<b>Display</b>	Backlit graphic LCD display 128x64 pixel	Backlit graphic LCD display 128x64 pixel	Backlit graphic LCD display 128x64 pixel	5.7 inches touch screen
<b>Control panel</b>	Membrane keyboard	Membrane keyboard	Membrane keyboard	touch screen (clean side) button (uncleaned side)
<b>Printer</b>	optional	optional	optional	optional
<b>Boiler</b>	n.a.	optional	yes	demi water standard tap water optional
<b>Drying system</b>	Thermodynamic	Forced hot air through "drying system"	2 motors for hot air through "drying system"	2 motors for hot air through "drying system"
<b>Pre-filter class C</b>	n.a.	yes	yes	yes
<b>HEPA filter class S 99,999%</b>	n.a.	yes	yes	yes
<b>Cold water supply</b>	yes	yes	yes	yes
<b>Hot water supply</b>	yes	yes	yes	yes
<b>Demineralized water supply</b>	yes	yes	yes	yes
<b>Integrated water softener</b>	yes	yes	optional (externally)	optional (externally)
<b>Washing pump</b>	400l/min	400l/min	2 x 400l/min	2 x 400l/min
<b>Conductivity control</b>	optional	optional	optional	optional
<b>Door interlock</b>	yes	yes	yes	yes
<b>Net weight (kg)</b>	76	83	282	680
<b>Conformity</b>	2006/95/CEE, 93/68/CEE, 2004/108/CEE	2006/95/CEE, 93/68/CEE, 2004/108/CEE	2006/95/CEE, 93/68/CEE, 2004/108/CEE	2006/95/CEE, 93/68/CEE, 2004/108/CEE
<b>Supply/Max Power</b>	1/N/PE/230V- 50Hz- 2,8kW As an alternative: 3/N/PE/400V- 50Hz- 7,0kW	1/N/PE/230V- 50Hz- 2,8kW As an alternative: 3/N/PE/400V- 50Hz- 7,0kW	3/N/PE/400V – 50Hz- 18,5kW	3/N/PE/400V – 50Hz- 22kW
<b>Possibility of 60Hz supply</b>	yes	yes	yes	yes
<b>Equipped with plug</b>	no	no	no	no



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