

## AC2 series

Rack conveyor dishwashers



# Five good reasons to choose the AC2 series

## 1 Economy

the AC2 series of rack conveyor dishwashers use very little water and, thanks to their compact size, allow space to be saved, thus providing more room for the operator.

## 2 Hygiene

the weld-free deep-drawn tank with rounded interior corners and the vertical self-draining pump ensure optimum hygiene.

## 3 Performance

despite their compact size, AC2 series dishwashers allow you to wash up to 150 racks an hour.

## 4 Reliability

integral balancing springs and side safety hooks make it easier to open and close the insulated door. Furthermore, diagrams and spare parts lists can be viewed 24 hours a day on the Internet.

## 5 Quality

all series AC2 machines are designed and built in an ISO 9001:2008 certified manufacturing plant.

COMENDA

2 60



SELECT





# AC2 series

## Rack conveyor dishwashers



AC2



AC2A



AC2P



AC2AP

### RANGE

The AC2 range includes compact, state-of-the-art, highly versatile machines created in full compliance with the green philosophy applied by Comenda, a company committed to developing low environmental impact solutions and products designed to ensure maximum energy saving. Equipped with technologically innovative systems, the models in this series reduce energy wastage to a minimum and use an accurate assessment of the amount of water required to rinse dishes and chemical products required for washing, which are calculated in perfect proportion to the number of racks to be washed.

Easy to install in any kind of premises, the AC2 is suited to the smallest of spaces.

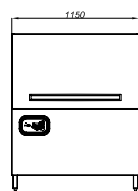
Thanks to its extremely compact size, the machine only occupies 1,15 linear metre of space, while being highly productive and allowing a capacity of 1800 dishes an hour. Unlike dual-rack hood machines, the AC2 series has an automatic conveyor system, so there is no need to wait until there are two racks of dirty dishes for each washing cycle to start, thus ensuring much faster reuse of dishes and less handling.

In addition to this, the direction of transport of the racks can be reversed, allowing them to enter the dishwasher from right to left or vice versa, depending on the user's requirements, thus ensuring that subsequent changes can be made if the washing system layout should be altered at a later stage.

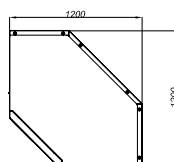
The full range consists of four models, both linear and with a corner washing/rinsing area, two of them accommodating an optional prewash module with removable filter drawer to facilitate the removal of accumulated waste without interrupting the washing operation. The two travel speeds – the first of which complies with DIN10510 hygiene standards – allow the AC2 series to achieve productivity levels of between 70 and 150 racks/hour, depending on the model chosen.

The DIGIT control panel fitted to the machines is simple and intuitive and provides a digital temperature readout on the display.

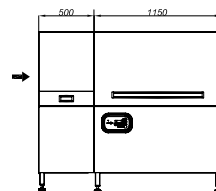
In addition to the modular drying tunnel, either linear or curved, all models can be fitted with traditional heat recovery systems or heat pumps, as well as a PRS-selectable double rinse.



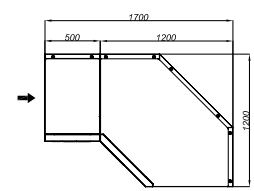
AC2



AC2A



AC2P



AC2AP

# FEATURES

## and details



### WASHING SYSTEM

Stainless steel upper and lower inspectable washing manifolds with negative embossed anti-drip nozzles.



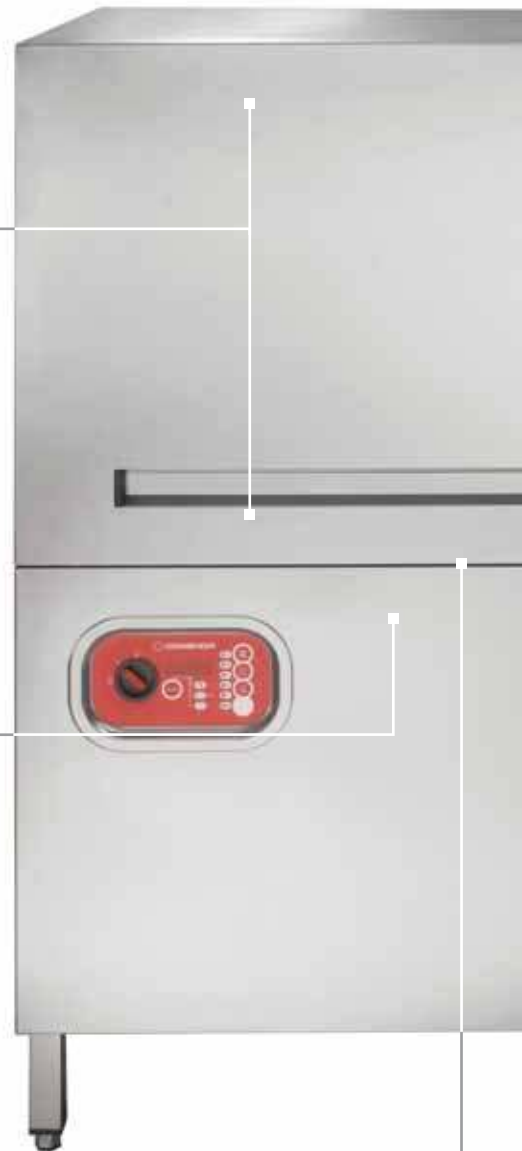
### TANK FILTERS

Complete coverage of the tank with stainless steel filters plus pump suction safety filter.



### ROUNDED CORNERS

Wash tank with rounded corners to prevent dirt formation. This structure also allows vertical installation of the self-draining pump.



### **INSULATION**

Thanks to the thickness of the doors, the insulation is particularly efficient - energy dispersal and noise levels are in fact significantly reduced.



### **DOOR WIPE SEAL**

The special shape of the seal allows the door to be cleaned automatically when opening and closing.



### **DOOR INTERIOR**

Inspection doors with integral balancing springs allow smooth and hygienic surfaces to be achieved.



### **SAFETY HOOKS**

Integral hooks inside the runners ensure secure hooking of the door and ease of operation.



## Types of use



. Cafés



. Canteens



. Restaurants



. Hotels



. Hospitals

### SOME OF THE KEY FEATURES OF THE AC2 SERIES

- AISI 304 stainless steel tank and chassis
- Inspection doors with integral balancing springs
- Compact installation dimensions
- Stainless steel upper and lower inspectable washing manifolds with negative embossed anti-drip nozzles
- Deep drawn tanks with rounded corners
- Fully self-draining vertical pumps
- Door wipe seal for constant cleaning of the inside of the door
- Whole tank stainless steel filters and pump suction filter
- Electronic control panel with digital display temperature readout
- Double wall doors
- 24V control circuit
- Machine side disconnection switch
- Economiser that activates rinsing only when rack passes through
- Electrical setup for connection of dosing devices for chemicals



# State-of-the-art TECHNOLOGIES

## HPS EASY

Dishwasher consumption is always an important factor for washing system operators as it is the main reason for choosing one product over another. There are various devices that allow this data to be read and managed but they normally require dedicated hardware and software. However, the AC2 series allows meters to be installed that enable operators to keep a daily check on water and energy consumption, using a dedicated display, and to be advised of any operational faults, without the need for special technologies.



## DIGIT control panel

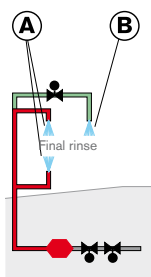
AC2 series models are fitted as standard with a DIGIT control panel. Simple and intuitive, it allows the temperatures in the various areas of the dishwasher to be read on a digital display. It is simple enough to be used by staff without any particular training.

**Consumption reduced by up to 33%**



## PRS and APRS

Despite being able to operate at different speeds, conventional rack conveyor dishwashers always use the same amount of rinse water, which causes an enormous amount of waste. Patented PRS (Proportional Rinse System) systems and their automatic version APRS, which can be incorporated in this range of dishwashers, are a real revolution in this sector as they allow the amount of water to be gauged accurately for the load placed in the machine and the rack transport speed selected, thus reducing water, energy and chemical product consumption by up to 33%.



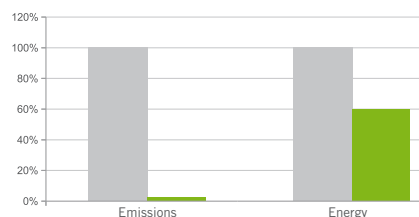
	Final rinse
A	1 <sup>st</sup> speed
A+B	2 <sup>nd</sup> speed

**Energy saving and healthier environments**



## Heat pumps

The heat pumps designed for rack conveyor dishwashers allow savings of up to 40% to be achieved in the amount of energy normally used to heat up the water. The system's ability to absorb the heat generated by the machine also considerably reduces thermal radiation, because the cooled and dehumidified extracted air is pumped back into the room, creating the best possible environmental conditions in the washing area. Depending on the model chosen, they can be single action, thus pre-heating the rinse water, or dual action, heating the washing water and pre-heating the rinse water.



	Emissions	Energy
STD standard	100%	100%
+ WP	2%	60%

**Rinse aid reduced by up to 70%**



## RAH – Rinse Aid Homogeniser (patented)

Rinse aid has a higher density than water. Because of this, the substances cannot mix uniformly and require a greater amount of surfactant in order to achieve good drying results.

The optional RAH system, designed to help combine two liquids of differing densities, is the ideal solution to this problem as it reduces the amount of rinse aid required by up to 70%, consequently saving money and reducing the environmental impact.



RAH System



# Savings

With the ECO2 project, Comenda has achieved considerable results in terms of water, energy and detergent saving, the three most important areas, by implementing a series of state-of-the-art technologies.

## RINSE ECONOMISER

The rinse function in COMENDA rack conveyor dishwashers is only activated when the rack enters the rinse area. This allows it to save enormous amounts of water, which would otherwise be used to rinse empty spaces.

## HEAT RECOVERY SYSTEM

Allows the machine to be fed by cold water, pre-heating it to a temperature of 45-50°C. Uses the heat and steam that would otherwise be lost in the environment, thus ensuring considerable energy savings. Condenses the steam from the machine and reduces the temperature of outgoing air.

## AUTOTIMER

Reduces consumption by stopping the pumps when there are no dishes being fed into the system, restarting automatically when new racks are loaded.

## DHM AUTOMATIC PRE-SCRAPPING SYSTEM

DHM stands out among the machine's various accessories. This new scrapping module, with a combination of arms fitted with several multidirectional jets, is installed ahead of the prewash module. The DHM effectively and advantageously replaces the traditional shower head, which is the main source of water consumption in the dish washing area.

# Technical info

AC2 SERIES	AC2/AC2A	AC2P/AC2AP
Racks/h capacity with 2 minutes contact time in compliance with DIN 10510	70	100
Maximum racks/h capacity	100	150
Machine length (mm)	1150/1200	1650/1700
Tank capacity (L)	80	125
Rinse water consumption according to DIN 10510 (with PRS/without PRS) (L/H)	150/220	200/300
Electrical connection (V)	400V 3N 50Hz	400V 3N 50Hz
Total power (55°C warm water connection) (kW)	19,04	23,74
Consumption (kWh)	15,23	18,93
Total power (15°C cold water connection with HRU) (kW)	22,15	27,85
Consumption (kWh)	17,72	22,28
Total power (15°C cold water connection with WP7) (kW)	16	21,7
Consumption (kWh)	12,80	17,36
Dryer (straight or corner version)(kW)	6,42	6,42
PRS, APRS, RAH, DHM, AUTOTIMER	Option	Option

We reserve the right to modify technical features and pictures.

A= corner version

P= Prewash section (500mm)



## ECO2: THE FORMULA FOR ENERGY SAVING

Comenda's philosophy is represented by a green petal, which defines the company's commitment to research and to applying high-tech formulas which combine high performance with energy savings. ECO2 is the key to Comenda's entire production - ecofriendly solutions that ensure excellent results and a healthier working environment. The AC2 range is also inspired by this green philosophy - a vast range of washing systems that can adapt to many different requirements, always ensuring top performance with very low running costs thanks to the reduced use of water and detergent. Low energy consumption is guaranteed by the PRS, APRS and WP accessories and by the economiser, which only activates the rinsing function when the rack passes through the machine, avoiding any waste of water. Comenda's green commitment has resulted in the company's UNI EN ISO 14001:2004 certification issued by the prestigious German TÜV organisation.



## AFTER SALES SERVICE IN JUST A CLICK

Faithful to its corporate philosophy, Comenda offers both excellent products and an all round support service. In order to provide its customers with the best possible real time support, along with its national and international network of qualified technicians, Comenda provides an easy-to-use online tool. The [www.comenda.eu](http://www.comenda.eu) website includes a section which currently has over 700 registered users and provides support and an online parts ordering system. Customers can access the private area of the website using their password and consult or download the user manual as well as electrical, hydraulic and installation diagrams. Exploded diagrams can also be accessed in a few clicks and orders can be sent automatically and directly to your national spare parts office without error.

