

Our proposal...

Aertesi designs and manufactures systems for comprehensive interior climate control in all types of surroundings. Leveraging the results generated by our intensive R&D work, Aertesi can offer a range of innovative system engineering solutions for:

- The home
- Office space and shops
- Healthcare facilities
- Hotels and restaurants

Accumulated technical experience enables Aertesi to deliver excellence and quality in the fields of air conditioning and heating.

Our dedication to maximising the conservation of energy sources has brought Aertesi to a position of prominence in the following areas:

- Hidronic terminal units also with sensible temperature/ humidity treatment
- · Dehumidifier for radiant cooling
- Terminal units with medium/high pressure
- Split without external motocondenser
- Controllers for integrated systems
- · High efficiency heat pumps for radiant cooling and heating

The broad range offered is accompanied by the Aertesi's hallmark flexibility displayed in its willingness to develop special solutions to meet specific customer demands.

INNOVATION IN COOLING AND HEATING

The Aertesi range of chillers and heat pumps high efficiency is the result of our experience and constant search for innovative technical solutions that comply with the need to protect the environment. Dehumidifiers were studied with the purpose to mantein high efficiency isothermic conditions and low noise for the environment.

ENERGY SAVING

Aertesi technical development has always been focused on research into products that are able to provide real energy savings. The introduction of heat pumps high efficiency and fancoils with fan groups with lower absorption energy power and lower noise level are only a few of the activities of development in this direction.

EASE OF INSTALLATION

The units are designed to ensure maximum accessibility for maintenance purposes. Each unit is individually checked with a double final test procedure to provide the maximum level of reliability for end customers.

NEW TOOLS

The development of technical-commercial tools, such as the product selection software, facilitates the selection of Aertesi units easily on the basis of customer requests.

SAFETY AND DECLARED EFFICIENCY

All Units are strictly in compliance with CEI regulations and electromagnetic compatibility requirements. Aertesi in partecipating in the Eurovent program.

COST-EFFECTIVE

Courtesy and attention to customer needs, i.e. the added value that makes Aertesi products even more attractive.

VERSIONS AND ACCESSORIES

Aertesi products can be personalised with a range of accessories and alternative configurations, controllers on-board the unit, wall mounted, or with PC interface to match the requirements of the most demanding users.

Certifications

The Company is participating in the following certification programs:









ISO 9001: 2000 CERTIFICATION







References



MARRIOTT HOTEL Vien, Austria



JIBACOA TOURIST RESORT Havana, Cuba



TISZAI VEGYI (chemical plants) Tiszaujvaros, Hungary



POLYCLINICBari, Italy



SANTA CESAREA SPA Lecce, Italy



WORLD MED CLUB CENTRE Parigi, France



BANGUE DE NORVEGE Luxemburg



POLICE EADQUARTERS Dubai, United Arab Emirates



ITALIAN SCIENTIFIC STATION Antarctica



CASINO' DE MONTREUX Swiss



GIARDINO HOTEL Ascona, Swiss



EL HELAI MAIN BUILDING Egipt



CLUB MED Djerba, Tunisia



CNET
Centre Research France Telecom
Brest, France



RENAULT BILLANCOURT VÉLIZY Rueil, France

UNIVERSITARY



BRASCHI PALACE

NEW

POLO

Rome, Italy

Berlin, Germany



METEOROLOGICAL NATIONAL STATION Budapest, Hungary



ERASINIO HOSPITAL Athens, Greece



VIRGIN MEGASTORE Paris, France



FACULTY OF VETERINARY MEDICINE UNIVERSITY VALENZIANO Bari, Italy



MERIDIEN HOTEL Baghdad, Iraq



MINISTRY OF DEFENCE Budapest, Hungary



PALACE OF JUSTICE Bari, Italy



AVION Bratislava, Slovacchia



HOTEL NARVIL Serock, Poland



LAURUS OFFICES Budapest, Hungary



Our mission.....one step forward!



ENERGY SAVING: THE EC BRUSHLESS MOTOR IS AVAILABLE FOR ZEFIRO/LNH/CASSETTE/VESTA

2 different solutions are foreseen according to the fan coil used Zefiro EC and LNH are available with EC Brushless motor, which does not need any capacitor. The inverter board allows a better fuel saving by modulating voltage and frequency at the same time

Cassettes CH2O-G/H-EC have got AC motor controlled by inverter board: it only works on the power supply, and it allows good saving compared with standard AC motor.





INCLINED MAIN DRAIN PAN TO MAKE SAFETY THE WATER DISCHARGE, IN ALL THE ZEFIRO VERSIONS.

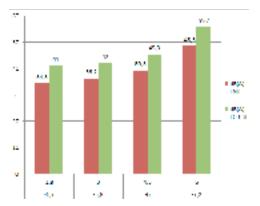
When the attention to the continous improvement of the product means "HEALTH": to prevent water stagnation on the fancoil means to prevent the bacteria.





LNH: UNITS AT MAXIMUM NOISELESS

When the planning of comfort means to respect the quiet of environment! It is suggested for installations in hotels, houses and hospitals. If it is combined with the proposal of EC motor, the offer is unmissable!





REVERSIBLE SIDES IN ABS PLASTIC OF ZEFIRO SERIES, AND AUXILIARY DRAIN PAN ARE ALWAYS SUPPLIED AS STANDARD

- Reversible sides:
 maintenance operations are easier than other fan coil units on the
 market, as you do not need to remove the complete cabinet, but only
 the side. You save time, and just 1 person can do the maintenance.
- Auxiliary drain pan: it is included on the price of the unit, unlike our competitors!



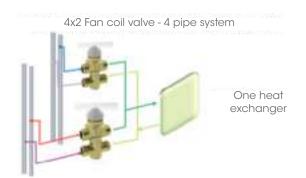


Our mission.....one step forward!



PATENTED SOLUTION: VALVE KIT 4TIN2T

This kit allows to work in a 4 pipe system with fan coil with 2 pipe system; the heating is produced by the main coil. Consequently you can work at $45^{\circ}-35^{\circ}$ (instead of $70^{\circ}-60^{\circ}$) with the same heating capacity supplied by the unit .





ZEFIRO WITH WOODEN PANEL: TO UNDERLINE THE DESIGN, AND REDUCE THE DIMENSIONS

We offer a wide range of solutions with different versions, in order to introduce the fan coil unit in places, where the design requires the utmost attention.





VESTA HI-VI: DEHUMIDIFIERS WITH HIGH PERFORMANCE IN COOLING. THE WAY TO OFFER HIGH COMFORT IN A SIMPLE AND SAFE WAY!

It allows high performance in cooling (from 2 to 2,4 kw): thanks to this feature, it becomes an innovative proposal in the competitive situation. The units becomes mini-chiller by using groundwater. As an alternative it can be used in houses with ext. motocondencing units that works on coil pipe to pipe (gas/water). In these cases the unit becomes the mother lode of heating/cooling instead of radiants with hot or cold water, in houses with low heat consuption, and low thermical load. The use of climatic curve hygrostat (HCP-EV) or "Clima Time" can assure the top of the comfort: you dehumidify when you only need to dehumidify, and you insert in heating or cooling, when it is necessary







STATE-OF-THE-ART CONTROLS, AND MANAGEMENT OF MASTER/SLAVE AND BMS

TOP 2 uses the highest technologies to manage the room with the best comfort, and the unit with "the highest efficency and control" (alarm for dirty filters, broken fan, low/high temperature thermostat TM, weekly program, etc.). Open system predisposed for Modbus Protocol to assure complete integration with other open systems. Possibility of Master/Slave











WET ZEFIRO: HIGH CONTROL OF THE QUALITY OF THE AIR!

It is not only a fan coil unit: it chills, dehumidifies, heats, humidifies (without rain!) with electronic regulation with extreme performance, which makes it suitable for all type of installation: technologic rooms, data centers, houses, hospitals, libraries, museums. It reduces the particulates, and makes the environment healthier: it is suggested for the people who are allergic to pollen. High power to preserve fine wood (parquet), papers (libraries), and food. Intelligent electronic management "Clima Time" for the modular management of humidity output, charging/discharging of water, and use with low electric absorbition.

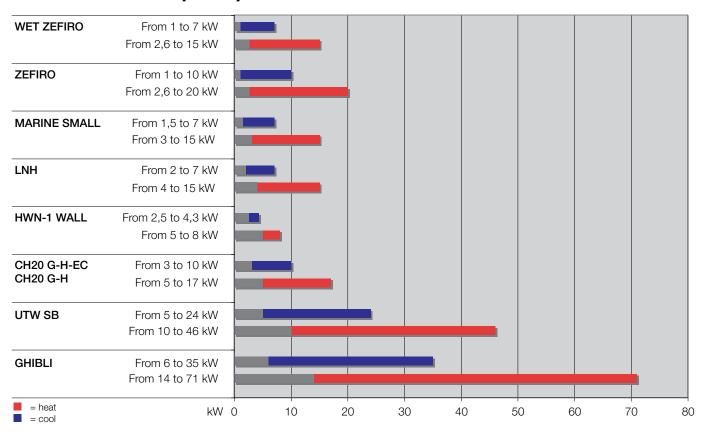


Index

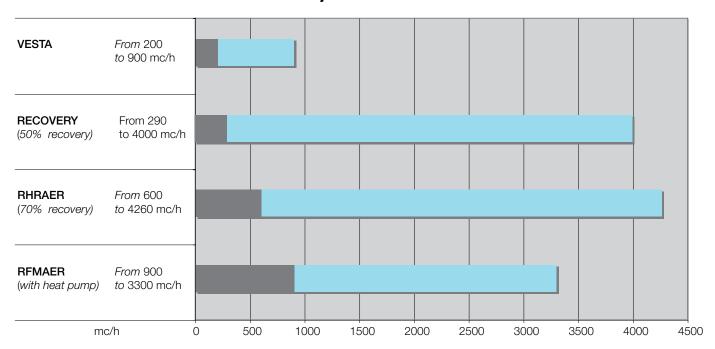
Integrated Control Systems		
Range of basic control per BMS	BASIS controls	9
Range OF advanced control for BMS	BMS control system	11
Hydronic terminal units		
Large range fan coils	ZEFIRO	15
Large range fan coils	ZEFIRO EC	19
Large range fan coils	ZEFIRO with built-in casing predisposition	23
Fan coil with integrated humidification	WET ZEFIRO	26
Fan coil for Hotel applications	LNH	28
Air handling unit	UTW SB	32
Low profile air handling unit	GHIBLI	34
Wall fan coil	HWN1 WALL	36
Fan coil cassette	CH20 G-H	38
Fan coil cassette with DC motor	CH20 G-H-EC	41
Fan coil unit for marine applications	MARINE SMALL	44
Heat Recovery units		
Cross air flow exchanger recovery unit	RECOVERY	46
High efficiency heat recovery	RHRAER	48
Active recovery with heat pump	RFMAER	51
Dehumidifiers		
Range of isothermal dehumidifiers	VESTA	54
"All in one" heat pumps		
Air conditioner without outdoor unit	ASSOLO	62



Terminal Units Capacity



Dehumifiers and Heat Recovery Air Flow





Basis controls

Control device for hidronic units



Identity

Wall mounted control Analogic and digital

Certification



Description

Range of electronic controls with analogic or digital interface, for the terminal hidronic units management, to ensure the better environmental well-being conditions.

Plus

ANALOGIC CONTROLS

They are the ideal solution for installations that require contained functions and costs.

The modern and ergonomic design permit an easy wall installation that joined with the electronic features make these devices a simple product but capable to offer an high comfort. The controls range offer a simple but effective solution for the fancoils management in both 2 and 4 pipes installations; they are availables in different models in consideration of the kind of employment nad the level of comfort to be obtained, by the more simple with the manually to that with the automatic fan speed control and fancoil management to ensure the best comfort with a gradually modulation of the capacity supplied.



Range of thermostat with similar functions to the analogic ones, but characterized by an elegant LCD display that make its particularly suitable for all the end users that wish to control the unit functioning and to have availables all the informations regarding the environmental clima.

The touch Screen model permit to the end user to interact with the graphic interface by means of the fingers touch make nice and intuitive the device employment.



↑ Aertesi

	Model	Description	Plant	Basis functions	Additional Functions
23	CSN N	Selector		On-Off 3 speed Low temperature thermostat relais	
	SATH N	Manual thermostat	2-4 pipes 2 pipes with heater	On-Off Summer-Winter selector 3 speed Low temperature thermostat relais	On-off valve control Electric heater control
(° !c.	TOP1 N	Automatic thermostat	2-4 pipes 2 pipes with heater	On-Off Summer-Winter automatic selector 3 speed + auto Low temperature thermostat relais	On-off valve control Electric heater control Economy function
	TOP1-0/10V N	Automatic thermostat	2-4 pipes	On-Off Summer-Winter automatic selector 3 speed + auto Low temperature thermostat relais	Modulating valves control Economy function
	HTC-002	Automatic thermostat	2-4 pipes valves only	On-Off Summer-Winter manual selector 3 speed + auto	On-off valve control
3	HTC-002 0-10_2P	Automatic thermostat	2 pipes valve only	On-Off Summer-Winter manual selector 3 speed + auto	Modulating valves control
00 8	HTC-002 0-10_4P	Automatic thermostat	4 pipes valves only	On-Off Summer-Winter manual selector 3 speed + auto	Modulating valves control
255	HTC-006	Automatic thermostat Touch screen	2-4 pipes	On-Off Summer-Winter automatic selector or manual 3 speed + auto	On-off valve control Weekly programm
	TOP 2	Digital control		On-Off Summer-Winter automatic selector 3 speed + auto	On-Off valve control Modulating valve control (0-10V) Dirty filter alarm Weekly program Windows contact Low temperature thermostat Modbus predisposition
	(2	CSN N SATH N TOP1 N TOP1-0/10V N HTC-002 HTC-002 0-10_2P HTC-002 0-10_4P HTC-006	CSN N Selector SATH N Manual thermostat TOP1 N Automatic thermostat TOP1-0/10V Automatic thermostat HTC-002 Automatic thermostat HTC-002 Automatic thermostat HTC-002 O-10_2P Automatic thermostat HTC-002 Automatic thermostat HTC-004 Automatic thermostat Top1-0/10V Automatic thermostat	CSN N Selector SATH N Manual thermostat TOP1 N Automatic thermostat TOP1-0/10V N Automatic thermostat TOP1-0/10V Automatic thermostat HTC-002 HTC-002 O-10_2P Automatic thermostat 2-4 pipes with heater 2-4 pipes valves only Automatic thermostat 2-2 pipes valves only Automatic thermostat 2 pipes valve only Automatic thermostat 4 pipes valves only HTC-002 O-10_4P Automatic thermostat Automatic thermostat 2-4 pipes Valves only Automatic thermostat 2 pipes valve only Automatic thermostat 2 pipes valves only Automatic thermostat Automatic thermostat Touch screen Digital control	CSN N Selector Don-Off 3 speed Low temperature thermostat relais On-Off 3 speed Low temperature thermostat relais On-Off Summer-Winter selector 3 speed Low temperature thermostat relais TOP1 N Automatic thermostat TOP1-0/10V N Automatic thermostat TOP1-0/10V N Automatic thermostat Automatic thermostat TIC-002 Automatic thermostat HTC-002 Automatic thermostat Automatic thermosta

BMS control system

Advanced management system for integrated heating and air conditioning installations.



Identity

Multi control system

Certifications



Description

The BMS (Building Management System) it's a system control capable to menage more funtions like: ventilation, air conditioning, illumination, to start by a presence signal combined with timers, meteorological conditions setted up by the end user.

It's a system more suitable for "open space", floor offices, hotels, hospitals and meeting rooms management and all those applications that require a centralized and integrate control." This BMS is studied particularly for the hidronic terminal units like fancoils, cassettes, little ducted units.



WPC-GH



TOP 2

Plus

BMS CONTROL - INSTALLATIONS ONLY 2 PIPES

Package of components created to optimized the 2 pipes installations ramified in more zones. The system permit the control until a maximum of 2048 devices with the possibility to centralize the management by means an Aertesi software or with MODBUS protocol..

BMS CONTROL - 2 AND 4 PIPES INSTALLATIONS

Control system for 2 or 4 pipes intallations diffused in more zones. The system allow a centralized control by means an Open Modbus protocol and software.

ALL IN 1 CONTROL

Wall mounted standard control with advanced functions Master/ Slave included to create little networks until 32 units each one.

TOP 2

Ventilation: fan always running or with thermostat management of the fan

ON-OFF or modulating valves management predisposition Dirty filter alarm

Weekly program set point management

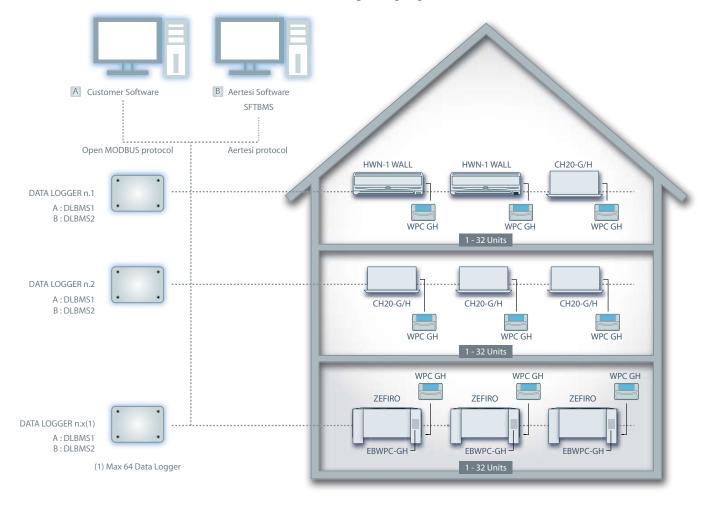
Windows contact (without to us any added relais!)

Broken fan alarm (AS) sectable by the menù (no more necessary an added control!)

MODBUS management interface predisposition

TM already included (minimum thermostat probe - it means that in winter the fan switch on only when the water is sufficiently hot) and also Maximum thermostat probe (switch off when the water is sufficiently cold).

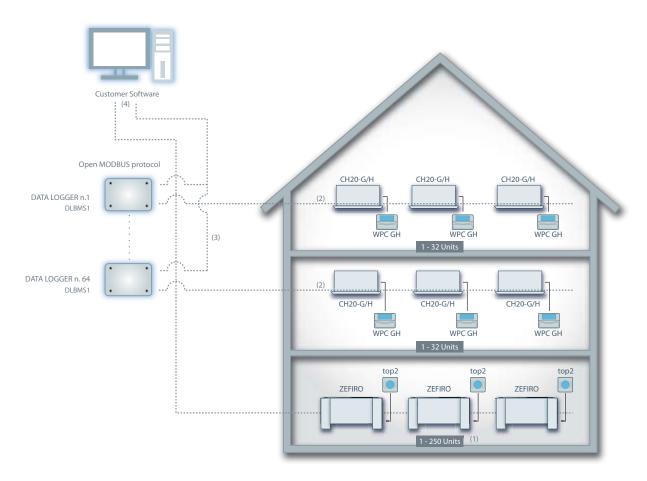
BMS Control - Installations only 2 pipes



Note: solution available also for LNH/GHIBLI/UTWSB units.

	Model	Description	Basis functions	Additional Functions
Wall mounted	WPC-GH	Digital control	On-Off Summer-Winter automatic selector 3 speed + auto	Low temperature thermostat Weekly programm

BMS control - 2 and 4 pipes installations



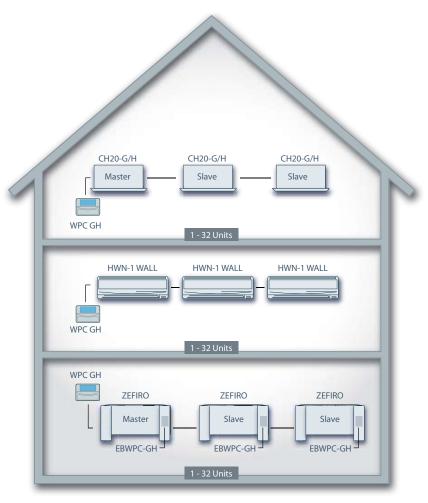
Note solution available also for LNH/GHIBLI/UTWSB units.

- (1) With Top2, until 250 units. In case of more units, it need to create two or more separates electric lines.
- (2) Connections between 1÷32 units and the relative data logger
- (3) Connections of the BMS network (Modbus protocol) of the 1÷64 Data logger.
- (4) In the proposed scheme, there are 2 separate BMS lines. One line is connecting all the units managed by the Top2 control, the other one is connecting all the units managed by the WPC-GH control.

Even if the logic adresses in the units managed by Top2 and WPC are differents, nothing is preventing the BMS Network systemist to realize only 1 line. In this case the software manager has to forsee in the program the units identification and the correct logic parameters.

		Model	Description	3 speed + auto On-Off Summar Winter automatic selector Onity filter alarm	
		WPC-GH	Digital control	Summer-Winter automatic selector	
Wall mounted	•	TOP 2	Digital control	Summer-Winter automatic selector	Modulating valve control (0-10V) Dirty filter alarm Weekly program Windows contact Low temperature thermostat

ALL IN 1 CONTROL 2 pipes plants



Note 4 pipes solution available only with management of lonely CH20-G/H B1.

	Model	Description	Basis functions	Additional Functions
Wall monted	WPC-GH	Digital control	On-Off Summer-Winter automatic selector 3 speed+auto	Low temperature thermostat Weekly programm

ZEFIRO series

Fancoils for vertical and horizontal installation



Identity

Fancoils availables in different versions for vertical and horizontal installation

Certification



Plus















Description

The result of a decade of experience in the air treatment sector, the Zefiro fan coil, reflects all the feedback received from users, installers and designers over the years, now incorporated in the new unit to make it complete in all its features.

Special attention has been paid to ease of installation, thereby significantly reducing time requirements, thanks also to the use of slot-in side panels. The attractive styling, quiet operation, versatility, components of reliable quality, and the massive range of available accessories, make this fan coil ideal for heating and cooling all types of interior spaces.

Stated performance data are guaranteed by the unit's Eurovent certification.

Plus

ALL IN 1 CONTROL

Wall mounted standard control with advanced functions Master/Slave included to create little networks until 32 units each one.

BMS COMPATIBLE

Possibility to control until 2048 units with DLBMS1 data logger and Modbus protocol or DLBMS2 with Aertesi protocol, even in combination with all the Aertesi terminal units.

QUALITY POINTS

ABS main drain pan to avoid the rusty making because of water stagnation.

EASY DRAIN

Plastic main drain pan with slope to favour the discharge and to avoid the water stagnation, that can make bacterias.

4TIN2T

Accessory proposed to adapt the 2 pipes devices in 4 pipes installations increasing the capacity efficiency with energy savings effects

VERSATILE DOUBLE FACE

"HDP" accessory for the versatility use both in vertical and horizontal of the unit

SMART CABINET

Cover cabinet with 2 flanks easy removable indipendently by the rest of the unit

SILEN1

Extremely silent, on the top level on the Eurovent certified prodcuts for sound power performance.



Version

VA	Vertical with movable grilles
VB	Vertical mod, with frontal air inlet and frontal panel that can be open to extract filter
vc	Vertical ceiling version with bottom suction
VD	Vertical ceiling version with frontal suction
VE	Concealed vertical with frontal outlet and bottom inlet
VL	Low Zefiro Low profile vertical version with frontal suction and panel that can be open to extract filter
VG	Upside Down Concealed vertical with frontal bottom outlet and frontal top inlet
НА	Horizontal with movable grilles
НВ	Horizontal version with bottom suction and frontal panel that can be open to extract filter
нс	Horizontal ceiling version with suction on the back side
HD	Horizontal ceiling version with bottom suction
VF	Concealed vertical with frontal outlet and frontal inlet
HL	Low Zefiro Low profile horizontal version with bottom suction and panel that can be open to extract filter

Technical data

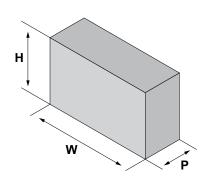
Size		308	316	320	628	634	840	847	1250	1260	1575	1885
Nominal technical data												
Max air flow	m3/h	300	300	300	530	530	730	730	1130	1130	1310	1850
Max std.speed of 6		2	2	2	2	2	2	2	2	2	2	2
Total cooling capacity - Super	kW	1,22	1,53	1,93	2,67	3,18	4,28	5,11	5,19	6,30	7,22	10,25
Total cooling capacity - Max. std	kW	0,97	1,42	1,80	2,48	2,93	3,65	4,32	4,85	5,85	6,79	9,35
Heating capacity - Super	kW	2,94	3,68	4,27	6,42	7,43	9,81	11,37	12,29	14,98	16,80	22,11
Heating capacity - Max. std	kW	2,62	3,43	3,95	5,94	6,81	8,26	9,46	11,43	13,37	15,75	20,7
Heating capacity - Max. std	kW	1,47	1,99	2,34	3,45	3,99	4,86	5,59	6,68	7,86	9,23	12,2
EH electric heater (Accessories)	kW		1000		12	50		20	000		30	00
Grille	n°		2		;	3			4		5	6
Plastic door	n°						2					

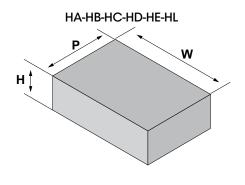
- (1) Air 27 $^{\circ}$ C 47% (in); Water in/out 7/12 $^{\circ}$ C
- (2) Temperature Air 20 °C (in); Water in/out 70/60 °C
- (3) Temperature Air 20 °C (in); Water in 50 °C
- (4) In compliance with EUROVENT parameters



Dimensions

VA-VB-VC-VD-VE-VF-VL





VA - VB

Size		308	316	320	628	634	840	847	1250	1260	1575	1885
Dimensions												
Width / W	mm	860	860	860	1120	1120	1380	1380	1380	1380	1640	1900
Weight / P	mm	222	222	222	222	222	222	222	222	222	222	222
Height / H	mm	586	586	586	586	586	586	586	586	586	586	586

HA - HB

Size		308	316	320	628	634	840	847	1250	1260	1575	1885
Dimensions												
Width / W	mm	860	860	860	1120	1120	1380	1380	1380	1380	1640	1900
Weight / P	mm	586	586	586	586	586	586	586	586	586	586	586
Height / H	mm	222	222	222	222	222	222	222	222	222	222	222

VC - VD - VE - VF

Size		308	316	320	628	634	840	847	1250	1260	1575	1885
Dimensions												
Width / W	mm	746	746	746	1006	1006	1266	1266	1266	1266	1526	1786
Weight / P	mm	217	217	217	217	217	217	217	217	217	217	217
Height / H	mm	460	460	460	460	460	460	460	460	460	460	460

HC - HD - HE

Size		308	316	320	628	634	840	847	1250	1260	1575	1885
Dimensions												
Width / W	mm	746	746	746	1006	1006	1266	1266	1266	1266	1526	1786
Weight / P	mm	460	460	460	460	460	460	460	460	460	460	460
Height / H	mm	217	217	217	217	217	217	217	217	217	217	217

VL

Size		308	316	320	628	634	840	847	1250	1260	1575	1885
Dimensions												
Width / W	mm	860	860	860	1120	1120	1380	1380	1380	1380	1640	1900
Weight / P	mm	222	222	222	222	222	222	222	222	222	222	222
Height / H	mm	486	486	486	486	486	486	486	486	486	486	486

HL

Size		308	316	320	628	634	840	847	1250	1260	1575	1885
Dimensions												
Width / W	mm	860	860	860	1120	1120	1380	1380	1380	1380	1640	1900
Weight / P	mm	486	486	486	486	486	486	486	486	486	486	486
Height / H	mm	222	222	222	222	222	222	222	222	222	222	222

Controls

		CSN N	3 Speed Selector with S/W switch wall installation
Wall mounted	3 0.	SATH N	Electronic thermostat with 3 speed selector and summer/winter selector
	0	TOP1 N	Multifunction electronic regulator
	[, O	TOP1-0/10V N	Multifunction electronic regulator 0-10V
		CSN-BI	Speed control with E / I board
Built In Version		SATH-BI	Electronic thermostat with 3 speed selector and summer/winter selector (built-in version)
		TOP1-BI	Multifunction electronic regulator (built-in version)
		TOP1-0/10V-BI	0-10V Multifunction electronic regulator (built-in version)
	2	CSN-BI KIT	3 Speed Selector with S/W switch, (kit not installed for built-in version)
Kit not installed	(= 04)	SATH-BI KIT	Electronic thermostat with 3 speed selector and summer/winter selector (kit not installed for built-in version)
	(FIEO.)	ТОР1-ВІ КІТ	Multifunction electronic regulator (kit not installed for built-in version)
		TOP1-0/10V-BI KIT	0-10V Multifunction electronic regulator (kit not installed for built-in version)
		ELMZ	"Master/Slave" elevator module (one for each unit)
Wall	3	TOP2	Advanced multifunctions digital control
mounted		SATH2	Analogic control
Built In		TOP2-BI	Advanced multifunctions digital control
Version	0	SATH2-BI	Analogic control
Kit not		TOP2-BI KIT	Advanced multifunctions digital control
installed	0	SATH2-BI KIT	Analogic control

ZEFIRO EC series

Fancoils for vertical and horizontal installation with electronic motor



Identity

Fancoils availables in different versions for vertical and horizontal installation

Electronic brushless motor with permanent magnets

Certificazioni



Certification















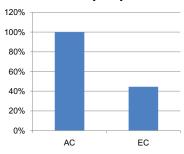
Description

The result of a decade of experience in the air treatment sector, the Zefiro fan coil, reflects all the feedback received from users, installers and designers over the years, now incorporated in the new unit to make it complete in all its features.

Special attention has been paid to ease of installation, thereby significantly reducing time requirements, thanks also to the use of slot-in side panels. The attractive styling, quiet operation, versatility, components of reliable quality, and the massive range of available accessories, make this fan coil ideal for heating and cooling all types of interior spaces.

Stated performance data are guaranteed by the unit's Eurovent certification.

Medium input power %



Plus

BMS COMPATIBLE

Management control until 250 units with TOP2 control without using a data logger accessory and Open Modbus protocol.

QUALITY POINTS

Drain pan made in ABS plastic or painted galvanised steel to avoid rust due to water stagnation.

SUPER SILENT

From 45% to 65% saving in comparison to the traditional motor depending on the different sizes and use. The electronic motor is Brushless version controlled by a signal 0-10vdc with very low power consumption.

EASY DRAIN

Main drain pan with slope to facilitate the water discharge, and avoid the water stagnation.

VERSATILE DOUBLE FACE

"HDP" accessory for the versatility use both in vertical and horizontal of the unit.

SMART CABINET

Cover cabinet with 2 flanks easy removable indipendently by the rest of the unit.

ENERGY SAVING

By the 45% to the 55% in comparison to the traditional motor, depending by the size and the end-user utilization way. The motor is a Brushless tipology managed by a signal 0-10Vdc with lowered absorption of energy consumption.

Version

VA	Vertical with movable grilles
VB	Vertical mod. with frontal air inlet and frontal panel that can be open to extract filter
VC	Vertical ceiling version with bottom suction
VD	Vertical ceiling version with frontal suction
VE	Concealed vertical with frontal outlet and bottom inlet
VL	Low Zefiro Low profile vertical version with frontal suction and panel that can be open to extract filter
VG	Upside Down Concealed vertical with frontal bottom outlet and frontal top inlet
НА	Horizontal with movable grilles
НВ	Horizontal version with bottom suction and frontal panel that can be open to extract filter
нс	Horizontal ceiling version with suction on the back side
HD	Horizontal ceiling version with bottom suction
VF	Concealed vertical with frontal outlet and frontal inlet
HL	Low Zefiro Low profile horizontal version with bottom suction and panel that can be open to extract filter

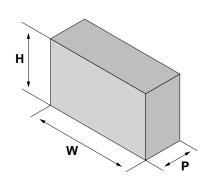
Technical data

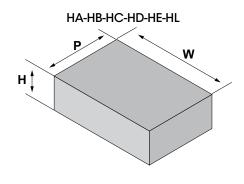
	Size		308	316	320	628	634	840	847	1250	1260	1575	1885
	Nominal technical data												
	Max air flow	m3/h	330	330	330	590	590	916	916	1249	1249	N.A.	N.A.
(1) (4)	Total cooling capacity - Max	kW	1,22	1,53	1,93	2,67	3,18	4,28	5,11	5,19	6,30	N.A.	N.A.
(2)	Heating capacity - Max	kW	2,94	3,68	4,27	6,42	7,43	9,81	11,37	12,29	14,98	N.A.	N.A.
(3)	Heating capacity - Max. std	kW	1,69	2,14	2,52	3,74	4,35	5,77	6,71	7,19	8,77	N.A.	N.A.
	Grille	n°		2		(3		4	4		N.A.	N.A.
	Plastic door	n°						2					

- (1) Air 27 °C 47% (in); Water in/out 7/12°C
- (2) Temperature Air 20 °C (in); Water in/out 70/60 °C
- (3) Temperature Air 20 °C (in); Water in 50 °C
- (4) In compliance with EUROVENT parameters

Dimensions

VA-VB-VC-VD-VE-VF-VL





VA - VB

Size		308	316	320	628	634	840	847	1250	1260	1575	1885
Dimensions												
Width / W	mm	860	860	860	1120	1120	1380	1380	1380	1380	1640	1900
Weight / P	mm	222	222	222	222	222	222	222	222	222	222	222
Height / H	mm	586	586	586	586	586	586	586	586	586	586	586

HA - HB

Size		308	316	320	628	634	840	847	1250	1260	1575	1885
Dimensions												
Width / W	mm	860	860	860	1120	1120	1380	1380	1380	1380	1640	1900
Weight / P	mm	586	586	586	586	586	586	586	586	586	586	586
Height / H	mm	222	222	222	222	222	222	222	222	222	222	222

VC - VD - VE - VF

Size		308	316	320	628	634	840	847	1250	1260	1575	1885
Dimensions												
Width / W	mm	746	746	746	1006	1006	1266	1266	1266	1266	1526	1786
Weight / P	mm	217	217	217	217	217	217	217	217	217	217	217
Height / H	mm	460	460	460	460	460	460	460	460	460	460	460

HC - HD - HE

Size		308	316	320	628	634	840	847	1250	1260	1575	1885
Dimensions												
Width / W	mm	746	746	746	1006	1006	1266	1266	1266	1266	1526	1786
Weight / P	mm	460	460	460	460	460	460	460	460	460	460	460
Height / H	mm	217	217	217	217	217	217	217	217	217	217	217

VL

Size		308	316	320	628	634	840	847	1250	1260	1575	1885
Dimensions												
Width / W	mm	860	860	860	1120	1120	1380	1380	1380	1380	1640	1900
Weight / P	mm	222	222	222	222	222	222	222	222	222	222	222
Height / H	mm	486	486	486	486	486	486	486	486	486	486	486

HL

Size		308	316	320	628	634	840	847	1250	1260	1575	1885
Dimensions												
Width / W	mm	860	860	860	1120	1120	1380	1380	1380	1380	1640	1900
Weight / P	mm	486	486	486	486	486	486	486	486	486	486	486
Height / H	mm	222	222	222	222	222	222	222	222	222	222	222

Controls

Wall		TOP2EC	Advanced multifunctions digital control	On-Off Summer-Winter automatic selector Continously speed by signal 0-10V	On-Off valve control Dirty filter alarm Weekly program Windows contact Low temperature thermostat Modbus predisposition
mounted		SATH2EC	Analogic control for EC motors	On-Off Summer-Winter selector Continously speed by signal 0-10V	On-off valve control
Built In		TOP2-BI EC	Advanced multifunctions digital control	On-Off Summer-Winter automatic selector Continously speed by signal 0-10V	On-Off valve control Dirty filter alarm Weekly program Windows contact Low temperature thermostat Modbus predisposition
Version	6	SATH2EC-BI	Analogic control for EC motors	On-Off Summer-Winter selector Continously speed by signal 0-10V	On-off valve control
Kit not	•	TOP2-BI KIT	Advanced multifunctions digital control	On-Off Summer-Winter automatic selector Continously speed by signal 0-10V	On-Off valve control Dirty filter alarm Weekly program Windows contact Low temperature thermostat Modbus predisposition
installed	6	SATH2EC-BI KIT	Analogic control for EC motors	On-Off Summer-Winter selector Continously speed by signal 0-10V	On-off valve control

Note: With the controls TOP2EC, SATH2EC the use of modulating valves is not necessary

Zefiro Serie with built-in casing predisposition

Fancoils for vertical and horizontal installation



Identity

Fancoils availables in different versions for vertical and horizontal installation

Certification



Plus













Description

The result of a decade of experience in the air treatment sector, the Zefiro fan coil, reflects all the feedback received from users, installers and designers over the years, now incorporated in the new unit to make it complete in all its features.

Special attention has been paid to ease of installation, thereby significantlyreducing time requirements, thanks also to the use of slot-in side panels. The attractive styling, quiet operation, versatility, components of reliable quality, and the massive range of available accessories, make this fan coil ideal for heating and cooling all types of interior spaces.

Stated performance data are guaranteed by the unit's Eurovent certification.

Plus

QUALITY POINTS

Refined and elegant design for inclusion in even the most demanding residential aesthetically Its structure facilitates the masonry during construction of the niche where the fan-coil will be installed. Inserted in the casing, the fan-coil will be completely hidden from view. The air intake and outlet air have manual flap to allow for better air distribution. The template provides for precut to break on all sides to facilitate hydraulic and electrical connections from all directions.

ALL IN 1 CONTROL

Wall mounted standard control with advanced functions Master/Slave included to create little networks until 32 units each one.



BMS COMPATIBLE

Management control until 250 units with TOP2 control without using a data logger accessory and Open Modbus protocol.

EASY DRAIN

Plastic main drain pan with slope to favour the discharge and to avoid the water stagnation, that can make bacterias, for the vertical versions.

SILENT

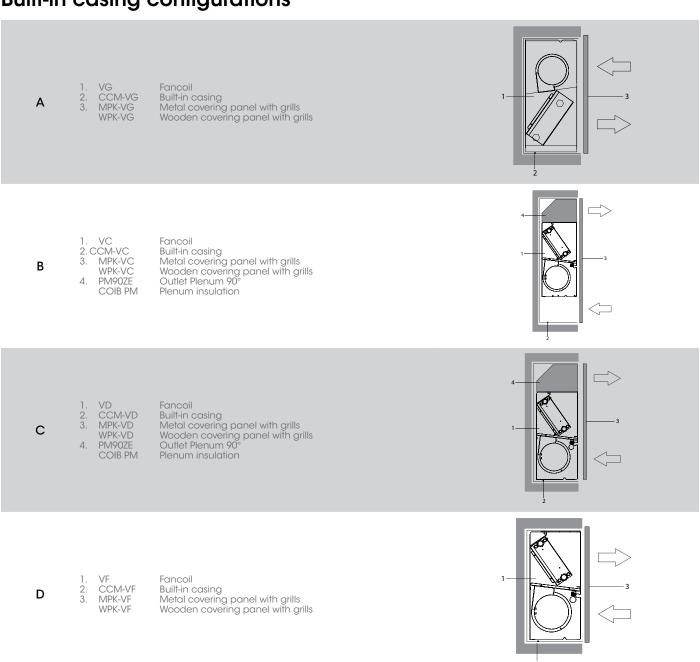
Extremely noiseless at the top level of the Eurovent certified companies because of the sound power performances.



Zefiro versions combined

VG	Upside Down Concealed vertical with frontal bottom outlet and frontal top inlet	
VC	Concealed vertical with movable air intake	
VD	Concealed vertical with movable air intake	
VF	Concealed vertical with frontal outlet and frontal inlet	

Built-in casing configurations

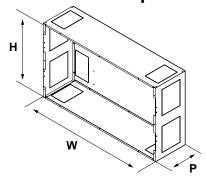


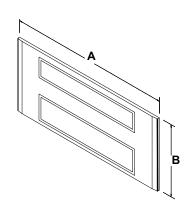
Technical data

Size		308	316	320	628	634	840	847	1250	1260	1575	1885
Nominal technical data												
Max air flow	m3/h	300	300	300	530	530	730	730	1130	1130	1310	1850
Max std.speed of 6		2	2	2	2	2	2	2	2	2	2	2
Total cooling capacity - Super	kW	1,22	1,53	1,93	2,67	3,18	4,28	5,11	5,19	6,30	7,22	10,25
Total cooling capacity - Max. std	kW	0,97	1,42	1,80	2,48	2,93	3,65	4,32	4,85	5,85	6,79	9,35
Heating capacity - Super	kW	2,94	3,68	4,27	6,42	7,43	9,81	11,37	12,29	14,98	16,80	22,11
Heating capacity - Max. std	kW	2,62	3,43	3,95	5,94	6,81	8,26	9,46	11,43	13,37	15,75	20,7
Heating capacity - Max. std	kW	1,47	1,99	2,34	3,45	3,99	4,86	5,59	6,68	7,86	9,23	12,2

- (1) Air 27 °C 47% (in); Water in/out 7/12°C
- (2) Temperature Air 20 °C (in); Water in/out 70/60 °C
- (3) Temperature Air 20 $^{\circ}$ C (in); Water in 50 $^{\circ}$ C
- (4) In compliance with EUROVENT parameters

Dimensions and service spaces





A CONFIGURATION - VG

Size		308	316	320	628	634	840	847	1250	1260	1575	1885
Dimensions												
Width / W	mm	860	860	860	1120	1120	1380	1380	1380	1380	1640	1900
Weight / P	mm	228	228	228	228	228	228	228	228	228	228	228
Height / H	mm	505	505	505	505	505	505	505	505	505	505	505
Panel												
А	mm	880	880	880	1140	1140	1400	1400	1400	1400	1660	1920
В	mm	525	525	525	525	525	525	525	525	525	525	525

B CONFIGURATION - VC

Size		308	316	320	628	634	840	847	1250	1260	1575	1885
Dimensions												
Width / W	mm	860	860	860	1120	1120	1380	1380	1380	1380	1640	1900
Weight / P	mm	228	228	228	228	228	228	228	228	228	228	228
Height / H	mm	790	790	790	790	790	790	790	790	790	790	790
Panel												
А	mm	880	880	880	1140	1140	1400	1400	1400	1400	1660	1920
В	mm	810	810	810	810	810	810	810	810	810	810	810

C CONFIGURATION - VD

Size		308	316	320	628	634	840	847	1250	1260	1575	1885
Dimensions												
Width / W	mm	860	860	860	1120	1120	1380	1380	1380	1380	1640	1900
Weight / P	mm	228	228	228	228	228	228	228	228	228	228	228
Height / H	mm	690	690	690	690	690	690	690	690	690	690	690
Panel												
А	mm	880	880	880	1140	1140	1400	1400	1400	1400	1660	1920
В	mm	710	710	710	710	710	710	710	710	710	710	710

D CONFIGURATION - VF

Size		308	316	320	628	634	840	847	1250	1260	1575	1885
Dimensions												
Width / W	mm	860	860	860	1120	1120	1380	1380	1380	1380	1640	1900
Weight / P	mm	228	228	228	228	228	228	228	228	228	228	228
Height / H	mm	490	490	490	490	490	490	490	490	490	490	490
Panel												
А	mm	880	880	880	1140	1140	1400	1400	1400	1400	1660	1920
В	mm	510	510	510	510	510	510	510	510	510	510	510

WET ZEFIRO series

Fancoils with temperature and humidity control



Identity

Integrated isothermal humidifier 2 or 4 pipes system plant

Certification



Plus













Description

The ideal temperature. The perfect humidity rate. A comfortable climate, in one Zefiro.

This concept lies at the base of the revolutionary system Wet Zefiro by Aertesi, conceived, designed and manufactured to combine the benefits of a fan convector and of an isothermal humidifier.

Complete with all its accessories, Wet Zefiro is a miniature air conditioning station to get the ultimate air quality and climate in summer and winter alike, that is a perfect balance between temperature and humidity.

Plus

CLIMA TIME

Integrated control of temperature and humidity. The logic of operation is as follows: once the temperature set-point is reached, the valves will cut water supply to the exchange battery. However, if the required humidity rate is not reached, the fans will not stop. This way, proper vapour distribution into the environment is ensured.

QUALITY POINT

More easy, less incumbrance and cheaper installation; easier control management (only one control); mixed steam-air for a more homogeneous disrtibution; adaptability and flexibility thanks the possibility to control the humidity and temperature of different and specific areas of the building.

FLEX

Simple solution at low installation cost that permit to solve specific thermo-hygrometric in different application sectors (museum, bibliotecary, show room, vegetable shops, food sector).



ENERGY SAVING

Compact isothermal humidifier at bathed electrods with simply tap water. The steam output is controlled in consideration of the real need, the result is a consum enery decrease and a precise manteining of the humidity set point. The thermic energy of the water to create the steam is transferred in the environmental, and so combined to the heating=energy efficiency.

HEALTH

regenerable filter with zinc metal sheet frame and filter sections in synthetic acrylic fibre. G2 class of filtration class Treated with AEmina®, a powerful long-lasting anti-bacterial substance. The humidification is generating making steam at 100°, that kill all the bacterias located in the distribution pipe before the steam come out. Falling down the thin powder reducing the allergic effects

EASY WET

The advanteages of the isotherm humidification: a) greater salt minerals reduction in the air; b) no rain fallinghumidity on the object surfaces; c) not decrease the winter temperature making humidification

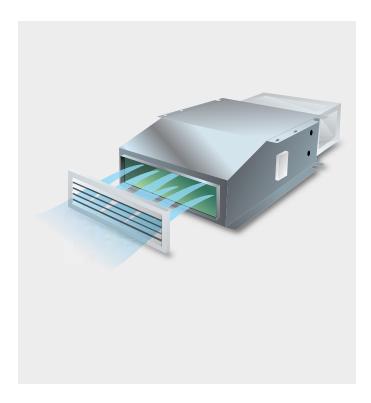
Technical data

	Size		308	316	320	628	634	840	847	1250	1260	1575
	Nominal technical data											
	Max air flow	m3/h	300	300	300	530	530	730	730	1130	1130	1310
	Max std.speed of 6		2	2	2	2	2	2	2	2	2	2
	Vapour output	Kg/h	1	1	1	1	1	2	2	2	2	2
(1)	Total cooling capacity - Super	kW	1,22	1,53	1,93	2,67	3,18	4,28	5,11	5,19	6,30	7,22
(1)	Total cooling capacity - Max. std	kW	0,97	1,42	1,80	2,48	2,93	3,65	4,32	4,85	5,85	6,79
(2) (4)	Heating capacity - Super	kW	2,94	3,68	4,27	6,42	7,43	9,81	11,37	12,29	14,98	16,80
(2) (4)	Heating capacity - Max. std	kW	2,62	3,43	3,95	5,94	6,81	8,26	9,46	11,43	13,37	15,75
(3) (4)	Heating capacity	kW	1,47	1,99	2,34	3,45	3,99	4,86	5,59	6,68	7,86	9,23
	Grilles	n°		3		4	4		į	5		6
	Doors	n°						2				

- (1) Temperature: Air 27 $^{\circ}$ C 47% (in); Water in/out 7/12 $^{\circ}$ C
- (2) Temperature Air 20 °C (in); Water in/out 70/60 °C
- (3) Temperature Air 20 °C (in); Water in 50 °C
- (4) In compliance with EUROVENT parameters

LNH series

Maximum silent fancoil for hotels, hospitals, homes



Identity

They are perfect for hotels, hospitals, and houses Concealed unit

Version

2 pipe

Certification



Plus









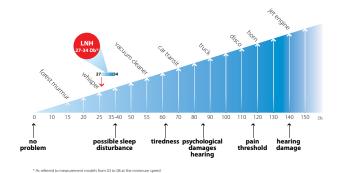




Description

The underceiling fancoil ""LNH"" is studied to obtain the maximum energy comfort with the maximum performance in sound level hardly reachable with air terminal units (split, fancoils).

Their performances make it the ideal product for every kind of installations that have to ensure the best respect of strictly sound level rules.



Plus

ALL IN 1 CONTROL

Wall mounted standard control with advanced functions Master/Slave included to create little networks until 32 units each one.

BMS COMPATIBLE

Possibility to control until 2048 units with DLBMS1 data logger and Modbus protocol or DLBMS2 with Aertesi protocol, even in combination with all the Aertesi terminal units.

Availability of the centralized management software SFTMB

SUPERSILENT

Extremely silent thanks to their technical features: the accurate study of an integrated silencer plenun and the utilize of a particular insulation with high soundproof power

ECO

The insulation material of the plenum and of the metal sheet body is realized with ecological material (Recycled fibre in polyester) at less environmental impact and closed cells to ensure a more sanitized impact.

4TIN2T

Accessory proposed to adapt the 2 pipes devices in 4 pipes installations increasing the capacity efficiency with energy savings effects

EASY SERVICE

LNH is designed for the maximum maintenance comfort: the fan, like the main drain pan and the coil are both inspectable and removablewith the some procedure.

Technical data

Size		3	6	8	12
Air flow		075	/10	000	1000
1		375	610	990	1338
2 Max		343	548	789	1256
3	m3/h	294	469	710	1103
4 Med		253	383	632	958
5 Min		203	328	470	696
6 Talahara (Sasarana a Sa		167	310	421	642
Total cooling capacity	<u> </u>				
1		2,2	3,59	5,82	7,21
2 Max		2,06	3,3	4,87	6,7
3	kW	1,82	2,91	4,55	6,26
4 Med		1,7	2,46	4,15	5,62
5 Min		1,33	2,15	3,25	4,36
6		1,19	2,05	3,00	4,2
Sensible cooling capacity					
1		1.69	2,77	4,48	5,71
2 Max		1,57	2,53	3,68	5,42
3	LAM	1,37	2,2	3,36	4,87
4 Med	kW	1,2	1,84	3,03	4,32
5 Min		0,986	1,6	2,31	3,28
6		0,823	1,52	2,09	3,05
Water flow					
1		379	617	1000	1238
2 Max		354	567	836	1184
3		313	500	768	1076
4 Med	l/h	275	423	697	967
5 Min		229	370	541	750
6		193	353	491	701
Pressure drop		170		771	, , , ,
1		13,6	6,28	19,1	28
2 Max		12	5,39	13,8	25,8
3	kPa	9,6	4,3	11,9	21,8
4 Med	RPG —	7,65	3,18	10,0	17,9
5 Min		5,49	2,51	6,3	11,3
6		4,02	2,29	5,3	10,1
Heating capacity					
1		4,75	8,2	12,8	16,8
2 Max		4,4	7,5	10,7	14,9
3	kW	3,8	6,7	9,8	14,5
4 Med		3,6	5,4	8,9	12,1
5 Min		2,78	4,68	6,82	9,4
6		2,45	4,5	6,3	8,83
Water flow					
0.14***		426	735	1116	1473
2 Max		394	674	929	1314
3	l/h	342	585	848	1232
4 Med		297	473	780	1058
5 Min		238	409	595	825
6		201	392	542	784
Pressure drop					
1		13	5,5	22,0	32
2 Max		10	4,9	15,0	27
3		8,5	4	13,4	23
4 Med		6	3	12,0	12
5 Min		4,8	2	8,0	7,2
6		3	1,7	6,0	6
Max air flow		0.75	/	000	
1		375	610	990	1338
2 Max		343	548	789	1256
3	m3/h	294	469	710	1103
4 Med		253	383	632	958
5 Min		203	328	470	696
6		167	310	421	642

Size		3	6	8	12
Heating capacity					
1		2,85	4,61	7,41	9,52
2 Max		2,64	4,2	6,09	9,04
3		2,31	3,66	5,55	8,12
4 Med	kW	2,1	3,05	5,00	7,2
5 Min		1,64	2,65	3,80	5,44
6		1,45	2,51	3,44	5,06
Water flow		.,	2,0.		
1		379	617	1000	1238
2 Max		354	567	836	1184
3		313	500	768	1076
4 Med	——— I/h ——	275	423	697	967
5 Min		229	370	541	750
6		193	353	491	701
		142	333	491	701
Pressure drop		11.4	F 07	17.00	02.5
1		11,4	5,27	16,00	23,5
2 Max		10,1	4,53	11,60	21,7
3	kPa	8,07	3,61	9,94	18,3
4 Med		6,4	2,67	8,37	15,1
5 Min		4,6	2,1	5,29	9,53
6		3,38	1,93	4,46	8,46
B1 additional coil heating capacit	У				
1		2,31	3,85	5,79	7,03
2 Max		2,18	3,58	4,98	6,75
3	kW	1,99	3,27	4,64	6,21
4 Med		1,79	2,83	4,35	5,66
5 Min		1,52	2,52	3,51	4,64
6		1,32	2,42	3,24	4,4
B1 additional coil water flow					
1		202	336	506	614
2 Max		190	313	435	590
3	175	174	286	406	534
4 Med	——— I/h ——	156	247	380	495
5 Min		133	221	307	406
6		115	212	283	384
B1 additional coil pressure drop					
1		5,78	20	7,40	10,5
2 Max		5,21	17,6	5,65	6,77
3		4,43	14,9	4,97	8,41
4 Med	kPa	3,65	11,5	4,43	7,12
5 Min		2,75	9,38	3,01	4,98
6		2,11	8,69	2,61	4,52
Sound power		2,11		2,01	7,02
		47	44	52	59
		42,9	40,8	48	56,9
2 Max					
4 March	———— dB(A) ——	39	37,4	45	53,5
4 Med		36,9	37	42	50,3
5 Min		30	32	34	45
6		27	30	31	45,2
Max power input					
1	W	40	55	108	170
1	A	0,19	0,24	0,47	0,75
Accessories					
Outlet plenum	n°	1	2		3
Outlet plenum diameter	mm		1	60	
EH electric heater (Accessories)	kW	1000	1250	20	00

(1) Temperature: Air 27 °C - 47%

Water In/Out 7/12 °C

(2) Temperature: Air 20 °C

Water In/Out 70/60 °C

(3) Temperature: Air 20 °C

Inside water 50 °C

(4) In compliance with EUROVENT parameters

Controls

	(E)	CSN N	3 Speed Selector with S/W switch wall installation
	3 0.	SATH N	Electronic thermostat with 3 speed selector and summer/winter selector
Wall	0 1	TOP1 N	Multifunction electronic regulator
mounted		TOP1-0/10V N	Multifunction electronic regulator 0-10V
		TOP2	Advanced multifunctions digital control
	000	SATH2	Analogic control

Series UTW SB

Ductable fan coil for heating, air conditioning, and mixed systems, with external static pressure of 70 Pa.





Description

UTW SB Series terminals are specially made for use in duct heating, air conditioning and mixed systems.

The fans are high head units, dimensioned to give a pressure of 70 Pa at nominal flow.

Plus

SILENT

Fans electronically balanced to combat induced vibrations.10 mm thick soundproofing material. 10 mm thick soundproofing material. Thick galvanised zinc panels.

ALL IN 1 CONTROL

Wall mounted standard control with advanced functions Master/ Slave included to create little networks until 32 units each one.

BMS COMPATIBLE

Possibility to control until 2048 units with DLBMS1 data logger and Modbus protocol or DLBMS2 with Aertesi protocol, even in combination with all the Aertesi terminal units.

ENERGY SAVING

The heat exchangers are Cu/Al continuous fin, 3 row (models 19, 31, 41 and 61) and 4 row (models 21, 36 and 81) with high efficiency reverse flow circuits for water operation. A 1 row exchanger can be added to 4 tube systems (or a 2 row exchanger in the case of low temperature systems).

Plastic fans with low power consumption on most sizes

FLEX

Hydraulic connections can be reversed on site. Reversible air outlet configuration.

EASY SERVICE

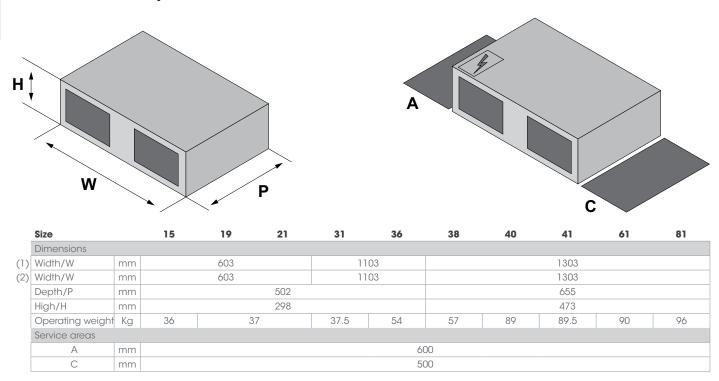
Easy access to the air filter for replacement or cleaning

Technical data

	Size		15	19	21	31	36	38	40	41	61	81
	General											
	Max air flow	m3/h	9	95	1178	1652	1835	2042	2505	2996	3211	3948
	Cooling performances											
(1)	Total cooling capacity	kW	3,68	5,32	7,07	9,26	11,61	12,47	13,83	17,52	18,39	24,69
	Heating performances											
(2) (1)	Heating capacity	kW	8,97	10,2	13,39	17,38	21,77	26,97	31,78	32,75	34,6	46,44
. /	Electric heater (accessories)	W	25	500	4500				6000			

- (1) Air flow with static pressure 70 Pa
- (2) Air temperature 27°C 50%; Water temperature in/out 7/12°C.

Dimensioni e spazi funzionali



- (1) Air temperature 20°C; Water temperature from boiler 70/60°C.
- (2) Air flow with static pressure 70 Pa

Series GHIBLI

Ductable fan coil for heating, air conditioning, and mixed systems, with external static pressure of 150 Pa.



Identity

Horizontal ducted installation External static pressure 150 Pa Low profile Double panels

Certifications



Plus











Description

The Ghibli range units are designed and built for all those applications where minimum thickness is an essential requirement. Manufactured in 7 models with nominal air flows from 1040 m3/h to 6450 m3/h and with 150Pa head, they are suitable for very many applications in the civil, commercial and industrial sectors. The quality of finishes makes this range of units suitable for exposed installation.

Plus

ALL IN 1 CONTROL

Wall mounted standard control with advanced functions Master/ Slave included to create little networks until 32 units each one.

BMS COMPATIBLE

Possibility to control until 2048 units with DLBMS1 data logger and Modbus protocol or DLBMS2 with Aertesi protocol, even in combination with all the Aertesi terminal units.

QUALITY POINTS

The structure is made with exclusive profiles and pre-painted double-shell steel panels (sandwich type) 10 mm thick (for sizes 111, 221, 282, 342, 402) or 20 mm (for sizes 512 and 653), internally insulated with polyurethane material; the panels are provided with a seal and secured to the frame with inox steel screws.

The filter used is the class G3 synthetic corrugated type (85% ponderal efficiency EU3).

SILENT

The fans are of the dual-intake centrifugal type with dynamically balanced, direct coupled forward bladed impellers.

The motors are 3-speed single-phase mounted on hard rubber supports that absorb all the vibrations.

Suitable quiet plenums are offered to reduce noise.

EASY SERVICE

The wide lower door ensures access to all internal components and very easy maintenance.

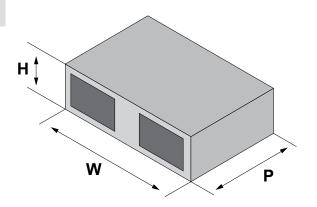
The CU/AL coils are easily accessed for extraordinary cleaning and can be disassembled and replaced, even with the unit mounted.

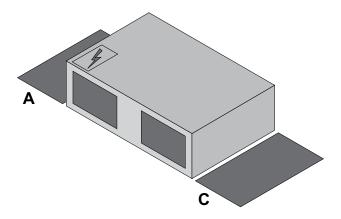
Technical data

	Size		111	221	282	342	402	512	653
	General								
(1)	Max air flow	m3/h	1040	2150	2740	3360	3950	5070	6450
	Cooling performances								
(2)	Total cooling capacity	kW	6.4	12.9	16.8	19.5	23.1	26.1	35
	Heating performances								
(3)	Heating capacity	kW	13.7	27.5	35.5	42	49.8	57.2	71
	Electric heater (accessories)	W	3000	4500	6600	7500	8100	9000	10500

- (1) P.S.E. 150 Pa with 4 R
- (2) Air temperature 27°C 50%; Water temperature in/out 7/12°C.
- (3) Water 70/60°C Air 20°C

Dimensions and service spaces



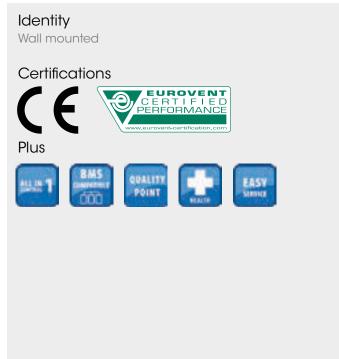


Size		111	221	282	342	402	512	653
Dimensions								
Width/W	mm	710	1070	1	400	1680	1780	2000
Depth/P	mm			850			90	50
High/H	mm			390			4	30
Operating weight	Kg	58	75	106	108	122	135	148
Service areas								
А	mm				600			
С	mm				500			

Series HWN-1 WALL

Low acoustic impact fan coil equipped with remote control handset or wall-mounted controls.





Description

The high HWN1 conditioners have a totally innovating design, where the aesthetic necessities of modern space and silence are the most important constraints.

Plus

ALL IN 1 CONTROL

Wall mounted standard control with advanced functions Master/ Slave included to create little networks until 32 units each one.

BMS COMPATIBLE

Possibility to control until 2048 units with DLBMS1 data logger and Modbus protocol or DLBMS2 with Aertesi protocol, even in combination with all the Aertesi terminal units.

NCU with optional control functions designed to simplify management through external controls

The controls are easily interchanged during installation or in storage

QUALITY POINTS

Ready for quick installation of three-way valve (optional)
Possibility to mount the valves directly in the factory
Refined and elegant design for the placement in even the most
aesthetically demanding domestic

High quality plastic that will not have any deformation with high water temperatures to 70 $^{\circ}\text{C}$

HEALTH

Removable and washable air filter to prevent the spread of dust and allergens in the environment

Adjustable air flow through the motorized flap to ensure proper distribution of air in the room and flows to avoid annoying people on

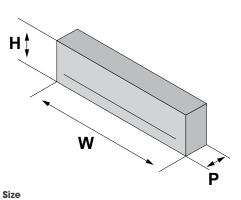
EASY SERVICE

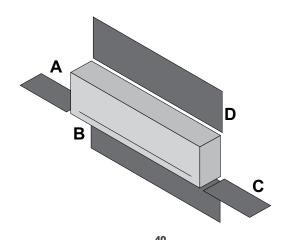
Easy access to the air filter for replacement or cleaning



	Size		30	40
	General			
	Max air flow	m3/h	474	648
	Cooling performances			
(1)	Total cooling capacity	kW	2.3	4
, ,	Heating performances			
(2)	Heating capacity	kW	4.7	8.5

- (1) Air temperature 27°C 50%; Water temperature in/out 7/12°C.
- (2) Air temperature 20°C; Water temperature from boiler 70/60°C.





Size		30	40
Dimensions			
Width/W	mm	1030	1160
Depth/P	mm	196	198
High/H	mm	320	330
Weight	Kg	13.5	16.5
Service areas			
А	mm	10	00
В	mm	23	00
С	mm	10	00
D	mm	8	0

Series CH2O-G/H

Water cassette. Fan coils for installation in suspended ceilings, with wall-mounted controls or infrared remote control.



Identity

Under ceiling installation Wall-mounted controls or infrared remote control

Versions

2 and 4 pipe versions

Certifications





Plus











Description

The water Cassette are fan coil systems suitable for installation in a false ceiling in the center of the room. Their attractive is suitable for the most sophisticated environments where requirements for space and silence are the greatest constraint.



WALL-MOUNTED CONTROL WPC-GH

Plus

ALL IN 1 CONTROL

Wall mounted standard control with advanced functions Master/ Slave included to create little networks until 32 units each one.

BMS COMPATIBLE

Possibility to control until 2048 units with DLBMS1 data logger and Modbus protocol or DLBMS2 with Aertesi protocol, even in combination with all the Aertesi terminal units.

NCUGH optional control functions designed to simplify management through external controls. The controls are easily interchanged during installation or in storage.

QUALITY POINTS

Ready for quick installation of valves 2 and 3 way (optional) Possibility to mount the valves directly in the factory Easy access to terminal block for electrical connections Integration of outside air drawn through two connections (up to 15% on a single connection).

Ready for fitting in the field or in storage of electrical resistances of integration with Plug & Play connections

4TIN2T

Hearing aid fitting accessory for the 2-pipe 4-pipe systems with no loss of performance.

EASY SERVICE

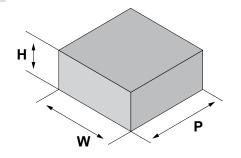
Ease of removal of the grid air Electrical panel removed without removing the ceiling Arrangement of components optimized for access from below

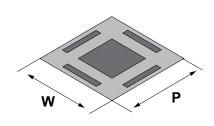
Size		20G	30G	40G	50G	60H	70H	100H	120H	40GB1	60HB1	80HB
Technical data												
Versions					21	ubi					4 Tubi	
Fans number	n°						1					
Cooling performances												
Nominal capacity/h	kW	2.37	3.2	4.08	4.56	5.6	6.9	10	11.7	3.6	5.75	7.92
Nominal capacity/m	kW	1.7	2.06	3.1	3.76	5.1	5.6	7.83	10	3.02	5.21	6.82
Nominal capacity/I	kW	1.	.41	2	2.7	3.	57	6	.56	2.42	3.18	5.34
Sensible nominal capacity/h	kW	1.89	2.5	3	3.17	4.37	5.06	7.94	8.86	2.94	4.46	6.96
Sensible nominal capacity/m	kW	1.35	1.62	2.45	2.85	3.85	4.37	6.45	7.94	2.6	4.2	6.28
Sensible nominal capacity/I	kW	1.	.11	2.	.15	2.	96	5	.58	2.22	2.76	5.2
Water flow	l/h	419	601	753	810	1047	1226	1767	2073	636	1007	1400
Pressure drop	kPa	6.5	12.8	30	36.8	27.7	36.9	38	49	14.7	40.3	26.8
Water volume	1	1.	.25	1.	.56	1.	78	2	.41	1.07	1.37	1.67
Heating performances												
Nominal capacity/h	kW	4.92	6.58	7.8	8.9	11.4	12.72	18.65	20.87	4.43	5.03	9.65
Nominal capacity/m	kW	3.98	4.3	6.92	7.4	10.13	11.4	16.6	18.65	3.84	4.63	8.87
Nominal capacity/I	kW	3.	.25	6.	.58	7.	52	1.	5.2	3.41	3.42	7.56
Nominal capacity/h	kW	2.8	3.65	5.29	6.15	6.72	8.28	11.48	13.7		-	
Nominal capacity/m	kW	2	2.4	4.1	4.9	6.2	6.72	9.39	11.48		-	
Nominal capacity/I	kW	1	.6	3	.5	4.	28	7	.87		-	
Water flow	l/h					-				380	431	827
Pressure drop	kPa					-				3.5	7.5	13.3
Water volume	I					-				0.49	0.41	0.74
Fan motor performance												
Power	Watt	38	50	56	85	89	146	267	310	85	146	310
Running current	Amp	0.17	0.26	0.24	0.37	0.36	0.64	1.16	1.35	0.37	0.64	1.35
Starting current	Amp	0.51	0.78	0.72	1.11	1.08	1.9	3.48	4.04	1.11	1.9	4.04
General												
Nominal air flow/h	m3/h	380	575	722	810	960	1300	1950	2290	810	1300	2290
Nominal air flow/m	m3/h	240	290	522	617	820	960	1380	1950	617	960	1950
Nominal air flow/I	m3/h		00		50		00	10	090	450	700	1090
Sound pressure at 1 m/h	dB(A)	34	37	44	46	42	47	50	52	46	50	54
Sound pressure at 1 m/m	dB(A)	30	32	35		40		42	46	40	42	50
Sound pressure at 1 m/l	dB(A)	2	27		30		36		39	30	36	39
Sound power/h	dB(A)	42	48	57	60	55	(55	70	60	65	70
Sound power/m	dB(A)	37	40	46	52	50	57	58	65	52	57	65
Sound power/I	dB(A)	3	35		12	40	5.8	4	17	42	46.8	47
Electric heater (accessories)	kW	-	1	-	2	-	3	-	4		-	
Power supply	V/Ph/Hz						230/1/50)				
D.i. drain pain connection	mm (in)						19.05 (3/4	1)				
Connecting system							FEMALE					
Water inlet connection	mm (in)						19.05 (3/4	1)				
Water outlet connection	mm (in)						19.05 (3/4	1)				
Flange for external air suction	n°						2					

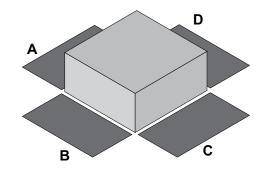
⁽¹⁾ Cooling: 27°C db /47% Inlet air temperature, 7°C Inlet water temperature, 12°C Outlet water temperature with nominal water flow

⁽²⁾ Heating: 20°C Inlet air temperature, 70°C Inlet water temperature, 60°C Outlet water temperature, same of cooling water flow

 $^{(3) \}quad \text{Heating: } 20^{\circ}\text{C Inlet air temperature, } 50^{\circ}\text{C Inlet water temperature, } \text{same of cooling water flow}$







Size		20G	30G	40G	50G	60H	70H	100H	120H	40GB1	60HB1	80HB1
Dimensions												
Width/W	mm		58	80		73	30	8	30	580	730	830
Depth/P	mm		58	80		73	30	8	30	580	730	830
High/H	mm		2	55		26	50			290		
Gross weight panel + packaging	Kg	28	3	3	30	3	6	5	50	30	36	50
Frontal panel												
Lenght	mm		6	80		83	30	9	80	680	830	980
Depth	mm		6	80		83	30	9	80	680	830	980
High	mm						28					
Service areas												
А	mm						500					
В	mm						500					
С	mm						500					
D	mm						500					

Series CH2O-G/H-EC

Water cassette. Fan coils for installation in suspended ceilings, with wall-mounted controls or infrared remote control with EC motor.



Identity

Under ceiling installation

DC electronic motor with permanent magnets Wall-mounted controls or infrared remote control

Versions

2 pipe versions

Certifications





Plus











Description

The water Cassette are fan coil systems suitable for installation in a false ceiling in the center of the room. Their attractive is suitable for the most sophisticated environments where requirements for space and silence are the greatest constraint.

Plus

ENERGY SAVING

From 35% to 50% compared to traditional motor depending on the type and mode of use $\,$

QUALITY POINTS

NCUEC optional control functions designed to simplify management through external controls. The controls are easily interchanged during installation.

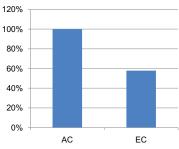
Ready for quick installation of valves 2 and 3 way (optional) Possibility to mount the valves directly in the factory

Easy access to terminal block for electrical connections

Integration of outside air drawn through two connections (up to 15% on a single connection).

Ready for fitting in the field or in storage of electrical resistances of integration with Plug & Play connections

Medium input power %



EASY SERVICE

Ease of removal of the grid air Electrical panel removed without removing the ceiling Arrangement of components optimized for access from below

ALL IN 1 CONTROL

Wall mounted standard control with advanced functions Master/Slave included to create little networks until 32 units each one.

BMS COMPATIBLE

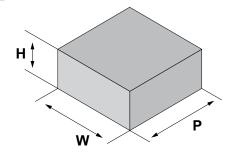
Possibility to control until 160 units with DLBMS-EC data logger and Modbus protocol, even in combination with all the Aertesi terminal units.

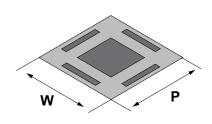
Size		30GEC	50GEC	70HEC	110HEC			
Technical data								
Versions				bes				
Fans number	n°			1				
Cooling performances								
Nominal capacity/h	kW	3.2	4.56	6.93	10.6			
Nominal capacity/m	kW	2.06	3.65	5	8.6			
Nominal capacity/I	kW	1.41	1.7	3.13	5.87			
Sensible nominal capacity/h	kW	2.48	3.17	5.03	8.11			
Sensible nominal capacity/m	kW	1.62	2.8	3.97	7.1			
Sensible nominal capacity/I	kW	1.11	1.35	2.52	4.84			
Water flow	I/h	601	836	1226	1865			
Pressure drop	kPa	12.8	36	31	36			
Water volume	I	1.25	1.56	1.78	2.41			
Heating performances								
Nominal capacity/h	kW	6.58	8.9	12.72	18.95			
Nominal capacity/m	kW	4.3	6.92	10.13	16.6			
Nominal capacity/I	kW	3.25	3.98	6.58	11.4			
Nominal capacity/h	kW	3.91	5.6	8.3	12.7			
Nominal capacity/m	kW	2.58	4.5	6	10.3			
Nominal capacity/I	kW	1.8	2.1	3.91	7			
Fan motor performance								
Power	Watt	30	40	72	200			
Running current	Amp	0.26	0.35	0.63	1.57			
Starting current	Amp	59.8	80	144	362			
General								
Nominal air flow/h	m3/h	575	810	1300	2100			
Nominal air flow/m	m3/h	290	520	820	1380			
Nominal air flow/I	m3/h	20	00	360	820			
Sound pressure at 1 m/h	dB(A)	37	46	50	54			
Sound pressure at 1 m/m	dB(A)	32	35	40	45			
Sound pressure at 1 m/l	dB(A)		4	28	30			
Sound power/h	dB(A)	48	60	65	66			
Sound power/m	dB(A)	39	45	53	58			
Sound power/I	dB(A)	3	5	39	42			
Electric heater (accessories)	kW	1	2	3	4			
Power supply	V/Ph/Hz		230/	1/50				
D.i. drain pain connection	mm (in)		19.05	(3/4)				
Connecting system			FEIV	IALE				
Water inlet connection	mm (in)	m (in) 19.05 (3/4)						
Water outlet connection	mm (in)		19.05	(3/4)				
Flange for external air suction	n°			2				

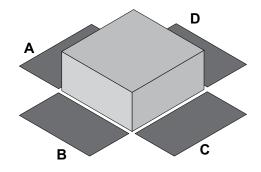
⁽¹⁾ Cooling: 27°C db /47% Inlet air temperature, 7°C Inlet water temperature, 12°C Outlet water temperature with nominal water flow

⁽²⁾ Heating: 20°C Inlet air temperature, 70°C Inlet water temperature, 60°C Outlet water temperature, same of cooling water flow

⁽³⁾ Heating: 20°C Inlet air temperature, 50°C Inlet water temperature, same of cooling water flow







Size		30GEC	50GEC	70HEC	110HEC
Dimensions					
Width/W	mm	580		730	830
Depth/P	mm	580		730	830
High/H	mm	255	290	260	290
Gross weight panel + packaging	Kg	28	30	36	50
Frontal panel					
Lenght	mm	680		830	980
Depth	mm	680		830	980
High	mm			28	
Service areas					
А	mm			500	
В	mm			500	
С	mm			500	
D	mm			500	

MARINE series

Fancoil units for marine application



Identity

Marine application Low pressure

Certification



Plus





Description

The ""Marine Small"" fancoil is studied to obtain the the maximum energy comfort with the maximum performance in sound level even in bad conditions like the marine environmental. The various versions availables give the possibility to mount its in different kinds of ships of little and great coaster.

Plus

QUALITY POINTS

Cabinet available in different kinds of materials in consideration of the environmental air aggressiveness of the installation:

- Aluzink (STD)
- Painting
- Inox

heat exchanger coils availables on demand copper to copper for aggressive atmosphere

Possibility to mount the valves directly in the factory

Version

OI	Horizontal concealed with frontal air outlet and behind air inlet
OIF	Horizontal concealed with frontal air outlet and bottom air inlet
ос	Horizontal with cabinet – Rear suction
OCF	Horizontal and vertical with cabinet – Frontal suction
VCF	Vertical with cabinet and frontal air inlet

Std version Mobile in Aluzink material and CU/AL coil

Technical data

	Size		3	4	6	9	12
	Cooling performances						
	Max air flow	m3/h	257	314	532	741	1311
(1)	Nominal capacity	kW	1,45	1,85	3,13	4,43	7,44
(1)	Sensible capacity	kW	3,08	3,84	6,51	9,01	15,43
	Grille	n°	3	4	6	8	8
	Plastic door	n°	2	2	2	2	2
	Electric heater (accessories)	kW	0,6	1	1,25	2	2

(1) Capacity is stated in accordance to ISO 7547

Series RECOVERY

Cross air flow exchanger recovery unit



Identity

Efficiency 50% Double panels Static with cross air flow

Versions

RC_HD: Horizontal double skin RC_VD: Vertical double skin

Certifications



Plus







Description

The series Recovery is ducted-type and the basic configurations are horizontal and vertical development. Through cross flow air-to-air aluminum heat exchanger, the series "Recovery" guarantees to recover over 50% of the energy that would normally be lost with the exhaust air expulsion. The "Recovery" units can be used to integrate traditional systems made up of fan coils, conditioning units, or radiators. They can operate both in the summer and winter season.

Plus

QUALITY POINTS

Completely removable aluzink plate side panels. Double-shell panel thermal and acoustic insulation by means of polyethylene/polyester panels with a thickness of 10 mm for the sizes RC290-550-1000 and 20 mm for the other sizes.

FLEX

For each size available, four possible positions for the recuperators are available. Depending on the net configuration and available space.

EASY SERVICE

UE3 efficiency air filters, which may be easily removed from the sides allowing their periodic cleaning.

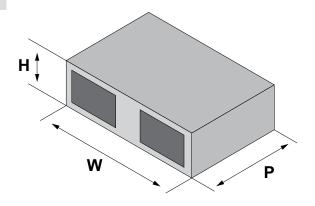
Dati Tecnici

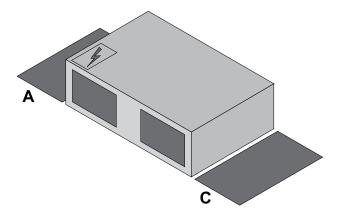
	Grandezze		290	550	1000	1400	1900	2500	3200	4000
	Generali									
	Portata aria max	m³/h	290	550	1000	1400	1900	2500	3200	4000
(1)	Pressione statica utile	Pa	40	65	90	140	120	110	170	170
(2)	Rendimento	%	52,3	54,6	53,4	52,1	51,8	57,6	56	55,6

⁽¹⁾ Max speed of 3 for models from 1000 to 3200 (single phase motor), for size 290, 550 and 4000 speed max of 2 (single phase motor for size 290 and 550, 3 phase motor for size 4000)

Dimensions and service spaces

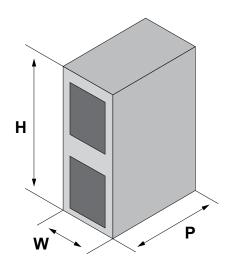
RC HD

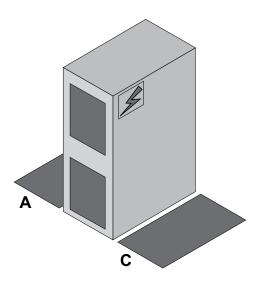




Size		290	550	1000	1400	1900	2500	3200	4000
Dimensions									
Width/W	mm	990	990	1150	1300	1450	1700	1700	1700
Depth/P	mm	750	750	860	900	900	1230	1230	1230
High/H	mm	270	270	385	410	470	490	530	630
Weight	Kg	39	41	68	91	99	140	155	179
Service areas									
A	mm				6	00			
С	mm				5	00			

RC VD





Size		290	550	1000	1400	1900	2500	3200	4000
Dimensions									
Width/W	mm	270	270	385	410	470	490	530	630
Depth/P	mm	750	750	860	900	900	1230	1230	1230
High/H	mm	990	990	1150	1300	1450	1700	1700	1700
Weight	Kg	39	41	68	91	99	140	155	179
Service areas									
A	mm				6	00			
С	mm				5	00			

⁽²⁾ Temperature: exhaust air 20 $^{\circ}$ C and air renewal -5 $^{\circ}$ C, nominal air flow

Series RHRAER

High efficiency heat recovery



Identity

Efficiency 70% Double panels

Countercurrent cross flows double-exchange surface Horizontal ducted installation

Certifications



Plus







Description

The heat recovery units in the series RHRAER are able to realize cost savings higher, recovering up to 80% of the heat content of exhaust air, which would otherwise be wasted during the expulsion.

This is possible by using a special air-to-air high surface exchanger. These units may be integrated with traditional heating and cooling systems (such as fan-coils, water heaters, etc.) and can operate both in summer and winter seasons; besides, they are particularly suitable for false ceiling installation and may be appropriately ducted allowing air supply and air suction directly in the room in many different orientations.

Plus

QUALITY POINTS

Fully removable panels (sandwich type). Acoustic and thermal panel insulation 20 mm thickness. The panels are fixed to the frame by steel screws.

High efficiency crossflow heat recovery, alluminium heat exchanger plates.

HEALTH

Air filters are synthetic cell cleanable type G4 class efficiency, removable from lower or side panels; as an option, F6-F7-F8 soft bag filter after the G4 prefilter.

FLEX

For each size there are four possible orientations of the recovery depends on the configuration of the network and the available space.



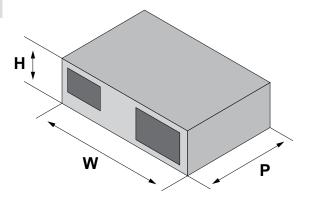
Size		14	19	30	50
Aeraulic data					
Nominal air flow/h	m3/h	1000	1600	2900	3900
Nominal air flow/I	m3/h	900	1400	2500	-
Nominal air flow/m	m3/h	800	1000	1850	3000
External static pressure - max	Pa	170	100		10
External static pressure - med	Pa	176	94	73	-
External static pressure - min Sound level	Pa	139	95	68	190
Sound pressure - max	dB(A)	54.8	57.4	58.7	60.4
Sound pressure - med	dB(A)	56.3	55.4	54.5	_
Sound pressure - min	dB(A)	47.7	48.4	51.2	58.4
Fan					
Fans	n°			2	
Motor power	W	3	350	550	1500
Maximum running current	A	5.8	6	11.4	11.2
Fan speeds	n°		3		2
Pole	n°			4	
Protection degree	IP			20	
Temperature class	"			F	
General Power supply	V/Ph/Hz		230/1/50		400/3/50
Performance					
Recovery efficiency - max	%	74.2	72	76.2	77.2
Recovery efficiency - med	%	75.4	73.6	77.9	-
Recovery efficiency - min	%	76.8	77.5	81.2	80.1
Saved power - max	kW	6.8	10.5	20.2	27.5
Saved power - med	kW	6.2	9.4	17.8	-
Saved power - min	kW	5.6	7.1	13.7	21.9
Supply air temperature - max	°C	13.6	13	14.1	14.3
		10.0	70.4	7.4.5	
Supply air temperature - med Supply air temperature - min Post-heating water coil	°C	13.8 14.2	13.4 14.4	14.5 15.3	15
Heating capacity (max speed)	kW	11.6	16.5	29.8	36.1
Supply air temperature	°C	47.3	43.4	43.3	40.3
Air side pressure drop	Pa	32	60	70	64
		32		3	04
Coil rows	n°	1.7			7.4
Water side pressure drop	kPa	17	12	20	14
Water flow Post-heating electric heater	m3/h	1.02	1.45	2.62	3.18
Heating capacity	kW	6	9	12	18
Air side Δt (at max fan speed)	°C	17.7	16.6	12.2	14
Power supply	V/Ph/Hz		400/	/3/50	
Air side pressure drop Water cooling coil external section	Pa n saf	4	8		9
Total cooling capacity (max speed)	kW	7.8	11.7	22.6	26.7
Supply air temperature		16.4	17.1	16.5	17.6
Air side pressure drop	Pa	45	72	79	50
Coil rows	n°			3	
Water side pressure drop	kPa	9	12	33	25
High efficiency filter (at max fan sp	eea)				
F6 compact filter - fc6 pressure drop	Ра	23	33	35	34
F6 bag filter - ft6 pressure drop	Pa	97	133	155	134
F7 bag filter - ft7 pressure drop	Pa	114	155	179	156
F8 bag filter - ft8 pressure drop	Pa	142	187	218	190
Round adapter for circular duct to	200		•		
Round adapter for circular duch					

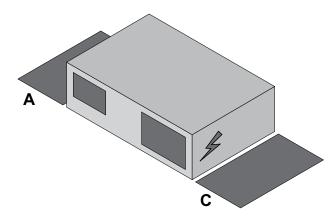
⁽¹⁾ Sound pressure values measured at 1 meter.

⁽²⁾ At the following conditions: room air temperature 20°C db 50% RH; fresh air temperature -5°C.

⁽³⁾ Inlet air temperature 13°C; inlet-outlet water temperature 70-60°C

⁽⁴⁾ Intake air temperature 29°C DB 60% RH; inlet-outlet water temperature 7-12°C





Size		14	19	30	50			
Dimensions								
Width/W	mm	90	00	1230	1350			
Depth/P	mm	2000	2150	25	80			
High/H	mm	410	470	530	705			
Operating weight	Kg	131	147	212	213			
Service areas								
А	mm	600						
С	mm		500					

Series RFMAER

Heat recovery unit with built-in heat pump system.



Identity

Heat pump R407c Double panels Static with cross air flow Horizontal ducted installation

Versions

T: 100% outside air version

P: 50% outside air and 50% recirculated air

Certifications













Description

The new stand-alone RFMAER units are dedicated to the refilling of room air and its thermal treatment.

They have been designed and developed in order to reconcile different requirements typical of applications both residential and commercial.



CONTROL PANEL

Plus

ENERGY SAVING

Heat pump refrigeration circuit totally self-managed by a microprocessor control that allows the neutralization of the thermal loads associated to the fresh air, in particular, the presence of heat recovery and enhances the thermal performance of the refrigerating circuit, giving very high efficiencies at 'units and allowing, therefore, very interesting economic conveniences

The neutralisation of room heat loads, specially for P version, where the surplus power left over the renewal air heat loads is particularly high.

QUALITY POINTS

Fully removable panels (sandwich type). Acoustic and thermal panel insulation 20 mm thickness. The panels are fixed to the frame by steel screws.

High efficiency crossflow heat recovery, stainless steel drain tray, heat insulated.

Technical area outside the air flow to allow service operations with ease

FIFX

For each size there are four possible orientations of the recovery depends on the configuration of the network and the available space.

HEALTH

G4 efficiency class synthetic cell filters

CONTROL

Depending on the value of set point, ambient and outdoor temperatures, the electronic control automatically decides the mode of operation of the unit. The possible modes are as follows: HEATING (electric heater when the feature is present) and FAN and COOLING

Size		14	19	25	30	40
Performance						
Air flow	m³/h	900	1400	2000	2600	3300
Outside airflow rate - T version (100%)	m³/h	900	1400	2000	2600	3300
Outside airflow rate - P version (50%)	m³/h	450	700	1000	1300	1650
External static pressure - outlet	Pa	210	190	175	170	180
External static pressure - inlet	Pa	170	140	125	1	10
Sound pressure	dB(A)	55	53	56	59	60
Fans	0.2 (0.1)					
Motor power	W	2 x 4	120	2 x 550	2 x 600	2 x 750
Maximum running current	А	7.:	2	9.2	13.2	6.2
Pole	n°			4	1012	0.2
Protection degree	IP			55		
Temperature class				F		
Power supply Compressors	V/Ph/Hz		230	0/1/50		400/3/50
Nominal power input	W	1900	2500	3500	4400	5100
Nominal running current	A	12	5.4	7	8	10
Power supply	V/Ph/Hz	230/1/50		400/	3/50	
Saved power						
Heating recovery - T version	W	4040	6100	9600	12110	15600
Heating recovery - P version	W	1990	2920	4460	5640	7180
Cooling recovery - T version	W	900	1360	2130	2700	3400
Cooling recovery - P version Installed cooling power	W	420	570	1000	1300	1590
Evaporator power	W	5260	8100	11200	14800	19220
Total power - T version	W	6160	9460	13330	17500	22620
Total power - P version	W	5680	8670	12200	16100	20810
Surplus power - T version	W	1710	2620	3670	4860	6280
Surplus power - P version	W	2530	3900	5450	7160	9310
Supply air temperature -T/P version Installed heating power		2000	0700	1	7.00	70.0
Condenser power - T version	W	5030	7720	11100	14400	18700
Condenser power - P version	W	4350	6590	9500	12200	15960
Total power - T version	W	9070	13820	20700	26510	34300
Total power - P version	W	6340	9510	13960	17840	23140
Surplus power - T version	W	1420	1920	3670	4410	6290
Surplus power - P version	W	2570	3570	5450	6810	9090
Min supply air temperature -T/P version	°C	24,6	24,0	25,4	25,0	256
Max supply air temperature - T/P version Additional electric heater res	°C	28,4	27,5	28,0	27,7	28,1
Heating capacity						
Air At	kW	2.			5	7
Running current	°C	8.2	5.3	7.4	5.7	6.2
O .	A	3.0	6	7	.2	10.1
Power supply	V/Ph/Hz			400/3/50		
Air side pressure drop High efficiency filter (at nominal a	irflow rate)	5	9	6	9	7
Fk6 pressure drop	Pa	40	65	55	70	75

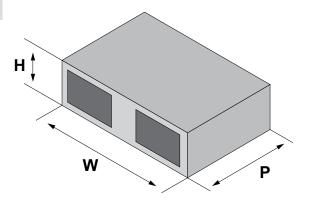
Sound pressure values measured at 1 meter.

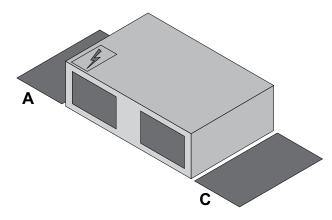
- (1) Winter air conditions: outside -5°C, room 20°C; summer air conditions: outside 32°C db 50% RH, room 26°C db 50% RH.
- (2) Freon temperature: evaporating 5°C , condensating 45°C .

(3)

Note: For proper operation of the units must be respected the following parameters:

- The nominal air flow required can increase by up to 10%
- In the winter mode Minimum Operating temperature operation can not be less than -5 ° C. For lower temperatures is required to use additional electric heaters. The new limit should be calculated case by case basis.





Size		14	19	25	30	40	
Dimensions	Dimensions						
Width/W	mm	123	30	1560			
Depth/P	mm 1450 1700						
High/H	mm	47	0	,	630		
Operating weigh	t Kg	212	225	247	258	279	
Service areas							
Α	mm	600					
С	mm		500				

Series VESTA Vertical

Isothermal dehumidifier with pre- and post-treatment water coil 260 m3/h



Identity

Vertical installation Suitable for radiant air conditioning Centrifugal fan R 134a

Versions

VESTA 80 V Vertical dehumidifier for exposed recessed installation VESTA 80 VD Vertical dehumidifier for ducted installation VESTA 80 VI Isotherm with possibility of integration for recessed installation in sight

Certifications



Plus









Descrizione

VESTA dehumidifiers are utilised for summer dehumidification of rooms with radiant panel cooling systems.

VESTA is designed and built exclusively for indoor use and delivers air at neutral temperature with respect to the room air.

This characteristic is assured by the presence in the unit of a post-cooling coil through which water from the radiant panels system is circulated.

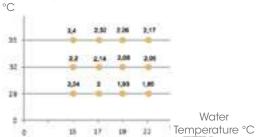
VESTA VI allows the cooling integration and dehumidification by means a supplementary plate exchanger; the setting are selectable by the end-user and automatically managed by an electronic device.

VESTA is controlled by the regulation and control system, also when several units are installed in parallel.

HIGH PERFORMANCE

Double cooling capacity available in comparison to the medium offer of similar units on the market

Air Temperature



Total cooling capacity in Kw 80VI Cooling Integration model

CONTROL PANEL

"Evolution" electronic hygrostat with variable hygrometric curve to optimize operation of the dehumidifier for Comfort pourpose EBE accessory microprocessor "advanced" for the intelligent management and efficient unit in order to ensure maximum energy saving, low noise and long life of the compressor.

COOLING INTEGRATION

The VI version is studied mostly for radiant installations in concomitance of very "fast" thermo-higrometric changements in the environmental or in the "start up" of the cooling system. But it's performances can allow itself to be used also like basic terminal unit of comfortable cooling and dehumidification in the room. Comparing them to the competitor's ones presents in the market that are working only in cooling integration and simultaneously dehumidification, Vesta VI can work also in lonely dehumidification, and it's perfectly combined to our climatic curve hygrostat control so to guarantee the comfort in all the conditions and not to make cooling when this is not requested.

Plus

QUALITY POINTS

Outer casing available in wood or metal version

Panel front cover made of wood or metal to fit into any living environment

Pre and post-treatment water coil

Centrifugal fan with 6-speed built-in motor to adjust the best operation to different working conditions.

EASY SERVICE

Air filter easy to remove with the front panel

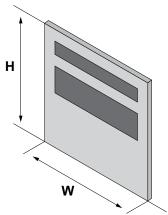
Size		Vesta 80V Vesta 80VD	Vesta 80VI			
Termotechnical data						
Approximate treatable volume	m³	200/250				
Human occupancy	n°	7				
Dehumidifing performances						
Nominal condensing capacity	I/h	0.8				
Nominal total water flow rate to pre and post-treatment coils (coils connected in parallel)	I/h	175	210			
Nominal total cooling capacity absorbed by the air pre and post-treatment coils	W	830				
Δp pre and post-treatment coils	kPa	7				
Max integration cooling capacity General	kW		2,4			
Power supply	(V/ph/ Hz)	230/1/50				
Nominal running current	A	1.8				
Maximum running current	А	2.6				
Nominal power input	W	360				
Maximum power input	W	400				
Electrical box protection rating		IP44				
R134a refrigerant charge	g	285	300			
Pre and post-treatment coils hydraulic connections	n°	2				
Pre and post-treatment coils hydraulic connections	W	3/8				
Pre and post-treatment coils hydraulic connections	Туре	GAS FEMALE				
Total sound pressure in open field at 1m distance	dB(A)	36.6				
Fan						
Centrifugal fan setting speed	n°	6				
Internal width of fan outlet port	mm	260				
Internal hight of fan outlet port	mm	100				
Nominal air flow m3/h Working field		260				
Pre-/post-treatment coils water temperature	°C	12 ÷ 25	15 ÷ 25			
Intake air db temperature	°C	15 ÷ 35	20 ÷ 37			
Relative humidity	%	45 ÷ 85				

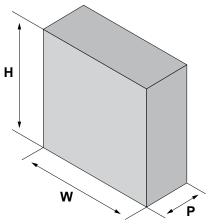
⁽¹⁾ Value that depends on the level of metabolic activity and the average radiant temperature in the room.

⁽²⁾ Nominal airflow; intake air 25°C ÷ 65%; nominal water flow rate; pre- and post treatment coils water inlet temperature: 15 °C. (20°C for VI models)

⁽³⁾ In the case of very warm rooms and surroundings with high relative humidity (swimming pools, spa baths, etc.) consult us and provide details of the place of installation.

⁽⁴⁾ Water temperature 15 °C, ambient air temperature 35°C





Size		Vesta 80V	Vesta 80VD	Vesta 80VI
Dimensions				
Weight	Kg		36	
Width/W	mm		729	
Depth/P	mm		212	
High/H	mm		705	
Outer casing width/W	mm		740	
Outer casing depth/P	mm		230	
Outer casing High/H	mm		750	
Wood front panel width/W	mm		800	
Wood front panel High/H	mm		800	
Metal front panel width/W	mm		760	
Metal front panel High/H	mm		770	

Series VESTA Horizontal

Isothermal dehumidifier with pre- and post-treatment water coil 260 m³/h



Identity

Horizontal ducted installation Suitable for radiant air conditioning Centrifugal fan R134a

Versions

VESTA 80 H Horizontal dehumidifier for ducted installation VESTA 80 HM Horizontal Dehumidifier with separate supply of pre-/post-treatment coils

VESTA 80 H - HP Horizontal dehumidifier for medium static pressure (50 Pa) ducted installation

VESTA 80 HI Isothermal with the possibility of integration for ducted installation.

VESTA 80 HI-HP Isothermal with the possibility of integration for ducted installation with medium static pressure (50 Pa).

Certifications













Description

VESTA dehumidifiers are utilised for summer dehumidification of rooms with radiant panel cooling systems.

VESTA is designed and built exclusively for indoor use and delivers air at neutral temperature with respect to the room air.

This characteristic is assured by the presence in the unit of a post-cooling coil through which water from the radiant panels system is circulated.

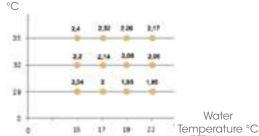
VESTA is controlled by the regulation and control system, also when several units are installed in parallel.

Optimal installation for all types of system is guaranteed by a range of optional accessories.

HIGH PERFORMANCE

Double cooling capacity available in comparison to the medium offer of similar units on the market

Air Temperature



Total cooling capacity in Kw 80VI Cooling Integration model

Plus "Evolution" ele

QUALITY POINTS

Centrifugal fan with 6-speed built-in motor to adjust the best operation to different working conditions.

HM version with separate pre-/post-treatment coils supply

EASY SERVICE

Easy removable filter with the frontal panel

FLEX

The HP versions with 50 pascal fan motor can guarantee higher flexibility to the installation needs; it allow to the unit to be installed ducted in technical under-ceilings far from bedroom rooms.

CONTROL PANEL

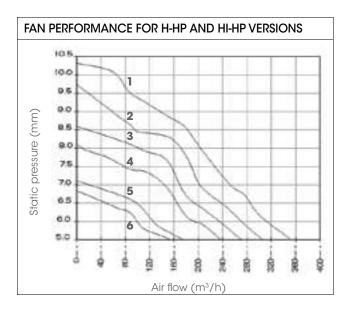
"Evolution" electronic hygrostat with variable hygrometric curve to optimize operation of the dehumidifier in accordance to the comfort. Versions H-HM: EBE device with microprocessor represent an "advanced" solution for the intelligent and efficient management of the unit in order to ensure the maximum energy saving, the noiseless and the long term life of the compressor.

COOLING INTEGRATION

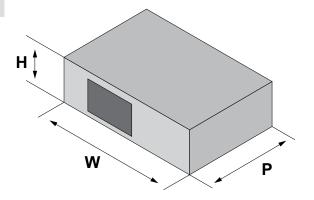
The version of HI has been studied mainly for radiant installations with changes of temperature-humidity conditions very ""sudden"" or ""start-up phases of the system."" Unlike some units in the market that only work in integration and dehumidification, HI Vesta can also work in single isothermal dehumidification, and perfectly matched to our humidistat to the temperature curve to ensure comfort in all conditions and when not to integrate there is a need.

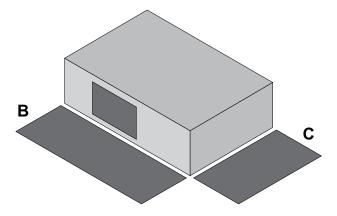
	Size		Vesta 80H	Vesta 80HM	Vesta 80H-HP	VESTA 80 HI	VESTA 80 HI-HP
	Termotechnical data						
	Approximate treatable volume	m³			200/250		
(1)	Human occupancy	n°			7		
` '	Dehumidifing performances						
(2)	Nominal condensing capacity	I/h			0.8		
	Nominal total water flow rate to pre and post-treatment coils (coils connected in parallel)	l/h		175			210
	Nominal total cooling capacity absorbed by the air pre and post-treatment coils	W			830		
	Δp pre and post-treatment coils	kPa			7		
(5)	Max integration cooling capacity General	kW			2,4		
	Power supply	(V/ph/ Hz)			230/1/50		
(2)	Nominal running current	Α			1.9		
	Maximum running current	Α			2.6		
(2)	Nominal power input	W			370		
	Maximum power input	W			400		
	Electrical box protection rating				IP44		
	R134a refrigerant charge	g		285			300
	Pre and post-treatment coils hydraulic connections	n°	2	4	2	2	2
	Pre and post-treatment coils hydraulic connections	W			1/2		
	Pre and post-treatment coils hydraulic connections	type			GAS FEMALE		
	Total sound pressure in open field at 1m distance	dB(A)			39.5		
	Fan						
	Centrifugal fan setting speed	n°			6		
	Internal width of fan outlet port	mm			260		
	Internal hight of fan outlet port	mm			100		
	Nominal air flow	m3/h			260		
	High static pressure	Pa		0		50	
	Working field						
(3)	Pre-/post-treatment coils water temperature	°C		12 ÷ 25			5 ÷ 25
(3)	Intake air db temperature	°C		15 ÷ 35			0 ÷ 37
(3)	Relative humidity	%		45 ÷ 85		4	5 ÷ 85

- (1) Value that depends on the level of metabolic activity and the average radiant temperature in the room.
- (2) Nominal airflow; intake air 25°C ÷ 65%; nominal water flow rate; pre- and post treatment coils water inlet temperature: 15 °C.
- (3) In the case of very warm rooms and surroundings with high relative humidity (swimming pools, spa baths, etc.) consult us and provide details of the place of installation.
- (4) The HP versions are required to be ducted with the air side pressure drop of 50 Pa.
- (5) Water temperature 15 $^{\circ}$ C, outdoor temperature 35 $^{\circ}$ C



Note: the std cabled curve of the fan is the 2nd. On demand it is possible to have a different cabling of the fan among tyhe ones indicated on the graph





Grandezze		Vesta 80H	Vesta 80HM	Vesta 80H-HP	VESTA 80 HI	VESTA 80 HI-HP
Dimensions						
Weight	Kg			39		
Width/W	mm			800		
Depth/P	mm			634		
High/H	mm			250		
Service areas						
В	mm			600		
С	mm			600		

Series VESTA Horizontal

Isothermal dehumidifier with pre- and post-treatment water coil 450-900 m3/h



Identity

Horizontal ducted installation Suitable for radiant air conditioning Isothermal (neutral air) Centrifugal fan R134a

Versions

VESTA 110 - 240 Horizontal for ducted installation

Certifications











Description

The VESTA 110 / 240 is a ductable unit designed and built for dehumidification and fresh air intake in rooms cooled by means of radiant panels.

The unit also provides the facility for fresh air intake during winter mode operation of the system.

The unit can be operated also in complete or partial recirculation mode.

These latter two installation modes are useful during summer operation in rooms in which high levels of air exchange are required and in conditions of very high ambient air absolute humidity levels. The energy recovery unit, which is available as an accessory, makes for significant energy savings and a consequent increase in unit efficiency in the case of operation entirely with external ambient air. VESTA 110 / 240 was designed primarily for medium/large size homes, public premises and retail units generally with occupancy levels of 12÷20 persons per unit.

Plus

QUALITY POINTS

Centrifugal fan with 3-speed built-in motor to adjust the best operation to different working conditions.

Pre and post-treatment coils with different hydraulic connections Return air plenum and air renewal and recovery module in combination

CONTROL PANEL

"Evolution" electronic hygrostat with variable hygrometric curve to optimize operation of the dehumidifier for Comfort pourpose EBE accessory microprocessor "advanced" for the intelligent management and efficient unit in order to ensure maximum energy saving, low noise and long life of the compressor.

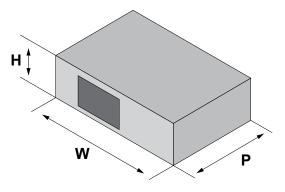
EASY SERVICE

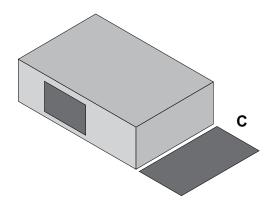
Air filter efficiency G3 corrugated acrylic



Size		Vesta 110	Vesta 240						
Termotechnical data									
Human occupancy	n°	15	25						
Power supply	(V/ph/ Hz)	230	0/1/50						
Maximum running current	А	4.4	7.5						
	W		1100						
Ü	g		1200						
External fuse	Α	10	12						
Pre and post-treatment coils hydraulic connections	n°		4						
Pre and post-treatment coils hydraulic connections	W.		1/2						
Pre and post-treatment coils hydraulic connections	tyoe	GAS	FEMALE						
Total sound pressure in open field at 1m distance	dB(A)	67.6	68.3						
Fan									
Main fan fuse	А		2.5						
Centrifugal fan setting speed	n°		3						
Nominal air flow	m³/h	450	900						
Max available pressure	Pa	200	145						
Dehumidifing performances									
Dehumidification capacity	I/h	1.25	2.4						
Power input	W		920						
Running current	А	2.5	5.2						
Nominal water flow rate to pre- treatment coils	l/h	120	200						
Water coil pressure drop at 200 I/h	kPa	6	-						
Water coil pressure drop at 300 l/h	kPa	-	11						
Working field									
Pre-/post-treatment coils water temperature	°C	12	2 ÷ 22						
Intake air db temperature	°C	10	10 ÷ 50						
Relative humidity	%	20	O ÷ 90						
	Termotechnical data Human occupancy General Power supply Maximum running current Maximum power input R134a refrigerant charge External fuse Pre and post-treatment coils hydraulic connections Pre and post-treatment coils hydraulic connections Pre and post-treatment coils hydraulic connections Total sound pressure in open field at 1 m distance Fan Main fan fuse Centrifugal fan setting speed Nominal air flow Max available pressure Dehumidifing performances Dehumidifing performances Dehumidifing performances Dehumidifing tour rent Nominal water flow rate to pre- treatment coils Water coil pressure drop at 200 I/h Water coil pressure drop at 300 I/h Working field Pre-/post-treatment coils water temperature Intake air db temperature	Termotechnical data Human occupancy General Power supply Maximum running current A Maximum power input R134a refrigerant charge External fuse A Pre and post-treatment coils hydraulic connections Total sound pressure in open field at 1 m distance Fan Main fan fuse A Centrifugal fan setting speed Nominal air flow Max available pressure Dehumidifing performances Dehumidifing performances Dehumidifing performances Dehumidifing tourent Nominal water flow rate to pretreatment coils Water coil pressure drop at 200 I/h Water coil pressure drop at 300 I/h Waa Working field Pre-/post-treatment coils water temperature Intake air db temperature C (V/ph/ Hz) (V/ph/ Hz) (V/ph/ Hz) Wariman occupancy Ramina purent A Nominal water flow rate to pretreatment coils Water coil pressure drop at 300 I/h Ramina purent Ramina pure	Termotechnical data Human occupancy General Power supply Maximum running current A A A4.4 Maximum power input W 570 R134a refrigerant charge g External fuse A Pre and post-treatment coils hydraulic connections Pre and post-treatment coils hydraulic connections Pre and post-treatment coils hydraulic connections Pre and post-treatment coils hydraulic connections Total sound pressure in open field at 1 m distance Fan Main fan fuse A Centrifugal fan setting speed Nominal air flow Max available pressure Pa Dehumidification capacity I/h Running current A 2.5 Nominal water flow rate to pre- treatment coils Water coil pressure drop at 200 I/h Water coil pressure drop at 300 I/h Warder coil pressure drop at 300 I/h Warking field Pre-/post-treatment coils water temperature Intake air do temperature °C 10 130 15 230 15 4.4 4.4 4.4 4.4 4.4 4.4 4.4						

- (1) Value that depends on the level of metabolic activity and the average radiant temperature in the room.
- (2) A flow control valve is supplied for fitting to the pre-treatment coil. The connections are 1/2" male (see section "Flow control valve connection")
- (3) According to fan speed
- (4) At the following conditions, typical of operation with recovery exchanger or in partial recirculation mode: Unit inlet air: 29°C-60% RH. Pre- and post-treatment coils water inlet temperature: 15°C
- (5) In the case of very warm rooms and surroundings with high relative humidity (swimming pools, spa baths, etc.) consult us and provide details of the place of installation.

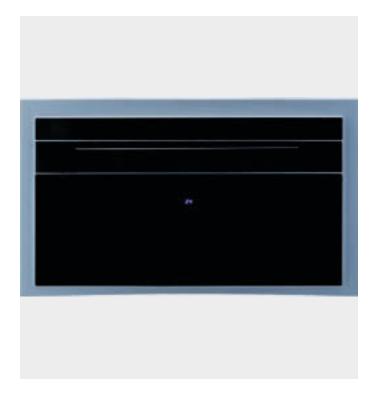




Size		Vesta 110	Vesta 240
Dimensions			
Weight	Kg	72	95
Width/W	mm	655	805
Depth/P	mm	}	375
High/H	mm	4	405
Service areas			
С	mm	7	700

Series ASSOLO

Heat pump split without external motocondenser



Identity

Heat pump Without external motocondenser R410a

Certifications



Plus









Description

Assolo was designed and implemented to respond to the needs and expectations of the modern consumer.

It is a versatile conditioning system as it has no external unit, it is extremely silent and easy to install.

Assolo is a high performance product that guarantees your daily well-being.

Plus

CONTROL PANEL

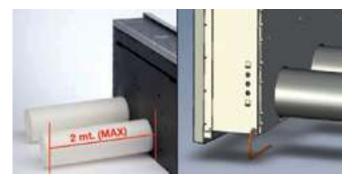
Assolo has an avant-garde programming system (with remote control), thanks to the evolved electronics board and controlled battery defrosting with Fuzzy logic.

QUALITY POINTS

Assolo is one of the most compact conditioning units on the market; it is only 23 cm thick. The polycarbonate panels give the product a modern and essential look, in line with contemporary design.

Assolo is fitted with an air exchanger (50 m³/h approx. for an average room).

A patented double condensation exhaust system removes water without the use of pumps so that no water discharge piping needs to be connected in cooling mode.



SILENT

Assolo is among the best of its kind in terms of eco-saving. It guarantees top performance for its class: high energy efficiency for cooling and heating.

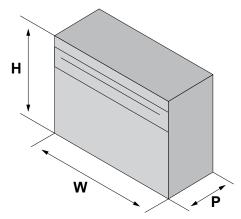
FLEX

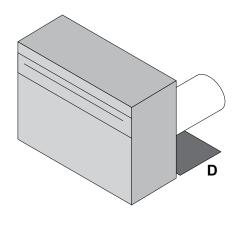
Assolo is ideal for wall or floor installation, depending on the users style and needs, even in the most difficult conditions: the system can be connected outside with up to 2 m ducting (optional).



	Size		ASSOLO
	Cooling performances		
(1)	Nominal capacity	Watt	2464
(1)	Power input	Watt	1060
	E.e.r.		2.53
	Heating performances		
(2)	Nominal capacity	Watt	2751
(2)	Power input	Watt	950
	C.o.p.		2.9
	General		
	Room air flowrate	m3/h	400
	External air flowrate	m3/h	550
(3)	External air flowrate	m3/h	550
	Dehumidification capacity	I/h	1.1
	Fan speed	n°	3
	Refrigerant	type	R410a
	Main supply		220-240 V / 50Hz
	Energy class in cooling mode		В
	Energy class in heating mode		В
	Remote control		Yes
	Active and catalytic carbon filters		Optional
	Conditioning and heat pump		Yes
	Dehumidifying		Yes
	Ventilation and cleaning		Yes
	Autoswing		Yes
	Set and room temperature display		Yes
	Compressor type	type	Rotary
	Sound level		
(4) (5)	Sound pressure - min	dB(A)	41
	Sound pressure - max	dB(A)	47
	Sound power - min	dB(A)	50
	Sound power - max	dB(A)	57

- (1) Cooling rate test conditions (EN 14511) Indoor DB 27°C WB 19° Outdoor DB 35°C WB 24°
- (2) Heating rate test conditions (EN 14511) Indoor DB 20°C WB 15° Outdoor DB 7°C WB 6°
- (3) Flow rate with 2-pole motor
- (4) Noise pressure was measured at a distance of 1m from the unit.
- (5) Noise power was measured in compliance with ISO 23741/2 standard





Size		ASSOLO
Dimensions		
Width/W	mm	1000
Depth/P	mm	230
High/H	mm	580
Weight with packaging	Kg	45
Wall hole diameter	mm	162
Length of 2 pipes supplied as kit	mm	500
D (max)	mm	2000



General terms Please download the official conditions from the website www.aertesi.com, section "Download", Up to date price list"





Aertesi srl - Via del Commercio, 2/b - 35026 Conselve PD - Italy Tel. +39 049 9501109 - Fax +39 049 9500823 - www.aertesi.com - info@aertesi.com