

NATURALLY HOT WATER

OCHSNER HOT WATER HEAT PUMPS



OCHSNER
HEAT PUMPS

GREATEST VARIETY OF HOT WATER OPTIONS

Europa series hot water heat pumps are the ideal supplement to any heating system. Besides efficient and environmentally friendly DHW heating, these offer numerous additional benefits such as the cooling or ventilation of pantries and storage rooms and much more.



Efficient DHW heating, independent of your heating system

Hot water heat pumps make it possible. The perfect complement to heating heat pumps and boilers, they can be installed as an alternative to solar thermal systems or in combination with them.

The Europa series of hot water heat pumps offers the following key benefits:

- Highly efficient and durable
- Environmentally friendly DHW heating with air/exhaust air as the heat source
- European EHPA Quality Label
- Very quiet running
- Quick positioning and installation: simply connect the appliance to the power supply and hot and cold water pipework
- Smart, simple-to-operate control technology with touchscreen (depending on the model)
- DHW up to 65°C in heat pump mode
- Can be combined with PV systems
- Also suitable for refurbishment projects, to complement existing oil, gas or biomass boilers



Waste heat from your house

Hot water heat pumps generally use warm indoor air to heat and provide water.

Ambient air from the interior is transferred to a refrigerant inside the heat pump. This refrigerant is compressed by a compressor and then used for generating hot water via a heat exchanger. This way, energy efficient use can be made of waste heat, particularly from secondary rooms or storage spaces such as a boiler room, larder or a store room.



Generate DHW separately and turn off your heating system in summer

There are many situations in which it is a good idea to separate your central heating and DHW heating systems. One significant benefit is that the central heat generator can be switched off outside the heating season, which saves energy over the long term. The fact is that many heat generators are oversized when it comes to DHW heating outside the heating season. As an additional benefit, switching your heating system off during the summer months extends its service life.



Ideally suited to retrofitting

Due to their operating principle and their high efficiency, hot water heat pumps are suitable for new build as well as for retrofitting in detached and two-family houses. Separating the heating system from DHW heating as an energy saving measure can be achieved quickly and simply. Hot water heat pumps are also a worthwhile investment which will pay off over the long term, if you are looking to replace your old electrically heated DHW tank.



Refrigerants for every requirement

OCHSNER offers hot water heat pumps both with synthetic refrigerants (EUROPA series) and with the natural refrigerant R290 (EUROPA N series).



Europa 333 Genius: The flagship model among OCHSNER hot water heat pumps

The Europa 333 Genius is a hot water heat pump with a 300 litre tank volume, Modbus interface and adjustable auxiliary heating element. When hooked up to a building management system or inverter, this combination of components allows for optimised use of on-site PV power. Available surplus power up to an electric output of 2100 W can be used on an infinitely variable basis via the heat pump and controllable electric immersion heater, with the energy being stored in the DHW. Depending on the surplus power and storage capacity available, the heat pump is switched and the remainder is regulated via the electric immersion heater. This allows even very small amounts of solar energy to be converted into heat.

The combination of a heat pump and controllable booster heating element in one appliance makes this concept absolutely unique on the market.



Winner of the "Energy Genius" innovation award from the Austrian Federal Ministry of Sustainability and Tourism.

Effects on energy savings and energy efficiency:

Considering the DHW volume and heating from 15°C to 65°C, 17 kWh of energy can be saved with the Europa 333 Genius. EHPA Quality Label tests on the hot water heat pump performed at the heat pump test centre in Buchs (CH) according to EN16147 resulted in an impressive COP of 3.8. Even if the full output of the electric heating element is used in addition to the heat pump, the COP is still 1.98 when utilising the maximum available surplus PV power.

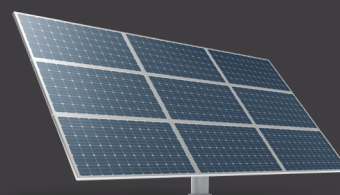
TIPTRONIC PLUS S CONTROLLER WITH TOUCHSCREEN

- DHW control with adjustable anti-legionella mode
- Ventilation function with integral speed control
- Real time clock (time programs for DHW, hygiene and ventilation modes)
- Heat pump operation with defrost function for use at air temperatures down to -10°C
- Solar control as standard for on-site solar thermal systems (can be configured on site) for Europa 333 Genius model



SMART GRID FUNCTION

Avail yourself of electricity from your own PV system as your preferred option for DHW heating. This is kind on your pocket and the environment, and reduces CO₂ emissions. You can also exploit the favourable tariffs we expect to see with the power grid of the future!



**SMART GRID
EUROPA 333 GENIUS,
EUROPA 300 L AND
EUROPA MINI IWP**



EUROPA 333 GENIUS

AIR/EXHAUST AIR HEAT PUMP

300 L
TANK

UP TO **5**
PEOPLE

DHW UP TO **65°**^{*}

For DHW heating, cooling of pantries and storage rooms, cellar dehumidification, ventilation

COMPACT APPLIANCE

- Smart grid ready
- PV self-consumption optimisation – infinitely variable from 0 to 2100 W
- Modbus interface
- With coil for external heat sources such as boilers and solar thermal systems
- Mains current anode
- Anti-legionella mode in heat pump operation
- Extremely straightforward commissioning
- Tiptronic Plus S controller with touchscreen



EUROPA 300 L

AIR/EXHAUST AIR HEAT PUMP

300 L
TANK

UP TO **5**
PEOPLE

DHW UP TO **65°**^{*}

For DHW heating, cooling of pantries and storage rooms, cellar dehumidification

COMPACT APPLIANCE

- Smart grid ready
- Fully wired / straightforward installation
- Integral electric immersion heater as standard
- DN150 air duct up to 20 m possible
- One integral sacrificial magnesium anode as standard
- Anti-legionella mode in heat pump operation
- Optimum heat yield
- Tiptronic Plus S controller with touchscreen



EUROPA 250 DK

AIR/EXHAUST AIR HEAT PUMP

250 L
TANK

UP TO **4**
PEOPLE

DHW UP TO **65°**^{*}

For DHW heating, cooling of pantries and storage rooms, cellar dehumidification

COMPACT APPLIANCE

- Fully wired / straightforward installation
- With sensor pocket for third party thermostat/sensor
- With coil for external heat sources such as boilers and solar thermal systems
- Integral electric immersion heater as standard
- DN150 air duct up to 20 m possible
- One integral sacrificial magnesium anode as standard
- Anti-legionella mode in heat pump operation
- Optimum heat yield
- Tiptronic Light controller

Application examples can be found on page 6 and at www.ochsner.com

^{*}In heat pump mode



EUROPA MINI

AIR/EXHAUST AIR HEAT PUMP

COMBINED WITH AN EXTERNAL TANK:

THE **ALL-ROUNDSOLUTION**
FOR SMALL DEMANDS TO COMMERCIAL APPLICATIONS

For DHW heating, cooling of pantries and storage rooms, cellar dehumidification; may be combined with existing pellet, solar thermal or conventional boiler systems

SPLIT APPLIANCE

- Fully wired / straightforward installation
- Compact footprint
- DN150 air duct up to 20 m possible
- Internal heat exchanger
- Tank charging via integral circulation pump
- Anti-legionella mode with the heat pump
- Can be combined with tanks up to 500 l
- Also suitable for DHW tanks greater than 500 l as a cascade solution

IWP SPLIT APPLIANCE

- Tiptronic Plus S controller with touchscreen
- Smart grid ready

IWPL SPLIT APPLIANCE

- Tiptronic Light controller



EUROPA N 300 R CA[#]

AIR/RECIRCULATION AIR HEAT PUMP

294 L
TANK

5
UP TO
PEOPLE

DHW UP TO
65°^{*}

for DHW heating, cooling and dehumidification in the installation room

COMPACT APPLIANCE

- Smart grid ready
- Fully wired / straightforward installation
- Integral electric immersion heater as standard
- With coil for external heat sources such as boilers and solar thermal systems
- Microchannel capacitor
- One integral sacrificial magnesium anode as standard
- Anti-legionella mode in heat pump operation
- Quick commissioning
- Operation via rotary knob or app



EUROPA N 200 CA[#]

AIR/RECIRCULATION AIR HEAT PUMP

200 L
TANK

4
UP TO
PEOPLE

DHW UP TO
65°^{*}

for DHW heating, cooling and dehumidification in the installation room

COMPACT APPLIANCE

- Smart grid ready
- Fully wired / straightforward installation
- Integral electric immersion heater as standard
- Microchannel capacitor
- One integral sacrificial magnesium anode as standard
- Anti-legionella mode in heat pump operation
- Quick commissioning
- Operation via rotary knob or app

[#] This hot water heat pump is filled with the natural but highly flammable refrigerant R290. Please observe the safety instructions and installation guidelines without fail. Alternatively, OCHSNER offers the EUROPA series with synthetic refrigerant and therefore much more flexible installation options.

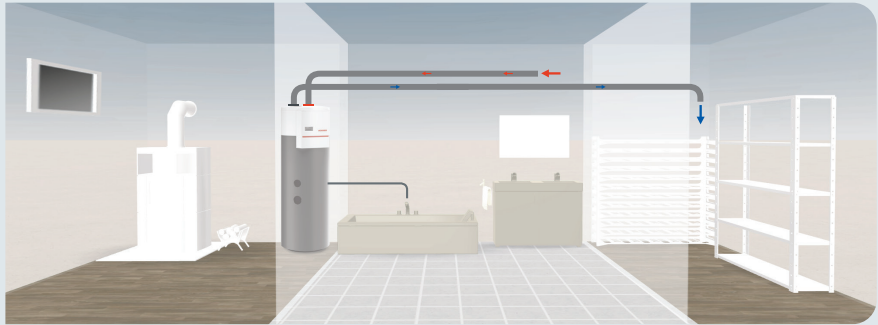
MORE THAN JUST DHW HEATING

EUROPA multifunctional appliances can also dry, cool and provide proper ventilation.

EXAMPLE A

Europa 250 DK, 333 Genius, 300 L and Mini IWP/IWPL models

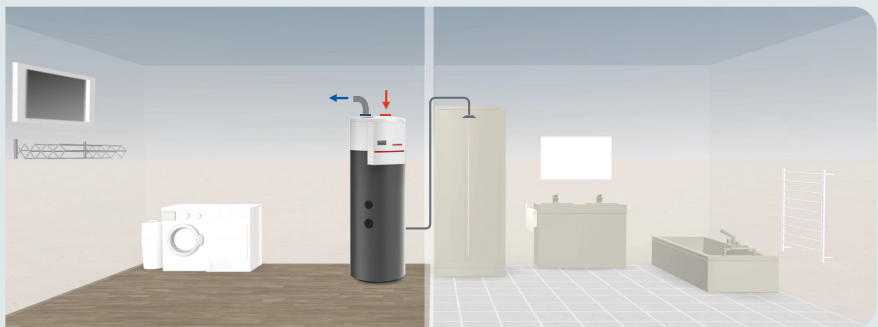
- Installation in a boiler room
- DHW heating using indoor air
- Additional benefit – cooling effect in a pantry/storage room or wine cellar



EXAMPLE B

Europa 250 DK, 333 Genius, 300 L and Mini IWP/IWPL models

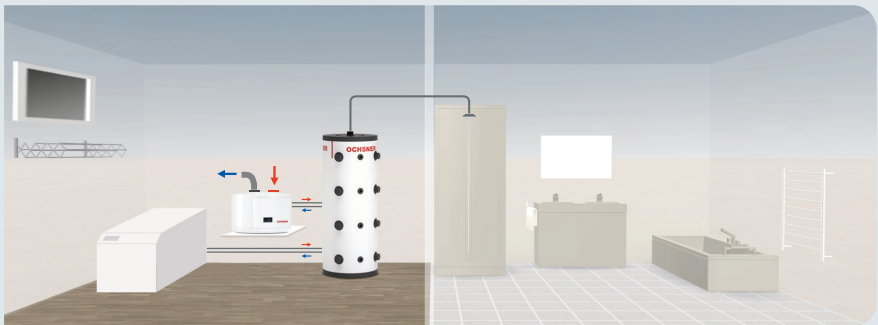
- Installation in a laundry room
- DHW heating using indoor air
- Additional benefit – laundry can be dried in the installation room



OTHER AREAS OF APPLICATION FOR THE OCHSNER EUROPA MINI IN COMBINATION WITH A HEATING SYSTEM

When used with an existing DHW tank of a conventional heating system, it only needs to operate during the heating season – saving energy and increasing its service life.

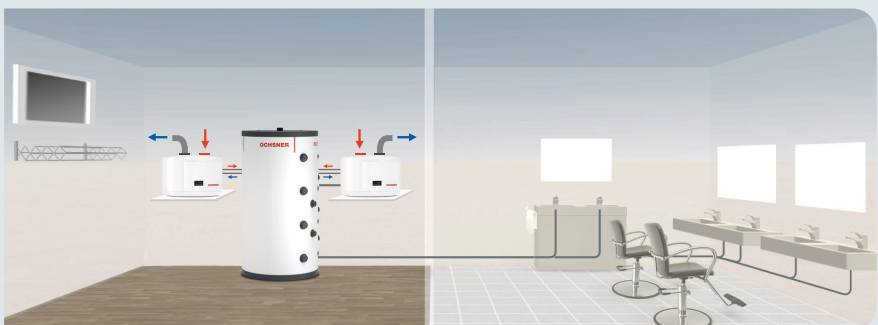
- Installation in a boiler room
- DHW heating using indoor air
- Additional benefit – laundry can be dried in the installation room



HIGH DEMAND FOR DHW

Two or more Europa Minis combined with an external DHW tank – for large volumes of hot water, for example in multi-occupancy residential buildings or commercial operations with a high demand for domestic hot water (such as hairdressers).

- Installation in a laundry or boiler room
- DHW heating using indoor air
- Additional benefit – laundry can be dried in the installation room



SPECIFICATION

EUROPA		333 GENIUS	300 L	250 DK	MINI IWP	MINI IWPL	N 300 R CA*	N 200 CA*
DIMENSIONS (ØxH)	[mm]	657 x 1838	657 x 1838	657 x 1625	657 x 432	657 x 432	650 x 1903	650 x 1478
WEIGHT	[kg]	124	101	109	45	45	127	98
COP to EN 16147		3.82	3.40	2.71	3.16	2.71	4.34	4.27
SCOP_w to VDI 4650-1: 2016		4.73	4.25	3.38	4.34	3.38	-	-
LOAD PROFILE		XL	XL	L	XL	XL	XL	L
SOUND PRESSURE LEVEL at 1 m distance	[dB(A)]	49	49	54	49	49	50	50
RATED VOLTAGE	[V]	220 - 240	220 - 240	220 - 240	220 - 240	220 - 240	220 - 240	220 - 240
OPERATING TEMPERATURE min./max. supply air*	[°C]	-10/+40	+6/+40	+6/+40	-10/+40	+6/+40	+6/+43	+6/+43
MAX. WATER TEMPERATURE	[°C]	65	65	65	60	60	65	65
ENERGY EFFICIENCY CLASS		A+	A+	A+	A+	A	A+	A+

*Installation room temperature at least +10 to +15°C (depending on operating mode)

The performance figures refer to data measured for heat pumps under standard conditions (heating output, COP), taking into account the specified tolerances. The energy efficiency, and therefore the running costs, of the system are the responsibility of the system installer. Heat pump heating systems must be installed in accordance with OCHSNER guidelines. No functional warranty for the heat pump can be provided for systems that are not installed in accordance with these guidelines. OCHSNER therefore recommends that the heat pumps are installed by trained OCHSNER system partners. Even if a system has been installed in accordance with OCHSNER guidelines, efficiency values may deviate from factory data, as the latter is based on measurements taken under standard conditions. User behaviour also plays a critical role.

* This hot water heat pump is filled with the natural but highly flammable refrigerant R290. Please observe the safety instructions and installation guidelines without fail. Alternatively, OCHSNER offers the EUROPA series with synthetic refrigerant and therefore much more flexible installation options.

OCHSNER

HEAT PUMPS

OCHSNER Wärmepumpen GmbH Austria (Commercial register)
Bockgasse 2a, 4021 Linz, Austria

Head Office/Factory

Ochsner-Strasse 1, 3350 Haag, Austria
OCHSNER hotline: +43 5 04245 – 8, kontakt@ochsner.com

OCHSNER Wärmepumpen GmbH Germany

Kurfürstendamm 11, 10719 Berlin, Germany

Berlin-Teltow Office

Rheinstrasse 11, 14513 Teltow, Germany
OCHSNER hotline: +49 30 8009314 – 8

OCHSNER Wärmepumpen GmbH Switzerland

Uraniastrasse 18, 8001 Zurich, Switzerland
OCHSNER hotline: +41 44 56100 – 08; kontakt@ochsner.com

OCHSNER Sp. z o.o.

ul. Pod Fortem 19, 31-302 Kraków, Poland
OCHSNER hotline: +48 662 107692, kontakt@ochsner.pl

Visit us at www.ochsner.com
and www.facebook.com/ochsnerwaermepumpen



CLIMATE GROUP
— Partner —
Unternehmen für
wirksamen Klimaschutz

OCHSNER and the WWF

As partners of the WWF CLIMATE GROUP, OCHSNER and other renowned companies are committed to effective climate protection. Together, we aim to bring climate-conscious thinking and action into the mainstream of politics, industry and society.