

	(heat p			requirements neat pump combination heaters)			
Model(s): AOWD-MB SMART-28K				, , , , , , , , , , , , , , , , , , , ,			
Air-to-water heat pump	Y			Low-temperature heat pump	N		
Water-to-water heat pump	N			Equipped with a supplementary heater	N		
Brine-to-water heat pump	N			Heat pump combination heater	Y		
Parameters declared for				Medium-temperature application			
Parameters declared for				Average climate condition			
Item	symbol	value	unit	Item	symbol	value	unit
Rated heat output (*)	Prated	7	kW	Seasonal space heating energy efficiency	ηs	127	%
Declared capacity for heating for part load at indoor temperature 20 °C and outdoor temperature Tj				Declared coefficient of performance or primary energy ratio for part load a indoor temperature 20 °C and outdoor temperature Tj			
Tj = − 7 °C	Pdh	6.20	kW	T. 7 %	CODI	2.22	
Degradation co-efficient (**)	Cdh	0.96	_	Tj = −7 °C	COPd	2.22	_
Tj = 2 ℃	Pdh	4.00	kW	Tj = 2 ℃	COPd	3.13	
Degradation co-efficient (**)	Cdh	0.96	-	1j-2 C	COru	3.13	
Tj = 7 ℃	Pdh	2.43	kW	- Tj = 7 ℃	COPd	4.26	_
Degradation co-efficient (**)	Cdh	0.96	-				
Tj = 12℃	Pdh	2.98	kW	T: _ 10°C	COPd	5.52	_
Degradation co-efficient (**)	Cdh	0.96	-	Tj = 12℃			
Tj = bivalent temperature	Pdh	6.20	kW	Tj = bivalent temperature	COPd	2.22	-
Tj = operation limit temperature	Pdh	4.34	kW	Tj = operation limit temperature	COPd	1.78	-
For air-to-water heat pumps: $Tj = -15^{\circ}C$ (if $TOL < -20^{\circ}C$)	Pdh	NA	kW	For air-to-water heat pumps: $Tj = -15^{\circ}\mathbb{C}$ (if $TOL < -20^{\circ}\mathbb{C}$)	COPd	NA	_
Bivalent temperature	Tbiv	-7	°C	For air-to-water heat pumps: Operation limit temperature	TOL	-10	℃
Cycling interval capacity for heating	Pcych	NA	kW	Cycling interval efficiency	COPcyc	NA	_
				Heating water operating limit temperature	WTOL	55	°C
Power consumption in modes other than active mode				Supplementary heater			
Off mode	P_{OFF}	0.018	kW	Rated heat output (*)	Psup	2.66	kW
Thermostat-off mode	P_{TO}	0.018	kW		ut Electric		
Standby mode	P_{SB}	0.018	kW	Type of energy input			
Crankcase heater mode	P_{CK}	0.000	kW				
Other	items						
Capacity control		variable		For air-to-water heat pumps: Rated air flow rate, outdoors	-	2600	m 3 /h
Sound power level, indoors/outdoors	L_{WA}	-/65	dB	For water- or brine-to-water heat pumps: Rated brine or water flow	– NA	m 3 /h	
Annual energy consumption	Q_{HE}	4423	kWh	rate, outdoor heat exchanger	- NA III 3/I		111 3 /11
For heat pump combination heater:(M	odel(s): AO	WD-MB SM	ART-28K +	WITD-AQUATANK MB-300			
Declared load profile		XL		Water heating energy efficiency	ηwh	106	%
Daily electricity consumption	Qelec	7.532	kWh	Daily fuel consumption	Qfuel	NA	kWh
Annual electricity consumption	AEC	1579	kWh	Annual fuel consumption	AFC	NA	GJ
Contact details: CL. Marques de Sentmenat, 97 08029 Barcelona				Name of the supplier: EUROFRED, S.A.			

^(*) For heat pump space heaters and heat pump combination heaters, the rated heat output Prated is equal to the design load for heating Pdesignh, and the rated heat output of a supplementary heater Psup is equal to the supplementary capacity for heating sup(Tj). (**) If Cdh is not determined by measurement then the default degradation coefficient is Cdh = 0,9.