

Models:	strong P H 20-190 / strong P HC 20-190
Air-to-water heat pump:	no
Water-to-water heat pump:	no
Brine-to-water heat pump:	yes
Application:	Low temperature (35 °C)
Equipped with supplementary heater:	no
Heat pump combination heater:	no

Parameter	Symbol	Value	Unit
Rated heat output	Prated	190	kW
Declared heating capacity for part load at inner temperature of 20 °C and outdoor temperature Tj			
Tj = − 7 °C	Pdh	168.1	kW
Tj = + 2 °C	Pdh	102.3	kW
Tj = + 7 °C	Pdh	65.8	kW
Tj = + 12 °C	Pdh	29.2	kW
Tj = bivalent temperature	Pdh	-	kW
Tj = limit temperature	Pdh	-	kW
Air-to-water heat pumps: Tj = − 15 °C (if TOL< − 20 °C)	Pdh	-	kW
Bivalent temperature	Tbiv	-10	°C
Cycling interval capacity for heating	Pcyc	-	kW
Degradation coefficient	Cdh	0.9	-
Power consumption in modes different than active mode			
Off mode	P _{OFF}	0.005	kW
Off by thermostat	P _{TO}	0.010	kW
Standby mode	P _{SB}	0.010	kW
Crankcase heater mode	P _{CK}	0.000	kW
Other parameters			
Capacity control	variable		
Sound power level (indoor/outdoor)	L _{WA}	68 / 0	dB
Annual energy consumption:	Q _{HE}	75232	kWh
For heat pump combination heater:			
Declared load profile	-		
Daily electricity consumption	Q _{elec}	-	kWh
Annual energy consumption	AEC	-	kWh

Parameter	Symbol	Value	Unit
Energy efficiency	η _s	204	%
Declared COP for part load at inner temperature of 20 °C and outdoor temperature Tj			
Tj = − 7 °C	COPd	4.7	-
Tj = + 2 °C	COPd	5.2	-
Tj = + 7 °C	COPd	5.5	-
Tj = + 12 °C	COPd	5.7	-
Tj = bivalent temperature	COPd	-	-
Tj = limit temperature	COPd	-	-
Air-to-water heat pumps: Tj = − 15 °C (if TOL< − 20 °C)	COPd	-	%
In air-to-water heat pumps: limit temperature	TOL	-	°C
Cycling interval COP	COP _{cyc}	-	%
Heating water operating limit	WTOL	65	°C
Supplementary heater			
Rated heat output	P _{TO}	-	kW
Type of energy input	-		
Air-to-water heat pumps: Nominal airflow	-	-	m³/h
Water-to-water and brine-to-water heat pumps: Nominal flow rates of water or brine in outdoor heat exchanger	-	32.7	m³/h
For heat pump combination heater:			
Water heating energy efficiency	η _{wh}	-	%
Daily fuel consumption	Q _{fuel}	-	kWh
Annual fuel consumption	AFC	-	GJ