

Information requirements (heat pump space heaters and heat pump combination heaters)							
Model(s): GRS-CQ8.0PdG/NhH3-E							
Air-to-water heat pump	Y			Low-temperature heat pump	N		
Water-to-water heat pump	N			Equipped with a supplementary heater	Y		
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	8	kW	Seasonal space heating energy efficiency	ηs	131	%
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 at indoor temperature 20 °C and outdoor temperature Tj			
Tj = - 7 °C	Pdh	6.89	kW	Tj = - 7 °C	COPd	2.33	-
Degradation co-efficient (**)	Cdh	0.99	-				
Tj = 2 °C	Pdh	4.66	kW	Tj = 2 °C	COPd	3.24	-
Degradation co-efficient (**)	Cdh	0.98	-				
Tj = 7 °C	Pdh	2.96	kW	Tj = 7 °C	COPd	4.18	-
Degradation co-efficient (**)	Cdh	0.97	-				
Tj = 12 °C	Pdh	3.21	kW	Tj = 12 °C	COPd	5.24	-
Degradation co-efficient (**)	Cdh	0.96	-				
Tj = bivalent temperature	Pdh	6.89	kW	Tj = bivalent temperature	COPd	2.33	-
Tj = operation limit temperature	Pdh	7.01	kW	Tj = operation limit temperature	COPd	2.07	-
For air-to-water heat pumps: Tj = - 15 °C (if TOL < - 20 °C)	Pdh	NA	kW	For air-to-water heat pumps: Tj = - 15 °C (if TOL < - 20 °C)	COPd	NA	-
Bivalent temperature	Tbiv	-7	°C	For air-to-water heat pumps: Operation limit temperature	TOL	-10	°C
Cycling interval capacity for heating	Ppsych	NA	kW	Cycling interval efficiency	COPcyc	NA	-
				Heating water operating limit temperature	WTOL	65	°C
Power consumption in modes other than active mode				Supplementary heater			
Off mode	P _{OFF}	0.025	kW	Rated heat output (*)	Psup	0.99	kW
Thermostat-off mode	P _{TO}	0.025	kW	Type of energy input	Electric		
Standby mode	P _{SB}	0.025	kW				
Crankcase heater mode	P _{CK}	0	kW				
Other items							
Capacity control	variable			For air-to-water heat pumps: Rated air flow rate, outdoors	-	4972	m ³ / h
Sound power level, outdoors	L _{WA}	64	dB	For water- or brine-to-water heat pumps: Rated brine or water flow rate, outdoor heat exchanger	-	NA	m ³ / h
Annual energy consumption	Q _{HE}	4799	kWh				
For heat pump combination heater:							
Declared load profile	L			Water heating energy efficiency	η _{wh}	123	%
Daily electricity consumption	Q _{elec}	3.985	kWh	Daily fuel consumption	Q _{fuel}	NA	kWh
Annual electricity consumption	AEC	831	kWh	Annual fuel consumption	AFC	NA	GJ
Contact details: West Jinji Rd, Qianshan, Zhuhai, Guangdong, China, 519070				Name of the supplier: GREE ELECTRIC APPLIANCES,INC. OF ZHUHAI			
(*) 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.							

Information requirements (heat pump space heaters and heat pump combination heaters)							
Model(s): GRS-CQ8.0PdG/NhH3-E							
Air-to-water heat pump	Y			Low-temperature heat pump	N		
Water-to-water heat pump	N			Equipped with a supplementary heater	Y		
Brine-to-water heat pump	N			Heat pump combination heater	Y		
Parameters declared for	Medium-temperature application						
Parameters declared for	Colder climate condition						
Item	symbol	value	unit	Item	symbol	value	unit
Rated heat output (*)	Prated	7	kW	Seasonal space heating energy efficiency	ηs	111	%
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 at indoor temperature 20 °C and outdoor temperature Tj			
Tj = - 7 °C	Pdh	4.28	kW	Tj = - 7 °C	COPd	2.40	-
Degradation co-efficient (**)	Cdh	0.99	-				
Tj = 2 °C	Pdh	2.69	kW	Tj = 2 °C	COPd	3.43	-
Degradation co-efficient (**)	Cdh	0.97	-				
Tj = 7 °C	Pdh	2.43	kW	Tj = 7 °C	COPd	4.94	-
Degradation co-efficient (**)	Cdh	0.95	-				
Tj = 12 °C	Pdh	3.26	kW	Tj = 12 °C	COPd	5.61	-
Degradation co-efficient (**)	Cdh	0.93	-				
Tj = bivalent temperature	Pdh	5.88	kW	Tj = bivalent temperature	COPd	1.65	-
Tj = operation limit temperature	Pdh	5.18	kW	Tj = operation limit temperature	COPd	1.23	-
For air-to-water heat pumps: Tj = - 15 °C (if TOL < - 20 °C)	Pdh	5.88	kW	For air-to-water heat pumps: Tj = - 15 °C (if TOL < - 20 °C)	COPd	1.65	-
Bivalent temperature	Tbiv	-15	°C	For air-to-water heat pumps: Operation limit temperature	TOL	-22	°C
Cycling interval capacity for heating	Ppsych	NA	kW	Cycling interval efficiency	COPcyc	NA	-
				Heating water operating limit temperature	WTOL	65	°C
Power consumption in modes other than active mode				Supplementary heater			
Off mode	P _{OFF}	0.025	kW	Rated heat output (*)	Psup	1.82	kW
Thermostat-off mode	P _{TO}	0.025	kW	Type of energy input	Electric		
Standby mode	P _{SB}	0.025	kW				
Crankcase heater mode	P _{CK}	0	kW				
Other items							
Capacity control	variable			For air-to-water heat pumps: Rated air flow rate, outdoors	-	4972	m ³ / h
Sound power level, outdoors	L _{WA}	64	dB	For water- or brine-to-water heat pumps: Rated brine or water flow rate, outdoor heat exchanger	-	NA	m ³ / h
Annual energy consumption	Q _{HE}	6190	kWh				
For heat pump combination heater:							
Declared load profile	L			Water heating energy efficiency	η _{wh}	94	%
Daily electricity consumption	Q _{elec}	5.175	kWh	Daily fuel consumption	Q _{fuel}	NA	kWh
Annual electricity consumption	AEC	1090	kWh	Annual fuel consumption	AFC	NA	GJ
Contact details: West Jinji Rd, Qianshan, Zhuhai, Guangdong, China, 519070				Name of the supplier: GREE ELECTRIC APPLIANCES,INC. OF ZHUHAI			
(*) 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.							

Information requirements (heat pump space heaters and heat pump combination heaters)							
Model(s): GRS-CQ8.0PdG/NhH3-E							
Air-to-water heat pump	Y			Low-temperature heat pump	N		
Water-to-water heat pump	N			Equipped with a supplementary heater	Y		
Brine-to-water heat pump	N			Heat pump combination heater	Y		
Parameters declared for	Medium-temperature application						
Parameters declared for	Warmer climate condition						
Item	symbol	value	unit	Item	symbol	value	unit
Rated heat output (*)	Prated	9	kW	Seasonal space heating energy efficiency	ηs	162	%
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 at indoor temperature 20 °C and outdoor temperature Tj			
Tj = − 7 °C	Pdh	NA	kW	Tj = − 7 °C	COPd	NA	−
Degradation co-efficient (**)	Cdh	NA	−				
Tj = 2 °C	Pdh	9.01	kW	Tj = 2 °C	COPd	2.51	−
Degradation co-efficient (**)	Cdh	0.99	−				
Tj = 7 °C	Pdh	5.29	kW	Tj = 7 °C	COPd	3.58	−
Degradation co-efficient (**)	Cdh	0.98	−				
Tj = 12°C	Pdh	2.77	kW	Tj = 12°C	COPd	5.15	−
Degradation co-efficient (**)	Cdh	0.95	−				
Tj = bivalent temperature	Pdh	9.01	kW	Tj = bivalent temperature	COPd	2.51	−
Tj = operation limit temperature	Pdh	9.01	kW	Tj = operation limit temperature	COPd	2.51	−
For air-to-water heat pumps: Tj = − 15°C (if TOL < − 20°C)	Pdh	NA	kW	For air-to-water heat pumps: Tj = − 15°C (if TOL < − 20°C)	COPd	NA	−
Bivalent temperature	Tbiv	2	°C	For air-to-water heat pumps: Operation limit temperature	TOL	2	°C
Cycling interval capacity for heating	Pcych	NA	kW	Cycling interval efficiency	COPcyc	NA	−
				Heating water operating limit temperature	WTOL	65	°C
Power consumption in modes other than active mode				Supplementary heater			
Off mode	P _{OFF}	0.025	kW	Rated heat output (*)	P _{sup}	0	kW
Thermostat-off mode	P _{TO}	0.025	kW	Type of energy input	Electric		
Standby mode	P _{SB}	0.025	kW				
Crankcase heater mode	P _{CK}	0	kW				
Other items							
Capacity control	variable			For air-to-water heat pumps: Rated air flow rate, outdoors	−	4972	m ³ /h
Sound power level, outdoors	L _{WA}	64	dB	For water- or brine-to-water heat pumps: Rated brine or water flow rate, outdoor heat exchanger	−	NA	m ³ /h
Annual energy consumption	Q _{HE}	2907	kWh				
For heat pump combination heater:							
Declared load profile	L			Water heating energy efficiency	η _{wh}	143	%
Daily electricity consumption	Q _{elec}	3.429	kWh	Daily fuel consumption	Q _{fuel}	NA	kWh
Annual electricity consumption	AEC	717	kWh	Annual fuel consumption	AFC	NA	GJ
Contact details: West Jinji Rd, Qianshan, Zhuhai, Guangdong, China, 519070				Name of the supplier: GREE ELECTRIC APPLIANCES,INC. OF ZHUHAI			
(*) 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.							

Information requirements (heat pump space heaters and heat pump combination heaters)							
Model(s): GRS-CQ8.0PdG/NhH3-E							
Air-to-water heat pump	Y			Low-temperature heat pump	N		
Water-to-water heat pump	N			Equipped with a supplementary heater	Y		
Brine-to-water heat pump	N			Heat pump combination heater	Y		
Parameters declared for	Low-temperature application						
Parameters declared for	Average climate condition						
Item	symbol	value	unit	Item	symbol	value	unit
Rated heat output (*)	Prated	8	kW	Seasonal space heating energy efficiency	ηs	183	%
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 at indoor temperature 20 °C and outdoor temperature Tj			
Tj = - 7 °C	Pdh	7.02	kW	Tj = - 7 °C	COPd	3.17	-
Degradation co-efficient (**)	Cdh	0.99	-				
Tj = 2 °C	Pdh	4.70	kW	Tj = 2 °C	COPd	4.60	-
Degradation co-efficient (**)	Cdh	0.98	-				
Tj = 7 °C	Pdh	3.02	kW	Tj = 7 °C	COPd	5.68	-
Degradation co-efficient (**)	Cdh	0.95	-				
Tj = 12 °C	Pdh	3.28	kW	Tj = 12 °C	COPd	7.34	-
Degradation co-efficient (**)	Cdh	0.94	-				
Tj = bivalent temperature	Pdh	7.02	kW	Tj = bivalent temperature	COPd	3.17	-
Tj = operation limit temperature	Pdh	6.82	kW	Tj = operation limit temperature	COPd	2.79	-
For air-to-water heat pumps: Tj = - 15 °C (if TOL < - 20 °C)	Pdh	NA	kW	For air-to-water heat pumps: Tj = - 15 °C (if TOL < - 20 °C)	COPd	NA	-
Bivalent temperature	Tbiv	-7	°C	For air-to-water heat pumps: Operation limit temperature	TOL	-10	°C
Cycling interval capacity for heating	Ppsych	NA	kW	Cycling interval efficiency	COPcyc	NA	-
				Heating water operating limit temperature	WTOL	65	°C
Power consumption in modes other than active mode				Supplementary heater			
Off mode	P _{OFF}	0.025	kW	Rated heat output (*)	Psup	1.18	kW
Thermostat-off mode	P _{TO}	0.025	kW	Type of energy input	Electric		
Standby mode	P _{SB}	0.025	kW				
Crankcase heater mode	P _{CK}	0	kW				
Other items							
Capacity control	variable			For air-to-water heat pumps: Rated air flow rate, outdoors	-	4972	m ³ / h
Sound power level, outdoors	L _{WA}	64	dB	For water- or brine-to-water heat pumps: Rated brine or water flow rate, outdoor heat exchanger	-	NA	m ³ / h
Annual energy consumption	Q _{HE}	3529	kWh				
For heat pump combination heater:							
Declared load profile	L			Water heating energy efficiency	η _{wh}	123	%
Daily electricity consumption	Q _{elec}	3.985	kWh	Daily fuel consumption	Q _{fuel}	NA	kWh
Annual electricity consumption	AEC	831	kWh	Annual fuel consumption	AFC	NA	GJ
Contact details: West Jinji Rd, Qianshan, Zhuhai, Guangdong, China, 519070				Name of the supplier: GREE ELECTRIC APPLIANCES,INC. OF ZHUHAI			
(*) 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.							

Information requirements (heat pump space heaters and heat pump combination heaters)							
Model(s): GRS-CQ8.0PdG/NhH3-E							
Air-to-water heat pump	Y			Low-temperature heat pump	N		
Water-to-water heat pump	N			Equipped with a supplementary heater	Y		
Brine-to-water heat pump	N			Heat pump combination heater	Y		
Parameters declared for	Low-temperature application						
Parameters declared for	Colder climate condition						
Item	symbol	value	unit	Item	symbol	value	unit
Rated heat output (*)	Prated	7	kW	Seasonal space heating energy efficiency	ηs	150	%
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 at indoor temperature 20 °C and outdoor temperature Tj			
Tj = - 7 °C	Pdh	4.41	kW	Tj = - 7 °C	COPd	3.63	-
Degradation co-efficient (**)	Cdh	0.98	-				
Tj = 2 °C	Pdh	2.77	kW	Tj = 2 °C	COPd	4.34	-
Degradation co-efficient (**)	Cdh	0.96	-				
Tj = 7 °C	Pdh	2.53	kW	Tj = 7 °C	COPd	5.31	-
Degradation co-efficient (**)	Cdh	0.95	-				
Tj = 12 °C	Pdh	3.33	kW	Tj = 12 °C	COPd	6.84	-
Degradation co-efficient (**)	Cdh	0.95	-				
Tj = bivalent temperature	Pdh	5.56	kW	Tj = bivalent temperature	COPd	2.75	-
Tj = operation limit temperature	Pdh	3.15	kW	Tj = operation limit temperature	COPd	1.43	-
For air-to-water heat pumps: Tj = - 15 °C (if TOL < - 20 °C)	Pdh	5.56	kW	For air-to-water heat pumps: Tj = - 15 °C (if TOL < - 20 °C)	COPd	2.75	-
Bivalent temperature	Tbiv	-15	°C	For air-to-water heat pumps: Operation limit temperature	TOL	-22	°C
Cycling interval capacity for heating	Ppsych	NA	kW	Cycling interval efficiency	COPcyc	NA	-
				Heating water operating limit temperature	WTOL	65	°C
Power consumption in modes other than active mode				Supplementary heater			
Off mode	P _{OFF}	0.025	kW	Rated heat output (*)	Psup	3.85	kW
Thermostat-off mode	P _{TO}	0.025	kW	Type of energy input	Electric		
Standby mode	P _{SB}	0.025	kW				
Crankcase heater mode	P _{CK}	0	kW				
Other items							
Capacity control	variable			For air-to-water heat pumps: Rated air flow rate, outdoors	-	4972	m ³ / h
Sound power level, outdoors	L _{WA}	64	dB	For water- or brine-to-water heat pumps: Rated brine or water flow rate, outdoor heat exchanger	-	NA	m ³ / h
Annual energy consumption	Q _{HE}	4363	kWh				
For heat pump combination heater:							
Declared load profile	L			Water heating energy efficiency	η _{wh}	94	%
Daily electricity consumption	Q _{elec}	5.175	kWh	Daily fuel consumption	Q _{fuel}	NA	kWh
Annual electricity consumption	AEC	1090	kWh	Annual fuel consumption	AFC	NA	GJ
Contact details: West Jinji Rd, Qianshan, Zhuhai, Guangdong, China, 519070				Name of the supplier: GREE ELECTRIC APPLIANCES,INC. OF ZHUHAI			
(*) 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.							

Information requirements (heat pump space heaters and heat pump combination heaters)							
Model(s): GRS-CQ8.0PdG/NhH3-E							
Air-to-water heat pump	Y			Low-temperature heat pump	N		
Water-to-water heat pump	N			Equipped with a supplementary heater	Y		
Brine-to-water heat pump	N			Heat pump combination heater	Y		
Parameters declared for	Low-temperature application						
Parameters declared for	Warmer climate condition						
Item	symbol	value	unit	Item	symbol	value	unit
Rated heat output (*)	Prated	9	kW	Seasonal space heating energy efficiency	ηs	235	%
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 at indoor temperature 20 °C and outdoor temperature Tj			
Tj = − 7 °C	Pdh	NA	kW	Tj = − 7 °C	COPd	NA	–
Degradation co-efficient (**)	Cdh	NA	–				
Tj = 2 °C	Pdh	8.71	kW	Tj = 2 °C	COPd	3.56	–
Degradation co-efficient (**)	Cdh	0.99	–				
Tj = 7 °C	Pdh	5.83	kW	Tj = 7 °C	COPd	5.18	–
Degradation co-efficient (**)	Cdh	0.98	–				
Tj = 12°C	Pdh	2.74	kW	Tj = 12°C	COPd	7.51	–
Degradation co-efficient (**)	Cdh	0.93	–				
Tj = bivalent temperature	Pdh	8.71	kW	Tj = bivalent temperature	COPd	3.56	–
Tj = operation limit temperature	Pdh	8.71	kW	Tj = operation limit temperature	COPd	3.56	–
For air-to-water heat pumps: Tj = − 15°C (if TOL < − 20°C)	Pdh	NA	kW	For air-to-water heat pumps: Tj = − 15°C (if TOL < − 20°C)	COPd	NA	–
Bivalent temperature	Tbiv	2	°C	For air-to-water heat pumps: Operation limit temperature	TOL	2	°C
Cycling interval capacity for heating	Pcyc	NA	kW	Cycling interval efficiency	COPcyc	NA	–
				Heating water operating limit temperature	WTOL	65	°C
Power consumption in modes other than active mode				Supplementary heater			
Off mode	P _{OFF}	0.025	kW	Rated heat output (*)	P _{sup}	0.29	kW
Thermostat-off mode	P _{TO}	0.025	kW	Type of energy input	Electric		
Standby mode	P _{SB}	0.025	kW				
Crankcase heater mode	P _{CK}	0	kW				
Other items							
Capacity control	variable			For air-to-water heat pumps: Rated air flow rate, outdoors	–	4972	m ³ /h
Sound power level, outdoors	L _{WA}	64	dB	For water- or brine-to-water heat pumps: Rated brine or water flow rate, outdoor heat exchanger	–	NA	m ³ /h
Annual energy consumption	Q _{HE}	1950	kWh				
For heat pump combination heater:							
Declared load profile	L			Water heating energy efficiency	η _{wh}	143	%
Daily electricity consumption	Q _{elec}	3.429	kWh	Daily fuel consumption	Q _{fuel}	NA	kWh
Annual electricity consumption	AEC	717	kWh	Annual fuel consumption	AFC	NA	GJ
Contact details: West Jinji Rd, Qianshan, Zhuhai, Guangdong, China, 519070				Name of the supplier: GREE ELECTRIC APPLIANCES,INC. OF ZHUHAI			
(*) 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.							

