Subtype Ecodan Zubadan (TR) 12 + 300D AA

Certificate Holder	Mitsubishi Electric Air Conditioning Systems Europe LTD
Address	Nettlehill Road, Houston Industrial Estate
ZIP	EH54 5EQ
City	Livingston
Country	GB
Certification Body	SZU - Strojirensky zkusebni ustav (Engineering Test Institute, Public Enterprise)
Subtype title	Ecodan Zubadan (TR) 12 + 300D AA
Registration number	037-0125-23
Heat Pump Type	Outdoor Air/Water
Refrigerant	R32
Mass of Refrigerant	1.8 kg
Certification Date	26.04.2023
Testing basis	HP Keymark scheme rules rev. no. 9
Testing laboratory	SZU Brno, CZ

Model PUZ-SHWM120VAA + EHST30D-*M*D	
Model name	PUZ-SHWM120VAA + EHST30D-*M*D
Application	Heating + DHW + low temp
Units	Indoor, Outdoor
Climate zone (for heating)	n/a
Heat Source	Outdoor Air
Cooling mode application (optional)	n/a
Any additional heat sources	n/a

General data	
Power supply	1x230V 50Hz
Off-peak product	n/a

Outdoor Air/Water	
EN 16147 | Average Climate	
Declared load profile	XL
Efficiency ηDHW	133 %
COP	3.22
Heating up time	2:31 h:min
Standby power input	47 W
Reference hot water temperature	52.5 °C
Mixed water at 40°C	417 l

EN 14511-4 | Heating	
Shutting off the heat transfer medium flow	passed
Complete power supply failure	passed
Defrost test	passed
Starting and operating test	passed

EN 14511-2 | Heating		
	Low temperature	Medium temperature
Heat output	10 kW	7 kW
El input	2.06 kW	2.59 kW
COP	4.85	2.7

EN 14511-2 | Cooling		
	+7°C/+12°C	+18°C/+23°C
El input	kW	kW
Cooling capacity		
EER		

EN 12102-1 | Average Climate		
	Low temperature	Medium temperature

Sound power level indoor	41 dB(A)	41 dB(A)
Sound power level outdoor	58 dB(A)	58 dB(A)

EN 14825 | Average Climate

	Low temperature	Medium temperature
ηs	179 %	136 %
Prated	12.1 kW	12.1 kW
SCOP	4.56	3.49
Tbiv	-10 °C	-10 °C
TOL	-10 °C	-10 °C
Pdh Tj = -7°C	10.7 kW	10.7 kW
COP Tj = -7°C	2.85	2.13
Cdh Tj = -7 °C	0.996	0.997
Pdh Tj = +2°C	6.5 kW	6.5 kW
COP Tj = +2°C	4.53	3.36
Cdh Tj = +2 °C	0.99	0.992
Pdh Tj = +7°C	5.2 kW	5 kW
COP Tj = +7°C	6.04	4.75
Cdh Tj = +7 °C	0.983	0.986
Pdh Tj = 12°C	4 kW	3.8 kW
COP Tj = 12°C	7.02	6.32
Cdh Tj = +12 °C	0.974	0.975
Pdh Tj = Tbiv	12.1 kW	12.1 kW
COP Tj = Tbiv	2.43	1.78
Pdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	12.1 kW	12.1 kW
COP Tj = TOL or COP Tj = Tdesignh if TOL < Tdesignh	2.43	1.78
Cdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	0.997	0.998
WTOL	60 °C	60 °C
Poff	15 W	15 W
PTO	15 W	15 W
PSB	15 W	15 W
PCK	0 W	0 W
Supplementary Heater: Type of energy input	Electricity	Electricity
Supplementary Heater: PSUP	0 kW	0 kW
Annual energy consumption Qhe	5481 kWh	7169 kWh

EN 14825 | Cooling

	+7°C/+12°C	+18°C/+23°C
Pdesignc	kW	kW
SEER		
Pdc Tj = 35°C	kW	kW
EER Tj = 35°C		
Cdc Tj = 35 °C		

Pdc Tj = 30°C	kW	kW
EER Tj = 30°C		
Cdc Tj = 30 °C		
Pdc Tj = 25°C	kW	kW
EER Tj = 25°C		
Cdc Tj = 25 °C		
Pdc Tj = 20°C	kW	kW
EER Tj = 20°C		
Cdc Tj = 20 °C		
Poff	W	W
PTO	W	W
PSB	W	W
PCK	W	W
Annual energy consumption Qce	kWh	kWh

Model PUZ-SHWM120YAA + EHST30D-*M*D	
Model name	PUZ-SHWM120YAA + EHST30D-*M*D
Application	Heating + DHW + low temp
Units	Indoor, Outdoor
Climate zone (for heating)	n/a
Heat Source	Outdoor Air
Cooling mode application (optional)	n/a
Any additional heat sources	n/a

General data	
Power supply	3x400V 50Hz
Off-peak product	n/a

Outdoor Air/Water EN 16147 | Average Climate	
Declared load profile	XL
Efficiency ηDHW	133 %
COP	3.22
Heating up time	2:31 h:min
Standby power input	47 W
Reference hot water temperature	52.5 °C
Mixed water at 40°C	417 l

EN 14511-4 | Heating	
Shutting off the heat transfer medium flow	passed
Complete power supply failure	passed
Defrost test	passed
Starting and operating test	passed

EN 14511-2 | Heating	Low temperature	Medium temperature
Heat output	10 kW	7 kW
El input	2.06 kW	2.59 kW
COP	4.85	2.7

EN 14511-2 | Cooling	+7°C/+12°C	+18°C/+23°C
El input	kW	kW
Cooling capacity		
EER		

EN 12102-1 | Average Climate	Low temperature	Medium temperature

Sound power level indoor	41 dB(A)	41 dB(A)
Sound power level outdoor	58 dB(A)	58 dB(A)

EN 14825 | Average Climate

	Low temperature	Medium temperature
ηs	178 %	136 %
Prated	12.1 kW	12.1 kW
SCOP	4.53	3.47
Tbiv	-10 °C	-10 °C
TOL	-10 °C	-10 °C
Pdh Tj = -7°C	10.7 kW	10.7 kW
COP Tj = -7°C	2.85	2.13
Cdh Tj = -7 °C	0.994	0.996
Pdh Tj = +2°C	6.5 kW	6.5 kW
COP Tj = +2°C	4.53	3.36
Cdh Tj = +2 °C	0.985	0.989
Pdh Tj = +7°C	5.2 kW	5 kW
COP Tj = +7°C	6.04	4.75
Cdh Tj = +7 °C	0.974	0.979
Pdh Tj = 12°C	4 kW	3.8 kW
COP Tj = 12°C	7.02	6.32
Cdh Tj = +12 °C	0.961	0.963
Pdh Tj = Tbiv	12.1 kW	12.1 kW
COP Tj = Tbiv	2.43	1.78
Pdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	12.1 kW	12.1 kW
COP Tj = TOL or COP Tj = Tdesignh if TOL < Tdesignh	2.43	1.78
Cdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	0.996	0.997
WTOL	60 °C	60 °C
Poff	22 W	22 W
PTO	22 W	22 W
PSB	22 W	22 W
PCK	0 W	0 W
Supplementary Heater: Type of energy input	Electricity	Electricity
Supplementary Heater: PSUP	0 kW	0 kW
Annual energy consumption Qhe	5516 kWh	7204 kWh

EN 14825 | Cooling

	+7°C/+12°C	+18°C/+23°C
Pdesignc	kW	kW
SEER		
Pdc Tj = 35°C	kW	kW
EER Tj = 35°C		
Cdc Tj = 35 °C		

Pdc Tj = 30°C	kW	kW
EER Tj = 30°C		
Cdc Tj = 30 °C		
Pdc Tj = 25°C	kW	kW
EER Tj = 25°C		
Cdc Tj = 25 °C		
Pdc Tj = 20°C	kW	kW
EER Tj = 20°C		
Cdc Tj = 20 °C		
Poff	W	W
PTO	W	W
PSB	W	W
PCK	W	W
Annual energy consumption Qce	kWh	kWh

Model PUZ-SHWM120VAA + ERST30D-*M*D	
Model name	PUZ-SHWM120VAA + ERST30D-*M*D
Application	Heating + DHW + low temp
Units	Indoor, Outdoor
Climate zone (for heating)	n/a
Heat Source	Outdoor Air
Reversibility	Yes
Cooling mode application (optional)	+7°C/12°C, +18°C/+23°C
Any additional heat sources	n/a

General data	
Power supply	1x230V 50Hz
Off-peak product	n/a

Outdoor Air/Water EN 16147 | Average Climate	
Declared load profile	XL
Efficiency ηDHW	133 %
COP	3.22
Heating up time	2:31 h:min
Standby power input	47 W
Reference hot water temperature	52.5 °C
Mixed water at 40°C	417 l

EN 14511-4 | Heating	
Shutting off the heat transfer medium flow	passed
Complete power supply failure	passed
Defrost test	passed
Starting and operating test	passed

EN 14511-2 | Heating	Low temperature	Medium temperature
Heat output	10 kW	7 kW
El input	2.06 kW	2.59 kW
COP	4.85	2.7

EN 14511-2 | Cooling	+7°C/+12°C	+18°C/+23°C
El input	3.86 kW	2.79 kW
Cooling capacity	11	12
EER	2.85	4.3

EN 12102-1 | Average Climate

	Low temperature	Medium temperature
Sound power level indoor	41 dB(A)	41 dB(A)
Sound power level outdoor	58 dB(A)	58 dB(A)

EN 14825 | Average Climate

	Low temperature	Medium temperature
ηs	181 %	138 %
Prated	12.1 kW	12.1 kW
SCOP	4.61	3.51
Tbiv	-10 °C	-10 °C
TOL	-10 °C	-10 °C
Pdh Tj = -7°C	10.7 kW	10.7 kW
COP Tj = -7°C	2.85	2.13
Cdh Tj = -7 °C	0.996	0.997
Pdh Tj = +2°C	6.5 kW	6.5 kW
COP Tj = +2°C	4.53	3.36
Cdh Tj = +2 °C	0.99	0.992
Pdh Tj = +7°C	5.2 kW	5 kW
COP Tj = +7°C	6.04	4.75
Cdh Tj = +7 °C	0.983	0.986
Pdh Tj = 12°C	4 kW	3.8 kW
COP Tj = 12°C	7.02	6.32
Cdh Tj = +12 °C	0.974	0.975
Pdh Tj = Tbiv	12.1 kW	12.1 kW
COP Tj = Tbiv	2.43	1.78
Pdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	12.1 kW	12.1 kW
COP Tj = TOL or COP Tj = Tdesignh if TOL < Tdesignh	2.43	1.78
Cdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	0.997	0.998
WTOL	60 °C	60 °C
Poff	15 W	15 W
PTO	15 W	15 W
PSB	15 W	15 W
PCK	0 W	0 W
Supplementary Heater: Type of energy input	Electricity	Electricity
Supplementary Heater: PSUP	0 kW	0 kW
Annual energy consumption Qhe	5426 kWh	7114 kWh

EN 14825 | Cooling

	+7°C/+12°C	+18°C/+23°C
Pdesignc	11 kW	12 kW
SEER	4.13	5.69
Pdc Tj = 35°C	11 kW	12 kW
EER Tj = 35°C	2.85	4.3

Cdc Tj = 35 °C	0.996	0.995
Pdc Tj = 30°C	8.11 kW	8.84 kW
EER Tj = 30°C	3.98	5.75
Cdc Tj = 30 °C	0.993	0.99
Pdc Tj = 25°C	5.21 kW	5.68 kW
EER Tj = 25°C	4.59	5.99
Cdc Tj = 25 °C	0.987	0.984
Pdc Tj = 20°C	2.5 kW	3.5 kW
EER Tj = 20°C	4.45	6.3
Cdc Tj = 20 °C	0.973	0.973
Poff	15 W	15 W
PTO	15 W	15 W
PSB	15 W	15 W
PCK	0 W	0 W
Annual energy consumption Qce	1597 kWh	1266 kWh

Model PUZ-SHWM120YAA + ERST30D-*M*D	
Model name	PUZ-SHWM120YAA + ERST30D-*M*D
Application	Heating + DHW + low temp
Units	Indoor, Outdoor
Climate zone (for heating)	n/a
Heat Source	Outdoor Air
Reversibility	Yes
Cooling mode application (optional)	+7°C/12°C, +18°C/+23°C
Any additional heat sources	n/a

General data	
Power supply	3x400V 50Hz
Off-peak product	n/a

Outdoor Air/Water EN 16147 | Average Climate	
Declared load profile	XL
Efficiency ηDHW	133 %
COP	3.22
Heating up time	2:31 h:min
Standby power input	47 W
Reference hot water temperature	52.5 °C
Mixed water at 40°C	417 l

EN 14511-4 | Heating	
Shutting off the heat transfer medium flow	passed
Complete power supply failure	passed
Defrost test	passed
Starting and operating test	passed

EN 14511-2 | Heating	Low temperature	Medium temperature
Heat output	10 kW	7 kW
El input	2.06 kW	2.59 kW
COP	4.85	2.7

EN 14511-2 | Cooling	+7°C/+12°C	+18°C/+23°C
El input	3.86 kW	2.79 kW
Cooling capacity	11	12
EER	2.85	4.3

EN 12102-1 | Average Climate

	Low temperature	Medium temperature
Sound power level indoor	41 dB(A)	41 dB(A)
Sound power level outdoor	58 dB(A)	58 dB(A)

EN 14825 | Average Climate

	Low temperature	Medium temperature
ηs	181 %	137 %
Prated	12.1 kW	12.1 kW
SCOP	4.6	3.51
Tbiv	-10 °C	-10 °C
TOL	-10 °C	-10 °C
Pdh Tj = -7°C	10.7 kW	10.7 kW
COP Tj = -7°C	2.85	2.13
Cdh Tj = -7 °C	0.994	0.996
Pdh Tj = +2°C	6.5 kW	6.5 kW
COP Tj = +2°C	4.53	3.36
Cdh Tj = +2 °C	0.985	0.989
Pdh Tj = +7°C	5.2 kW	5 kW
COP Tj = +7°C	6.04	4.75
Cdh Tj = +7 °C	0.974	0.979
Pdh Tj = 12°C	4 kW	3.8 kW
COP Tj = 12°C	7.02	6.32
Cdh Tj = +12 °C	0.961	0.963
Pdh Tj = Tbiv	12.1 kW	12.1 kW
COP Tj = Tbiv	2.43	1.78
Pdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	12.1 kW	12.1 kW
COP Tj = TOL or COP Tj = Tdesignh if TOL < Tdesignh	2.43	1.78
Cdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	0.996	0.997
WTOL	60 °C	60 °C
Poff	22 W	22 W
PTO	22 W	22 W
PSB	22 W	22 W
PCK	0 W	0 W
Supplementary Heater: Type of energy input	Electricity	Electricity
Supplementary Heater: PSUP	0 kW	0 kW
Annual energy consumption Qhe	5435 kWh	7123 kWh

EN 14825 | Cooling

	+7°C/+12°C	+18°C/+23°C
Pdesignc	11 kW	12 kW
SEER	4.1	5.62
Pdc Tj = 35°C	11 kW	12 kW
EER Tj = 35°C	2.85	4.3

Cdc Tj = 35 °C	0.994	0.992
Pdc Tj = 30°C	8.11 kW	8.84 kW
EER Tj = 30°C	3.98	5.75
Cdc Tj = 30 °C	0.989	0.986
Pdc Tj = 25°C	5.21 kW	5.68 kW
EER Tj = 25°C	4.59	5.99
Cdc Tj = 25 °C	0.981	0.977
Pdc Tj = 20°C	2.5 kW	3.5 kW
EER Tj = 20°C	4.45	6.3
Cdc Tj = 20 °C	0.961	0.96
Poff	22 W	22 W
PTO	22 W	22 W
PSB	22 W	22 W
PCK	0 W	0 W
Annual energy consumption Qce	1611 kWh	1282 kWh