

Subtype ALYA 12-16 FS-A

Certificate Holder	BAXI S.p.A.
Address	Via Trozzetti, 20
ZIP	
City	Bassano del Grappa (VI)
Country	IT
Certification Body	Kiwa Nederland B.V.
Subtype title	ALYA 12-16 FS-A
Registration number	007-DN0140
Heat Pump Type	Outdoor Air/Water
Refrigerant	R32
Mass of Refrigerant	1.84 kg
Certification Date	11.11.2022
Testing basis	European KEYMARK Scheme for Heat Pumps (v10)

Model ALYA 12M E FS-A		
Model name	ALYA 12M E FS-A	
Application	Heating + DHW + low temp	
Units	Indoor, Outdoor	
Climate zone (for heating)	n/a	
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	L	
Efficiency η_{DHW}	108 %	
COP	2.60	
Heating up time	0:57 h:min	
Standby power input	32.4 W	
Reference hot water temperature	53.0 °C	
Mixed water at 40°C	239 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	12.10 kW	12.00 kW
El input	2.44 kW	3.87 kW
COP	4.95	3.10
EN 14511-2 Cooling		
	+7°C/+12°C	+18°C/+23°C
El input	10.55 kW	10.77 kW
Cooling capacity	4.19	2.92
EER	2.52	3.69
EN 12102-1 Average Climate		
	Low temperature	Medium temperature
Sound power level indoor	39 dB(A)	39 dB(A)

Sound power level outdoor	56 dB(A)	56 dB(A)
EN 14825 Average Climate		
	Low temperature	Medium temperature
η_s	178 %	135 %
Prated	12.00 kW	11.58 kW
SCOP	4.52	3.46
Tbiv	-7 °C	-7 °C
TOL	-10 °C	-10 °C
Pdh Tj = -7°C	10.61 kW	10.25 kW
COP Tj = -7°C	2.88	2.01
Cdh Tj = -7 °C	0.900	0.900
Pdh Tj = +2°C	6.48 kW	6.52 kW
COP Tj = +2°C	4.30	3.44
Cdh Tj = +2 °C	0.900	0.900
Pdh Tj = +7°C	4.44 kW	4.36 kW
COP Tj = +7°C	6.00	4.59
Cdh Tj = +7 °C	0.900	0.900
Pdh Tj = 12°C	3.74 kW	3.30 kW
COP Tj = 12°C	8.47	6.05
Cdh Tj = +12 °C	0.900	0.900
Pdh Tj = Tbiv	10.61 kW	10.25 kW
COP Tj = Tbiv	2.88	2.01
Pdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	10.75 kW	9.10 kW
COP Tj = TOL or COP Tj = Tdesignh if TOL < Tdesignh	2.77	1.79
Cdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	0.900	0.900
WTOL	65 °C	65 °C
Poff	14 W	14 W
PTO	24 W	24 W
PSB	14 W	14 W
PCK	0 W	0 W
Supplementary Heater: Type of energy input	Electricity	Electricity
Supplementary Heater: PSUP	1.26 kW	2.50 kW
Annual energy consumption Qhe	5482 kWh	6919 kWh
EN 14825 Cooling		
	+7°C/+12°C	+18°C/+23°C
Pdesignc	10.55 kW	10.77 kW
SEER	4.09	6.66
Pdc Tj = 35°C	10.55 kW	10.77 kW
EER Tj = 35°C	2.52	3.69
Cdc Tj = 35 °C	0.900	0.900
Pdc Tj = 30°C	7.78 kW	7.88 kW

EER Tj = 30°C	3.58	5.39
Cdc Tj = 30 °C	0.900	0.900
Pdc Tj = 25°C	5.17 kW	5.20 kW
EER Tj = 25°C	4.57	7.93
Cdc Tj = 25 °C	0.900	0.900
Pdc Tj = 20°C	2.24 kW	3.03 kW
EER Tj = 20°C	5.05	9.28
Cdc Tj = 20 °C	0.900	0.900
Poff	14 W	14 W
PTO	10 W	10 W
PSB	14 W	14 W
PCK	0 W	0 W
Annual energy consumption Qce	1548 kWh	971 kWh

Model ALYA 16M E FS-A

Model name	ALYA 16M E FS-A
Application	Heating + DHW + low temp
Units	Indoor, Outdoor
Climate zone (for heating)	n/a
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	L
Efficiency η_{DHW}	108 %
COP	2.60
Heating up time	0:57 h:min
Standby power input	32.4 W
Reference hot water temperature	53.0 °C
Mixed water at 40°C	239 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	16.00 kW	16.00 kW
El input	3.56 kW	5.52 kW
COP	4.50	2.90

EN 14511-2 | Cooling

	+7°C/+12°C	+18°C/+23°C
El input	12.36 kW	11.63 kW
Cooling capacity	5.44	3.22
EER	2.27	3.61

EN 12102-1 | Average Climate

	Low temperature	Medium temperature
Sound power level indoor	39 dB(A)	39 dB(A)

Sound power level outdoor	56 dB(A)	56 dB(A)
EN 14825 Average Climate		
	Low temperature	Medium temperature
η_s	177 %	133 %
Prated	15.21 kW	13.02 kW
SCOP	4.50	3.40
Tbiv	-7 °C	-7 °C
TOL	-10 °C	-10 °C
Pdh Tj = -7°C	13.45 kW	11.52 kW
COP Tj = -7°C	2.72	1.99
Cdh Tj = -7 °C	0.900	0.900
Pdh Tj = +2°C	8.20 kW	7.18 kW
COP Tj = +2°C	4.30	3.34
Cdh Tj = +2 °C	0.900	0.900
Pdh Tj = +7°C	5.70 kW	4.56 kW
COP Tj = +7°C	6.20	4.61
Cdh Tj = +7 °C	0.900	0.900
Pdh Tj = 12°C	3.78 kW	3.32 kW
COP Tj = 12°C	8.51	5.80
Cdh Tj = +12 °C	0.900	0.900
Pdh Tj = Tbiv	13.45 kW	11.52 kW
COP Tj = Tbiv	2.72	1.99
Pdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	12.52 kW	10.33 kW
COP Tj = TOL or COP Tj = Tdesignh if TOL < Tdesignh	2.48	1.80
Cdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	0.900	0.900
WTOL	65 °C	65 °C
Poff	14 W	14 W
PTO	24 W	24 W
PSB	14 W	14 W
PCK	0 W	0 W
Supplementary Heater: Type of energy input	Electricity	Electricity
Supplementary Heater: PSUP	2.68 kW	2.67 kW
Annual energy consumption Qhe	6979 kWh	7914 kWh
EN 14825 Cooling		
	+7°C/+12°C	+18°C/+23°C
Pdesignc	12.36 kW	11.63 kW
SEER	4.20	6.19
Pdc Tj = 35°C	12.36 kW	11.63 kW
EER Tj = 35°C	2.27	3.61
Cdc Tj = 35 °C	0.900	0.900
Pdc Tj = 30°C	9.40 kW	8.67 kW

EER Tj = 30°C	3.41	5.22
Cdc Tj = 30 °C	0.900	0.900
Pdc Tj = 25°C	5.89 kW	5.39 kW
EER Tj = 25°C	4.80	7.78
Cdc Tj = 25 °C	0.900	0.900
Pdc Tj = 20°C	2.81 kW	2.48 kW
EER Tj = 20°C	5.80	6.89
Cdc Tj = 20 °C	0.900	0.900
Poff	14 W	14 W
PTO	10 W	10 W
PSB	14 W	14 W
PCK	0 W	0 W
Annual energy consumption Qce	1766 kWh	1128 kWh

Model ALYA 12M H FS-A

Model name	ALYA 12M H FS-A
Application	Heating + DHW + low temp
Units	Indoor, Outdoor
Climate zone (for heating)	n/a
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	L
Efficiency η_{DHW}	108 %
COP	2.60
Heating up time	0:57 h:min
Standby power input	32.4 W
Reference hot water temperature	53.0 °C
Mixed water at 40°C	239 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	12.10 kW	12.00 kW
El input	2.44 kW	3.87 kW
COP	4.95	3.10

EN 14511-2 | Cooling

	+7°C/+12°C	+18°C/+23°C
El input	10.55 kW	10.77 kW
Cooling capacity	4.19	2.92
EER	2.52	3.69

EN 12102-1 | Average Climate

	Low temperature	Medium temperature
Sound power level indoor	39 dB(A)	39 dB(A)

Sound power level outdoor	56 dB(A)	56 dB(A)
EN 14825 Average Climate		
	Low temperature	Medium temperature
η_s	178 %	135 %
Prated	12.00 kW	11.58 kW
SCOP	4.52	3.46
Tbiv	-7 °C	-7 °C
TOL	-10 °C	-10 °C
Pdh Tj = -7°C	10.61 kW	10.25 kW
COP Tj = -7°C	2.88	2.01
Cdh Tj = -7 °C	0.900	0.900
Pdh Tj = +2°C	6.48 kW	6.52 kW
COP Tj = +2°C	4.30	3.44
Cdh Tj = +2 °C	0.900	0.900
Pdh Tj = +7°C	4.44 kW	4.36 kW
COP Tj = +7°C	6.00	4.59
Cdh Tj = +7 °C	0.900	0.900
Pdh Tj = 12°C	3.74 kW	3.30 kW
COP Tj = 12°C	8.47	6.05
Cdh Tj = +12 °C	0.900	0.900
Pdh Tj = Tbiv	10.61 kW	10.25 kW
COP Tj = Tbiv	2.88	2.01
Pdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	10.75 kW	9.10 kW
COP Tj = TOL or COP Tj = Tdesignh if TOL < Tdesignh	2.77	1.79
Cdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	0.900	0.900
WTOL	65 °C	65 °C
Poff	14 W	14 W
PTO	24 W	24 W
PSB	14 W	14 W
PCK	0 W	0 W
Supplementary Heater: Type of energy input	Electricity	Electricity
Supplementary Heater: PSUP	1.26 kW	2.50 kW
Annual energy consumption Qhe	5482 kWh	6919 kWh

EN 14825 Cooling		
	+7°C/+12°C	+18°C/+23°C
Pdesignc	10.55 kW	10.77 kW
SEER	4.09	6.66
Pdc Tj = 35°C	10.55 kW	10.77 kW
EER Tj = 35°C	2.52	3.69
Cdc Tj = 35 °C	0.900	0.900
Pdc Tj = 30°C	7.78 kW	7.88 kW

EER Tj = 30°C	3.58	5.39
Cdc Tj = 30 °C	0.900	0.900
Pdc Tj = 25°C	5.17 kW	5.20 kW
EER Tj = 25°C	4.57	7.93
Cdc Tj = 25 °C	0.900	0.900
Pdc Tj = 20°C	2.24 kW	3.03 kW
EER Tj = 20°C	5.05	9.28
Cdc Tj = 20 °C	0.900	0.900
Poff	14 W	14 W
PTO	10 W	10 W
PSB	14 W	14 W
PCK	0 W	0 W
Annual energy consumption Qce	1548 kWh	971 kWh

Model ALYA 16M H FS-A		
Model name	ALYA 16M H FS-A	
Application	Heating + DHW + low temp	
Units	Indoor, Outdoor	
Climate zone (for heating)	n/a	
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	L	
Efficiency η_{DHW}	108 %	
COP	2.60	
Heating up time	0:57 h:min	
Standby power input	32.4 W	
Reference hot water temperature	53.0 °C	
Mixed water at 40°C	239 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	16.00 kW	16.00 kW
El input	3.56 kW	5.52 kW
COP	4.50	2.90
EN 14511-2 Cooling		
	+7°C/+12°C	+18°C/+23°C
El input	12.36 kW	11.63 kW
Cooling capacity	5.44	3.22
EER	2.27	3.61
EN 12102-1 Average Climate		
	Low temperature	Medium temperature
Sound power level indoor	39 dB(A)	39 dB(A)

Sound power level outdoor 56 dB(A) 56 dB(A)

EN 14825 | Average Climate

	Low temperature	Medium temperature
η_s	177 %	133 %
Prated	15.21 kW	13.02 kW
SCOP	4.50	3.40
Tbiv	-7 °C	-7 °C
TOL	-10 °C	-10 °C
Pdh Tj = -7°C	13.45 kW	11.52 kW
COP Tj = -7°C	2.72	1.99
Cdh Tj = -7 °C	0.900	0.900
Pdh Tj = +2°C	8.20 kW	7.18 kW
COP Tj = +2°C	4.30	3.34
Cdh Tj = +2 °C	0.900	0.900
Pdh Tj = +7°C	5.70 kW	4.56 kW
COP Tj = +7°C	6.20	4.61
Cdh Tj = +7 °C	0.900	0.900
Pdh Tj = 12°C	3.78 kW	3.32 kW
COP Tj = 12°C	8.51	5.80
Cdh Tj = +12 °C	0.900	0.900
Pdh Tj = Tbiv	13.45 kW	11.52 kW
COP Tj = Tbiv	2.72	1.99
Pdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	12.52 kW	10.33 kW
COP Tj = TOL or COP Tj = Tdesignh if TOL < Tdesignh	2.48	1.80
Cdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	0.900	0.900
WTOL	65 °C	65 °C
Poff	14 W	14 W
PTO	24 W	24 W
PSB	14 W	14 W
PCK	0 W	0 W
Supplementary Heater: Type of energy input	Electricity	Electricity
Supplementary Heater: PSUP	2.68 kW	2.67 kW
Annual energy consumption Qhe	6979 kWh	7914 kWh

EN 14825 | Cooling

	+7°C/+12°C	+18°C/+23°C
Pdesignc	12.36 kW	11.63 kW
SEER	4.20	6.19
Pdc Tj = 35°C	12.36 kW	11.63 kW
EER Tj = 35°C	2.27	3.61
Cdc Tj = 35 °C	0.900	0.900
Pdc Tj = 30°C	9.40 kW	8.67 kW

EER Tj = 30°C	3.41	5.22
Cdc Tj = 30 °C	0.900	0.900
Pdc Tj = 25°C	5.89 kW	5.39 kW
EER Tj = 25°C	4.80	7.78
Cdc Tj = 25 °C	0.900	0.900
Pdc Tj = 20°C	2.81 kW	2.48 kW
EER Tj = 20°C	5.80	6.89
Cdc Tj = 20 °C	0.900	0.900
Poff	14 W	14 W
PTO	10 W	10 W
PSB	14 W	14 W
PCK	0 W	0 W
Annual energy consumption Qce	1766 kWh	1128 kWh

Model ALYA 12T E FS-A

Model name	ALYA 12T E FS-A
Application	Heating + DHW + low temp
Units	Indoor, Outdoor
Climate zone (for heating)	n/a
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	L
Efficiency η_{DHW}	108 %
COP	2.60
Heating up time	0:57 h:min
Standby power input	32.4 W
Reference hot water temperature	53.0 °C
Mixed water at 40°C	239 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	12.10 kW	12.00 kW
El input	2.44 kW	3.87 kW
COP	4.95	3.10

EN 14511-2 | Cooling

	+7°C/+12°C	+18°C/+23°C
El input	10.55 kW	10.77 kW
Cooling capacity	4.19	2.92
EER	2.52	3.69

EN 12102-1 | Average Climate

	Low temperature	Medium temperature
Sound power level indoor	39 dB(A)	39 dB(A)

Sound power level outdoor	56 dB(A)	56 dB(A)
EN 14825 Average Climate		
	Low temperature	Medium temperature
η_s	178 %	135 %
Prated	12.00 kW	11.58 kW
SCOP	4.52	3.46
Tbiv	-7 °C	-7 °C
TOL	-10 °C	-10 °C
Pdh Tj = -7°C	10.61 kW	10.25 kW
COP Tj = -7°C	2.88	2.01
Cdh Tj = -7 °C	0.900	0.900
Pdh Tj = +2°C	6.48 kW	6.52 kW
COP Tj = +2°C	4.30	3.44
Cdh Tj = +2 °C	0.900	0.900
Pdh Tj = +7°C	4.44 kW	4.36 kW
COP Tj = +7°C	6.00	4.59
Cdh Tj = +7 °C	0.900	0.900
Pdh Tj = 12°C	3.74 kW	3.30 kW
COP Tj = 12°C	8.47	6.05
Cdh Tj = +12 °C	0.900	0.900
Pdh Tj = Tbiv	10.61 kW	10.25 kW
COP Tj = Tbiv	2.88	2.01
Pdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	10.75 kW	9.10 kW
COP Tj = TOL or COP Tj = Tdesignh if TOL < Tdesignh	2.77	1.79
Cdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	0.900	0.900
WTOL	65 °C	65 °C
Poff	20 W	20 W
PTO	30 W	30 W
PSB	20 W	20 W
PCK	0 W	0 W
Supplementary Heater: Type of energy input	Electricity	Electricity
Supplementary Heater: PSUP	1.26 kW	2.50 kW
Annual energy consumption Qhe	5482 kWh	6919 kWh

EN 14825 Cooling		
	+7°C/+12°C	+18°C/+23°C
Pdesignc	10.55 kW	10.77 kW
SEER	4.09	6.66
Pdc Tj = 35°C	10.55 kW	10.77 kW
EER Tj = 35°C	2.52	3.69
Cdc Tj = 35 °C	0.900	0.900
Pdc Tj = 30°C	7.78 kW	7.88 kW

EER Tj = 30°C	3.58	5.39
Cdc Tj = 30 °C	0.900	0.900
Pdc Tj = 25°C	5.17 kW	5.20 kW
EER Tj = 25°C	4.57	7.93
Cdc Tj = 25 °C	0.900	0.900
Pdc Tj = 20°C	2.24 kW	3.03 kW
EER Tj = 20°C	5.05	9.28
Cdc Tj = 20 °C	0.900	0.900
Poff	20 W	20 W
PTO	10 W	10 W
PSB	20 W	20 W
PCK	0 W	0 W
Annual energy consumption Qce	1548 kWh	971 kWh

Model ALYA 16T E FS-A		
Model name	ALYA 16T E FS-A	
Application	Heating + DHW + low temp	
Units	Indoor, Outdoor	
Climate zone (for heating)	n/a	
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	L	
Efficiency η_{DHW}	108 %	
COP	2.60	
Heating up time	0:57 h:min	
Standby power input	32.4 W	
Reference hot water temperature	53.0 °C	
Mixed water at 40°C	239 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	16.00 kW	16.00 kW
El input	3.56 kW	5.52 kW
COP	4.50	2.90
EN 14511-2 Cooling		
	+7°C/+12°C	+18°C/+23°C
El input	12.36 kW	11.63 kW
Cooling capacity	5.44	3.22
EER	2.27	3.61
EN 12102-1 Average Climate		
	Low temperature	Medium temperature
Sound power level indoor	39 dB(A)	39 dB(A)

Sound power level outdoor	56 dB(A)	56 dB(A)
EN 14825 Average Climate		
	Low temperature	Medium temperature
η_s	177 %	133 %
Prated	15.21 kW	13.02 kW
SCOP	4.50	3.40
Tbiv	-7 °C	-7 °C
TOL	-10 °C	-10 °C
Pdh Tj = -7°C	13.45 kW	11.52 kW
COP Tj = -7°C	2.72	1.99
Cdh Tj = -7 °C	0.900	0.900
Pdh Tj = +2°C	8.20 kW	7.18 kW
COP Tj = +2°C	4.30	3.34
Cdh Tj = +2 °C	0.900	0.900
Pdh Tj = +7°C	5.70 kW	4.56 kW
COP Tj = +7°C	6.20	4.61
Cdh Tj = +7 °C	0.900	0.900
Pdh Tj = 12°C	3.78 kW	3.32 kW
COP Tj = 12°C	8.51	5.80
Cdh Tj = +12 °C	0.900	0.900
Pdh Tj = Tbiv	13.45 kW	11.52 kW
COP Tj = Tbiv	2.72	1.99
Pdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	12.52 kW	10.33 kW
COP Tj = TOL or COP Tj = Tdesignh if TOL < Tdesignh	2.48	1.80
Cdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	0.900	0.900
WTOL	65 °C	65 °C
Poff	20 W	20 W
PTO	30 W	30 W
PSB	20 W	20 W
PCK	0 W	0 W
Supplementary Heater: Type of energy input	Electricity	Electricity
Supplementary Heater: PSUP	2.68 kW	2.67 kW
Annual energy consumption Qhe	6979 kWh	7914 kWh
EN 14825 Cooling		
	+7°C/+12°C	+18°C/+23°C
Pdesignc	12.36 kW	11.63 kW
SEER	4.20	6.19
Pdc Tj = 35°C	12.36 kW	11.63 kW
EER Tj = 35°C	2.27	3.61
Cdc Tj = 35 °C	0.900	0.900
Pdc Tj = 30°C	9.40 kW	8.67 kW

EER Tj = 30°C	3.41	5.22
Cdc Tj = 30 °C	0.900	0.900
Pdc Tj = 25°C	5.89 kW	5.39 kW
EER Tj = 25°C	4.80	7.78
Cdc Tj = 25 °C	0.900	0.900
Pdc Tj = 20°C	2.81 kW	2.48 kW
EER Tj = 20°C	5.80	6.89
Cdc Tj = 20 °C	0.900	0.900
Poff	20 W	20 W
PTO	10 W	10 W
PSB	20 W	20 W
PCK	0 W	0 W
Annual energy consumption Qce	1766 kWh	1128 kWh

Model ALYA 12T H FS-A		
Model name	ALYA 12T H FS-A	
Application	Heating + DHW + low temp	
Units	Indoor, Outdoor	
Climate zone (for heating)	n/a	
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	L	
Efficiency η_{DHW}	108 %	
COP	2.60	
Heating up time	0:57 h:min	
Standby power input	32.4 W	
Reference hot water temperature	53.0 °C	
Mixed water at 40°C	239 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	12.10 kW	12.00 kW
El input	2.44 kW	3.87 kW
COP	4.95	3.10
EN 14511-2 Cooling		
	+7°C/+12°C	+18°C/+23°C
El input	10.55 kW	10.77 kW
Cooling capacity	4.19	2.92
EER	2.52	3.69
EN 12102-1 Average Climate		
	Low temperature	Medium temperature
Sound power level indoor	39 dB(A)	39 dB(A)

Sound power level outdoor	56 dB(A)	56 dB(A)
EN 14825 Average Climate		
	Low temperature	Medium temperature
η_s	178 %	135 %
Prated	12.00 kW	11.58 kW
SCOP	4.52	3.46
Tbiv	-7 °C	-7 °C
TOL	-10 °C	-10 °C
Pdh Tj = -7°C	10.61 kW	10.25 kW
COP Tj = -7°C	2.88	2.01
Cdh Tj = -7 °C	0.900	0.900
Pdh Tj = +2°C	6.48 kW	6.52 kW
COP Tj = +2°C	4.30	3.44
Cdh Tj = +2 °C	0.900	0.900
Pdh Tj = +7°C	4.44 kW	4.36 kW
COP Tj = +7°C	6.00	4.59
Cdh Tj = +7 °C	0.900	0.900
Pdh Tj = 12°C	3.74 kW	3.30 kW
COP Tj = 12°C	8.47	6.05
Cdh Tj = +12 °C	0.900	0.900
Pdh Tj = Tbiv	10.61 kW	10.25 kW
COP Tj = Tbiv	2.88	2.01
Pdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	10.75 kW	9.10 kW
COP Tj = TOL or COP Tj = Tdesignh if TOL < Tdesignh	2.77	1.79
Cdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	0.900	0.900
WTOL	65 °C	65 °C
Poff	20 W	20 W
PTO	30 W	30 W
PSB	20 W	20 W
PCK	0 W	0 W
Supplementary Heater: Type of energy input	Electricity	Electricity
Supplementary Heater: PSUP	1.26 kW	2.50 kW
Annual energy consumption Qhe	5482 kWh	6919 kWh
EN 14825 Cooling		
	+7°C/+12°C	+18°C/+23°C
Pdesignc	10.55 kW	10.77 kW
SEER	4.09	6.66
Pdc Tj = 35°C	10.55 kW	10.77 kW
EER Tj = 35°C	2.52	3.69
Cdc Tj = 35 °C	0.900	0.900
Pdc Tj = 30°C	7.78 kW	7.88 kW

EER Tj = 30°C	3.58	5.39
Cdc Tj = 30 °C	0.900	0.900
Pdc Tj = 25°C	5.17 kW	5.20 kW
EER Tj = 25°C	4.57	7.93
Cdc Tj = 25 °C	0.900	0.900
Pdc Tj = 20°C	2.24 kW	3.03 kW
EER Tj = 20°C	5.05	9.28
Cdc Tj = 20 °C	0.900	0.900
Poff	20 W	20 W
PTO	10 W	10 W
PSB	20 W	20 W
PCK	0 W	0 W
Annual energy consumption Qce	1548 kWh	971 kWh

Model ALYA 16T H FS-A		
Model name	ALYA 16T H FS-A	
Application	Heating + DHW + low temp	
Units	Indoor, Outdoor	
Climate zone (for heating)	n/a	
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	L	
Efficiency η_{DHW}	108 %	
COP	2.60	
Heating up time	0:57 h:min	
Standby power input	32.4 W	
Reference hot water temperature	53.0 °C	
Mixed water at 40°C	239 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	16.00 kW	16.00 kW
El input	3.56 kW	5.52 kW
COP	4.50	2.90
EN 14511-2 Cooling		
	+7°C/+12°C	+18°C/+23°C
El input	12.36 kW	11.63 kW
Cooling capacity	5.44	3.22
EER	2.27	3.61
EN 12102-1 Average Climate		
	Low temperature	Medium temperature
Sound power level indoor	39 dB(A)	39 dB(A)

Sound power level outdoor	56 dB(A)	56 dB(A)
EN 14825 Average Climate		
	Low temperature	Medium temperature
η_s	177 %	133 %
Prated	15.21 kW	13.02 kW
SCOP	4.50	3.40
Tbiv	-7 °C	-7 °C
TOL	-10 °C	-10 °C
Pdh Tj = -7°C	13.45 kW	11.52 kW
COP Tj = -7°C	2.72	1.99
Cdh Tj = -7 °C	0.900	0.900
Pdh Tj = +2°C	8.20 kW	7.18 kW
COP Tj = +2°C	4.30	3.34
Cdh Tj = +2 °C	0.900	0.900
Pdh Tj = +7°C	5.70 kW	4.56 kW
COP Tj = +7°C	6.20	4.61
Cdh Tj = +7 °C	0.900	0.900
Pdh Tj = 12°C	3.78 kW	3.32 kW
COP Tj = 12°C	8.51	5.80
Cdh Tj = +12 °C	0.900	0.900
Pdh Tj = Tbiv	13.45 kW	11.52 kW
COP Tj = Tbiv	2.72	1.99
Pdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	12.52 kW	10.33 kW
COP Tj = TOL or COP Tj = Tdesignh if TOL < Tdesignh	2.48	1.80
Cdh Tj = TOL or Pdh Tj = Tdesignh if TOL < Tdesignh	0.900	0.900
WTOL	65 °C	65 °C
Poff	20 W	20 W
PTO	30 W	30 W
PSB	20 W	20 W
PCK	0 W	0 W
Supplementary Heater: Type of energy input	Electricity	Electricity
Supplementary Heater: PSUP	2.68 kW	2.67 kW
Annual energy consumption Qhe	6979 kWh	7914 kWh
EN 14825 Cooling		
	+7°C/+12°C	+18°C/+23°C
Pdesignc	12.36 kW	11.63 kW
SEER	4.20	6.19
Pdc Tj = 35°C	12.36 kW	11.63 kW
EER Tj = 35°C	2.27	3.61
Cdc Tj = 35 °C	0.900	0.900
Pdc Tj = 30°C	9.40 kW	8.67 kW

EER Tj = 30°C	3.41	5.22
Cdc Tj = 30 °C	0.900	0.900
Pdc Tj = 25°C	5.89 kW	5.39 kW
EER Tj = 25°C	4.80	7.78
Cdc Tj = 25 °C	0.900	0.900
Pdc Tj = 20°C	2.81 kW	2.48 kW
EER Tj = 20°C	5.80	6.89
Cdc Tj = 20 °C	0.900	0.900
Poff	20 W	20 W
PTO	10 W	10 W
PSB	20 W	20 W
PCK	0 W	0 W
Annual energy consumption Qce	1766 kWh	1128 kWh