

**SM120-4VI****Scroll compressor, SM120S4VC**

Refrigerant: R22, Segment usage: Air conditioning, Compressor power supply
[V/Ph/Hz]: 400/3/50 460/3/60

PRODUCT DETAILS

Gross weight	79.34 kg
Net weight	73 kg
EAN	5702428839402
Approval standard	CE UL
Brand technique	Scroll compressor
Capacity control	Fixed speed
Colour	Blue
Compressor power supply [V/Ph/Hz]	400/3/50 460/3/60
Configuration code	Single
Connection type	Brazed
Description	SM120-4
Diameter [mm]	254 mm
Discharge connection height [mm]	515 mm
Discharge connection pipe size [in]	7/8 in
Discharge connection size [in]	7/8 in
Drawing number	8552037b
Economizer	No
Factory HP [bar]	33 bar
Factory LP [bar]	25 bar
Fitting standard	ODF
Frequency [Hz]	50/60
Gauge port HP	None
Gauge port LP	Schrader
Generation code	C
Glass mounting	Threaded
Glass torque [Nm]	50 Nm
GP LP torque [Nm]	15 Nm
High side max pressure (Ps)	30.2 bar
High Side TS Max	150 °C
High Side TS Min	-35 °C
High Side Volume	1.1 L
High value of nominal voltage at 50Hz [V]	400 V
High value of nominal voltage at 60Hz [V]	460 V
High value of voltage range at 50Hz [V]	440 V

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Product Detail | Scroll compressor, SM120S4VC

PRODUCT DETAILS

High value of voltage range at 60Hz [V]	506 V
IP protection class	IP54 (with cable gland)
Low side max pressure (Ps)	25 bar
Low Side TS Max	63 °C
Low Side TS Min	-35 °C
Low Side Volume	13.6 L
Low value of nominal voltage at 50Hz [V]	380 V
Low value of nominal voltage at 60Hz [V]	460 V
Low value of voltage range at 50Hz [V]	342 V
Low value of voltage range at 60Hz [V]	414 V
LRA	130 A
Maximum Operating Current [MOC]	24 A
MCC	29 A
Model number	SM120S4VC
Motor protection	Internal overload protector
Mounting torque [Nm]	21 Nm
Nominal cooling capacity 60 kBTU/h	125.26 kBTU/h
Nominal cooling capacity at 50Hz	27.3 kW
Nominal cooling capacity at 60Hz	36.7 kW
Number of starts per hour [Max]	12
Oil charge [L]	3.25 L
Oil equalization	3/8" flare SAE
Oil equalization torque [Nm]	48 Nm
Oil reference	160P
Oil type	Mineral
Packaging height [mm]	596 mm
Packaging length [mm]	470 mm
Packaging weight [Kg]	78 kg
Packaging width [mm]	370 mm
Packing format	Single pack
Packing quantity	1
Phase	3
Power connections	Screw 4.8 mm
Refrigerant	R22
Refrigerant charge [kg] [Max]	10 kg
Relief valve	None
RLA	20.7 A
Rotational speed at 50Hz [rpm]	2900 rpm
Rotational speed at 60Hz [rpm]	3500 rpm
Segment usage	Air conditioning
Shipped instructions	Installation instructions
Shipped mounting	Mounting kit with grommets, bolts, nuts, sleeves and washers
Shipped oil	Initial oil charge
Suction connection height [mm]	178 mm
Suction connection pipe size [in]	1 3/8 in

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Product Detail | Scroll compressor, SM120S4VC

PRODUCT DETAILS

Suction connection size [in]	1 3/8 in
Swept volume [cm ³]	166.6 cm ³
Technology	Scroll
Test dif [bar] [Max]	24 bar
Test HP [bar] [Max]	32 bar
Test LP [bar] [Max]	25 bar
Torque earth [Nm]	2 Nm
Torque power [Nm]	3 Nm
Total height [mm]	558 mm
Type	SM
Type designation	Compressor
Viscosity [cP]	32 cP
Winding resistance for three-phase compressors with identical windings [Ohm]	1.05 Ohm

For Documents, Software, Visuals and more information, please use this link to visit the product page on Danfoss Product Store [🔗](#)

Accessories

**8156013** [🔗](#)**Gasket set, 1-1/4", 1-3/4", 2-1/4", OSG gaskets black and white**

Gasket set, 1-1/4", 1-3/4", 2-1/4", OSG gaskets black and white

**8173230** [🔗](#)**T block connector 52 x 57 mm**

T block connector 52 x 57 mm

**120Z0405** [🔗](#)**Adaptor**

Solder sleeve adaptor set (1-3/4" rotolock, 1-3/8" ODF), (1-1/4" rotolock, 7/8" ODF)

**8156132** [🔗](#)**Gasket, 1-3/4"**

Gasket, 1-3/4"

**8156135** [🔗](#)**Service kit for terminal box 96 x 115 mm, including 1 cover, 1 clamp**

Service kit for terminal box 96 x 115 mm, including 1 cover, 1 clamp

**8156138** [🔗](#)**Mounting kit**

Mounting kit for one-scroll compressor, including 4 grommets, 4 sleeves, 4 bolts, 4 washers

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Accessories



8153003 [🔗](#)

Adaptor

Solder sleeve, P10 (1-3/4" rotolock, 1-3/8" ODF)



7750009 [🔗](#)

Discharge thermostat kit

Discharge thermostat kit



7755010 [🔗](#)

Acoustic hood for scroll compressor S110-S120

Acoustic hood for scroll compressor S110-S120

Spare Parts



120Z0382 [🔗](#)

Surface sump heater + bottom insulation, 48 W, 460 V, CE mark, UL

Surface sump heater + bottom insulation, 48 W, 460 V, CE mark, UL



7705007 [🔗](#)

MCI

Electronic soft start kit, MCI 25 C



120Z0381 [🔗](#)

Surface sump heater + bottom insulation, 48 W, 400 V, CE mark, UL

Surface sump heater + bottom insulation, 48 W, 400 V, CE mark, UL



7754001 [🔗](#)

Mineral oil, 160P, 2-litre can

Mineral oil, 160P, 2-litre can



8156019 [🔗](#)

Oil sight glass with gaskets (black and white)

Oil sight glass with gaskets (black and white)



8168022 [🔗](#)

Rotolock valve, V10 (1-3/4" rotolock, 1-3/8" ODF), Service kit

VALVE SETS V10 1 3/4"-1 3/8"

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Spare Parts

**120Z0380** [🔗](#)**Surface sump heater + bottom insulation, 48 W, 230 V, CE mark, UL**

Surface sump heater + bottom insulation, 48 W, 230 V, CE mark, UL

**7703392** [🔗](#)**Valve set**

Packing format: Multi pack, Packing quantity: 6

**7773117** [🔗](#)**Belt type crankcase heater, 65 W, 400 V, CE mark, UL**

Belt type crankcase heater, 65 W, 400 V, CE mark, UL

**120Z0466** [🔗](#)**Belt type crankcase heater, 65 W, 460 V, CE mark, UL**

Belt type crankcase heater, 65 W, 460 V, CE mark, UL

**8168030** [🔗](#)**Rotolock valve, V05 (1-1/4" rotolock, 7/8" ODF), Service kit**

VALVE SETS V05 1 1/4"-7/8"

**120Z0361** [🔗](#)**Surface sump heater + bottom insulation, 48 W, 24 V, CE mark, UL**

Surface sump heater + bottom insulation, 48 W, 24 V, CE mark, UL

**7773107** [🔗](#)**Belt type crankcase heater, 65 W, 230 V, CE mark, UL**

Belt type crankcase heater, 65 W, 230 V, CE mark, UL

**8156129** [🔗](#)**Gasket for oil sight glass (white teflon)**

Gasket for oil sight glass (white teflon)

**120Z0039** [🔗](#)**Belt type crankcase heater, 65 W, 400 V, CE mark, UL**

Belt type crankcase heater, 65 W, 400 V, CE mark, UL

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