

Single Pack SC12FT 220-240V 50/60Hz CSIR

Single pack code number: **195B4057**

| Position | Title | Code | Amount |
|----------|---|----------|--------|
| 1 | Compressor SC12FT | 104G8205 | 1 |
| 2 | Starting relay | 117U6003 | 1 |
| 3 | Starting capacitor (80 μ F 220V, 6.3mm) | 117U5017 | 1 |
| 4 | Cord relief | 103N1004 | 1 |
| 5 | Cover | 103N2009 | 1 |
| 6 | Bolt joint for one compressor M6 \varnothing 16mm | 118-1917 | 1 |

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Model

| | | | | |
|-------------|---------------|-----------------------------------|-------------|-----------------|
| Designation | SC12FT | 220-240V/50Hz 1~ 220-240V/60Hz 1~ | Sales code: | 104G8205 |
|-------------|---------------|-----------------------------------|-------------|-----------------|

Compressor design

| | | | |
|----------------------------|---------------------------------|-----------------------|----------------------------------|
| Oil type | Polyolester | Refrigerant(s) | R134a |
| Oil viscosity | 22cST | Displacement | 12,87cm ³ / 0,79cu.in |
| Oil quantity | 550cm ³ / 18,6fl.oz | Compressors on pallet | 80 |
| Refr. charge - tech. limit | 1300g / 45,9oz | | |
| Free gas volume comp. | 1410cm ³ / 47,7fl.oz | | |
| Weight | 12,7kg / 28lbs | | |
| Motor protection | 1# internal | | |
| Winding resistance main | 6,9Ω (at 25°C) | | |
| Winding resistance aux | 11Ω (at 25°C) | | |
| Max. winding temp. | 125°C / 257°F | | |
| Max. discharge temp. | 135°C / 275°F | | |



General - Configurations with SC12FT

| | Conf. 1 | Conf. 2 | Conf. 3 | Conf. 4 |
|------------------------|----------------|----------------|----------------|----------------|
| Motorconfiguration | CSIR | CSIR | RSIR | RSIR |
| Power supply (nominal) | 220-240V/50Hz | 208-230V/60Hz | 220-240V/50Hz | 208-230V/60Hz |
| Number of phases | 1 | 1 | 1 | 1 |
| Voltage range | 187-254V | 198-254V | 187-254V | 198-254V |
| Approvals | CCC, VDE | CCC, VDE | CCC, VDE | CCC, VDE |
| Starting torque | HST | HST | LST | LST |
| Note | - / - | | | |

Applications with SC12FT

| | Conf. 1 | Conf. 2 | Conf. 3 | Conf. 4 |
|-------------------------|----------------|----------------|----------------|----------------|
| Refrigerant | R134a | R134a | R134a | R134a |
| Application | LBP | LBP | LBP | LBP |
| System cooling | fan 1,5m/s | fan 1,5m/s | fan 1,5m/s | fan 1,5m/s |
| Hot gas defrost | OK | OK | OK | OK |
| Long interval pull down | OK | OK | OK | OK |

Electrical data - Configurations with SC12FT

| | Conf. 1 | Conf. 2 | Conf. 3 | Conf. 4 |
|------------------------------|----------------|----------------|----------------|----------------|
| Starting device type | relay | relay | PTC | PTC |
| Run capacitor | -/ - | -/ - | -/ - | -/ - |
| Start capacitor | 80μF | 80μF | -/ - | -/ - |
| LRA (locked rotor amps / 4s) | 23,4A | 23,4A | | |
| RLA (rated load amps / 1s) | 4,3A | 4,3A | -/ -A | -/ -A |
| Cut in current | 23,4A | 23,4A | | |

Model

Designation

SC12FT

220-240V/50Hz 1~ 220-240V/60Hz 1~

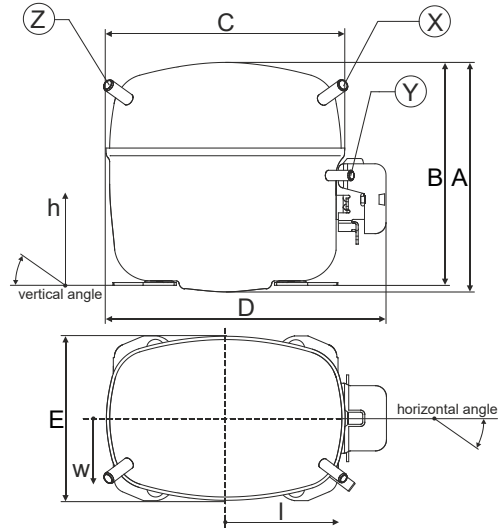
Sales code:

104G8205

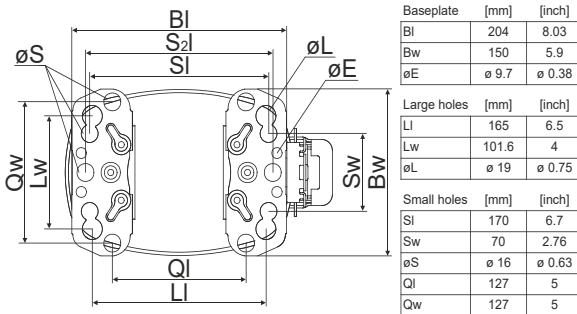
Compressor dimensions

| | | |
|----------------|-------------------|-----------------|
| Housing | A Height | 209mm / 8,23in |
| | B Height | 203mm / 7,99in |
| | C Length shell | 218mm / 8,58in |
| | D Length w. cover | 255mm / 10,04in |
| | E Width | 151mm / 5,94in |

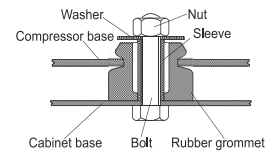
| Connectors | Suction X | Discharge Y | Process Z |
|----------------------------|--------------|----------------|--------------|
| Diameter [mm] | øi 8,11-8,29 | øi 6,11-6,29 | øi 6,11-6,29 |
| (i:inside, o:outside) [in] | øi 0,32-0,33 | øi 0,24-0,25 | øi 0,24-0,25 |
| Material | copper | copper | copper |
| Horizontal angle ±2° | 37° | 37° | 143° |
| Vertical angle ±2° | 30° | 0° | 150° |
| Position l/h/w [mm] | 107/183/55 | 115/100/63 | -107/183/55 |
| [in] | 4,2/7,2/2,2 | 4,5/3,9/2,5 | -4,2/7,2/2,2 |
| Straight tube l. [mm] | 12 | 12 | 12 |
| [in] | 0,5 | 0,5 | 0,5 |



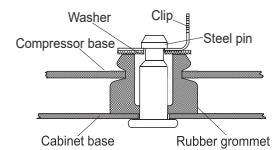
Compressor fixation



Bolt joint



Snap-on



Mounting accessories

| | one comp. | multi pack |
|----------------------------|-----------|------------|
| Bolt joint M6 ø16mm | 118-1917 | 118-1918 |
| Bolt joint ø1/4" ø16mm | 118-1946 | |
| Bolt joint ø1/4" ø19mm | 118-1949 | |
| Snap-on ø7,3 ø16mm | 118-1947 | 118-1919 |

Application notes

Provision for PE Grounding is located at the PE Stamp on the compressor

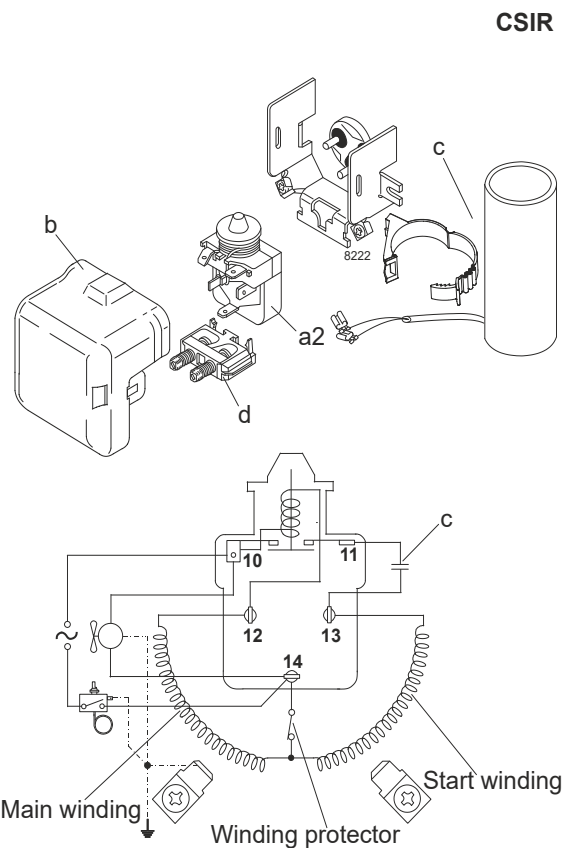
Model

| | | | | | |
|-------------|---------------|----------------------|----------------|-------------|-----------------|
| Designation | SC12FT | 220-240V/50Hz | Conf. 1 | Sales code: | 104G8205 |
|-------------|---------------|----------------------|----------------|-------------|-----------------|

Configuration

| | |
|------------------------|------------------|
| Motorconfiguration | CSIR |
| Power supply (nominal) | 220-240V/50Hz 1~ |
| Refrigerant | R134a |
| Application | LBP |
| Voltage range | 187-254V |
| Starting torque | HST |
| Approvals | CCC VDE |

Electrical accessories / wiring diagram



Ambient/ machine room temperatures minimum /maximum

Ambient temperature range: 10 - 43°C / 50 - 110°F

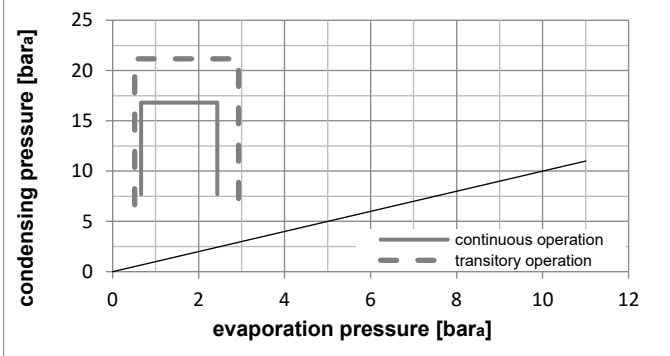
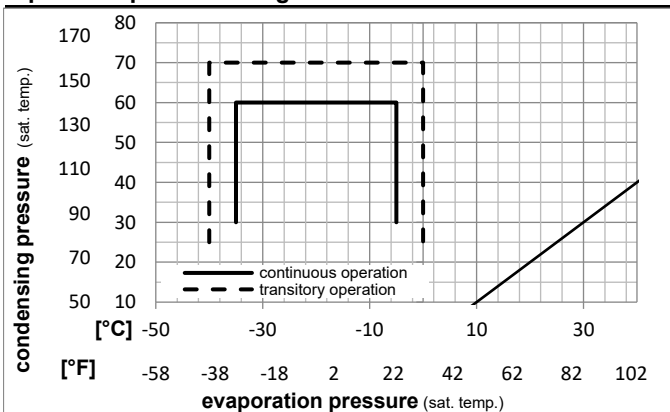
Machine room temperature range: 10 - 48°C / 50 - 119°F

Compressor cooling: fan 1,5m/s

Operation Limits

F1 at 43°C ambient temperature possible at 220V nominal (187-242V)

Operation pressure range



Components

| | | |
|----|------------------------|----------|
| a2 | assy. relay | 117U6003 |
| c | start capacitor (80μF) | 117U5017 |
| d | cord relief | 103N1004 |
| b | plastic cover | 103N2009 |

Model

Designation **SC12FT** **220-240V/50Hz** Conf. 1 Sales code: **104G8205**

Optimization + standard conditions

R134a, 220V/50Hz, CSIR, fan 1,5m/s, CCC, VDE

| | Evaporating pressure (saturation temperature) | | | | Condensing pressure (saturation temperature) | | | Return gas temp. | Liquid temp. | Cooling capacity | COP | EER | Power consumption | | | Ref. mass flow |
|------|---|-----|-----|------|--|---------|----------|------------------|--------------|------------------|-------|------|-------------------|-------------|---|----------------|
| | pe | pc | RGT | Tliq | [W] | [Btu/h] | [kcal/h] | | | | | | P1 | I | m | |
| [°C] | | | | | | | | | | | | | | | | |
| [°F] | | | | | | | | | | | | | | | | |
| | -23 | 54 | 32 | 32 | 320,4 | 1094 | 275,8 | 1,15 | 3,94 | 0,99 | 277,9 | 2,08 | 6,22 | ASHRAE LBP | | |
| | -10 | 130 | 90 | 90 | | | | | | | | | | | | |
| | -25 | 55 | 32 | 55 | 233,0 | 796 | 200,5 | 0,88 | 3,00 | 0,76 | 265,0 | 2,04 | 5,57 | cecomaf LBP | | |
| | -13 | 131 | 90 | 131 | | | | | | | | | | | | |
| | -35 | 40 | 20 | 40 | 155,2 | 530 | 133,6 | 0,79 | 2,68 | 0,68 | 197,6 | 1,87 | 3,41 | EN12900 LBP | | |
| | -31 | 104 | 68 | 104 | | | | | | | | | | | | |
| | -23 | 49 | 4,4 | 49 | 266,9 | 911 | 229,7 | 0,96 | 3,29 | 0,83 | 277,2 | 2,08 | 7,05 | ARI540 LBP | | |
| | -10 | 120 | 40 | 120 | | | | | | | | | | | | |
| | -23 | 41 | 32 | 32 | 362,5 | 1238 | 312,0 | 1,35 | 4,60 | 1,16 | 268,9 | 2,07 | 7,04 | AHAM LBP | | |
| | -10 | 105 | 90 | 90 | | | | | | | | | | | | |
| | -35 | 45 | 32 | 45 | 142,4 | 486 | 122,6 | 0,73 | 2,48 | 0,62 | 196,4 | 1,86 | 3,07 | opt | | |
| | -31 | 113 | 90 | 113 | | | | | | | | | | | | |

Performance tables

R134a, 220V/50Hz, CSIR, fan 1,5m/s, CCC, VDE

| | pe | | Cooling capacity | | | COP | EER | P1 | I | m | |
|------------------|------|------|------------------|---------|----------|-------|----------|-----------|-------|------|--------|
| | [°C] | [°F] | [W] | [Btu/h] | [kcal/h] | [W/W] | [Btu/Wh] | [kcal/Wh] | [W] | [A] | [kg/h] |
| [°C / °F] | -35 | -31 | 142,4 | 486 | 122,6 | 0,73 | 2,48 | 0,62 | 196,4 | 1,86 | 3,07 |
| cond. pressure | -30 | -22 | 205,6 | 702 | 176,9 | 0,89 | 3,05 | 0,77 | 230,5 | 1,95 | 4,44 |
| pc= 45/113 | -25 | -13 | 283,3 | 968 | 243,8 | 1,08 | 3,67 | 0,93 | 263,3 | 2,04 | 6,14 |
| return gas temp. | -23 | -10 | 313,5 | 1071 | 269,8 | 1,14 | 3,90 | 0,98 | 274,4 | 2,08 | 6,80 |
| RGT= 32/90 | -20 | -4 | 378,1 | 1291 | 325,4 | 1,28 | 4,36 | 1,10 | 296,2 | 2,15 | 8,21 |
| liquid temp | -15 | 5 | 492,1 | 1681 | 423,5 | 1,49 | 5,09 | 1,28 | 330,3 | 2,27 | 10,73 |
| Tliq= 45/113 | -5 | 23 | 787,4 | 2689 | 677,7 | 1,93 | 6,60 | 1,66 | 407,4 | 2,55 | 17,32 |
| [°C / °F] | -35 | -31 | 102,5 | 350 | 88,3 | 0,56 | 1,91 | 0,48 | 183,7 | 1,84 | 2,44 |
| cond. pressure | -30 | -22 | 163,4 | 558 | 140,6 | 0,72 | 2,47 | 0,62 | 225,6 | 1,93 | 3,90 |
| pc= 55/131 | -25 | -13 | 233,0 | 796 | 200,5 | 0,88 | 3,00 | 0,76 | 265,0 | 2,04 | 5,57 |
| return gas temp | -23 | -10 | 259,0 | 885 | 222,9 | 0,93 | 3,18 | 0,80 | 278,0 | 2,08 | 6,20 |
| RGT= 32/90 | -20 | -4 | 313,6 | 1071 | 269,9 | 1,03 | 3,53 | 0,89 | 303,0 | 2,17 | 7,52 |
| liquid temp | -15 | 5 | 407,6 | 1392 | 350,8 | 1,20 | 4,08 | 1,03 | 341,1 | 2,30 | 9,81 |
| Tliq= 55/131 | -5 | 23 | 644,9 | 2203 | 555,0 | 1,53 | 5,22 | 1,32 | 422,0 | 2,61 | 15,68 |

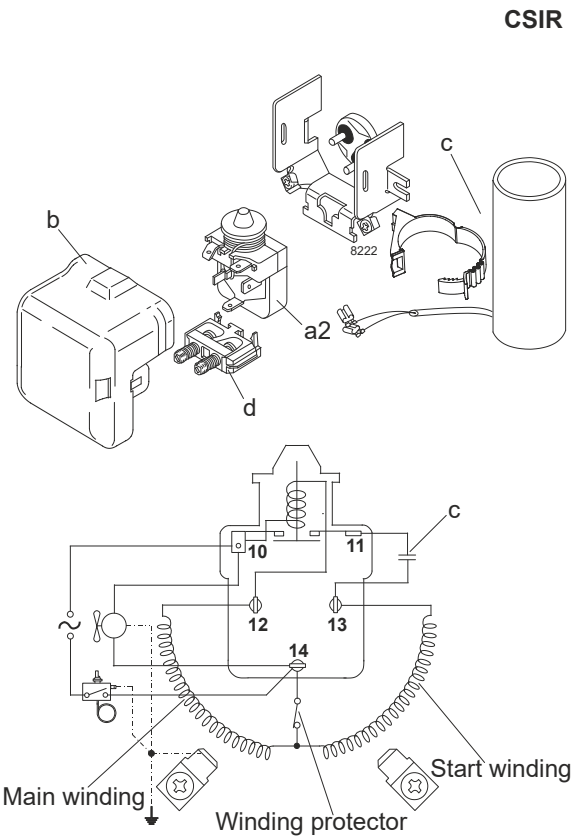
Model

| | | | | | |
|-------------|---------------|----------------------|----------------|-------------|-----------------|
| Designation | SC12FT | 208-230V/60Hz | Conf. 2 | Sales code: | 104G8205 |
|-------------|---------------|----------------------|----------------|-------------|-----------------|

Configuration

| | |
|------------------------|------------------|
| Motorconfiguration | CSIR |
| Power supply (nominal) | 208-230V/60Hz 1~ |
| Refrigerant | R134a |
| Application | LBP |
| Voltage range | 198-254V |
| Starting torque | HST |
| Approvals | CCC VDE |

Electrical accessories / wiring diagram



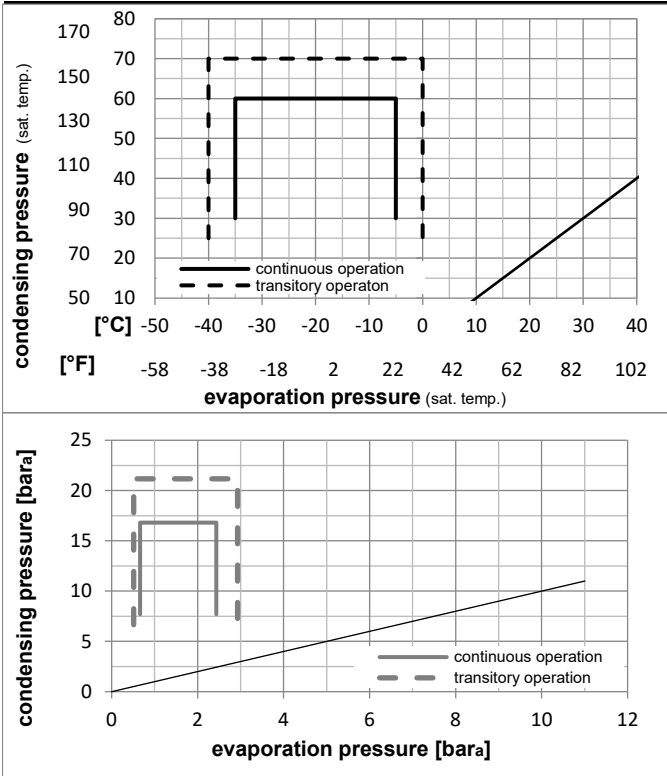
Ambient/ machine room temperatures minimum /maximum

| | |
|---------------------------------|------------------------|
| Ambient temperature range: | 10 - 43°C / 50 - 110°F |
| Machine room temperature range: | 10 - 48°C / 50 - 119°F |
| Compressor cooling: | fan 1,5m/s |

Operation Limits

F1 at 43°C ambient temperature possible at 220V nominal (187-242V)

Operation pressure range



Components

| | | |
|----|------------------------|----------|
| a2 | assy. relay | 117U6003 |
| c | start capacitor (80μF) | 117U5017 |
| d | cord relief | 103N1004 |
| b | plastic cover | 103N2009 |

Model

| | | | | | |
|-------------|---------------|----------------------|----------------|-------------|-----------------|
| Designation | SC12FT | 208-230V/60Hz | Conf. 2 | Sales code: | 104G8205 |
|-------------|---------------|----------------------|----------------|-------------|-----------------|

Optimization + standard conditions

R134a, 220V/60Hz, CSIR, fan 1,5m/s, CCC, VDE

| | Evaporating pressure (saturation temperature) | | | | Cooling capacity | | | | | | Power consumption | | | ASHRAE LBP |
|------|---|-----|-----|------|------------------|---------|----------|-----------|--------------|-----------|-------------------|-------|----------|-------------|
| | pe | pc | RGT | Tliq | [W] | [Btu/h] | [kcal/h] | COP [W/W] | EER [Btu/Wh] | [kcal/Wh] | P1 [W] | I [A] | m [kg/h] | |
| [°C] | -23 | 54 | 32 | 32 | 373,8 | 1277 | 321,7 | 1,18 | 4,04 | 1,02 | 315,9 | 1,98 | 7,26 | ASHRAE LBP |
| [°F] | -10 | 130 | 90 | 90 | | | | | | | | | | |
| [°C] | -25 | 55 | 32 | 55 | 272,0 | 929 | 234,1 | 0,91 | 3,12 | 0,79 | 298,0 | 1,92 | 6,50 | cecomaf LBP |
| [°F] | -13 | 131 | 90 | 131 | | | | | | | | | | |
| [°C] | -35 | 40 | 20 | 40 | 192,1 | 656 | 165,3 | 0,88 | 3,02 | 0,76 | 217,5 | 1,66 | 4,21 | EN12900 LBP |
| [°F] | -31 | 104 | 68 | 104 | | | | | | | | | | |
| [°C] | -23 | 49 | 4,4 | 49 | 313,8 | 1072 | 270,1 | 0,99 | 3,37 | 0,85 | 317,6 | 1,98 | 8,29 | ARI540 LBP |
| [°F] | -10 | 120 | 40 | 120 | | | | | | | | | | |
| [°C] | -23 | 41 | 32 | 32 | 437,8 | 1495 | 376,8 | 1,38 | 4,70 | 1,18 | 318,2 | 1,97 | 8,50 | AHAM LBP |
| [°F] | -10 | 105 | 90 | 90 | | | | | | | | | | |
| [°C] | -35 | 45 | 32 | 45 | 172,6 | 589 | 148,5 | 0,82 | 2,81 | 0,71 | 210,1 | 1,64 | 3,72 | opt |
| [°F] | -31 | 113 | 90 | 113 | | | | | | | | | | |

Performance tables

R134a, 220V/60Hz, CSIR, fan 1,5m/s, CCC, VDE

| | pe | | Cooling capacity | | | COP | EER | | P1 | I | m |
|------------------|------|------|------------------|---------|----------|-------|----------|-----------|-------|------|--------|
| | [°C] | [°F] | [W] | [Btu/h] | [kcal/h] | [W/W] | [Btu/Wh] | [kcal/Wh] | [W] | [A] | [kg/h] |
| [°C / °F] | -35 | -31 | 172,6 | 589 | 148,5 | 0,82 | 2,81 | 0,71 | 210,1 | 1,64 | 3,72 |
| cond. pressure | -30 | -22 | 246,3 | 841 | 212,0 | 0,96 | 3,28 | 0,83 | 256,2 | 1,78 | 5,32 |
| pc= 45/113 | -25 | -13 | 337,4 | 1152 | 290,4 | 1,11 | 3,81 | 0,96 | 302,7 | 1,93 | 7,31 |
| return gas temp. | -23 | -10 | 372,8 | 1273 | 320,8 | 1,17 | 4,00 | 1,01 | 318,5 | 1,98 | 8,08 |
| RGT= 32/90 | -20 | -4 | 448,5 | 1532 | 386,0 | 1,28 | 4,39 | 1,11 | 349,3 | 2,08 | 9,74 |
| liquid temp | -15 | 5 | 582,4 | 1989 | 501,2 | 1,47 | 5,02 | 1,27 | 395,8 | 2,25 | 12,69 |
| Tliq= 45/113 | -5 | 23 | 929,0 | 3173 | 799,5 | 1,90 | 6,51 | 1,64 | 487,7 | 2,61 | 20,43 |
| [°C / °F] | -35 | -31 | 124,5 | 425 | 107,2 | 0,64 | 2,20 | 0,55 | 193,3 | 1,58 | 2,96 |
| cond. pressure | -30 | -22 | 192,4 | 657 | 165,6 | 0,78 | 2,68 | 0,68 | 245,3 | 1,75 | 4,59 |
| pc= 55/131 | -25 | -13 | 272,0 | 929 | 234,1 | 0,91 | 3,12 | 0,79 | 298,0 | 1,92 | 6,50 |
| return gas temp | -23 | -10 | 302,2 | 1032 | 260,1 | 0,96 | 3,27 | 0,82 | 316,0 | 1,98 | 7,23 |
| RGT= 32/90 | -20 | -4 | 366,0 | 1250 | 315,0 | 1,04 | 3,56 | 0,90 | 351,2 | 2,10 | 8,78 |
| liquid temp | -15 | 5 | 477,0 | 1629 | 410,5 | 1,18 | 4,03 | 1,01 | 404,6 | 2,30 | 11,48 |
| Tliq= 55/131 | -5 | 23 | 761,2 | 2599 | 655,1 | 1,49 | 5,08 | 1,28 | 511,3 | 2,71 | 18,50 |

Model

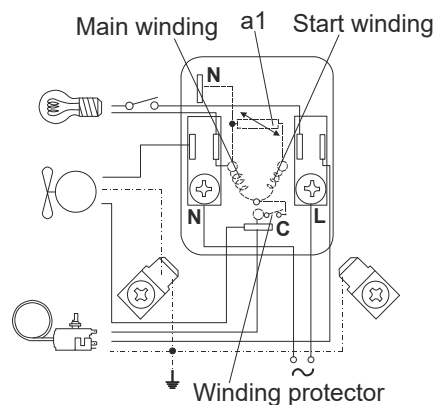
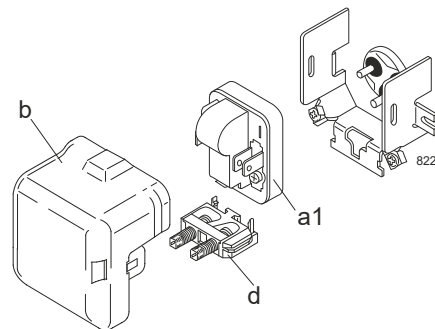
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|-------------|---------------|----------------------|----------------|-------------|-----------------|
| Designation | SC12FT | 220-240V/50Hz | Conf. 3 | Sales code: | 104G8205 |
|-------------|---------------|----------------------|----------------|-------------|-----------------|

Configuration

| | |
|------------------------|------------------|
| Motorconfiguration | RSIR |
| Power supply (nominal) | 220-240V/50Hz 1~ |
| Refrigerant | R134a |
| Application | LBP |
| Voltage range | 187-254V |
| Starting torque | LST |
| Approvals | CCC VDE |

Electrical accessories / wiring diagram

RSIR



Ambient/ machine room temperatures minimum /maximum

Ambient temperature range: 10 - 43°C / 50 - 110°F

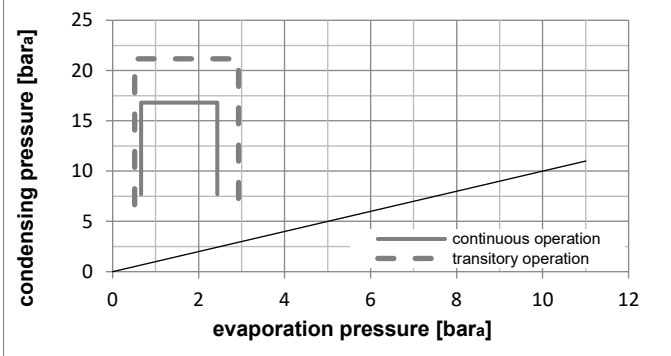
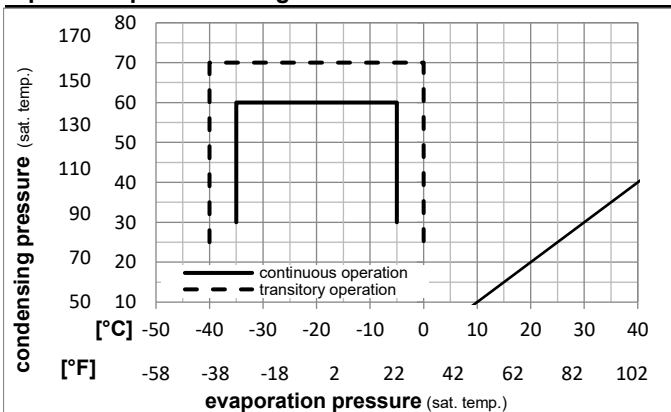
Machine room temperature range: 10 - 48°C / 50 - 119°F

Compressor cooling: fan 1,5m/s

Operation Limits

F1 at 43°C ambient temperature possible at 220V nominal (187-242V)

Operation pressure range



Components

| | | |
|----|----------------------------------|----------|
| a1 | PTC starter (220V, 25Ohm, 6.3mm) | 103N0011 |
| d | cord relief | 103N1004 |
| b | plastic cover | 103N2009 |

Model

Designation **SC12FT** **220-240V/50Hz** Conf. 3 Sales code: **104G8205**

Optimization + standard conditions

R134a, 220V/50Hz, RSIR, fan 1,5m/s, CCC, VDE

| | Evaporating pressure (saturation temperature) | | | | Condensing pressure (saturation temperature) | | | Return gas temp. | Liquid temp. | Cooling capacity | COP | EER | Power consumption | | | ASHRAE LBP |
|------|---|-----|-----|-------|--|---------|----------|------------------|--------------|------------------|------|------|-------------------|---|---|------------|
| | pe | pc | RGT | Tliq | [W] | [Btu/h] | [kcal/h] | | | | | | P1 | I | m | |
| [°C] | | | | | | | | | | | | | | | | |
| [°F] | | | | | | | | | | | | | | | | |
| -23 | 54 | 32 | 32 | 320,4 | 1094 | 275,8 | 1,15 | 3,94 | 0,99 | 277,9 | 2,08 | 6,22 | ASHRAE LBP | | | |
| -10 | 130 | 90 | 90 | | | | | | | | | | | | | |
| -25 | 55 | 32 | 55 | 233,0 | 796 | 200,5 | 0,88 | 3,00 | 0,76 | 265,0 | 2,04 | 5,57 | cecomaf LBP | | | |
| -13 | 131 | 90 | 131 | | | | | | | | | | | | | |
| -35 | 40 | 20 | 40 | 155,2 | 530 | 133,6 | 0,79 | 2,68 | 0,68 | 197,6 | 1,87 | 3,41 | EN12900 LBP | | | |
| -31 | 104 | 68 | 104 | | | | | | | | | | | | | |
| -23 | 49 | 4,4 | 49 | 266,9 | 911 | 229,7 | 0,96 | 3,29 | 0,83 | 277,2 | 2,08 | 7,05 | ARI540 LBP | | | |
| -10 | 120 | 40 | 120 | | | | | | | | | | | | | |
| -23 | 41 | 32 | 32 | 362,5 | 1238 | 312,0 | 1,35 | 4,60 | 1,16 | 268,9 | 2,07 | 7,04 | AHAM LBP | | | |
| -10 | 105 | 90 | 90 | | | | | | | | | | | | | |
| -35 | 45 | 32 | 45 | 142,4 | 486 | 122,6 | 0,73 | 2,48 | 0,62 | 196,4 | 1,86 | 3,07 | opt | | | |
| -31 | 113 | 90 | 113 | | | | | | | | | | | | | |

Performance tables

R134a, 220V/50Hz, RSIR, fan 1,5m/s, CCC, VDE

| | pe | | Cooling capacity | | | COP | EER | P1 | I | m | |
|------------------|------|------|------------------|---------|----------|-------|----------|-----------|-------|------|--------|
| | [°C] | [°F] | [W] | [Btu/h] | [kcal/h] | [W/W] | [Btu/Wh] | [kcal/Wh] | [W] | [A] | [kg/h] |
| [°C / °F] | -35 | -31 | 142,4 | 486 | 122,6 | 0,73 | 2,48 | 0,62 | 196,4 | 1,86 | 3,07 |
| cond. pressure | -30 | -22 | 205,6 | 702 | 176,9 | 0,89 | 3,05 | 0,77 | 230,5 | 1,95 | 4,44 |
| pc= 45/113 | -25 | -13 | 283,3 | 968 | 243,8 | 1,08 | 3,67 | 0,93 | 263,3 | 2,04 | 6,14 |
| return gas temp. | -23 | -10 | 313,5 | 1071 | 269,8 | 1,14 | 3,90 | 0,98 | 274,4 | 2,08 | 6,80 |
| RGT= 32/90 | -20 | -4 | 378,1 | 1291 | 325,4 | 1,28 | 4,36 | 1,10 | 296,2 | 2,15 | 8,21 |
| liquid temp | -15 | 5 | 492,1 | 1681 | 423,5 | 1,49 | 5,09 | 1,28 | 330,3 | 2,27 | 10,73 |
| Tliq= 45/113 | -5 | 23 | 787,4 | 2689 | 677,7 | 1,93 | 6,60 | 1,66 | 407,4 | 2,55 | 17,32 |
| [°C / °F] | -35 | -31 | 102,5 | 350 | 88,3 | 0,56 | 1,91 | 0,48 | 183,7 | 1,84 | 2,44 |
| cond. pressure | -30 | -22 | 163,4 | 558 | 140,6 | 0,72 | 2,47 | 0,62 | 225,6 | 1,93 | 3,90 |
| pc= 55/131 | -25 | -13 | 233,0 | 796 | 200,5 | 0,88 | 3,00 | 0,76 | 265,0 | 2,04 | 5,57 |
| return gas temp | -23 | -10 | 259,0 | 885 | 222,9 | 0,93 | 3,18 | 0,80 | 278,0 | 2,08 | 6,20 |
| RGT= 32/90 | -20 | -4 | 313,6 | 1071 | 269,9 | 1,03 | 3,53 | 0,89 | 303,0 | 2,17 | 7,52 |
| liquid temp | -15 | 5 | 407,6 | 1392 | 350,8 | 1,20 | 4,08 | 1,03 | 341,1 | 2,30 | 9,81 |
| Tliq= 55/131 | -5 | 23 | 644,9 | 2203 | 555,0 | 1,53 | 5,22 | 1,32 | 422,0 | 2,61 | 15,68 |

Model

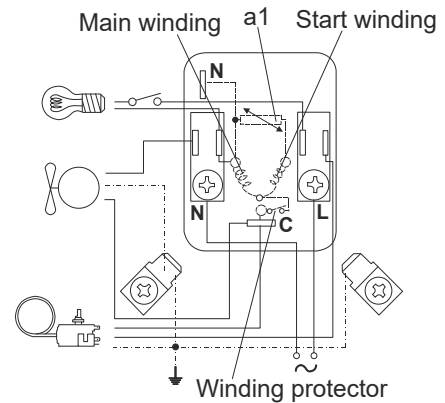
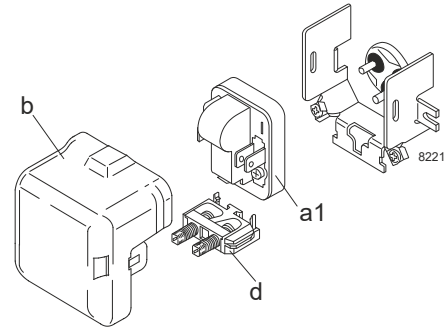
| | | | | | |
|-------------|---------------|----------------------|----------------|-------------|-----------------|
| Designation | SC12FT | 208-230V/60Hz | Conf. 4 | Sales code: | 104G8205 |
|-------------|---------------|----------------------|----------------|-------------|-----------------|

Configuration

| | |
|------------------------|------------------|
| Motorconfiguration | RSIR |
| Power supply (nominal) | 208-230V/60Hz 1~ |
| Refrigerant | R134a |
| Application | LBP |
| Voltage range | 198-254V |
| Starting torque | LST |
| Approvals | CCC VDE |

Electrical accessories / wiring diagram

RSIR



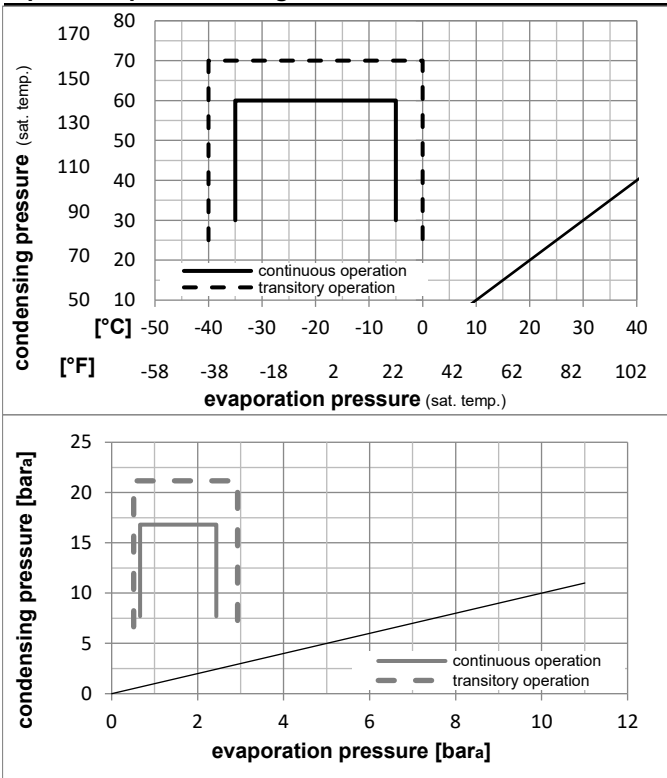
Ambient/ machine room temperatures minimum /maximum

| | |
|---------------------------------|------------------------|
| Ambient temperature range: | 10 - 43°C / 50 - 110°F |
| Machine room temperature range: | 10 - 48°C / 50 - 119°F |
| Compressor cooling: | fan 1,5m/s |

Operation Limits

F1 at 43°C ambient temperature possible at 220V nominal (187-242V)

Operation pressure range



Components

| | | |
|----|----------------------------------|----------|
| a1 | PTC starter (220V, 250hm, 6.3mm) | 103N0011 |
| d | cord relief | 103N1004 |
| b | plastic cover | 103N2009 |

Model

| | | | | | |
|-------------|---------------|----------------------|----------------|-------------|-----------------|
| Designation | SC12FT | 208-230V/60Hz | Conf. 4 | Sales code: | 104G8205 |
|-------------|---------------|----------------------|----------------|-------------|-----------------|

Optimization + standard conditions

R134a, 220V/60Hz, RSIR, fan 1,5m/s, CCC, VDE

| | Evaporating pressure (saturation temperature) | | | | Cooling capacity | | | COP | EER | P1 | Power consumption | | | ASHRAE LBP |
|--|---|------|------|------|------------------|---------|----------|-------|----------|-----------|-------------------|---------------------|----------------|-------------|
| | pe | pc | RGT | Tliq | [W] | [Btu/h] | [kcal/h] | | | | l | Current consumption | Ref. mass flow | |
| | [°C] | [°F] | [°C] | [°F] | [W] | [Btu/h] | [kcal/h] | [W/W] | [Btu/Wh] | [kcal/Wh] | [W] | [A] | [kg/h] | |
| | -23 | 54 | 32 | 32 | 373,8 | 1277 | 321,7 | 1,18 | 4,04 | 1,02 | 315,9 | 1,98 | 7,26 | ASHRAE LBP |
| | -10 | 130 | 90 | 90 | | | | | | | | | | |
| | -25 | 55 | 32 | 55 | 272,0 | 929 | 234,1 | 0,91 | 3,12 | 0,79 | 298,0 | 1,92 | 6,50 | cecomaf LBP |
| | -13 | 131 | 90 | 131 | | | | | | | | | | |
| | -35 | 40 | 20 | 40 | 192,1 | 656 | 165,3 | 0,88 | 3,02 | 0,76 | 217,5 | 1,66 | 4,21 | EN12900 LBP |
| | -31 | 104 | 68 | 104 | | | | | | | | | | |
| | -23 | 49 | 4,4 | 49 | 313,8 | 1072 | 270,1 | 0,99 | 3,37 | 0,85 | 317,6 | 1,98 | 8,29 | ARI540 LBP |
| | -10 | 120 | 40 | 120 | | | | | | | | | | |
| | -23 | 41 | 32 | 32 | 437,8 | 1495 | 376,8 | 1,38 | 4,70 | 1,18 | 318,2 | 1,97 | 8,50 | AHAM LBP |
| | -10 | 105 | 90 | 90 | | | | | | | | | | |
| | -35 | 45 | 32 | 45 | 172,6 | 589 | 148,5 | 0,82 | 2,81 | 0,71 | 210,1 | 1,64 | 3,72 | opt |
| | -31 | 113 | 90 | 113 | | | | | | | | | | |

Performance tables

R134a, 220V/60Hz, RSIR, fan 1,5m/s, CCC, VDE

| | pe | | Cooling capacity | | | COP | EER | P1 | l | m | |
|------------------|------|------|------------------|---------|----------|------|------|------|-------|------|-------|
| | [°C] | [°F] | [W] | [Btu/h] | [kcal/h] | | | | | | |
| [°C / °F] | -35 | -31 | 172,6 | 589 | 148,5 | 0,82 | 2,81 | 0,71 | 210,1 | 1,64 | 3,72 |
| cond. pressure | -30 | -22 | 246,3 | 841 | 212,0 | 0,96 | 3,28 | 0,83 | 256,2 | 1,78 | 5,32 |
| pc= 45/113 | -25 | -13 | 337,4 | 1152 | 290,4 | 1,11 | 3,81 | 0,96 | 302,7 | 1,93 | 7,31 |
| return gas temp. | -23 | -10 | 372,8 | 1273 | 320,8 | 1,17 | 4,00 | 1,01 | 318,5 | 1,98 | 8,08 |
| RGT= 32/90 | -20 | -4 | 448,5 | 1532 | 386,0 | 1,28 | 4,39 | 1,11 | 349,3 | 2,08 | 9,74 |
| liquid temp | -15 | 5 | 582,4 | 1989 | 501,2 | 1,47 | 5,02 | 1,27 | 395,8 | 2,25 | 12,69 |
| Tliq= 45/113 | -5 | 23 | 929,0 | 3173 | 799,5 | 1,90 | 6,51 | 1,64 | 487,7 | 2,61 | 20,43 |
| [°C / °F] | -35 | -31 | 124,5 | 425 | 107,2 | 0,64 | 2,20 | 0,55 | 193,3 | 1,58 | 2,96 |
| cond. pressure | -30 | -22 | 192,4 | 657 | 165,6 | 0,78 | 2,68 | 0,68 | 245,3 | 1,75 | 4,59 |
| pc= 55/131 | -25 | -13 | 272,0 | 929 | 234,1 | 0,91 | 3,12 | 0,79 | 298,0 | 1,92 | 6,50 |
| return gas temp | -23 | -10 | 302,2 | 1032 | 260,1 | 0,96 | 3,27 | 0,82 | 316,0 | 1,98 | 7,23 |
| RGT= 32/90 | -20 | -4 | 366,0 | 1250 | 315,0 | 1,04 | 3,56 | 0,90 | 351,2 | 2,10 | 8,78 |
| liquid temp | -15 | 5 | 477,0 | 1629 | 410,5 | 1,18 | 4,03 | 1,01 | 404,6 | 2,30 | 11,48 |
| Tliq= 55/131 | -5 | 23 | 761,2 | 2599 | 655,1 | 1,49 | 5,08 | 1,28 | 511,3 | 2,71 | 18,50 |



SC Compressors





SC Compressors

Service/Repair – R290



8545



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