

SC18CL LBP/MBP Compressor R404A/R507 220-240V 50Hz

General

| | |
|-----------------------|---------------|
| Code number | 104L2132 |
| Approvals | EN 60335-2-34 |
| Compressors on pallet | 80 |

Application

| Application | LBP/MBP | | |
|--|---------|-----------|----|
| Frequency | Hz | 50 | 60 |
| Evaporating temperature | °C | -45 to -5 | - |
| Voltage range | V | 198 - 254 | - |
| Max. condensing temperature continuous (short) | °C | 55 (60) | - |
| Max. winding temperature continuous (short) | °C | 125 (135) | - |

Cooling requirements

| Frequency | Hz | 50 | | | 60 | | |
|-------------------------|----|----------------|----------------|-----|-----|-----|-----|
| Application | | LBP | MBP | HBP | LBP | MBP | HBP |
| 32°C | | F ₂ | F ₂ | - | - | - | - |
| 38°C | | F ₂ | F ₂ | - | - | - | - |
| 43°C | | - | - | - | - | - | - |
| Remarks on application: | | | | | | | |

Motor

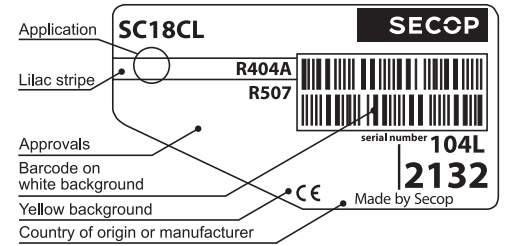
| Motor type | CSR | | |
|---|-----|------|------|
| LRA (rated after 4 sec. UL984), HST LST | A | 20.0 | - |
| Cut in Current, HST LST | A | 20.0 | - |
| Resistance, main start winding (25°C) | Ω | 3.7 | 14.1 |

Design

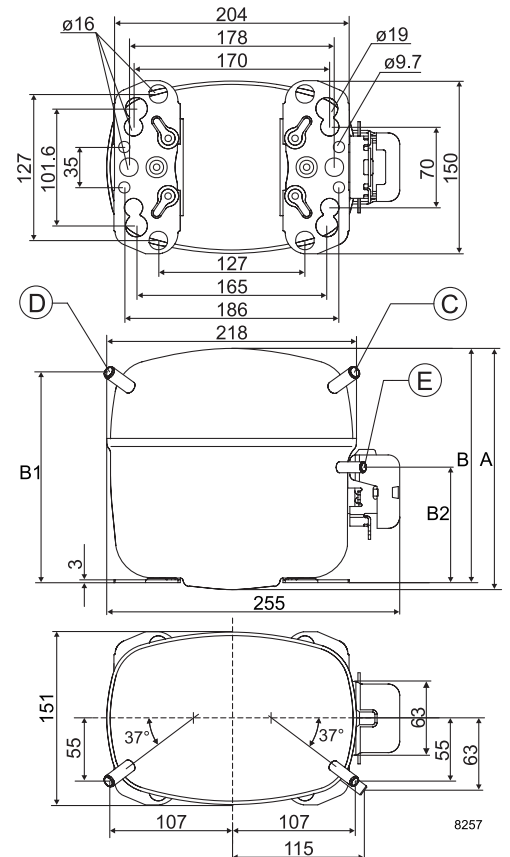
| | | |
|-------------------------------------|-----------------|-------------------|
| Displacement | cm ³ | 17.69 |
| Oil quantity (type) | cm ³ | 600 (polyolester) |
| Maximum refrigerant charge | g | 1300 |
| Free gas volume in compressor | cm ³ | 1460 |
| Weight without electrical equipment | kg | 13.7 |

Dimensions

| | | | |
|----------------------|--------------------------|----|----------------------|
| Height | mm | A | 219 |
| | | B | 213 |
| | | B1 | 193 |
| | | B2 | 110 |
| Suction connector | location/I.D. mm angle | C | 9.7 37° |
| | material comment | | Copper Rubber plug |
| Process connector | location/I.D. mm angle | D | 6.5 37° |
| | material comment | | Copper Rubber plug |
| Discharge connector | location/I.D. mm angle | E | 6.5 37° |
| | material comment | | Copper Rubber plug |
| Oil cooler connector | location/I.D. mm angle | F | - |
| | material comment | | - |
| Connector tolerance | I.D. mm | | ±0.09 |
| Remarks: | | | |



- S = Static cooling normally sufficient
- O = Oil cooling
- F₁ = Fan cooling 1.5 m/s
(compressor compartment temperature equal to ambient temperature)
- F₂ = Fan cooling 3.0 m/s necessary
- SG = Suction gas cooling normally sufficient
- = not applicable in this area

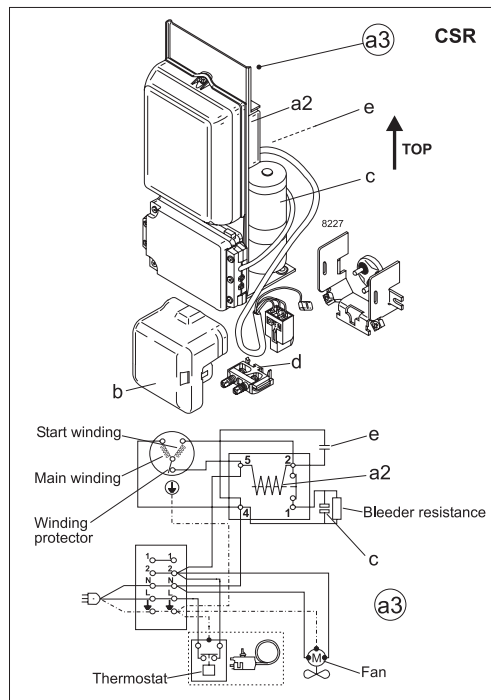


EN 12900 Household (CECOMAF) 220V, 50Hz, fan cooling F₂

| | | | | | | | | | | | | | | | | | |
|--------------------|------|------|------|------|------|-------|------|------|------|------|------|---|---|-----|----|----|----|
| Evap. temp. in °C | -45 | -40 | -35 | -30 | -25 | -23.3 | -20 | -15 | -10 | -6.7 | -5 | 0 | 5 | 7.2 | 10 | 15 | 20 |
| Capacity in W | 167 | 271 | 395 | 542 | 715 | 781 | 918 | 1154 | 1425 | 1625 | 1735 | | | | | | |
| Power cons. in W | 294 | 376 | 455 | 534 | 615 | 643 | 700 | 792 | 894 | 967 | 1008 | | | | | | |
| Current cons. in A | 2.61 | 2.80 | 3.02 | 3.29 | 3.60 | 3.72 | 3.96 | 4.36 | 4.80 | 5.12 | 5.29 | | | | | | |
| COP in W/W | 0.57 | 0.72 | 0.87 | 1.01 | 1.16 | 1.21 | 1.31 | 1.46 | 1.59 | 1.68 | 1.72 | | | | | | |

ASHRAE LBP 220V, 50Hz, fan cooling F₂

| | | | | | | | | | | | | | | | | | |
|--------------------|------|------|------|------|------|-------|------|------|------|------|------|---|---|-----|----|----|----|
| Evap. temp. in °C | -45 | -40 | -35 | -30 | -25 | -23.3 | -20 | -15 | -10 | -6.7 | -5 | 0 | 5 | 7.2 | 10 | 15 | 20 |
| Capacity in W | 193 | 313 | 457 | 628 | 830 | 907 | 1067 | 1342 | 1659 | 1885 | 2022 | | | | | | |
| Power cons. in W | 294 | 376 | 455 | 534 | 615 | 643 | 700 | 792 | 894 | 967 | 1008 | | | | | | |
| Current cons. in A | 2.61 | 2.80 | 3.02 | 3.29 | 3.60 | 3.72 | 3.96 | 4.36 | 4.80 | 5.12 | 5.29 | | | | | | |
| COP in W/W | 0.66 | 0.83 | 1.00 | 1.18 | 1.35 | 1.41 | 1.52 | 1.69 | 1.86 | 1.95 | 2.01 | | | | | | |



| Accessories for | SC18CL | Figure | Code number |
|------------------------|-------------------------|--------|-------------------------------|
| Starting device | 550 mm cable length | a3 | 117-7027 |
| | 650 mm cable length | | 117-7046 |
| | 1000 mm cable length | | 117-7040 |
| Cover | | b | 103N2009 |
| Starting relay | 6.3 mm spade connectors | a2 | Components of starting device |
| Start. capacitor 80 µF | 6.3 mm spade connectors | c | |
| Run capacitor 10 µF | 6.3 mm spade connectors | e | |
| Cord relief | | d | 103N1004 |

| Test conditions | EN 12900/CECOMAF | ASHRAE LBP |
|-------------------------|------------------|------------|
| Condensing temperature | 45°C | 45°C |
| Ambient temperature | 32°C | 32°C |
| Suction gas temperature | 32°C | 32°C |
| Liquid temperature | no subcooling | 32°C |

| Mounting accessories | | Code number |
|--------------------------|----------|-------------|
| Bolt joint for one comp. | Ø: 16 mm | 118-1917 |
| Bolt joint in quantities | Ø: 16 mm | 118-1918 |
| Snap-on in quantities | Ø: 16 mm | 118-1919 |

Nidec GA Compressors accepts no responsibility for possible errors in catalogs, brochures, and other printed material. Nidec GA Compressors reserves the right to alter its products without notice. This also applies to products already on order provided that such alterations can be made without subsequential changes being necessary to specifications already agreed. All trademarks in this material are the property of the respective companies. Secop and the Secop logotype are trademarks of Nidec Global Appliance Germany GmbH. All rights reserved. www.secop.com