



## Datasheets

# Danfoss Reciprocating compressors MT / MTZ / MPZ / NTZ



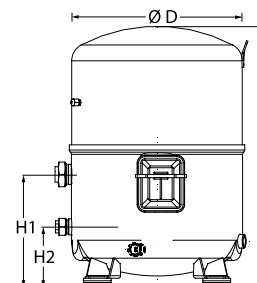
## Datasheet, technical data

## Maneurop reciprocating compressor, MT125-4

### General Characteristics

|                                                   |                                                                       |                  |
|---------------------------------------------------|-----------------------------------------------------------------------|------------------|
| Model number (on compressor nameplate)            |                                                                       | <b>MT125HU4D</b> |
| Code number for Industrial pack**                 |                                                                       | MT125-4M         |
| Drawing number                                    |                                                                       | 8504013e         |
| Suction and discharge connections                 |                                                                       | Rotolock         |
| Suction connection                                |                                                                       | 1-3/4 " Rotolock |
| Discharge connection                              |                                                                       | 1-1/4 " Rotolock |
| Suction connection with supplied sleeve           |                                                                       | 1-1/8 " ODF      |
| Discharge connection with supplied sleeve         |                                                                       | 3/4 " ODF        |
| Oil sight glass                                   |                                                                       | Brazed           |
| Oil equalisation connection                       |                                                                       | None             |
| Oil drain connection                              |                                                                       | None             |
| L.P gauge port                                    |                                                                       | Schrader         |
| IPR valve                                         |                                                                       | 30 bar / 8 bar   |
| Cylinders                                         | 4                                                                     |                  |
| Swept volume                                      | 215,44 cm <sup>3</sup> /rev                                           |                  |
| Displacement @ Nominal speed                      | 37.5 m <sup>3</sup> /h @ 2900 rpm - 45.2 m <sup>3</sup> /h @ 3500 rpm |                  |
| Net weight                                        | 64 kg                                                                 |                  |
| Oil charge                                        | 3,9 litre, Mineral - 160P                                             |                  |
| Maximum system test pressure Low Side / High side | 25 bar(g) / 30 bar(g)                                                 |                  |
| Maximum differential test pressure                | 30 bar                                                                |                  |
| Maximum number of starts per hour                 | 12                                                                    |                  |
| Refrigerant charge limit                          | 10 kg                                                                 |                  |
| Approved refrigerants                             | R22, R417A-160PZ                                                      |                  |

### Dimensions



D=352 mm  
H=519 mm  
H1=233 mm  
H2=125 mm

### Electrical Characteristics

|                                                    |                                     |
|----------------------------------------------------|-------------------------------------|
| Nominal voltage                                    | 380-400V/3/50Hz - 460V/3/60Hz       |
| Voltage range                                      | 340-440 V @ 50Hz - 414-506 V @ 60Hz |
| Winding resistance (between phases) +/- 7% at 25°C | 1.57 #                              |
| Maximum Continuous Current (MCC)                   | 27 A                                |
| Locked Rotor Amps (LRA)                            | 105 A                               |
| Motor protection                                   | Internal overload protector         |

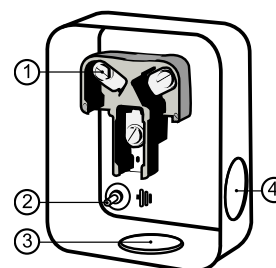
### Recommended Installation torques

|                                      |             |
|--------------------------------------|-------------|
| Oil sight glass                      | 0 Nm        |
| Power connections / Earth connection | 3 Nm / 2 Nm |
| Mounting bolts                       | 50 Nm       |

### Parts shipped with compressor

|                                                              |
|--------------------------------------------------------------|
| Mounting kit with grommets, bolts, nuts, sleeves and washers |
| Initial oil charge                                           |
| Installation instructions                                    |

### Terminal box



IP54 (with cable gland)

- 1: Screw connectors 10-32 UNF x 9.5
- 2: Earth M4-12
- 3: Knock-out Ø 29 mm (1.14")
- 4: Knock-out Ø 25.5 mm (1.00")

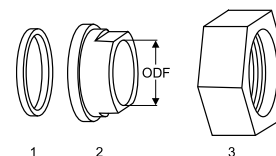
**Approvals :** CE certified, UL certified (file SA6873), -

\*Singlepack: Compressor in cardboard box

\*\*Industrial pack: 6 Unboxed compressors on pallet (order per multiples of 6)

**Datasheet, accessories and spare parts**
**Maneurop reciprocating compressor, MT125-4**
**Rotolock accessories, suction side**
**Code no.**

|                                                   |         |
|---------------------------------------------------|---------|
| Solder sleeve, P02 (1-3/4" Rotolock, 1-1/8" ODF)  | 8153004 |
| Angle adapter, C02 (1-3/4" Rotolock, 1-1/8" ODF)  | 8168005 |
| Rotolock valve, V02 (1-3/4" Rotolock, 1-1/8" ODF) | 8168028 |
| Gasket, 1-3/4"                                    | 8156132 |

**Gaskets, sleeves and nuts**

**Rotolock accessories, discharge side**
**Code no.**

|                                                 |         |
|-------------------------------------------------|---------|
| Solder sleeve, P04 (1-1/4" Rotolock, 3/4" ODF)  | 8153008 |
| Angle adapter, C04 (1-1/4" Rotolock, 3/4" ODF)  | 8168006 |
| Rotolock valve, V04 (1-1/4" Rotolock, 3/4" ODF) | 8168029 |
| Gasket, 1-1/4"                                  | 8156131 |

**Rotolock accessories, sets**
**Code no.**

|                                                           |         |
|-----------------------------------------------------------|---------|
| Angle adapter set, C02 (1-3/4"~1-1/8"), C04 (1-1/4"~3/4") | 7703014 |
| Valve set, V02 (1-3/4"~1-1/8"), V04 (1-1/4"~3/4")         | 7703009 |
| Gasket set, 1", 1-1/4", 1-3/4", OSG gaskets black & white | 8156009 |

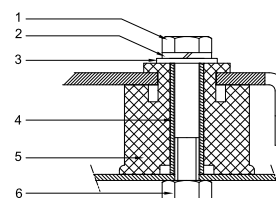
- 1: Gasket  
2: Solder sleeve  
3: Rotolock nut

**Oil / lubricants**
**Code no.**

|                                |         |
|--------------------------------|---------|
| Mineral oil, 160P, 2 litre can | 7754001 |
| Mineral oil, 160P, 5 litre can | 7754002 |

**Crankcase heaters**
**Code no.**

|                                                      |          |
|------------------------------------------------------|----------|
| PTC heater 27W, CE mark, UL                          | 120Z0459 |
| Belt type crankcase heater, 75 W, 230 V, CE mark, UL | 7773108  |
| Belt type crankcase heater, 75 W, 400 V, CE mark, UL | 7773118  |
| Belt type crankcase heater, 75 W, 460 V, CE mark, UL | 120Z0464 |

**Mounting kit**

**Miscellaneous accessories**
**Code no.**

|                                                             |          |
|-------------------------------------------------------------|----------|
| Electronic soft start kit, MCI 25 C                         | 7705007  |
| Soft start kit with statoric resistors, prewired box, SCR03 | 7705001  |
| Acoustic hood for 4 cylinder compressor                     | 120Z0473 |

**Spare parts**
**Code no.**

|                                                                                                      |         |
|------------------------------------------------------------------------------------------------------|---------|
| Mounting kit for 1 and 2 cylinder compressor, including 3 grommets, 3 bolts                          | 8156001 |
| Service kit for terminal box 96 x 115 mm, including 1 cover, 1 clamp, 1 T block connector 52 x 57 mm | 8156135 |
| T block connector 52 x 57 mm                                                                         | 8173230 |

- 1: Bolt (3x)  
2: Lock washer (3x)  
3: Flat washer (3x)  
4: Sleeve (3x)  
5: Grommet (3x)  
6: Nut (3x)

# Datasheet, performance data

# Maneurop reciprocating compressor. MT125-4

## Performance data at 50 Hz, EN 12900 rating conditions

**R22**

| Cond. temp. in<br>°C (tc) | Evaporating temperature in °C (to) |     |     |     |    |   |   |    |    |
|---------------------------|------------------------------------|-----|-----|-----|----|---|---|----|----|
|                           | -25                                | -20 | -15 | -10 | -5 | 0 | 5 | 10 | 15 |

### Cooling capacity in W

|    |       |        |        |        |        |        |        |        |        |
|----|-------|--------|--------|--------|--------|--------|--------|--------|--------|
| 30 | 8 796 | 11 708 | 15 224 | 19 425 | 24 389 | 30 196 | 36 925 | 44 656 | 53 468 |
| 35 | 7 858 | 10 651 | 14 013 | 18 023 | 22 759 | 28 301 | 34 728 | 42 120 | 50 555 |
| 40 | 7 000 | 9 652  | 12 837 | 16 634 | 21 121 | 26 377 | 32 481 | 39 512 | 47 550 |
| 45 | 6 225 | 8 713  | 11 698 | 15 257 | 19 470 | 24 414 | 30 169 | 36 813 | 44 425 |
| 50 | -     | 7 854  | 10 617 | 13 919 | 17 837 | 22 449 | 27 835 | 34 073 | 41 240 |
| 55 | -     | -      | 9 598  | 12 618 | 16 219 | 20 476 | 25 469 | 31 276 | 37 974 |
| 60 | -     | -      | -      | 11 363 | 14 622 | 18 501 | 23 076 | 28 427 | 34 630 |
| 65 | -     | -      | -      | -      | 13 075 | 16 554 | 20 693 | 25 568 | 31 256 |

### Power input in W

|    |       |       |       |       |       |        |        |        |        |
|----|-------|-------|-------|-------|-------|--------|--------|--------|--------|
| 30 | 4 821 | 5 395 | 5 939 | 6 430 | 6 848 | 7 172  | 7 381  | 7 453  | 7 367  |
| 35 | 5 081 | 5 689 | 6 276 | 6 822 | 7 305 | 7 705  | 7 999  | 8 168  | 8 189  |
| 40 | 5 301 | 5 950 | 6 588 | 7 196 | 7 752 | 8 234  | 8 622  | 8 894  | 9 030  |
| 45 | 5 476 | 6 173 | 6 870 | 7 547 | 8 182 | 8 754  | 9 243  | 9 626  | 9 884  |
| 50 | -     | 6 352 | 7 115 | 7 868 | 8 590 | 9 259  | 9 856  | 10 358 | 10 744 |
| 55 | -     | -     | 7 316 | 8 153 | 8 969 | 9 743  | 10 454 | 11 082 | 11 604 |
| 60 | -     | -     | -     | 8 396 | 9 313 | 10 199 | 11 033 | 11 793 | 12 459 |
| 65 | -     | -     | -     | -     | 9 617 | 10 622 | 11 585 | 12 485 | 13 301 |

### Current consumption in A

|    |      |       |       |       |       |       |       |       |       |
|----|------|-------|-------|-------|-------|-------|-------|-------|-------|
| 30 | 8.57 | 9.27  | 9.98  | 10.66 | 11.26 | 11.74 | 12.05 | 12.15 | 11.99 |
| 35 | 8.90 | 9.65  | 10.44 | 11.21 | 11.92 | 12.53 | 12.99 | 13.26 | 13.29 |
| 40 | 9.18 | 10.00 | 10.88 | 11.75 | 12.59 | 13.35 | 13.97 | 14.43 | 14.66 |
| 45 | 9.40 | 10.31 | 11.28 | 12.28 | 13.26 | 14.18 | 14.98 | 15.63 | 16.08 |
| 50 | -    | 10.56 | 11.65 | 12.78 | 13.91 | 15.00 | 16.00 | 16.86 | 17.54 |
| 55 | -    | -     | 11.95 | 13.24 | 14.54 | 15.81 | 17.01 | 18.10 | 19.02 |
| 60 | -    | -     | -     | 13.63 | 15.11 | 16.59 | 18.01 | 19.33 | 20.52 |
| 65 | -    | -     | -     | -     | 15.64 | 17.32 | 18.98 | 20.55 | 22.01 |

### Mass flow in kg/h

|    |     |     |     |     |     |     |     |     |       |
|----|-----|-----|-----|-----|-----|-----|-----|-----|-------|
| 30 | 192 | 253 | 324 | 408 | 505 | 617 | 745 | 892 | 1 057 |
| 35 | 178 | 239 | 310 | 393 | 489 | 601 | 728 | 874 | 1 039 |
| 40 | 165 | 225 | 295 | 377 | 473 | 583 | 709 | 853 | 1 016 |
| 45 | 154 | 212 | 281 | 361 | 455 | 563 | 687 | 828 | 989   |
| 50 | -   | 201 | 267 | 345 | 436 | 541 | 662 | 801 | 958   |
| 55 | -   | -   | 254 | 329 | 416 | 518 | 635 | 770 | 923   |
| 60 | -   | -   | -   | 313 | 396 | 494 | 607 | 737 | 885   |
| 65 | -   | -   | -   | -   | 376 | 468 | 576 | 701 | 845   |

### Coefficient of performance (C.O.P.)

|    |      |      |      |      |      |      |      |      |      |
|----|------|------|------|------|------|------|------|------|------|
| 30 | 1.82 | 2.17 | 2.56 | 3.02 | 3.56 | 4.21 | 5.00 | 5.99 | 7.26 |
| 35 | 1.55 | 1.87 | 2.23 | 2.64 | 3.12 | 3.67 | 4.34 | 5.16 | 6.17 |
| 40 | 1.32 | 1.62 | 1.95 | 2.31 | 2.72 | 3.20 | 3.77 | 4.44 | 5.27 |
| 45 | 1.14 | 1.41 | 1.70 | 2.02 | 2.38 | 2.79 | 3.26 | 3.82 | 4.49 |
| 50 | -    | 1.24 | 1.49 | 1.77 | 2.08 | 2.42 | 2.82 | 3.29 | 3.84 |
| 55 | -    | -    | 1.31 | 1.55 | 1.81 | 2.10 | 2.44 | 2.82 | 3.27 |
| 60 | -    | -    | -    | 1.35 | 1.57 | 1.81 | 2.09 | 2.41 | 2.78 |
| 65 | -    | -    | -    | -    | 1.36 | 1.56 | 1.79 | 2.05 | 2.35 |

### Nominal performance at to = 5 °C, tc = 50 °C

|                     |        |      |
|---------------------|--------|------|
| Cooling capacity    | 27 835 | W    |
| Power input         | 9 856  | W    |
| Current consumption | 16.00  | A    |
| Mass flow           | 662    | kg/h |
| C.O.P.              | 2.82   |      |

to: Evaporating temperature at dew point

tc: Condensing temperature at dew point

Rating conditions : Superheat = 10 K , Subcooling = 0 K

### Pressure switch settings

|                           |      |        |
|---------------------------|------|--------|
| Maximum HP switch setting | 27.7 | bar(g) |
| Minimum LP switch setting | 0.2  | bar(g) |
| LP pump down setting      | 0.9  | bar(g) |

### Sound power data

|                    |   |       |
|--------------------|---|-------|
| Sound power level  | 0 | dB(A) |
| With acoustic hood | 0 | dB(A) |

All performance data +/- 5%

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**Datasheet, performance data**
**Maneurop reciprocating compressor. MT125-4**
**Performance data at 50 Hz, ARI rating conditions**
**R22**

| Cond. temp. in<br>°C (tc) | Evaporating temperature in °C (to) |     |     |     |    |   |   |    |    |
|---------------------------|------------------------------------|-----|-----|-----|----|---|---|----|----|
|                           | -25                                | -20 | -15 | -10 | -5 | 0 | 5 | 10 | 15 |

**Cooling capacity in W**

|    |       |        |        |        |        |        |        |        |        |
|----|-------|--------|--------|--------|--------|--------|--------|--------|--------|
| 30 | 9 340 | 12 422 | 16 140 | 20 578 | 25 819 | 31 943 | 39 035 | 47 177 | 56 450 |
| 35 | 8 375 | 11 342 | 14 909 | 19 159 | 24 175 | 30 039 | 36 833 | 44 641 | 53 545 |
| 40 | 7 489 | 10 316 | 13 708 | 17 746 | 22 514 | 28 093 | 34 566 | 42 016 | 50 525 |
| 45 | 6 693 | 9 358  | 12 550 | 16 352 | 20 847 | 26 117 | 32 245 | 39 313 | 47 404 |
| 50 | -     | 8 477  | 11 445 | 14 988 | 19 186 | 24 123 | 29 882 | 36 544 | 44 192 |
| 55 | -     | -      | 10 407 | 13 665 | 17 543 | 22 123 | 27 487 | 33 720 | 40 901 |
| 60 | -     | -      | -      | 12 396 | 15 929 | 20 127 | 25 074 | 30 852 | 37 544 |
| 65 | -     | -      | -      | -      | 14 355 | 18 149 | 22 654 | 27 954 | 34 130 |

**Power input in W**

|    |       |       |       |       |       |        |        |        |        |
|----|-------|-------|-------|-------|-------|--------|--------|--------|--------|
| 30 | 4 821 | 5 395 | 5 939 | 6 430 | 6 848 | 7 172  | 7 381  | 7 453  | 7 367  |
| 35 | 5 081 | 5 689 | 6 276 | 6 822 | 7 305 | 7 705  | 7 999  | 8 168  | 8 189  |
| 40 | 5 301 | 5 950 | 6 588 | 7 196 | 7 752 | 8 234  | 8 622  | 8 894  | 9 030  |
| 45 | 5 476 | 6 173 | 6 870 | 7 547 | 8 182 | 8 754  | 9 243  | 9 626  | 9 884  |
| 50 | -     | 6 352 | 7 115 | 7 868 | 8 590 | 9 259  | 9 856  | 10 358 | 10 744 |
| 55 | -     | -     | 7 316 | 8 153 | 8 969 | 9 743  | 10 454 | 11 082 | 11 604 |
| 60 | -     | -     | -     | 8 396 | 9 313 | 10 199 | 11 033 | 11 793 | 12 459 |
| 65 | -     | -     | -     | -     | 9 617 | 10 622 | 11 585 | 12 485 | 13 301 |

**Current consumption in A**

|    |      |       |       |       |       |       |       |       |       |
|----|------|-------|-------|-------|-------|-------|-------|-------|-------|
| 30 | 8.57 | 9.27  | 9.98  | 10.66 | 11.26 | 11.74 | 12.05 | 12.15 | 11.99 |
| 35 | 8.90 | 9.65  | 10.44 | 11.21 | 11.92 | 12.53 | 12.99 | 13.26 | 13.29 |
| 40 | 9.18 | 10.00 | 10.88 | 11.75 | 12.59 | 13.35 | 13.97 | 14.43 | 14.66 |
| 45 | 9.40 | 10.31 | 11.28 | 12.28 | 13.26 | 14.18 | 14.98 | 15.63 | 16.08 |
| 50 | -    | 10.56 | 11.65 | 12.78 | 13.91 | 15.00 | 16.00 | 16.86 | 17.54 |
| 55 | -    | -     | 11.95 | 13.24 | 14.54 | 15.81 | 17.01 | 18.10 | 19.02 |
| 60 | -    | -     | -     | 13.63 | 15.11 | 16.59 | 18.01 | 19.33 | 20.52 |
| 65 | -    | -     | -     | -     | 15.64 | 17.32 | 18.98 | 20.55 | 22.01 |

**Mass flow in kg/h**

|    |     |     |     |     |     |     |     |     |       |
|----|-----|-----|-----|-----|-----|-----|-----|-----|-------|
| 30 | 191 | 251 | 322 | 405 | 502 | 613 | 741 | 886 | 1 051 |
| 35 | 177 | 237 | 308 | 391 | 487 | 598 | 724 | 869 | 1 033 |
| 40 | 164 | 224 | 294 | 375 | 470 | 580 | 705 | 848 | 1 010 |
| 45 | 153 | 211 | 280 | 360 | 452 | 560 | 683 | 824 | 983   |
| 50 | -   | 200 | 266 | 343 | 434 | 538 | 659 | 796 | 952   |
| 55 | -   | -   | 253 | 327 | 414 | 515 | 632 | 766 | 918   |
| 60 | -   | -   | -   | 311 | 394 | 491 | 603 | 733 | 880   |
| 65 | -   | -   | -   | -   | 374 | 466 | 573 | 697 | 840   |

**Coefficient of performance (C.O.P.)**

|    |      |      |      |      |      |      |      |      |      |
|----|------|------|------|------|------|------|------|------|------|
| 30 | 1.94 | 2.30 | 2.72 | 3.20 | 3.77 | 4.45 | 5.29 | 6.33 | 7.66 |
| 35 | 1.65 | 1.99 | 2.38 | 2.81 | 3.31 | 3.90 | 4.60 | 5.47 | 6.54 |
| 40 | 1.41 | 1.73 | 2.08 | 2.47 | 2.90 | 3.41 | 4.01 | 4.72 | 5.60 |
| 45 | 1.22 | 1.52 | 1.83 | 2.17 | 2.55 | 2.98 | 3.49 | 4.08 | 4.80 |
| 50 | -    | 1.33 | 1.61 | 1.90 | 2.23 | 2.61 | 3.03 | 3.53 | 4.11 |
| 55 | -    | -    | 1.42 | 1.68 | 1.96 | 2.27 | 2.63 | 3.04 | 3.52 |
| 60 | -    | -    | -    | 1.48 | 1.71 | 1.97 | 2.27 | 2.62 | 3.01 |
| 65 | -    | -    | -    | -    | 1.49 | 1.71 | 1.96 | 2.24 | 2.57 |

**Nominal performance at to = 7.2 °C, tc = 54.4 °C**

|                     |        |      |
|---------------------|--------|------|
| Cooling capacity    | 30 429 | W    |
| Power input         | 10 664 | W    |
| Current consumption | 17.37  | A    |
| Mass flow           | 692    | kg/h |
| C.O.P.              | 2.85   |      |

to: Evaporating temperature at dew point

tc: Condensing temperature at dew point

Rating conditions : Superheat = 11.1 K , Subcooling = 8.3 K

**Pressure switch settings**

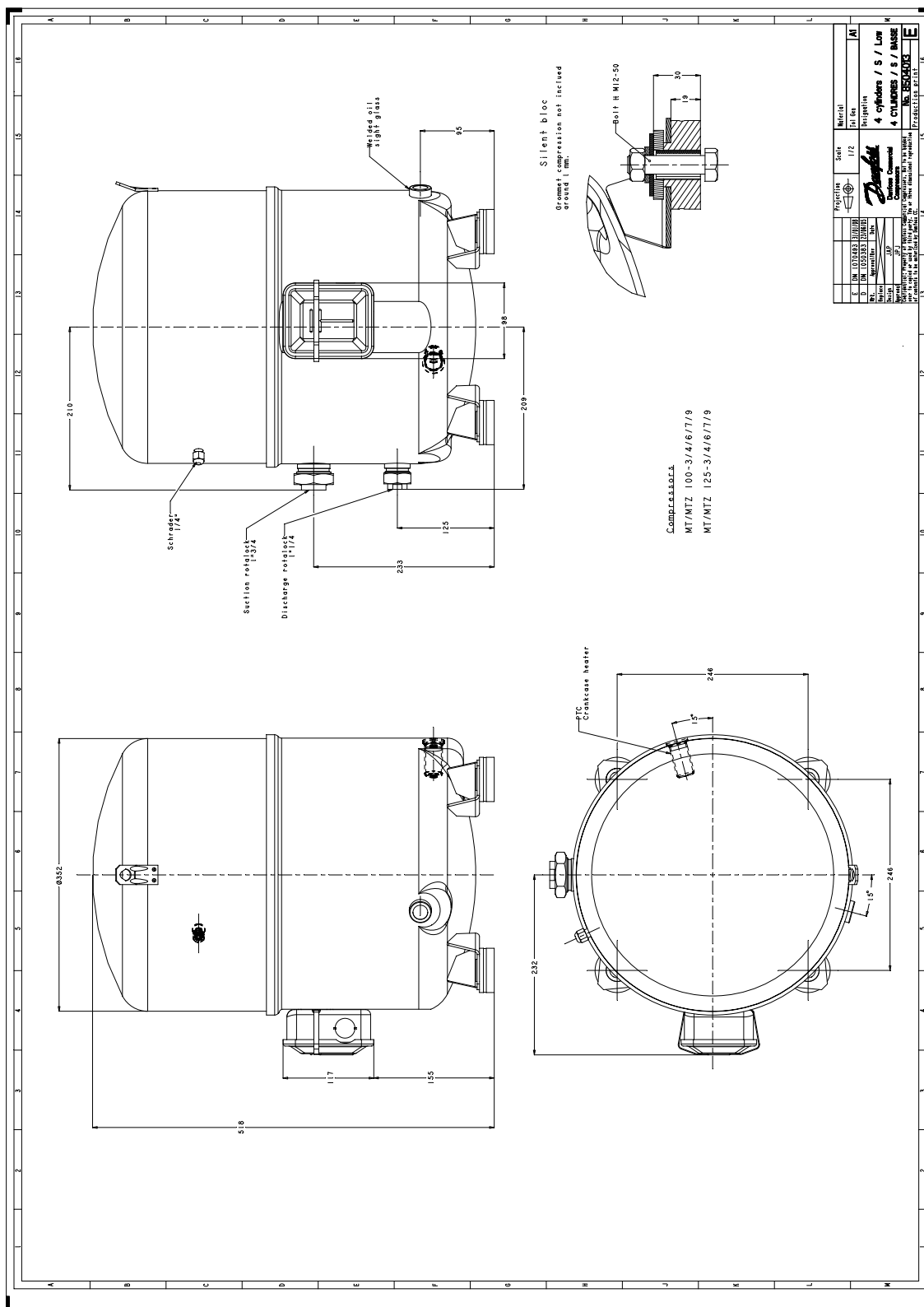
|                           |      |        |
|---------------------------|------|--------|
| Maximum HP switch setting | 27.7 | bar(g) |
| Minimum LP switch setting | 0.2  | bar(g) |
| LP pump down setting      | 0.9  | bar(g) |

**Sound power data**

|                    |   |       |
|--------------------|---|-------|
| Sound power level  | 0 | dB(A) |
| With acoustic hood | 0 | dB(A) |

All performance data +/- 5%

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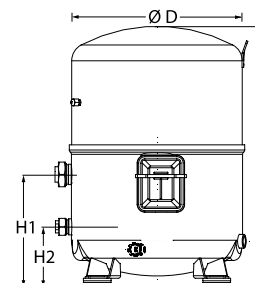
**Datasheet, technical data**

**Maneurop reciprocating compressor, MT125-4**

**General Characteristics**

|                                                   |                                                                       |                    |
|---------------------------------------------------|-----------------------------------------------------------------------|--------------------|
| Model number (on compressor nameplate)            |                                                                       | <b>MT125HU4DVE</b> |
| Code number for Singlepack*                       |                                                                       | MT125-4VI          |
| Code number for Industrial pack**                 |                                                                       | MT125-4VM          |
| Drawing number                                    |                                                                       | 8504010f           |
| Suction and discharge connections                 |                                                                       | Rotolock           |
| Suction connection                                |                                                                       | 1-3/4 " Rotolock   |
| Discharge connection                              |                                                                       | 1-1/4 " Rotolock   |
| Suction connection with supplied sleeve           |                                                                       | 1-1/8 " ODF        |
| Discharge connection with supplied sleeve         |                                                                       | 3/4 " ODF          |
| Oil sight glass                                   |                                                                       | Threaded           |
| Oil equalisation connection                       |                                                                       | 3/8" flare SAE     |
| Oil drain connection                              |                                                                       | None               |
| LP gauge port                                     |                                                                       | Schrader           |
| IPR valve                                         |                                                                       | 30 bar / 8 bar     |
| Cylinders                                         | 4                                                                     |                    |
| Swept volume                                      | 215,44 cm <sup>3</sup> /rev                                           |                    |
| Displacement @ Nominal speed                      | 37.5 m <sup>3</sup> /h @ 2900 rpm - 45.2 m <sup>3</sup> /h @ 3500 rpm |                    |
| Net weight                                        | 64 kg                                                                 |                    |
| Oil charge                                        | 3,9 litre, Mineral - 160P                                             |                    |
| Maximum system test pressure Low Side / High side | 25 bar(g) / 30 bar(g)                                                 |                    |
| Maximum differential test pressure                | 30 bar                                                                |                    |
| Maximum number of starts per hour                 | 12                                                                    |                    |
| Refrigerant charge limit                          | 10 kg                                                                 |                    |
| Approved refrigerants                             | R22, R417A-160PZ                                                      |                    |

**Dimensions**

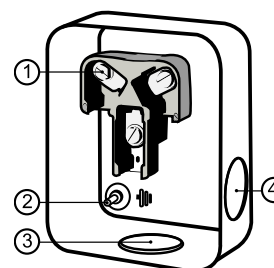


D=352 mm  
H=519 mm  
H1=233 mm  
H2=125 mm

**Electrical Characteristics**

|                                                    |                                     |
|----------------------------------------------------|-------------------------------------|
| Nominal voltage                                    | 380-400V/3/50Hz - 460V/3/60Hz       |
| Voltage range                                      | 340-440 V @ 50Hz - 414-506 V @ 60Hz |
| Winding resistance (between phases) +/- 7% at 25°C | 1.57 #                              |
| Maximum Continuous Current (MCC)                   | 27 A                                |
| Locked Rotor Amps (LRA)                            | 105 A                               |
| Motor protection                                   | Internal overload protector         |

**Terminal box**



IP54 (with cable gland)

- 1: Screw connectors 10-32 UNF x 9.5
- 2: Earth M4-12
- 3: Knock-out Ø 29 mm (1.14")
- 4: Knock-out Ø 25.5 mm (1.00")

**Recommended Installation torques**

|                                      |             |
|--------------------------------------|-------------|
| Oil sight glass                      | 50 Nm       |
| Power connections / Earth connection | 3 Nm / 2 Nm |
| Mounting bolts                       | 50 Nm       |

**Parts shipped with compressor**

|                                                                                                    |
|----------------------------------------------------------------------------------------------------|
| Mounting kit with grommets, bolts, nuts, sleeves and washers                                       |
| Suction & Discharge solder sleeves, rotolock nuts and gaskets (shipped with rotolock version only) |
| Initial oil charge                                                                                 |
| Installation instructions                                                                          |

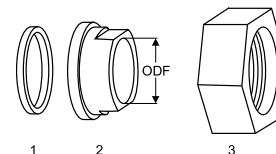
**Approvals :** CE certified, UL certified (file SA6873), -

\*Singlepack: Compressor in cardboard box

\*\*Industrial pack: 6 Unboxed compressors on pallet (order per multiples of 6)

**Datasheet, accessories and spare parts**
**Maneurop reciprocating compressor, MT125-4**
**Rotolock accessories, suction side**
**Code no.**

|                                                   |         |
|---------------------------------------------------|---------|
| Solder sleeve, P02 (1-3/4" Rotolock, 1-1/8" ODF)  | 8153004 |
| Angle adapter, C02 (1-3/4" Rotolock, 1-1/8" ODF)  | 8168005 |
| Rotolock valve, V02 (1-3/4" Rotolock, 1-1/8" ODF) | 8168028 |
| Gasket, 1-3/4"                                    | 8156132 |

**Gaskets, sleeves and nuts**

**Rotolock accessories, discharge side**
**Code no.**

|                                                 |         |
|-------------------------------------------------|---------|
| Solder sleeve, P04 (1-1/4" Rotolock, 3/4" ODF)  | 8153008 |
| Angle adapter, C04 (1-1/4" Rotolock, 3/4" ODF)  | 8168006 |
| Rotolock valve, V04 (1-1/4" Rotolock, 3/4" ODF) | 8168029 |
| Gasket, 1-1/4"                                  | 8156131 |

**Rotolock accessories, sets**
**Code no.**

|                                                           |         |
|-----------------------------------------------------------|---------|
| Angle adapter set, C02 (1-3/4"~1-1/8"), C04 (1-1/4"~3/4") | 7703014 |
| Valve set, V02 (1-3/4"~1-1/8"), V04 (1-1/4"~3/4")         | 7703009 |
| Gasket set, 1", 1-1/4", 1-3/4", OSG gaskets black & white | 8156009 |

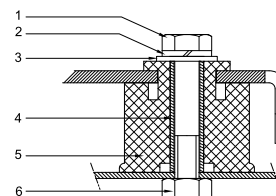
- 1: Gasket  
2: Solder sleeve  
3: Rotolock nut

**Oil / lubricants**
**Code no.**

|                                |         |
|--------------------------------|---------|
| Mineral oil, 160P, 2 litre can | 7754001 |
| Mineral oil, 160P, 5 litre can | 7754002 |

**Crankcase heaters**
**Code no.**

|                                                      |          |
|------------------------------------------------------|----------|
| PTC heater 27W, CE mark, UL                          | 120Z0459 |
| Belt type crankcase heater, 75 W, 230 V, CE mark, UL | 7773108  |
| Belt type crankcase heater, 75 W, 400 V, CE mark, UL | 7773118  |
| Belt type crankcase heater, 75 W, 460 V, CE mark, UL | 120Z0464 |

**Mounting kit**

**Miscellaneous accessories**
**Code no.**

|                                                             |          |
|-------------------------------------------------------------|----------|
| Electronic soft start kit, MCI 25 C                         | 7705007  |
| Soft start kit with statoric resistors, prewired box, SCR03 | 7705001  |
| Acoustic hood for 4 cylinder compressor                     | 120Z0473 |
| Oil equalisation nut                                        | 8153127  |

**Spare parts**
**Code no.**

|                                                                                                      |         |
|------------------------------------------------------------------------------------------------------|---------|
| Mounting kit for 4 cylinder compressor & MS, including 4 grommets, 4 bolts                           | 8156007 |
| Oil sight glass with gaskets (black & white)                                                         | 8156019 |
| Gasket for oil sight glass (black chloroprene)                                                       | 8156145 |
| Service kit for terminal box 96 x 115 mm, including 1 cover, 1 clamp, 1 T block connector 52 x 57 mm | 8156135 |
| T block connector 52 x 57 mm                                                                         | 8173230 |

- 1: Bolt (4x)  
2: Lock washer (4x)  
3: Flat washer (4x)  
4: Sleeve (4x)  
5: Grommet (4x)  
6: Nut (4x)

**Datasheet, performance data**
**Maneurop reciprocating compressor. MT125-4**
**Performance data at 50 Hz, EN 12900 rating conditions**
**R22**

| Cond. temp. in<br>°C (tc) | Evaporating temperature in °C (to) |     |     |     |    |   |   |    |    |
|---------------------------|------------------------------------|-----|-----|-----|----|---|---|----|----|
|                           | -25                                | -20 | -15 | -10 | -5 | 0 | 5 | 10 | 15 |

**Cooling capacity in W**

|    |       |        |        |        |        |        |        |        |        |
|----|-------|--------|--------|--------|--------|--------|--------|--------|--------|
| 30 | 8 796 | 11 708 | 15 224 | 19 425 | 24 389 | 30 196 | 36 925 | 44 656 | 53 468 |
| 35 | 7 858 | 10 651 | 14 013 | 18 023 | 22 759 | 28 301 | 34 728 | 42 120 | 50 555 |
| 40 | 7 000 | 9 652  | 12 837 | 16 634 | 21 121 | 26 377 | 32 481 | 39 512 | 47 550 |
| 45 | 6 225 | 8 713  | 11 698 | 15 257 | 19 470 | 24 414 | 30 169 | 36 813 | 44 425 |
| 50 | -     | 7 854  | 10 617 | 13 919 | 17 837 | 22 449 | 27 835 | 34 073 | 41 240 |
| 55 | -     | -      | 9 598  | 12 618 | 16 219 | 20 476 | 25 469 | 31 276 | 37 974 |
| 60 | -     | -      | -      | 11 363 | 14 622 | 18 501 | 23 076 | 28 427 | 34 630 |
| 65 | -     | -      | -      | -      | 13 075 | 16 554 | 20 693 | 25 568 | 31 256 |

**Power input in W**

|    |       |       |       |       |       |        |        |        |        |
|----|-------|-------|-------|-------|-------|--------|--------|--------|--------|
| 30 | 4 821 | 5 395 | 5 939 | 6 430 | 6 848 | 7 172  | 7 381  | 7 453  | 7 367  |
| 35 | 5 081 | 5 689 | 6 276 | 6 822 | 7 305 | 7 705  | 7 999  | 8 168  | 8 189  |
| 40 | 5 301 | 5 950 | 6 588 | 7 196 | 7 752 | 8 234  | 8 622  | 8 894  | 9 030  |
| 45 | 5 476 | 6 173 | 6 870 | 7 547 | 8 182 | 8 754  | 9 243  | 9 626  | 9 884  |
| 50 | -     | 6 352 | 7 115 | 7 868 | 8 590 | 9 259  | 9 856  | 10 358 | 10 744 |
| 55 | -     | -     | 7 316 | 8 153 | 8 969 | 9 743  | 10 454 | 11 082 | 11 604 |
| 60 | -     | -     | -     | 8 396 | 9 313 | 10 199 | 11 033 | 11 793 | 12 459 |
| 65 | -     | -     | -     | -     | 9 617 | 10 622 | 11 585 | 12 485 | 13 301 |

**Current consumption in A**

|    |      |       |       |       |       |       |       |       |       |
|----|------|-------|-------|-------|-------|-------|-------|-------|-------|
| 30 | 8.57 | 9.27  | 9.98  | 10.66 | 11.26 | 11.74 | 12.05 | 12.15 | 11.99 |
| 35 | 8.90 | 9.65  | 10.44 | 11.21 | 11.92 | 12.53 | 12.99 | 13.26 | 13.29 |
| 40 | 9.18 | 10.00 | 10.88 | 11.75 | 12.59 | 13.35 | 13.97 | 14.43 | 14.66 |
| 45 | 9.40 | 10.31 | 11.28 | 12.28 | 13.26 | 14.18 | 14.98 | 15.63 | 16.08 |
| 50 | -    | 10.56 | 11.65 | 12.78 | 13.91 | 15.00 | 16.00 | 16.86 | 17.54 |
| 55 | -    | -     | 11.95 | 13.24 | 14.54 | 15.81 | 17.01 | 18.10 | 19.02 |
| 60 | -    | -     | -     | 13.63 | 15.11 | 16.59 | 18.01 | 19.33 | 20.52 |
| 65 | -    | -     | -     | -     | 15.64 | 17.32 | 18.98 | 20.55 | 22.01 |

**Mass flow in kg/h**

|    |     |     |     |     |     |     |     |     |       |
|----|-----|-----|-----|-----|-----|-----|-----|-----|-------|
| 30 | 192 | 253 | 324 | 408 | 505 | 617 | 745 | 892 | 1 057 |
| 35 | 178 | 239 | 310 | 393 | 489 | 601 | 728 | 874 | 1 039 |
| 40 | 165 | 225 | 295 | 377 | 473 | 583 | 709 | 853 | 1 016 |
| 45 | 154 | 212 | 281 | 361 | 455 | 563 | 687 | 828 | 989   |
| 50 | -   | 201 | 267 | 345 | 436 | 541 | 662 | 801 | 958   |
| 55 | -   | -   | 254 | 329 | 416 | 518 | 635 | 770 | 923   |
| 60 | -   | -   | -   | 313 | 396 | 494 | 607 | 737 | 885   |
| 65 | -   | -   | -   | -   | 376 | 468 | 576 | 701 | 845   |

**Coefficient of performance (C.O.P.)**

|    |      |      |      |      |      |      |      |      |      |
|----|------|------|------|------|------|------|------|------|------|
| 30 | 1.82 | 2.17 | 2.56 | 3.02 | 3.56 | 4.21 | 5.00 | 5.99 | 7.26 |
| 35 | 1.55 | 1.87 | 2.23 | 2.64 | 3.12 | 3.67 | 4.34 | 5.16 | 6.17 |
| 40 | 1.32 | 1.62 | 1.95 | 2.31 | 2.72 | 3.20 | 3.77 | 4.44 | 5.27 |
| 45 | 1.14 | 1.41 | 1.70 | 2.02 | 2.38 | 2.79 | 3.26 | 3.82 | 4.49 |
| 50 | -    | 1.24 | 1.49 | 1.77 | 2.08 | 2.42 | 2.82 | 3.29 | 3.84 |
| 55 | -    | -    | 1.31 | 1.55 | 1.81 | 2.10 | 2.44 | 2.82 | 3.27 |
| 60 | -    | -    | -    | 1.35 | 1.57 | 1.81 | 2.09 | 2.41 | 2.78 |
| 65 | -    | -    | -    | -    | 1.36 | 1.56 | 1.79 | 2.05 | 2.35 |

**Nominal performance at to = 5 °C, tc = 50 °C**

|                     |        |      |
|---------------------|--------|------|
| Cooling capacity    | 27 835 | W    |
| Power input         | 9 856  | W    |
| Current consumption | 16.00  | A    |
| Mass flow           | 662    | kg/h |
| C.O.P.              | 2.82   |      |

to: Evaporating temperature at dew point

tc: Condensing temperature at dew point

Rating conditions : Superheat = 10 K , Subcooling = 0 K

**Pressure switch settings**

|                           |      |        |
|---------------------------|------|--------|
| Maximum HP switch setting | 27.7 | bar(g) |
| Minimum LP switch setting | 0.2  | bar(g) |
| LP pump down setting      | 0.9  | bar(g) |

**Sound power data**

|                    |   |       |
|--------------------|---|-------|
| Sound power level  | 0 | dB(A) |
| With acoustic hood | 0 | dB(A) |

All performance data +/- 5%

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**Datasheet, performance data**
**Maneurop reciprocating compressor. MT125-4**
**Performance data at 50 Hz, ARI rating conditions**
**R22**

| Cond. temp. in<br>°C (tc) | Evaporating temperature in °C (to) |     |     |     |    |   |   |    |    |
|---------------------------|------------------------------------|-----|-----|-----|----|---|---|----|----|
|                           | -25                                | -20 | -15 | -10 | -5 | 0 | 5 | 10 | 15 |

**Cooling capacity in W**

|    |       |        |        |        |        |        |        |        |        |
|----|-------|--------|--------|--------|--------|--------|--------|--------|--------|
| 30 | 9 340 | 12 422 | 16 140 | 20 578 | 25 819 | 31 943 | 39 035 | 47 177 | 56 450 |
| 35 | 8 375 | 11 342 | 14 909 | 19 159 | 24 175 | 30 039 | 36 833 | 44 641 | 53 545 |
| 40 | 7 489 | 10 316 | 13 708 | 17 746 | 22 514 | 28 093 | 34 566 | 42 016 | 50 525 |
| 45 | 6 693 | 9 358  | 12 550 | 16 352 | 20 847 | 26 117 | 32 245 | 39 313 | 47 404 |
| 50 | -     | 8 477  | 11 445 | 14 988 | 19 186 | 24 123 | 29 882 | 36 544 | 44 192 |
| 55 | -     | -      | 10 407 | 13 665 | 17 543 | 22 123 | 27 487 | 33 720 | 40 901 |
| 60 | -     | -      | -      | 12 396 | 15 929 | 20 127 | 25 074 | 30 852 | 37 544 |
| 65 | -     | -      | -      | -      | 14 355 | 18 149 | 22 654 | 27 954 | 34 130 |

**Power input in W**

|    |       |       |       |       |       |        |        |        |        |
|----|-------|-------|-------|-------|-------|--------|--------|--------|--------|
| 30 | 4 821 | 5 395 | 5 939 | 6 430 | 6 848 | 7 172  | 7 381  | 7 453  | 7 367  |
| 35 | 5 081 | 5 689 | 6 276 | 6 822 | 7 305 | 7 705  | 7 999  | 8 168  | 8 189  |
| 40 | 5 301 | 5 950 | 6 588 | 7 196 | 7 752 | 8 234  | 8 622  | 8 894  | 9 030  |
| 45 | 5 476 | 6 173 | 6 870 | 7 547 | 8 182 | 8 754  | 9 243  | 9 626  | 9 884  |
| 50 | -     | 6 352 | 7 115 | 7 868 | 8 590 | 9 259  | 9 856  | 10 358 | 10 744 |
| 55 | -     | -     | 7 316 | 8 153 | 8 969 | 9 743  | 10 454 | 11 082 | 11 604 |
| 60 | -     | -     | -     | 8 396 | 9 313 | 10 199 | 11 033 | 11 793 | 12 459 |
| 65 | -     | -     | -     | -     | 9 617 | 10 622 | 11 585 | 12 485 | 13 301 |

**Current consumption in A**

|    |      |       |       |       |       |       |       |       |       |
|----|------|-------|-------|-------|-------|-------|-------|-------|-------|
| 30 | 8.57 | 9.27  | 9.98  | 10.66 | 11.26 | 11.74 | 12.05 | 12.15 | 11.99 |
| 35 | 8.90 | 9.65  | 10.44 | 11.21 | 11.92 | 12.53 | 12.99 | 13.26 | 13.29 |
| 40 | 9.18 | 10.00 | 10.88 | 11.75 | 12.59 | 13.35 | 13.97 | 14.43 | 14.66 |
| 45 | 9.40 | 10.31 | 11.28 | 12.28 | 13.26 | 14.18 | 14.98 | 15.63 | 16.08 |
| 50 | -    | 10.56 | 11.65 | 12.78 | 13.91 | 15.00 | 16.00 | 16.86 | 17.54 |
| 55 | -    | -     | 11.95 | 13.24 | 14.54 | 15.81 | 17.01 | 18.10 | 19.02 |
| 60 | -    | -     | -     | 13.63 | 15.11 | 16.59 | 18.01 | 19.33 | 20.52 |
| 65 | -    | -     | -     | -     | 15.64 | 17.32 | 18.98 | 20.55 | 22.01 |

**Mass flow in kg/h**

|    |     |     |     |     |     |     |     |     |       |
|----|-----|-----|-----|-----|-----|-----|-----|-----|-------|
| 30 | 191 | 251 | 322 | 405 | 502 | 613 | 741 | 886 | 1 051 |
| 35 | 177 | 237 | 308 | 391 | 487 | 598 | 724 | 869 | 1 033 |
| 40 | 164 | 224 | 294 | 375 | 470 | 580 | 705 | 848 | 1 010 |
| 45 | 153 | 211 | 280 | 360 | 452 | 560 | 683 | 824 | 983   |
| 50 | -   | 200 | 266 | 343 | 434 | 538 | 659 | 796 | 952   |
| 55 | -   | -   | 253 | 327 | 414 | 515 | 632 | 766 | 918   |
| 60 | -   | -   | -   | 311 | 394 | 491 | 603 | 733 | 880   |
| 65 | -   | -   | -   | -   | 374 | 466 | 573 | 697 | 840   |

**Coefficient of performance (C.O.P.)**

|    |      |      |      |      |      |      |      |      |      |
|----|------|------|------|------|------|------|------|------|------|
| 30 | 1.94 | 2.30 | 2.72 | 3.20 | 3.77 | 4.45 | 5.29 | 6.33 | 7.66 |
| 35 | 1.65 | 1.99 | 2.38 | 2.81 | 3.31 | 3.90 | 4.60 | 5.47 | 6.54 |
| 40 | 1.41 | 1.73 | 2.08 | 2.47 | 2.90 | 3.41 | 4.01 | 4.72 | 5.60 |
| 45 | 1.22 | 1.52 | 1.83 | 2.17 | 2.55 | 2.98 | 3.49 | 4.08 | 4.80 |
| 50 | -    | 1.33 | 1.61 | 1.90 | 2.23 | 2.61 | 3.03 | 3.53 | 4.11 |
| 55 | -    | -    | 1.42 | 1.68 | 1.96 | 2.27 | 2.63 | 3.04 | 3.52 |
| 60 | -    | -    | -    | 1.48 | 1.71 | 1.97 | 2.27 | 2.62 | 3.01 |
| 65 | -    | -    | -    | -    | 1.49 | 1.71 | 1.96 | 2.24 | 2.57 |

**Nominal performance at to = 7.2 °C, tc = 54.4 °C**

|                     |        |      |
|---------------------|--------|------|
| Cooling capacity    | 30 429 | W    |
| Power input         | 10 664 | W    |
| Current consumption | 17.37  | A    |
| Mass flow           | 692    | kg/h |
| C.O.P.              | 2.85   |      |

to: Evaporating temperature at dew point

tc: Condensing temperature at dew point

Rating conditions : Superheat = 11.1 K , Subcooling = 8.3 K

**Pressure switch settings**

|                           |      |        |
|---------------------------|------|--------|
| Maximum HP switch setting | 27.7 | bar(g) |
| Minimum LP switch setting | 0.2  | bar(g) |
| LP pump down setting      | 0.9  | bar(g) |

**Sound power data**

|                    |   |       |
|--------------------|---|-------|
| Sound power level  | 0 | dB(A) |
| With acoustic hood | 0 | dB(A) |

All performance data +/- 5%

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