

**Qty. Description**

1 TP 50-180/2 A-F-A-BQQE-FW1


**Note! Product picture may differ from actual product**

Product No.: [98133648](#)

Single-stage, close-coupled, volute pump with in-line suction and discharge ports of identical diameter. The pump is of the top-pull-out design, i.e. the power head (motor, pump head and impeller) can be removed for maintenance or service while the pump housing remains in the pipework.

The pump is fitted with an unbalanced rubber bellows seal. The shaft seal is according to EN 12756. Pipework connection is via PN 6/10 DIN flanges (EN 1092-2 and ISO 7005-2).

The pump is fitted with a fan-cooled asynchronous motor.

**Controls:**

Frequency converter: None

**Liquid:**

Pumped liquid: Water

Liquid temperature range: -25 .. 120 °C

Selected liquid temperature: 20 °C

Density: 998.2 kg/m<sup>3</sup>
**Technical:**

Pump speed on which pump data are based: 2850 rpm

Rated flow: 18.3 m<sup>3</sup>/h

Rated head: 10.2 m

Actual impeller diameter: 100 mm

Code for shaft seal: BQQE

Curve tolerance: ISO9906:2012 3B2

**Materials:**

Pump housing: Cast iron  
EN-GJL-250  
ASTM class 35

Impeller: Stainless steel  
EN 1.4301  
AISI 304

**Installation:**

Range of ambient temperature: -30 .. 60 °C

Maximum operating pressure: 10 bar

Max pressure at stated temp: 10 bar / 120 °C

Type of connection: DIN

Size of connection: DN 50

Pressure rating for connection: PN 6/10

Port-to-port length: 280 mm

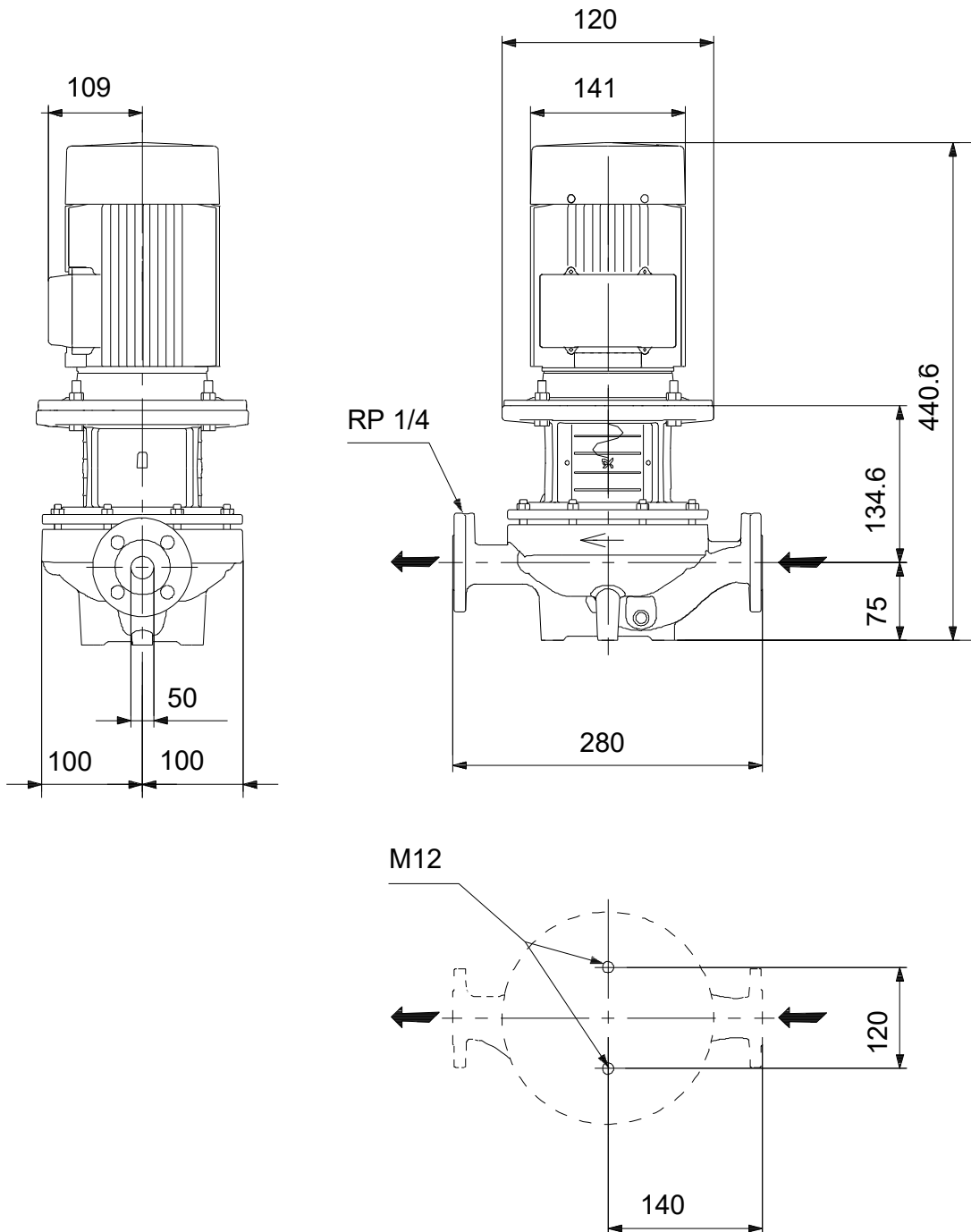
Flange size for motor: FT100

**Electrical data:**

Motor type: 80A

| Qty.                             | Description   |                   |         |                  |       |                |                         |                |             |                   |           |                         |           |              |               |                      |     |                                |             |                               |             |                               |             |                  |   |                             |                 |                            |   |           |          |         |  |                                  |      |             |         |               |         |                  |                     |                 |           |                  |         |                    |         |                    |    |                    |          |
|----------------------------------|---|-------------------|---------|------------------|-------|----------------|-------------------------|----------------|-------------|-------------------|-----------|-------------------------|-----------|--------------|---------------|----------------------|-----|--------------------------------|-------------|-------------------------------|-------------|-------------------------------|-------------|------------------|---|-----------------------------|-----------------|----------------------------|---|-----------|----------|---------|--|----------------------------------|------|-------------|---------|---------------|---------|------------------|---------------------|-----------------|-----------|------------------|---------|--------------------|---------|--------------------|----|--------------------|----------|
| 1                                | <table> <tr> <td>Rated power - P2:</td> <td>0.75 kW</td> </tr> <tr> <td>Mains frequency:</td> <td>50 Hz</td> </tr> <tr> <td>Rated voltage:</td> <td>3 x 220-240D/380-415Y V</td> </tr> <tr> <td>Rated current:</td> <td>3.30/1.90 A</td> </tr> <tr> <td>Starting current:</td> <td>580-620 %</td> </tr> <tr> <td>Cos phi - power factor:</td> <td>0.81-0.71</td> </tr> <tr> <td>Rated speed:</td> <td>2840-2870 rpm</td> </tr> <tr> <td>IE Efficiency class:</td> <td>IE3</td> </tr> <tr> <td>Motor efficiency at full load:</td> <td>80.7-80.7 %</td> </tr> <tr> <td>Motor efficiency at 3/4 load:</td> <td>82.7-80.9 %</td> </tr> <tr> <td>Motor efficiency at 1/2 load:</td> <td>81.7-77.9 %</td> </tr> <tr> <td>Number of poles:</td> <td>2</td> </tr> <tr> <td>Enclosure class (IEC 34-5):</td> <td>55 Dust/Jetting</td> </tr> <tr> <td>Insulation class (IEC 85):</td> <td>F</td> </tr> <tr> <td>Motor No:</td> <td>85U05104</td> </tr> <tr> <td colspan="2">Others:</td> </tr> <tr> <td>Minimum efficiency index, MEI ≥:</td> <td>0.70</td> </tr> <tr> <td>Net weight:</td> <td>28.1 kg</td> </tr> <tr> <td>Gross weight:</td> <td>31.6 kg</td> </tr> <tr> <td>Shipping volume:</td> <td>0.08 m<sup>3</sup></td> </tr> <tr> <td>Danish VVS No.:</td> <td>381813180</td> </tr> <tr> <td>Finnish LVI No.:</td> <td>4616053</td> </tr> <tr> <td>Norwegian NRF no.:</td> <td>9043557</td> </tr> <tr> <td>Country of origin:</td> <td>HU</td> </tr> <tr> <td>Custom tariff no.:</td> <td>84137051</td> </tr> </table> | Rated power - P2: | 0.75 kW | Mains frequency: | 50 Hz | Rated voltage: | 3 x 220-240D/380-415Y V | Rated current: | 3.30/1.90 A | Starting current: | 580-620 % | Cos phi - power factor: | 0.81-0.71 | Rated speed: | 2840-2870 rpm | IE Efficiency class: | IE3 | Motor efficiency at full load: | 80.7-80.7 % | Motor efficiency at 3/4 load: | 82.7-80.9 % | Motor efficiency at 1/2 load: | 81.7-77.9 % | Number of poles: | 2 | Enclosure class (IEC 34-5): | 55 Dust/Jetting | Insulation class (IEC 85): | F | Motor No: | 85U05104 | Others: |  | Minimum efficiency index, MEI ≥: | 0.70 | Net weight: | 28.1 kg | Gross weight: | 31.6 kg | Shipping volume: | 0.08 m <sup>3</sup> | Danish VVS No.: | 381813180 | Finnish LVI No.: | 4616053 | Norwegian NRF no.: | 9043557 | Country of origin: | HU | Custom tariff no.: | 84137051 |
| Rated power - P2:                | 0.75 kW   |                   |         |                  |       |                |                         |                |             |                   |           |                         |           |              |               |                      |     |                                |             |                               |             |                               |             |                  |   |                             |                 |                            |   |           |          |         |  |                                  |      |             |         |               |         |                  |                     |                 |           |                  |         |                    |         |                    |    |                    |          |
| Mains frequency:                 | 50 Hz   |                   |         |                  |       |                |                         |                |             |                   |           |                         |           |              |               |                      |     |                                |             |                               |             |                               |             |                  |   |                             |                 |                            |   |           |          |         |  |                                  |      |             |         |               |         |                  |                     |                 |           |                  |         |                    |         |                    |    |                    |          |
| Rated voltage:                   | 3 x 220-240D/380-415Y V   |                   |         |                  |       |                |                         |                |             |                   |           |                         |           |              |               |                      |     |                                |             |                               |             |                               |             |                  |   |                             |                 |                            |   |           |          |         |  |                                  |      |             |         |               |         |                  |                     |                 |           |                  |         |                    |         |                    |    |                    |          |
| Rated current:                   | 3.30/1.90 A   |                   |         |                  |       |                |                         |                |             |                   |           |                         |           |              |               |                      |     |                                |             |                               |             |                               |             |                  |   |                             |                 |                            |   |           |          |         |  |                                  |      |             |         |               |         |                  |                     |                 |           |                  |         |                    |         |                    |    |                    |          |
| Starting current:                | 580-620 %   |                   |         |                  |       |                |                         |                |             |                   |           |                         |           |              |               |                      |     |                                |             |                               |             |                               |             |                  |   |                             |                 |                            |   |           |          |         |  |                                  |      |             |         |               |         |                  |                     |                 |           |                  |         |                    |         |                    |    |                    |          |
| Cos phi - power factor:          | 0.81-0.71   |                   |         |                  |       |                |                         |                |             |                   |           |                         |           |              |               |                      |     |                                |             |                               |             |                               |             |                  |   |                             |                 |                            |   |           |          |         |  |                                  |      |             |         |               |         |                  |                     |                 |           |                  |         |                    |         |                    |    |                    |          |
| Rated speed:                     | 2840-2870 rpm   |                   |         |                  |       |                |                         |                |             |                   |           |                         |           |              |               |                      |     |                                |             |                               |             |                               |             |                  |   |                             |                 |                            |   |           |          |         |  |                                  |      |             |         |               |         |                  |                     |                 |           |                  |         |                    |         |                    |    |                    |          |
| IE Efficiency class:             | IE3   |                   |         |                  |       |                |                         |                |             |                   |           |                         |           |              |               |                      |     |                                |             |                               |             |                               |             |                  |   |                             |                 |                            |   |           |          |         |  |                                  |      |             |         |               |         |                  |                     |                 |           |                  |         |                    |         |                    |    |                    |          |
| Motor efficiency at full load:   | 80.7-80.7 %   |                   |         |                  |       |                |                         |                |             |                   |           |                         |           |              |               |                      |     |                                |             |                               |             |                               |             |                  |   |                             |                 |                            |   |           |          |         |  |                                  |      |             |         |               |         |                  |                     |                 |           |                  |         |                    |         |                    |    |                    |          |
| Motor efficiency at 3/4 load:    | 82.7-80.9 %   |                   |         |                  |       |                |                         |                |             |                   |           |                         |           |              |               |                      |     |                                |             |                               |             |                               |             |                  |   |                             |                 |                            |   |           |          |         |  |                                  |      |             |         |               |         |                  |                     |                 |           |                  |         |                    |         |                    |    |                    |          |
| Motor efficiency at 1/2 load:    | 81.7-77.9 %   |                   |         |                  |       |                |                         |                |             |                   |           |                         |           |              |               |                      |     |                                |             |                               |             |                               |             |                  |   |                             |                 |                            |   |           |          |         |  |                                  |      |             |         |               |         |                  |                     |                 |           |                  |         |                    |         |                    |    |                    |          |
| Number of poles:                 | 2   |                   |         |                  |       |                |                         |                |             |                   |           |                         |           |              |               |                      |     |                                |             |                               |             |                               |             |                  |   |                             |                 |                            |   |           |          |         |  |                                  |      |             |         |               |         |                  |                     |                 |           |                  |         |                    |         |                    |    |                    |          |
| Enclosure class (IEC 34-5):      | 55 Dust/Jetting   |                   |         |                  |       |                |                         |                |             |                   |           |                         |           |              |               |                      |     |                                |             |                               |             |                               |             |                  |   |                             |                 |                            |   |           |          |         |  |                                  |      |             |         |               |         |                  |                     |                 |           |                  |         |                    |         |                    |    |                    |          |
| Insulation class (IEC 85):       | F   |                   |         |                  |       |                |                         |                |             |                   |           |                         |           |              |               |                      |     |                                |             |                               |             |                               |             |                  |   |                             |                 |                            |   |           |          |         |  |                                  |      |             |         |               |         |                  |                     |                 |           |                  |         |                    |         |                    |    |                    |          |
| Motor No:                        | 85U05104  |                   |         |                  |       |                |                         |                |             |                   |           |                         |           |              |               |                      |     |                                |             |                               |             |                               |             |                  |   |                             |                 |                            |   |           |          |         |  |                                  |      |             |         |               |         |                  |                     |                 |           |                  |         |                    |         |                    |    |                    |          |
| Others:                          |   |                   |         |                  |       |                |                         |                |             |                   |           |                         |           |              |               |                      |     |                                |             |                               |             |                               |             |                  |   |                             |                 |                            |   |           |          |         |  |                                  |      |             |         |               |         |                  |                     |                 |           |                  |         |                    |         |                    |    |                    |          |
| Minimum efficiency index, MEI ≥: | 0.70  |                   |         |                  |       |                |                         |                |             |                   |           |                         |           |              |               |                      |     |                                |             |                               |             |                               |             |                  |   |                             |                 |                            |   |           |          |         |  |                                  |      |             |         |               |         |                  |                     |                 |           |                  |         |                    |         |                    |    |                    |          |
| Net weight:                      | 28.1 kg   |                   |         |                  |       |                |                         |                |             |                   |           |                         |           |              |               |                      |     |                                |             |                               |             |                               |             |                  |   |                             |                 |                            |   |           |          |         |  |                                  |      |             |         |               |         |                  |                     |                 |           |                  |         |                    |         |                    |    |                    |          |
| Gross weight:                    | 31.6 kg   |                   |         |                  |       |                |                         |                |             |                   |           |                         |           |              |               |                      |     |                                |             |                               |             |                               |             |                  |   |                             |                 |                            |   |           |          |         |  |                                  |      |             |         |               |         |                  |                     |                 |           |                  |         |                    |         |                    |    |                    |          |
| Shipping volume:                 | 0.08 m <sup>3</sup>   |                   |         |                  |       |                |                         |                |             |                   |           |                         |           |              |               |                      |     |                                |             |                               |             |                               |             |                  |   |                             |                 |                            |   |           |          |         |  |                                  |      |             |         |               |         |                  |                     |                 |           |                  |         |                    |         |                    |    |                    |          |
| Danish VVS No.:                  | 381813180   |                   |         |                  |       |                |                         |                |             |                   |           |                         |           |              |               |                      |     |                                |             |                               |             |                               |             |                  |   |                             |                 |                            |   |           |          |         |  |                                  |      |             |         |               |         |                  |                     |                 |           |                  |         |                    |         |                    |    |                    |          |
| Finnish LVI No.:                 | 4616053   |                   |         |                  |       |                |                         |                |             |                   |           |                         |           |              |               |                      |     |                                |             |                               |             |                               |             |                  |   |                             |                 |                            |   |           |          |         |  |                                  |      |             |         |               |         |                  |                     |                 |           |                  |         |                    |         |                    |    |                    |          |
| Norwegian NRF no.:               | 9043557   |                   |         |                  |       |                |                         |                |             |                   |           |                         |           |              |               |                      |     |                                |             |                               |             |                               |             |                  |   |                             |                 |                            |   |           |          |         |  |                                  |      |             |         |               |         |                  |                     |                 |           |                  |         |                    |         |                    |    |                    |          |
| Country of origin:               | HU  |                   |         |                  |       |                |                         |                |             |                   |           |                         |           |              |               |                      |     |                                |             |                               |             |                               |             |                  |   |                             |                 |                            |   |           |          |         |  |                                  |      |             |         |               |         |                  |                     |                 |           |                  |         |                    |         |                    |    |                    |          |
| Custom tariff no.:               | 84137051  |                   |         |                  |       |                |                         |                |             |                   |           |                         |           |              |               |                      |     |                                |             |                               |             |                               |             |                  |   |                             |                 |                            |   |           |          |         |  |                                  |      |             |         |               |         |                  |                     |                 |           |                  |         |                    |         |                    |    |                    |          |

**98133648 TP 50-180/2 A-F-A-BQQE-FW1 50 Hz**



Note! All units are in [mm] unless others are stated.  
Disclaimer: This simplified dimensional drawing does not show all details.