

## Data sheet

# Micro Plate Heat Exchanger (MPHE): XB06

## Description



Micro Plate Heat Exchangers - a revolutionary technology from Danfoss. Characterized by their unique plate pattern, MPHEs enable heat to be transferred more efficient than any previous model of heat exchangers.

### Benefits:

- Energy and cost savings
- Better heat transfer
- Lower pressure loss
- More flexible design
- Longer life time

more on:  
[MPHE.danfoss.com](http://MPHE.danfoss.com)

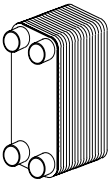
XB 06 is copper brazed heat exchanger, designed and configured for District Heating, District Cooling and other Heating applications.

### Approval:

Pressure Equipment Directive (PED) 97/23/EC.

## Ordering

### 1-pass heat exchanger XB 06

| Picture                                                                             | No. of plates, n | Connection   | XB 06L-1 | XB 06H-1 | XB 06H+  |
|-------------------------------------------------------------------------------------|------------------|--------------|----------|----------|----------|
|                                                                                     |                  |              | Code No. |          |          |
|  | 8                | Thread G ¾ A | 004B2024 | 004B2036 | 004B1206 |
|                                                                                     | 10               |              | 004B2025 | 004B2037 | 004B1207 |
|                                                                                     | 16               |              | 004B2026 | 004B2038 | 004B1209 |
|                                                                                     | 20               |              | 004B2027 | 004B2039 | 004B1211 |
|                                                                                     | 26               |              | 004B2028 | 004B2041 | 004B1212 |
|                                                                                     | 30               |              | 004B2029 | 004B2042 | 004B1214 |
|                                                                                     | 36               |              | 004B2030 | 004B2043 | 004B1216 |
|                                                                                     | 40               |              | 004B2031 | 004B2044 | 004B1217 |
|                                                                                     | 50               |              | 004B2032 | 004B2046 | 004B1219 |
|                                                                                     | 60               |              | 004B2033 | 004B2047 | 004B1221 |
|                                                                                     | 70               |              | 004B2034 | 004B2048 | 004B1222 |
|                                                                                     | 80               |              | -        | -        | 004B1223 |

**Ordering (continued)**
**Accessories-Tailpieces**

| Picture | Description         | Connection      | Code No. <sup>1)</sup> |
|---------|---------------------|-----------------|------------------------|
|         | Solder tailpieces   | G 3/4 A/15 mm   | <b>004B2945</b>        |
|         |                     | G 3/4 A/18 mm   | <b>004B2946</b>        |
|         | Weld-on tailpieces  | G 3/4 A/DN 20   | <b>004B2944</b>        |
|         | Threaded tailpieces | G 3/4 A/G 3/4 A | <b>004B2947</b>        |
|         |                     | G 3/4 A/G 1 A   | <b>004B2953</b>        |

<sup>1)</sup> One set contains 2 tailpieces with union nuts and gaskets

**Accessories-Insulation XB 06-1**

| Picture | No. of plates, n | Code No.        |
|---------|------------------|-----------------|
|         | 8-26             | <b>004B1191</b> |
|         | 30-40            | <b>004B1192</b> |
|         | 50-70            | <b>004B1193</b> |

**Accessories-Bracket**

| Picture | Code No.        |
|---------|-----------------|
|         | <b>004B2948</b> |

**Accessories-Insulation XB 06H+**

| Picture | No. of plates, n | Code No.        |
|---------|------------------|-----------------|
|         | 8-36             | <b>004B1191</b> |
|         | 40-70            | <b>004B1192</b> |
|         | 80               | <b>004B1193</b> |

**Technical data**

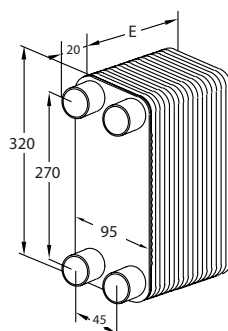
| Type                    |     | XB 06L-1                                                                                                                                                                                                   | XB 06H-1 | XB 06H+        |
|-------------------------|-----|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|----------|----------------|
| Max. working pressure   | bar | 25 (16) <sup>1)</sup>                                                                                                                                                                                      |          | 25             |
| Min. / Max. temperature | °C  | -10/180                                                                                                                                                                                                    |          |                |
| Flow medium             |     | DH: Circulation water / glycolic water up to 50%<br>DC: ethylene-, propylene-glycolic water, ethanol-water solutions and other suitable heat transfer media. (Please contact your Danfoss representative). |          |                |
| Volume / Channel        | Ltr | 0,034                                                                                                                                                                                                      | 0,023    | 0,018          |
| Connection type         |     | Cylindrical external thread acc. to DIN ISO 228/1                                                                                                                                                          |          |                |
| Connection size         |     | G ¾ A                                                                                                                                                                                                      |          |                |
| Weight                  | kg  | 0,67 + 0,08 × n                                                                                                                                                                                            |          | 0,6 + 0,07 × n |
| Materials               |     |                                                                                                                                                                                                            |          |                |
| Plate                   |     | Stainless steel, mat. no. 1.4404                                                                                                                                                                           |          |                |
| Brazing                 |     | Copper                                                                                                                                                                                                     |          |                |

**Insulation**

|                     |                 |                   |     |
|---------------------|-----------------|-------------------|-----|
| Type                |                 | PU (Polyurethane) |     |
| Wall thickness      | mm              | 20                |     |
| Heatconductivity, λ | W/mK            | 0,035             |     |
| Max temperature     | Permanent       | °C                | 130 |
|                     | Short term peak |                   | 160 |

<sup>1)</sup> 16 bar versions are available on enquiry

Dimension

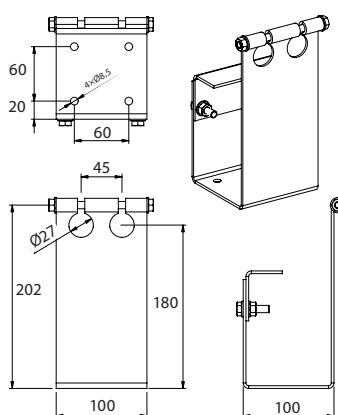


| Type        | Connection          | E<br>(mm)           | Weight empty<br>(kg)   |
|-------------|---------------------|---------------------|------------------------|
| XB 06 L-... | G ¾ A <sup>1)</sup> | $7 + 1,6 \times n$  | $0,67 + n \times 0,08$ |
| XB 06 H-... |                     | $7 + 1,25 \times n$ |                        |
| XB 06H+ ... |                     | $7 + 0,95 \times n$ | $0,6 + n \times 0,07$  |

$n$  = number of plates

<sup>1)</sup> Cylindrical external thread acc. to DIN ISO 228/1

Mounting brackets



Insulation XB 06-1

| No. of plates | A   | B   | E   | Code No. |
|---------------|-----|-----|-----|----------|
|               | mm  |     |     |          |
| 8-26          | 368 | 140 | 98  | 004B1191 |
| 30-40         |     | 145 | 138 | 004B1192 |
| 50-70         |     | 150 | 168 | 004B1193 |

Insulation XB 06H+

| No. of plates | A   | B   | E   | Code No. |
|---------------|-----|-----|-----|----------|
|               | mm  |     |     |          |
| 8-36          | 368 | 140 | 98  | 004B1191 |
| 40-70         |     | 145 | 138 | 004B1192 |
| 80            |     | 150 | 168 | 004B1193 |

Tailpieces

| Picture                                                                             | Description         | Connection    | a    | b  | SW <sup>1)</sup> | Code No. |
|-------------------------------------------------------------------------------------|---------------------|---------------|------|----|------------------|----------|
|                                                                                     |                     |               | mm   |    |                  |          |
|  | Solder tailpieces   | G ¾ A / 15 mm | 15   | 35 | 32               | 004B2945 |
|                                                                                     |                     | G ¾ A / 18 mm | 18   | 35 | 32               | 004B2946 |
|  | Weld-on tailpieces  | G ¾ A / DN 20 | 21,2 | 35 | 32               | 004B2944 |
|  | Threaded tailpieces | G ¾ A / G ¾ A | ¾"   | 40 | 32               | 004B2947 |
|                                                                                     |                     | G ¾ A / G 1 A | 1"   | 22 | 32               | 004B2953 |

<sup>1)</sup> Union nut, width across flats

