

Perforated band: universally applicable for various diameters and widths Ratchet lock: installation and removal without tools Screw lock: simple installation, high holding force Various supply options: kit format, bulk or to customer specification

# Universal Clamps Product Group 174

Material

PG 174 All parts are stainless steel, Material no. 1.4301/ UNS S30400 Optional alternative materials

Series

| Size range | width x thickness |  |  |  |
|------------|-------------------|--|--|--|
| ≥ 35.0 mm  | 10.0 x 0.5 mm     |  |  |  |
| ≥ 80.0 mm  | 18.0 x 0.8 mm*    |  |  |  |
| ≥ 80.0 mm  | 30.0 x 0.7 mm**   |  |  |  |

\* For use with 18 mm screw lock \*\* For use with 30 mm screw lock

The data in this catalog are based on many years experience. They are intended for reference, not as design specifications.



### Clamp Design

#### Concept

Individual closure mechanism (screw or ratchet lock) combined with perforated steel band – clamps can be round or have an irregular form. Available as kits, in bulk or to customer's specification. Special versions are available with integral tolerance compensation and non-perforated band.

Universal clamps are available in standard widths and thicknesses. The band dimensions should be chosen to give the necessary radial force (clamping force) to ensure the required retention properties under the anticipated ambient conditions.

#### Assembly Recommendations

For installation of the Screw Lock, we recommend to use a suitable flat blade screwdriver, or a socket wrench.

Static tightening torque

Screw lock for band width 10 mm: max. 3 Nm Screw lock for band width 18 mm: max. 10 Nm Screw lock for band width 30 mm: max. 20 Nm



#### Universal Clamps PG 174

#### Assembly instructions

Screw lock type



Determine the clamp length, e.g. wrap around object to be clamped and add approx. 50 mm.



Cut off band to required length. To avoid possible injury remove sharp edges with a file and trim corners at an angle.



Insert approximately 30 mm of band material through the top of the retaining slot and fold backwards underneath the remaining strip.



Position clamp over object. Insert free end of the band over the hooks and under the screw, protruding past the body of the screw lock. Engage the hooks in the perforations at the tightest possible position.



Tighten the clamp with a screwdriver or hexagon wrench.

#### Ratchet lock type



Determine the clamp length, e.g. wrap around object to be clamped and add approx. 50 mm.



Cut off band to required length. To avoid possible injury remove sharp edges with a file and trim corners at an angle.



Insert approximately 30 mm of band material through the top of the retaining slot and fold backwards underneath the remaining strip.



Place lever in open position, pre-form the end of the band to match the curvature of lock. Pass free end under tongue and through slot, so that the end extends beyond the lock body.



Position clamp over object. With minimal force, press free end of band steel down and ratchet the lever back and fourth until tight. Firmly lock the lever down in the final retained position. "Securing dimple" prevents unintentional opening.

# Universal Clamps PG 174

## Order information

| Screw lock         Perforated steel band           Compatible with band width 10 mm         Width 10 mm, material thickness 0.5 mm           17400003         540R/10-         40 - 100           17400002         540R/10+         100           Compatible with band width 18 mm         Width 18 mm, material thickness 0.8 mm           17400005         540R/18-         80 - 150           17400004         540R/18+         150           Compatible with band width 30 mm         T400077         518R/10         10           17400006         540R/30-         80 - 150         17400079         518R/20         20           Compatible with band width 30 mm         Steel band         Steel band         Width 30 mm         10           17400007         540R/30-         150         Steel band         Width 30 mm         10           17400007         540R/30-         150         Midth 30 mm, material thickness 0.7 mm         17400101         530R/10         10           17400007         540R/30-         150         Width 30 mm, material thickness 0.7 mm         17400101         530R/10         10           17400063         504R/60-         35 - 60         35 - 60         20         20         20 | Item No.                         | Ref. No. | Size range (mm) | Item No.                               | Ref. No. | Band length (m) |  |
|--|----------------------------------|----------|-----------------|--|----------|-----------------|--|
| $ \begin{array}{c cccc} 17400003 & 540R/10- & 40 & -100 \\ 17400002 & 540R/10+ & 100 & - \hdots & \\ \hline \\ 1740002 & 540R/10+ & 100 & - \hdots & \\ \hline \\$   | Screw lock                       |          |                 | Perforated steel band                  | Ł        |                 |  |
| 17400002       540R/10+       100       17400081       501R/20       20         Compatible with band width 18 mm       Width 18 mm, material thickness 0.8 mm       17400077       518R/10       10         17400004       540R/18+       150       17400079       518R/20       20         Compatible with band width 30 mm       17400079       518R/20       20         Compatible with band width 30 mm       Steel band       Steel band         17400007       540R/30+       80 - 150       17400101       530R/10       10         17400007       540R/30-       150       Width 30 mm, material thickness 0.7 mm       17400101       530R/10       10         Ratchet lock       Vidth 10 mm       17400102       530R/20       20       20         Compatible with band width 10 mm       17400102       530R/20       20       20         Compatible with band width 10 mm       35 - 60       35 - 60       35 - 60       35 - 60       35 - 60   | Compatible with band width 10 mm |          |                 | Width 10 mm, material thickness 0.5 mm |          |                 |  |
| Compatible with band width 18 mm       Width 18 mm, material thickness 0.8 mm         17400005       540R/18-       80 - 150         17400004       540R/18+       150         Compatible with band width 30 mm       17400079       518R/20       20         Compatible with band width 30 mm       Steel band       Steel band         17400007       540R/30+       80 - 150       17400101       530R/10       10         17400007       540R/30-       150       Width 30 mm, material thickness 0.7 mm       17400101       530R/10       10         Ratchet lock       Compatible with band width 10 mm       35 - 60       60       504R/60-       35 - 60   | 17400003                         | 540R/10- | 40 - 100        | 17400067                               | 501R/10  | 10              |  |
| 17400005       540R/18-       80 - 150       17400077       518R/10       10         17400004       540R/18+       150       17400079       518R/20       20         Compatible with band width 30 mm         17400006       540R/30+       80 - 150       150       Steel band         17400007       540R/30-       150       Width 30 mm, material thickness 0.7 mm       10         Ratchet lock       Vidth 10 mm       17400101       530R/10       10         Compatible with band width 10 mm       17400102       530R/20       20         Compatible with band width 10 mm         17400063       504R/60-       35 - 60   | 17400002                         | 540R/10+ | 100 –           | 17400081                               | 501R/20  | 20              |  |
| 17400005       540R/18-       80 - 150       17400077       518R/10       10         17400004       540R/18+       150       17400079       518R/20       20         Compatible with band width 30 mm         17400006       540R/30+       80 - 150       150       Steel band         17400007       540R/30-       150       Width 30 mm, material thickness 0.7 mm       10         Ratchet lock       Vidth 10 mm       17400101       530R/10       10         Compatible with band width 10 mm       17400102       530R/20       20         Compatible with band width 10 mm         17400063       504R/60-       35 - 60   |                                  |          |                 |  |          |                 |  |
| 17400004       540R/18+       150       17400079       518R/20       20         Compatible with band width 30 mm       Steel band       Steel band       Steel band         17400006       540R/30+       80 - 150       Width 30 mm, material thickness 0.7 mm       17400101       530R/10       10         17400101       530R/10       10       17400102       530R/20       20         Compatible with band width 10 mm         17400063       504R/60-       35 - 60   | Compatible with band width 18 mm |          |                 | Width 18 mm, material thickness 0.8 mm |          |                 |  |
| Compatible with band width 30 mm       Steel band         17400006       540R/30+       80 - 150         17400007       540R/30-       150         Nidth 30 mm, material thickness 0.7 mm       17400101         Ratchet lock       530R/10       10         Compatible with band width 10 mm       17400102       530R/20       20         Compatible with band width 10 mm       35 - 60       35 - 60   | 17400005                         | 540R/18- | 80 - 150        | 17400077                               | 518R/10  | 10              |  |
| 17400006       540R/30+       80 - 150         17400007       540R/30-       150         Ratchet lock       17400101       530R/10       10         Compatible with band width 10 mm       17400102       530R/20       20         17400063       504R/60-       35 - 60   | 17400004                         | 540R/18+ | 150 –           | 17400079                               | 518R/20  | 20              |  |
| 17400006       540R/30+       80 - 150         17400007       540R/30-       150         Ratchet lock       17400101       530R/10       10         Compatible with band width 10 mm       17400102       530R/20       20         17400063       504R/60-       35 - 60   |                                  |          |                 |  |          |                 |  |
| 17400007       540R/30-       150 -        Width 30 mm, material thickness 0.7 mm         Ratchet lock       17400101       530R/10       10         Compatible with band width 10 mm       17400102       530R/20       20         17400063       504R/60-       35 - 60  | Compatible with band width 30 mm |          |                 | Steel band                             |          |                 |  |
| Ratchet lock       17400101       530R/10       10         Compatible with band width 10 mm       17400102       530R/20       20         17400063       504R/60-       35 - 60  | 17400006                         | 540R/30+ | 80 - 150        |  |          |                 |  |
| Ratchet lock     17400102     530R/20     20       Compatible with band width 10 mm     17400063     504R/60-     35 - 60  | 17400007                         | 540R/30- | 150 –           | Width 30 mm, material thickness 0.7 mm |          |                 |  |
| Compatible with band width 10 mm         35 - 60   |                                  |          |                 | 17400101                               | 530R/10  | 10              |  |
| 17400063 504R/60- 35 - 60  | Ratchet lock                     |          |                 | 17400102                               | 530R/20  | 20              |  |
| 17400063 504R/60- 35 - 60  |                                  |          |                 |  |          |                 |  |
|  | Compatible with band width 10 mm |          |                 |  |          |                 |  |
| 17400064 E04D/60 60  | 17400063                         | 504R/60- | 35 - 60         |  |          |                 |  |
| 17400064 504H/60+ 60   | 17400064                         | 504R/60+ | 60 –            |  |          |                 |  |

