

Centrifugally Lift Off Sprags Freewheels

RSXM



TYPE



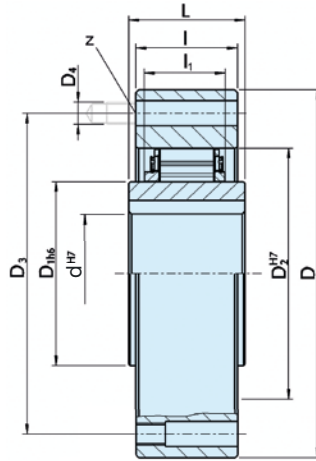
The series RSXM completes the small to medium backstop range, which commenced with the highly successful RSCI programme. Type RSXM is a centrifugal lift off sprag type freewheel with the inner race rotating. Only the inner race is designed for freewheeling. It is a non self-supported type. Bearings must be provided to ensure concentricity of the inner and outer races and support axial and radial loads, as shown overleaf. Concentricity and run-out limits must be observed.

The RSXM type accepts all types of lubricant currently used in power transmission equipment. It is possible to mount these freewheels directly in gearboxes without separate lubrication. An oil mist is generally sufficient. Grease lubrication may be acceptable if the unit works mostly in overrunning condition, as on E-motors. When used as a backstop, it must be checked that the overrunning speed will not go below the minimum speed given in the characteristic table.

Centrifugally Lift Off Sprags Freewheels

RSXM

RSXM



| Type | Size | Bore dia. | Torque | Overrunning speeds | | | Number | | | | | | Weight | | | | | |
|------|------|------------------|-----------------------|--|--|---|------------------|-------------------|----------------------|---------------|---------------|-------------|-------------|-------------|---------------|-------------------|-------------------|------|
| | | d^{H7} [mm] | $T_{KN}^{1)}$ [Nm] | $n_{max}^{2)}$ [min ⁻¹] | $n_{min}^{3)}$ [min ⁻¹] | $n_{imax}^{4)}$ [min ⁻¹] | $D^{5)}$ [mm] | D_{1h6} [mm] | D_{2}^{H7} [mm] | D_3 [mm] | D_4 [mm] | z [nb] | L [mm] | l [mm] | l_1 [mm] | t_{min} [mm] | d_{min} [mm] | [kg] |
| RSXM | 31 | 20* | 100 | 340 | 820 | 20000 | 85 | 31 | 55 | 70 | M6 | 6 | 24 | 25 | 17 | 1 | 41 | 0,75 |
| | 38 | 25* | 135 | 320 | 770 | 18500 | 90 | 38 | 62 | 75 | M6 | 6 | 24 | 25 | 17 | 1 | 50 | 0,95 |
| | 46 | 25,30 | 425 | 300 | 530 | 13500 | 95 | 46 | 70 | 82 | M6 | 6 | 35 | 35 | 25 | 1 | 53 | 1,4 |
| | 51 | 30,35 | 525 | 220 | 525 | 12500 | 105 | 51 | 75 | 90 | M6 | 6 | 35 | 35 | 25 | 1 | 62 | 1,8 |
| | 56 | 35,40 | 625 | 210 | 500 | 11500 | 110 | 56 | 80 | 96 | M6 | 8 | 35 | 35 | 25 | 1 | 70 | 1,8 |
| | 61 | 35,40 | 420 | 265 | 640 | 14000 | 120 | 61 | 85 | 105 | M8 | 6 | 25 | 27 | 17 | 2 | 73 | 1,8 |
| | 66 | 35,40,45 | 850 | 200 | 480 | 10000 | 132 | 66 | 90 | 115 | M8 | 8 | 35 | 35 | 25 | 1 | 78 | 2,7 |
| | 76 | 40,45,50 | 1100 | 190 | 460 | 9000 | 140 | 76 | 100 | 125 | M8 | 8 | 35 | 35 | 25 | 1 | 90 | 3,1 |
| | 86 | 45,50 | 1450 | 180 | 440 | 8000 | 150 | 86 | 110 | 132 | M8 | 8 | 40 | 40 | 25 | 1 | 100 | 4,2 |
| | 101 | 45,55,60,70 | 1950 | 175 | 420 | 6500 | 175 | 101 | 125 | 155 | M10 | 8 | 50 | 50 | 25 | 1 | 117 | 7,3 |

NOTES

- 1) $T_{max} = 2 \times T_{KN}$
» Refer to Selection page 7 to 11
- 2) This maximum allowable torque transmission speed n_{max} must not be exceeded when transmitting torque.
- 3) This minimum allowable overrunning speed n_{min} should not be reduced under continuous operation. Possible reduction of this minimum speed in request.
- 4) Inner race overruns.
Keyway to DIN 6885.1
*Keyway to DIN 6885.3
- 5) Tolerance +1
» Refer to mounting and maintenance instructions page 12 to 13.

Other bore diameters on request.

MOUNTING EXAMPLE

