

# 51100 NSK 10x24x9mm outside diameter design: Straight Thrust ball bearings

|                                     |   |
|-------------------------------------|---|
| Bearing number                      | 51100   |
| Size (mm)                           | 10x24x9   |
| Brand                               | NSK   |
| Bore diameter (mm)                  | 10  |
| Outer diameter (mm)                 | 24  |
| Width (mm)                          | 9   |
| d                                   | 10 mm   |
| D                                   | 24 mm   |
| T                                   | 9 mm  |
| d1                                  | 24 mm   |
| r min.                              | 0.3 mm  |
| d1                                  | 11 mm   |
| da min.                             | 18 mm   |
| da max.                             | 16 mm   |
| ra max.                             | 0.3 mm  |
| Weight                              | 0.019 Kg  |
| Basic dynamic load rating (C)       | 10.1 kN   |
| Basic static load rating (C0)       | 14 kN   |
| (Grease) Lubrication Speed          | 6700 r/min  |
| Category                            | Thrust Ball Bearing   |
| BDI Inventory                       | 0.0   |
| Manufacturer Name                   | NSK   |
| Minimum Buy Quantity                | N/A   |
| Weight / Kilogram                   | 0.02  |
| EAN                                 | 0029176026355   |
| Product Group - BDI                 | 800308  |
| Rolling Element                     | Ball Bearing  |
| Thrust Bearing                      | Yes   |
| Single or Double Direction          | Single Direction  |
| Banded                              | No  |
| Cage Material                       | Steel   |
| Precision Class                     | Non-Precision   |
| Component Description               | Roller Assembly Plus Raceways   |
| Other Features                      | Single Row   With Flat Seat   |
| Long Description                    | 10MM Bore 1; 13MM Bore 2; 24MM Outside Diameter; 9MM Height; Ball Bearing; Single Direction; Not Banded; Steel Cage; Non-Precision  |
| Inch - Metric                       | Metric  |
| Category - BDI                      | Thrust Ball Bearings  |
| UNSPSC                              | 31171552  |
| Harmonized Tariff Code              | 8482.10.50.00   |
| Non-Keyword String                  | Bearing   |
| Manufacturer URL                    | <a href="http://www.nskamericas.com">http://www.nskamericas.com</a>   |
| Manufacturer Item Number            | 51100   |
| Weight / LBS                        | 0.04189   |
| Bore 2                              | 0.433 Inch   11 Millimeter  |
| Height                              | 0.354 Inch   9 Millimeter   |
| Outside Diameter                    | 0.945 Inch   24 Millimeter  |
| Overall Height with Aligning Washer | 0 Inch   0 Millimeter   |
| Bore 1                              | 0.394 Inch   10 Millimeter  |
| bore diameter:                      | 10 mm   |
| static load capacity:               | 1420 kg   |
| outside diameter:                   | 24 mm   |
| dynamic load capacity:              | 1030 kg   |
| overall width:                      | 9 mm  |
| operating temperature range:        | Maximum of +120 °C  |
| thrust bearing type:                | Single-Direction  |
| maximum rpm:                        | 10000 RPM   |
| outside diameter design:            | Straight  |
| cage material:                      | Steel   |
| separable or banded:                | Separable   |
| fillet radius:                      | 0.3 mm  |
| face type:                          | Flat  |
| series:                             | S11   |
| precision rating:                   | ABEC 1 (ISO Class Normal)   |
| SRI                                 | 2.6   |
| NSR90A                              | 51000   |
| LangID                              | 1   |
| D_                                  | 24  |
| SREX                                | 0.03  |
| C                                   | 10.1  |
| g_                                  | 9   |
| CAD                                 | <a href="http://service.web3cad.co.jp/pcom/Make-NSK_RB&amp;info-nsk_rb/roller_bearings/thrust_bearings/single_direction_tbb/with_flat_seat_asstb.prj&amp;varset=(ORIG=51100).(SD=10).(D=24).(T=9).(SR=0.3).(CAN=10100).(CON=14000).(CA=10300).(CG=14200).(GR=6700).(D11=10000).(SD1=24).(D1=11).(SDA=10).(DA=10).(SRA=0.3).(PMS5=0.019)">http://service.web3cad.co.jp/pcom/Make-NSK_RB&amp;info-nsk_rb/roller_bearings/thrust_bearings/single_direction_tbb/with_flat_seat_asstb.prj&amp;varset=(ORIG=51100).(SD=10).(D=24).(T=9).(SR=0.3).(CAN=10100).(CON=14000).(CA=10300).(CG=14200).(GR=6700).(D11=10000).(SD1=24).(D1=11).(SDA=10).(DA=10).(SRA=0.3).(PMS5=0.019)</a> |
| hdfFile                             | ecat_N50TB  |
| d11 rpm                             | 10000   |
| SRE                                 | 2.6   |
| MS                                  | 0.019   |
| ERS rpm                             | 6700  |
| ra                                  | 0.3   |
| SREX                                | 0.03  |
| D_a                                 | 16  |
| SREN                                | 0   |
| CD                                  | 14  |
| SREN                                | 0   |
| D_1                                 | 11  |
| Prod_Type3                          | TB_SD_MFS   |
| da                                  | 10  |
| DA_                                 | 4.762   |
| Z_                                  | 10  |

|        |                                    |
|--------|------------------------------------|
| yp01   | 51100                              |
| SDM    | 17                                 |
| r      | 0.3                                |
| T      | 9                                  |
| KBRG   | 5111                               |
| calc01 | /bearingGuide/html/calculation.jsp |