

**FAG****6009-2Z**

Deep groove ball bearing

Deep groove ball bearing 60...-2Z, single row, shields, steel sheet metal cage

## Technical information



## Your current product variant

|                                  |              |   |
|----------------------------------|--------------|---|
| Sealing                          | 2Z           | Non-contact shield on both sides        |
| Cage                             | JN           | Steel sheet metal                       |
| Tolerance class                  | PN           | Normal (ISO 492:2023)                   |
| Dimensional / heat stabilization | SN           | Rings dimensional stabilized up to 120° |
| Lubricant                        | GA13         | Ball bearing and insert bearing grease  |
| Radial internal clearance        | CN (Group N) | Normal internal clearance               |
| Bore type                        | Z            | Cylindrical                             |

## Main Dimensions &amp; Performance Data

|             |              |                                   |
|-------------|--------------|-----------------------------------|
| d           | 45 mm        | Bore diameter                     |
| D           | 75 mm        | Outside diameter                  |
| B           | 16 mm        | Width                             |
| $C_r$       | 21,200 N     | Basic dynamic load rating, radial |
| $C_{0r}$    | 14,400 N     | Basic static load rating, radial  |
| $C_{ur}$    | 750 N        | Fatigue load limit, radial        |
| $n_G$       | 11,200 1/min | Limiting speed                    |
| $n_{gr}$    | 9,700 1/min  | Reference speed                   |
| $\approx m$ | 0.241 kg     | Weight                            |



### Mounting dimensions

|              |         |                                      |
|--------------|---------|--------------------------------------|
| $d_{a \min}$ | 49.6 mm | Minimum diameter shaft shoulder      |
| $D_{a \max}$ | 70.4 mm | Maximum diameter of housing shoulder |
| $r_{a \max}$ | 1 mm    | Maximum fillet radius                |

### Dimensions

|            |          |                              |
|------------|----------|------------------------------|
| $r_{\min}$ | 1 mm     | Minimum chamfer dimension    |
| $D_1$      | 65.6 mm  | Shoulder diameter outer ring |
| $D_2$      | 67.98 mm | Caliber diameter outer ring  |
| $d_1$      | 54.2 mm  | Shoulder diameter inner ring |

### Temperature range

|            |        |                            |
|------------|--------|----------------------------|
| $T_{\min}$ | -20 °C | Operating temperature min. |
| $T_{\max}$ | 120 °C | Operating temperature max. |

### Calculation factors

|       |      |                    |
|-------|------|--------------------|
| $f_0$ | 15.3 | Calculation factor |
|-------|------|--------------------|

### Characteristics

|   |  |
|---|--|
|  | Radial load                                    |
|  | Axial load in one direction                    |
|  | Axial load in two directions                   |
|  | Lifetime lubrication, freedom from maintenance |
|  | Grease Lubrication                             |
|  | Sealed on both sides                           |