



## SKF 23120 CCK/W33

Spherical roller bearing with tapered bore and relubrication features

Spherical roller bearings can accommodate heavy loads in both directions. They are self-aligning and accommodate misalignment and shaft deflections, with virtually no increase in friction or temperature. The design includes features to facilitate relubrication. The bearings can be used in a modular system, including housings, sleeves and nuts.

### Technical specifications

General	
Bore type	Tapered 1:12
Dimensions	
Bore diameter	100 mm
Deviation limits of mid-range bore diameter	0..0.035 mm
Deviation limits of tapered slope	0..0.035 mm
Outside diameter	165 mm
Deviation limits of mid-range outside diameter	-0.025..0 mm
Width	52 mm
Deviation limits of ring width	-0.08..0 mm
Shoulder diameter of inner ring	115 mm
Shoulder/recess diameter of outer ring	144 mm
Width of lubrication groove	6 mm
Diameter of lubrication hole	3 mm
Chamfer dimension	2 mm
ISO tolerance class for dimensions	Normal
Abutment dimensions	
Diameter of housing abutment	154 mm
Radius of fillet	2 mm
Calculation data	
SKF performance class	SKF Explorer
Basic dynamic load rating	385 kN
Basic static load rating	490 kN
Fatigue load limit	53 kN
Reference speed	3000 r/min
Limiting speed	4000 r/min
Limiting value	0.3
Calculation factor	2.3
Calculation factor	3.4
Calculation factor	2.2
Tolerances of run-out	
Range of section height at inner ring of assembled bearing	6 µm
Maximum run-out of inner ring side face to the bore	9 µm
Range of section height at outer ring of assembled bearing	13 µm
Perpendicularity of outer ring outside surface	5 µm
ISO tolerance class for geometrical tolerances	P5
Radial internal clearance	
Minimum initial clearance	80 µm
Maximum initial clearance	110 µm
Mounting information	
Recommended tightening angle for lock nut	150 °

Performance	
Basic dynamic load rating	385 kN
Basic static load rating	490 kN
Reference speed	3000 r/min
Limiting speed	4000 r/min
SKF performance class	SKF Explorer

Properties	
Number of rows	2
Locating feature, bearing outer ring	Without
Bore type	Tapered 1:12
Cage	Sheet metal
Radial internal clearance	CN
Tolerance class for dimensions	Normal
Tolerance class for run-out	P5
Sealing	Without
Lubricant	None
Relubrication feature	With
Candidate for remanufacturing	Yes
Indicative carbon footprint for new product	15.3 kg CO <sub>2</sub> e
Indicative carbon footprint for remanufactured product	5.4 kg CO <sub>2</sub> e

Logistics	
Product net weight	4.25 kg
eClass code	23-05-09-11
UNSPSC code	31171510

**SKF drawings**

