



W 6003

Deep groove ball bearings

Bearing data

[Tolerances,](#)

Normal (metric), P6, P5, Normal (inch),

[Radial internal clearance,](#)

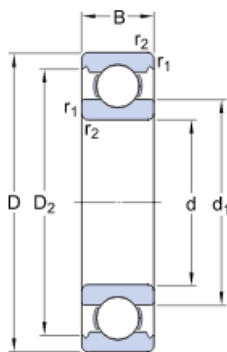
Matched bearing pairs, Stainless steel
 $d < 10$ mm, Other bearings

Bearing interfaces

[Seat tolerances for standard conditions,](#)

[Tolerances and resultant fits](#)

Technical specification

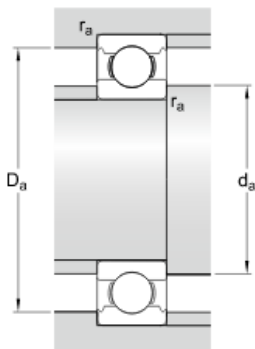


DIMENSIONS

d	17 mm
D	35 mm
B	10 mm
d ₁	≈ 23.5 mm
D ₂	≈ 31.85 mm
r _{1,2}	min. 0.3 mm

ABUTMENT DIMENSIONS

d _a	min. 19 mm
D _a	max. 33 mm
r _a	max. 0.3 mm



CALCULATION DATA

Basic dynamic load rating	C	4.94 kN
Basic static load rating	C_0	3.15 kN
Fatigue load limit	P_u	0.137 kN
Reference speed		45000 r/min
Limiting speed		28000 r/min
Calculation factor	k_f	0.03
Calculation factor	f_0	14.1

MASS

Mass bearing		0.036 kg
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More information

Product details	Engineering information	Tools
Single row deep groove ball bearings	Principles of rolling bearing selection	Bearing Select
Stainless steel deep groove ball bearings	General bearing knowledge	SimPro Quick
Single row deep groove ball bearings with filling slots	Bearing selection process	Engineering Calculator
Double row deep groove ball bearings	Bearing interfaces	LubeSelect for SKF greases
Bearing data	Seat tolerances for standard conditions	Heater selection tool
Loads	Selecting internal clearance	Rolling bearings mounting and dismounting instructions
Temperature limits	Lubrication	
Permissible speed	Sealing, mounting and dismounting	
Designation system	Bearing failure and how to prevent it	

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