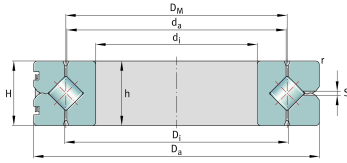


**SX011836-A**

## Crossed roller bearing

Crossed roller bearings dimension series 18 to  
DIN 616

## Technical information

**Main Dimensions & Performance Data**

d <sub>1</sub>	180 mm	Bore Diameter
	0,004 mm	Bore diameter upper tolerance
	-0,021 mm	Bore diameter lower tolerance
D <sub>a</sub>	225 mm	Outside Diameter
	0 mm	Outside diameter upper tolerance
	-0,029 mm	Outside diameter lower tolerance
H	22 mm	Height of the assembled bearing
h <sub>i</sub>	22 mm	Height inner ring
	0,1 mm	Width upper tolerance
	-0,1 mm	Width lower tolerance
≈m	2,22 kg	Weight

**Dimensions**

D <sub>i</sub>	202,8 mm	Inner diameter outer ring
D <sub>M</sub>	202 mm	Rolling element pitch circle diameter
d <sub>a</sub>	201,2 mm	Outer diameter inner ring
h	22 mm	Height of individual ring
	0 mm	Height of individual ring upper tolerance
	-0,025 mm	Height of individual ring lower tolerance
r <sub>min</sub>	1,1 mm	Chamfer dimension
S	2 mm	Diameter of lubrication hole



### Temperature range

$T_{\min}$	-30 °C	Operating temperature min.
$T_{\max}$	80 °C	Operating temperature max.








### Calculation factors

	0,015 mm	Running accuracy, radial
	0,01 mm	Running accuracy, axial
$S_{r \min}$	0,005 mm	Minimum radial bearing clearance, at standard bearing clearance
$S_{r \max}$	0,025 mm	Maximum radial bearing clearance, at standard bearing clearance
$S_{k \min}$	0,01 mm	Minimum axial tilting clearance, at standard bearing clearance
$S_{k \max}$	0,05 mm	Maximum axial tilting clearance, at standard bearing clearance
$RLO_{\max}$	0,005 mm	Low clearance: Radial clearance
$RLO_{\max}$	0,01 mm	Low clearance: Preload
$C_a$	98.000 N	Basic dynamic load rating, axial
$C_{0a}$	360.000 N	Basic static load rating, axial
$C_r$	70.000 N	Basic dynamic load rating, radial (for radial load only)
$C_{0r}$	177.000 N	Basic static load rating, radial (for radial load only)
$N_{G \text{ oil}}$	755 1/min	Limiting speed for oil lubrication with normal clearance
$N_{G \text{ Grease}}$	375 1/min	Limiting speed for grease lubrication with normal clearance
	61836	Dimensions identical to ISO dimension series 18



### Characteristics

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-  Radial load
-  Axial load in one direction
-  Axial load in two directions
-  Grease Lubrication
-  Oil Lubrication
-  Not sealed
-  Small design envelope