

PDF technical sheet

23992L1C3

Double row spherical roller bearings

Spherical roller bearing, with central rib on inner ring, 2-part machined cage centred on inner ring, groove and lubrication holes on outer ring

Product definition	
d	18.1102 "
D	24.4094 "
B	4.6457 "
D1	22.4843 "
rs min	0.1575 "
Number of lubrication holes	8
b	0.6299 "
k	0.3937 "
e	0.17
Y1	3.95
Y2	5.88
Y0	3.86
Radial clearance class	C3
Brand	NTN

Product performance	
Dynamic load, C	2,100 kN
Static load, C0	4,950 kN
Fatigue limit load, Cu	360 kN
Nref	610 RPM
Nlim	900 RPM
Min operating temperature, Tmin	-40 °C
Max operating temperature, Tmax	248 °C
Characteristic cage frequency, FTF	
Characteristic rolling element frequency, BSF	
Characteristic outer ring frequency, BPF0	
Characteristic inner ring frequency, BPF1	

Abutment dimensions	
da min	18.6850 "
Da max	23.8346 "
ra max	0.1181 "

Calculation factors

Equivalent dynamic radial load

$$P = X.F_r + Y.F_a$$

$F_a / F_r \leq e$		$F_a / F_r > e$	
X	Y	X	Y
1	Y1	0.67	Y2

Equivalent static radial load

$$P_0 = X_0.F_r + Y_0.F_a$$

X_0	Y_0
1	Y0

The values for e, Y1, Y2 and Y0 are shown in the above table .