



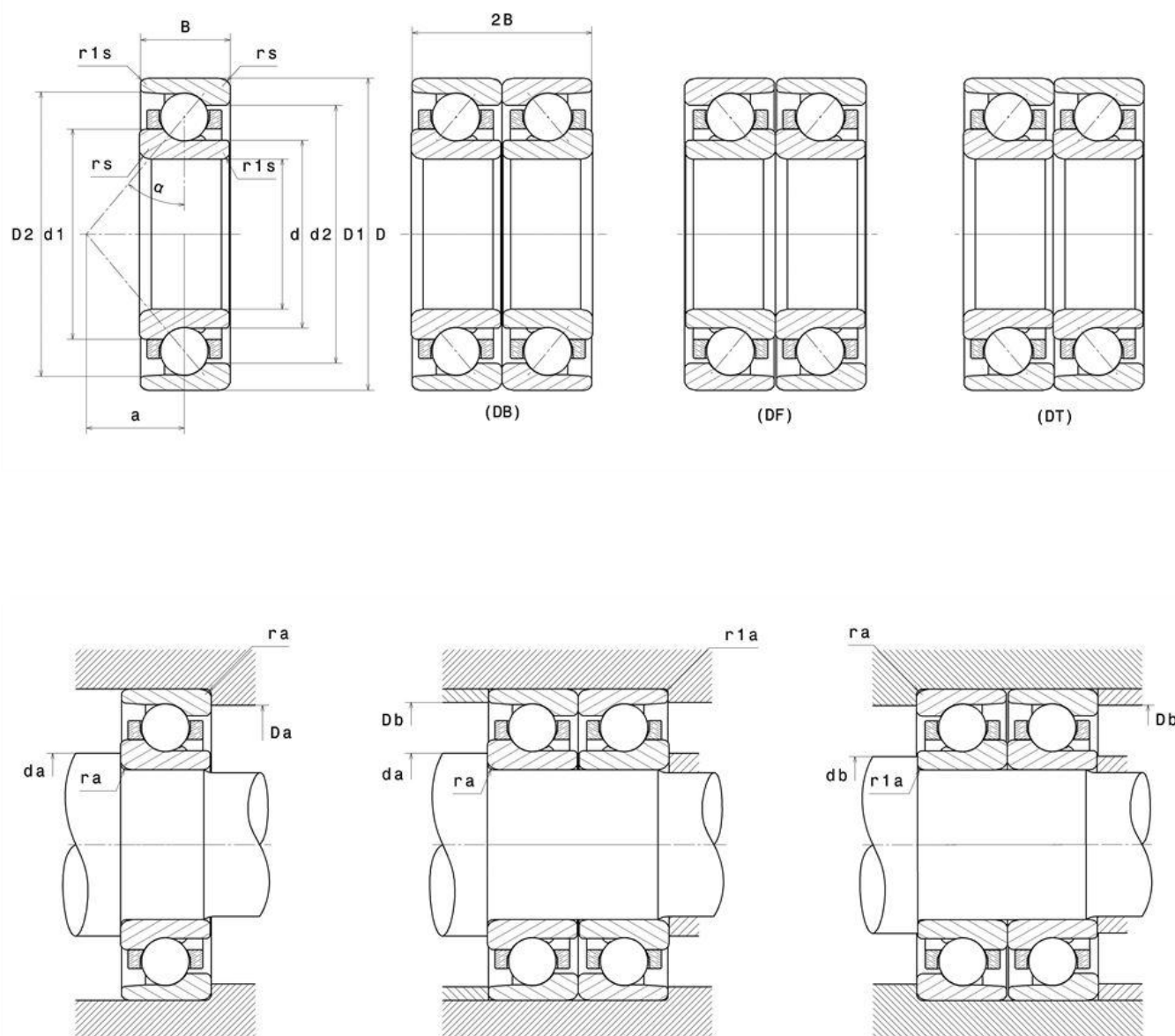
Technical data

7318BL1G

Single row or matched pairs of angular contact ball bearings

Angular contact ball bearing, brass cage inner ring guided

VISUAL (S)



7318BL1G

Single row or matched pairs of angular contact ball bearings

PRODUCT DEFINITION

Brand	NTN
d - Internal diameter	90 mm
D - External diameter	190 mm
B - Bearing/Inner ring width	43 mm
a - Charge load application point	80,5 mm
- Contact angle	40 °
rs - Min fillet radius	3 mm
r1s - Min fillet radius	1,1 mm
Radial clearance class	CN
Mass	5,16 kg

PRODUCT PERFORMANCE

C - Dynamic load	173000000 mN
C0 - Static load	135000000 mN
Cu - Fatigue limit load	8950000 mN
N lim - Oil lubrication limit speed	27000 °/s
N lim - Grease lubrication limit speed	20400 °/s
Tmin - Min operating temperature	233,15 °K
Tmax - Max operating temperature	393,15 °K

ABUTMENT

da min - Min shoulder diameter IR	104 mm
db min - Min IR shoulder diameter	97 mm
Da max - Max shoulder diameter OR	176 mm
Db max - Max OR shoulder diameter	183 mm



NTN Europe

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ABUTMENT

r1a - Max fillet radius	1 mm
ra max - Max shaft & housing fillet radius	2,5 mm

INDUSTRY CALCUL FACTORS

Equivalent dynamic radial load

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

	e	Single or DT bearing arrangement				DB or DF arrangement			
		Fa / Fr ≤ e		Fa / Fr > e		Fa / Fr ≤ e		Fa / Fr > e	
		X	Y	X	Y	X	Y	X	Y
30°	0.8	1	0	0.9	0.76	1	0.78	0.63	1.24
40°	1.14			0.35	0.57		0.55	0.57	0.93

Equivalent static radial load

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

a	Single or DT bearing arrangement		DB or DF arrangement	
	X ₀	Y ₀	X ₀	Y ₀
30°	0.5	0.33	1	0.66
40°		0.26		0.52

For single or DT bearing arrangement :

If $P_0 < F_r$, then use $P_0 = F_r$



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