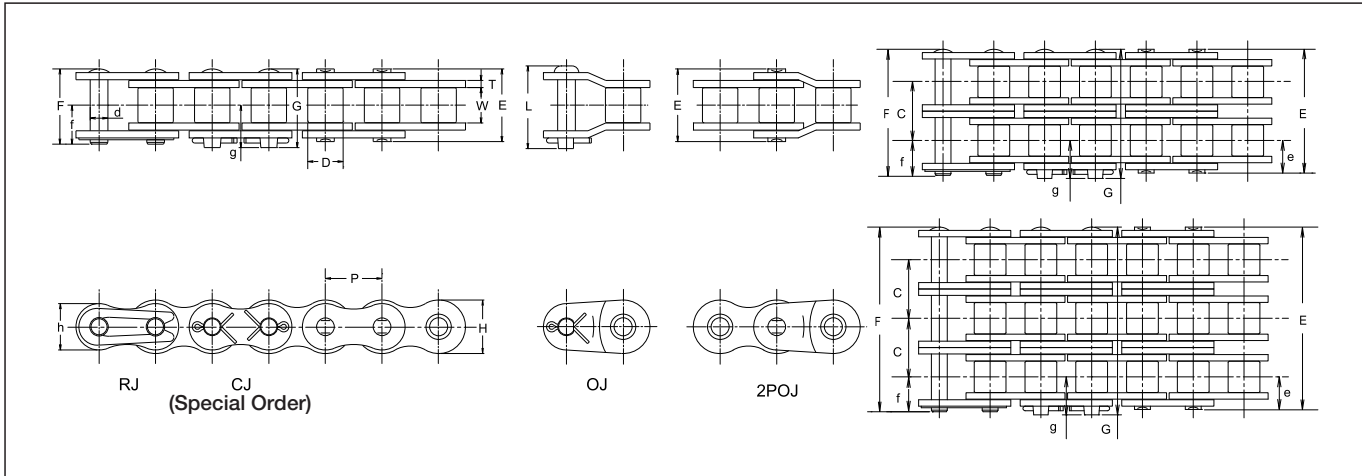


DID 50 standard roller chain

Roller Chains for Power Transmission

Standard Roller Chain



Dimensions

Unit (mm)

Chain No.	Pitch	Roller Link Width W	Roller dia. D	Pin									Transverse Pitch C	Plate				JIS Min. Tensile Strength		DID Min. Tensile Strength		DID Avg. Tensile Strength		DID Max. Allowable Load		Approx. Weight (kg/m)
				d	E	F	G	L	e	f	g	T		H	h	kN	kgf	kN	kgf	kN	kgf	kN	kgf			
DID50	50				20.3	21.9	22.1	23.2									21.8	2,210	26.5	2,690	30.8	3,130	6.86	700	1.06	
DID50-2	50-2				38.5	40.1	40.3	41.3									43.6	4,430	53	5,380	61.6	6,250	11.7	1,190	2.04	
DID50-3	50-3	15.875	9.53	10.16	5.09	56.7	58.3	58.5	59.5	10.2	11.6	12.1	18.1	2.00	15.0	13.0	65.4	6,640	79.5	8,070	92.4	9,380	17.2	1,750	3.06	
DID50-4	50-4					74.8	76.4	76.6	76.6								—	—	106	10,760	123	12,490	22.6	2,290	4.06	
DID50-5	50-5					93.0	94.5	94.7	94.7								—	—	132	13,400	154	15,630	26.8	2,720	5.08	

Note: The values of average tensile strength and Max. allowable tension are for chains.

Max. Kilowatt Ratings DID 50

Unit (kW)

Type of Lubrication No. of Teeth of Small Sprocket	Small Sprocket revolutions per minute (rpm) (See P132 for the details of type of lubrication A, B and C.)																																																																																									
	50					100					300					900					1200					1500					1800					2100					2400					2700					3000					3300					3500					4000					4500					5000					5400					5800				
	A					B					C					A					B					C					A					B					C					A					B					C					A					B					C																			
11	0.76	1.42	3.82	6.05	7.88	7.64	5.46	4.15	3.30	2.70	2.26	1.93	1.67	1.53	1.25	1.05	0.89	0.80	0.71																																																																							
12	0.83	1.56	4.19	6.64	8.71	8.70	6.22	4.73	3.76	3.07	2.57	2.20	1.90	1.74	1.43	1.19	1.02	0.91	0.81																																																																							
13	0.91	1.70	4.57	7.24	9.82	9.81	7.02	5.34	4.24	3.47	2.90	2.48	2.15	1.97	1.61	1.35	1.15	1.02	0.92																																																																							
14	0.98	1.84	4.95	7.85	11.0	11.0	7.85	5.97	4.73	3.87	3.25	2.77	2.40	2.20	1.80	1.51	1.28	1.14	—																																																																							
15	1.06	1.98	5.34	8.45	12.2	12.2	8.70	6.62	5.25	4.30	3.60	3.07	2.66	2.44	1.99	1.67	1.43	1.27	—																																																																							
16	1.14	2.13	5.72	9.06	13.4	13.4	9.59	7.29	5.78	4.73	3.97	3.39	2.93	2.69	2.20	1.84	1.57	1.40	—																																																																							
17	1.21	2.27	6.11	9.68	14.7	14.7	10.5	7.99	6.34	5.19	4.34	3.71	3.21	2.94	2.41	2.02	1.72	1.53	—																																																																							
18	1.29	2.41	6.50	10.3	15.8	15.8	11.4	8.70	6.90	5.65	4.73	4.04	3.50	3.21	2.62	2.20	1.88	—	—																																																																							
19	1.37	2.56	6.89	10.9	16.8	16.8	12.4	9.44	7.49	6.13	5.13	4.38	3.80	3.48	2.85	2.38	2.03	—	—																																																																							
20	1.45	2.71	7.28	11.5	17.7	17.7	13.4	10.2	8.09	6.62	5.55	4.73	4.10	3.76	3.07	2.57	2.20	—	—																																																																							
21	1.53	2.85	7.68	12.2	18.7	18.7	14.4	11.0	8.70	7.12	5.97	5.09	4.41	4.04	3.31	2.77	2.36	—	—																																																																							
22	1.61	3.00	8.07	12.8	19.6	19.6	15.5	11.8	9.33	7.64	6.40	5.46	4.73	4.33	3.55	2.97	2.54	—	—																																																																							
23	1.68	3.15	8.47	13.4	20.6	20.6	16.5	12.6	9.97	8.16	6.84	5.84	5.06	4.63	3.79	3.18	—	—	—																																																																							
24	1.76	3.30	8.87	14.1	21.6	21.6	17.6	13.4	10.6	8.70	7.29	6.22	5.39	4.94	4.04	3.39	—	—	—																																																																							
25	1.84	3.44	9.27	14.7	22.5	22.5	18.7	14.3	11.3	9.25	7.75	6.62	5.74	5.25	4.30	3.60	—	—	—																																																																							
28	2.08	3.89	10.5	16.6	26.8	26.8	22.2	16.9	13.4	11.0	9.19	7.85	6.80	6.22	5.09	—	—	—	—																																																																							
30	2.25	4.20	11.3	17.9	29.1	29.1	24.6	18.7	14.9	12.2	10.2	8.70	7.54	6.90	5.65	—	—	—	—																																																																							
32	2.41	4.50	12.1	19.2	31.4	31.4	27.1	20.6	16.4	13.4	11.2	9.59	8.31	7.61	6.22	—	—	—	—																																																																							
35	2.65	4.96	13.3	21.1	34.4	34.4	31.0	23.6	18.7	15.3	12.8	11.0	9.50	8.70	7.12	—	—	—	—																																																																							
40	3.07	5.73	15.4	24.4	40.4	40.4	37.9	28.8	22.9	18.7	15.7	13.4	11.6	10.6	—	—	—	—	—																																																																							
45	3.48	6.50	17.5	27.7	46.0	46.0	45.2	34.4	27.3	22.4	18.7	16.0	13.9	—	—	—	—	—	—																																																																							

Note: Values in the table above are for simplex chain only. For multiplex chains, please multiply the coefficient of multi-strand. (See "Chain Selection" on P120).