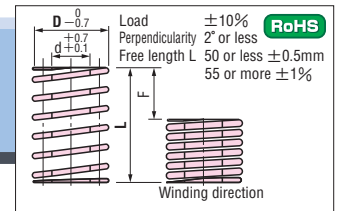
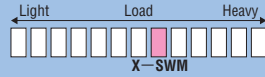


COIL SPRINGS

—X—SWM—



D	d	L	Spring constant N/mm (kgf/mm)	F=L×25.6%		F=L×28.8%		Catalog No.
				Fmm	Load N (kgf)	Fmm	Load N (kgf)	
Operation count				1,000,000	500,000			Type D—L
8	4	10	42.9 (4.37)	2.6	2.9			X—SWM 8—10
		15	28.6 (2.91)	3.8	4.3			15
		20	21.5 (2.18)	5.1	5.8			20
		25	17.2 (1.75)	6.4	7.2			25
		30	14.3 (1.46)	7.7	8.6			30
		35	12.2 (1.25)	9.0	10.1			35
		40	10.7 (1.09)	10.2	11.5			40
		45	9.5 (0.97)	11.5	13.0			45
		50	8.6 (0.87)	12.8	14.4			50
		55	7.8 (0.79)	14.1	15.8			55
		60	7.1 (0.73)	15.4	17.3			60
		65	6.6 (0.67)	16.6	18.7			65
		70	6.1 (0.62)	17.9	20.2			70
		75	5.7 (0.58)	19.2	21.6			75
		80	5.4 (0.55)	20.5	23.0			80

• Load calculation method: Load=Spring constant×Deflection
(SI unit) N=mm×Fmm
kgf=kgf/mm×Fmm
(kgf=N×0.101972)

D	d	L	Spring constant N/mm (kgf/mm)	F=L×25.6%		F=L×28.8%		Catalog No.
				Fmm	Load N (kgf)	Fmm	Load N (kgf)	
Operation count				1,000,000	500,000			Type D—L
16	8	20	78.1 (7.97)	5.1	5.8			X—SWM16—20
		25	62.5 (6.38)	6.4	7.2			25
		30	52.1 (5.31)	7.7	8.6			30
		35	44.7 (4.55)	9.0	10.1			35
		40	39.1 (3.98)	10.2	11.5			40
		45	34.7 (3.54)	11.5	13.0			45
		50	31.3 (3.19)	12.8	14.4			50
		55	28.4 (2.90)	14.1	15.8			55
		60	26.0 (2.66)	15.4	17.3			60
		65	24.0 (2.45)	16.6	18.7			65
		70	22.3 (2.28)	17.9	20.2			70
		75	20.8 (2.13)	19.2	21.6			75
		80	19.5 (1.99)	20.5	23.0			80
		90	17.4 (1.77)	23.0	25.9			90
		100	15.6 (1.59)	25.6	28.8			100

Order **Catalog No.**
X—SWM 20—80

Days to Ship **Quotation**

Price **Quotation**

D	d	L	Spring constant N/mm (kgf/mm)	F=L×25.6%		F=L×28.8%		Catalog No.
				Fmm	Load N (kgf)	Fmm	Load N (kgf)	
Operation count				1,000,000	500,000			Type D—L
25	12.5	25	153.0 (15.6)	6.4	7.2			X—SWM25—25
		30	128.0 (13.0)	7.7	8.6			30
		35	109.0 (11.2)	9.0	10.1			35
		40	95.7 (9.77)	10.2	11.5			40
		45	85.1 (8.68)	11.5	13.0			45
		50	76.6 (7.81)	12.8	14.4			50
		55	69.6 (7.10)	14.1	15.8			55
		60	63.8 (6.51)	15.4	17.3			60
		65	58.9 (6.01)	16.6	18.7			65
		70	54.7 (5.58)	17.9	20.2			70
		75	51.0 (5.21)	19.2	21.6			75
		80	47.9 (4.88)	20.5	23.0			80
		90	42.5 (4.34)	23.0	25.9			90
		100	38.3 (3.91)	25.6	28.8			100
		125	30.6 (3.13)	32.0	36.0			125
		150	25.5 (2.60)	38.4	43.2			150
175	21.9 (2.23)	44.8	50.4			175		

D	d	L	Spring constant N/mm (kgf/mm)	F=L×25.6%		F=L×28.8%		Catalog No.
				Fmm	Load N (kgf)	Fmm	Load N (kgf)	
Operation count				1,000,000	500,000			Type D—L
40	20	40	245.0 (25.0)	10.2	11.5			X—SWM40—40
		45	218.0 (22.2)	11.5	13.0			45
		50	196.0 (20.0)	12.8	14.4			50
		55	178.0 (18.2)	14.1	15.8			55
		60	163.0 (16.7)	15.4	17.3			60
		65	151.0 (15.4)	16.6	18.7			65
		70	140.0 (14.3)	17.9	20.2			70
		75	131.0 (13.3)	19.2	21.6			75
		80	123.0 (12.5)	20.5	23.0			80
		90	109.0 (11.1)	23.0	25.9			90
		100	98.1 (10.0)	25.6	28.8			100
		125	78.5 (8.00)	32.0	36.0			125
		150	65.4 (6.67)	38.4	43.2			150
		175	56.0 (5.71)	44.8	50.4			175
		200	49.0 (5.00)	51.2	57.6			200
		225	43.6 (4.44)	57.6	64.8			225
250	39.2 (4.00)	64.0	72.0			250		
275	35.7 (3.64)	70.4	79.2			275		
300	32.7 (3.33)	76.8	86.4			300		

Product guide P.806