

SFC-SA2

Specification

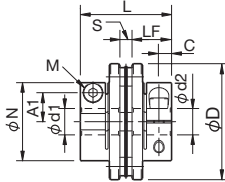
Model	Permissible torque [N·m]	Max. permissible misalignment			Max. rotation speed [min ⁻¹]	Torsional stiffness [N·m/rad]	Radial displacement [N/mm]	Shape TYPE	Moment of inertia [kg·m ²]	Mass [kg]	Price
		Parallel offset [mm]	Angular misalignment [°]	Axial displacement [mm]							
SFC-005SA2	0.6	0.02	0.5	±0.05	10000	500	140	C	0.25×10 ⁻⁶	0.007	-
SFC-010SA2	1.0	0.02	1	±0.1	10000	1400	140	C	0.58×10 ⁻⁶	0.011	-
SFC-020SA2	2.0	0.02	1	±0.15	10000	3700	64	C	2.36×10 ⁻⁶	0.025	-
SFC-025SA2	4.0	0.02	1	±0.19	10000	5600	60	C	3.67×10 ⁻⁶	0.029	-
SFC-030SA2	5.0	0.02	1	±0.2	10000	8000	64	A	4.00×10 ⁻⁶	0.033	-
								B	6.06×10 ⁻⁶	0.041	-
								C	8.12×10 ⁻⁶	0.049	-
SFC-035SA2	8.0	0.02	1	±0.25	10000	18000	112	C	18.43×10 ⁻⁶	0.084	-
SFC-040SA2	10	0.02	1	±0.3	10000	20000	80	A	16.42×10 ⁻⁶	0.076	-
								B	22.98×10 ⁻⁶	0.090	-
								C	29.53×10 ⁻⁶	0.105	-
SFC-050SA2	25	0.02	1	±0.4	10000	32000	48	A	54.88×10 ⁻⁶	0.156	-
								B	77.10×10 ⁻⁶	0.185	-
								C	99.33×10 ⁻⁶	0.214	-
SFC-060SA2	60	0.02	1	±0.45	10000	70000	76.4	A	143.7×10 ⁻⁶	0.279	-
								B	206.1×10 ⁻⁶	0.337	-
								C	268.5×10 ⁻⁶	0.396	-
SFC-080SA2	100	0.02	1	±0.55	10000	140000	128	C	709.3×10 ⁻⁶	0.727	-
SFC-090SA2	180	0.02	1	±0.65	10000	100000	108	C	1227×10 ⁻⁶	0.959	-
SFC-100SA2	250	0.02	1	±0.74	10000	120000	111	C	1858×10 ⁻⁶	1.181	-

* The indicated values in the moment of inertia and mass are measured with the maximum bore diameter.
 * The torsional stiffness indicates the actual measurement value of element.
 * The maximum rotation speed does not consider the dynamic balance.

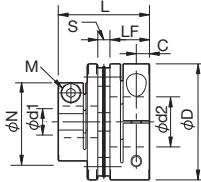
Dimensions



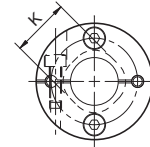
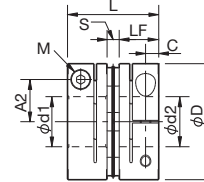
TYPE A



TYPE B



TYPE C



Unit [mm]

Model	d1*1		d2*1		D	N	L	LF	S	A1	A2	C	K	M	Tightening torque [N·m]	Shape TYPE	CAD file No.		
	Min.	Max.	Min.	Max.															
SFC-005SA2	3	6	3	6	16	-	16.7	7.85	1.0	-	4.8	2.5	6.5	2-M2	0.4 to 0.5	C	C005S2B1		
SFC-010SA2	3	8	3	8	19	-	19.35	9.15	1.05	-	5.8*2	3.15	8.5	2-M2.5*3	1.0 to 1.1*3	C	C010S2B1		
SFC-020SA2	4	10	4	11	26	-	23.15	10.75	1.65	-	9.5	3.3	10.6	2-M2.5	1.0 to 1.1	C	C020S2B1		
SFC-025SA2	5	14	5	14	29	-	23.4	10.75	1.9	-	11	3.3	14.5	2-M2.5	1.0 to 1.1	C	-		
SFC-030SA2	5	10	5	10	34	21.6	27.3	12.4	2.5	8	-	3.75	14.5	2-M3	1.5 to 1.9	A	C030S2B1		
	5	10	Over10	16						8	12.5							B	C030S2B2
	Over 10	14	Over10	16						-	12.5								
SFC-035SA2	6	16	6	18	39	-	34.0	15.5	3.0	-	14.0	4.5	17	2-M4	3.4 to 4.1	C	C035S2B1		
SFC-040SA2	8	15	8	15	44	29.6	34.0	15.5	3.0	11	-	4.5	19.5	2-M4	3.4 to 4.1	A	C040S2B1		
	8	15	Over 15	22						11	17.0							B	C040S2B2
	Over 15	19	Over 15	22						-	17.0								
SFC-050SA2	8	19	8	19	56	38	43.4	20.5	2.4	14.5	-	6	26	2-M5	7.0 to 8.5	A	C050S2B1		
	8	19	Over 19	30						14.5	22.0							B	C050S2B2
	Over 19	25	Over 19	30						-	22.0								
SFC-060SA2	11	24	11	24	68	46	53.6	25.2	3.2	17.5	-	7.75	31	2-M6	14 to 15	A	C060S2B1		
	11	24	Over 24	35						17.5	26.5							B	C060S2B2
	Over 24	30	Over 24	35						-	26.5								
SFC-080SA2	18	35	18	40	82	-	68	30	8	-	28	9	38	2-M8	27 to 30	C	C080S2B1		
SFC-090SA2	25	40	25	45	94	-	68.3	30	8.3	-	34	9	42	2-M8	27 to 30	C	C090S2B1		
SFC-100SA2	32	45	32	45	104	-	69.8	30	9.8	-	39	9	48	2-M8	27 to 30	C	C100S2B1		

*1 The torque permitted could be limited depending on the bore diameter. Refer to the "Standard bore diameter" on page15.

*2 indicates the value when d1 or d2 is ø3 to ø7. It will be 0.6 if d1 or d2 is ø8.

*3 indicates the value when d1 or d2 is ø3 to ø7. It will be M2 if d1 or d2 is ø8. The tightening torque of M2 is 0.4 to 0.5N·m.

* The dimensional tolerance of the target shaft is h7. However, for a shaft diameter of ø35, the tolerance is ^{0.010}/_{0.025}. Contact us for tolerances other than h7.



Standard bore diameter

Standard bore diameter Model	d1 [mm]		d2 [mm]																																	
	min	max	3	4	5	6	6.35	7	8	9	9.525	10	11	12	14	15	16	17	18	19	20	22	24	25	28	30	32	35	38	40	42	45				
SFC-005SA2	3	6	●	●	●	●																														
SFC-010SA2	3	8	●	●	●	●	●	●	●																											
SFC-020SA2	4	10		●	●	●	●	●	●	●	●	○																								
SFC-025SA2	5	14			2.1	●	●	●	●	●	●	●	●	●																						
SFC-030SA2	5	14			2.8	3.4	●	●	●	●	●	●	●	●	○	○																				
SFC-035SA2	6	16				5.0	5.0	6.6	●	●	●	●	●	●	●	●	○	○																		
SFC-040SA2	8	19							9.0	●	●	●	●	●	●	●	●	●	●	○	○															
SFC-050SA2	8	25							18	20	22	22	●	●	●	●	●	●	●	●	●	●	●	●	○	○										
SFC-060SA2	11	30											50	51	●	●	●	●	●	●	●	●	●	●	●	●	○	○								
SFC-080SA2	18	35																			●	●	●	●	●	●	●	●	○	○						
SFC-090SA2	25	40																																		
SFC-100SA2	32	45																																		

* The bore diameters with ● mark, ○ mark and value are supported as standard bore diameter.
 * Because the bore diameters marked ○ is limited by the element's inner diameter (K), only hub of the d2 side is supported. Not producible case: SFC-020SA2-11B-11B, Producibile case: SFC-020SA2-10B-11B
 * The permissible torque of small bore diameter indicated in the column with value is limited by the shaft locking mechanism. The value indicates its operating torque [N·m].
 * For bore diameters other than those above, processing cost is added to the standard price.

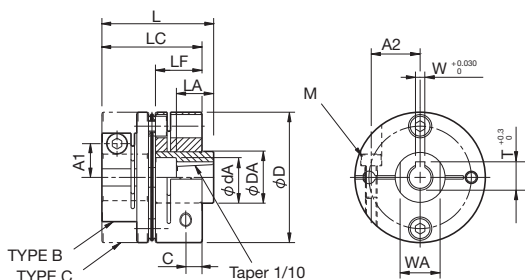
Optional: Taper shaft compatible

Specification SFC-□SA2-□B-□BC

Model	Permissible torque [N·m]	Max. permissible misalignment			Max. rotation speed [min ⁻¹]	Torsional stiffness [N·m/rad]	Radial displacement [N/mm]	Shape TYPE	Moment of inertia [kg·m ²]	Mass [kg]	Price
		Parallel offset [mm]	Angular misalignment [°]	Axial displacement [mm]							
SFC-050SA2-□B-11BC	25	0.02	1	±0.4	10000	32000	48	B	82.91×10 ⁻⁶	0.240	-
								C	103.5×10 ⁻⁶	0.258	
SFC-050SA2-□B-14BC	25	0.02	1	±0.4	10000	32000	48	B	88.72×10 ⁻⁶	0.271	-
								C	111.5×10 ⁻⁶	0.301	
SFC-050SA2-□B-16BC	25	0.02	1	±0.4	10000	32000	48	B	95.44×10 ⁻⁶	0.309	-
								C	118.2×10 ⁻⁶	0.338	
SFC-060SA2-□B-16BC	60	0.02	1	±0.45	10000	70000	76.4	B	228.7×10 ⁻⁶	0.475	-
								C	287.8×10 ⁻⁶	0.517	

* The indicated values in the moment of inertia and mass are measured with the maximum bore diameter.
 * The torsional stiffness indicates the actual measurement value of element only.
 * The maximum rotation speed does not consider the dynamic balance.

Dimensions SFC-□SA2-□B-□BC



Model	CAD file No.	
	Shape TYPE B	Shape TYPE C
SFC-050SA2-□B-11BC	C050S2C1	C050S2C2
SFC-050SA2-□B-14BC	C050S2C3	C050S2C4
SFC-050SA2-□B-16BC	C050S2C5	C050S2C6
SFC-060SA2-□B-16BC	C060S2C1	C060S2C2

Unit [mm]

Model	W	T	WA	LA	dA	DA	L	D	LC	LF	C	A1	A2	M
SFC-050SA2-□B-11BC	4	12.2	18	16	17	22	48.4	56	43.4	20.5	6	14.5	22	2-M5
-□B-14BC	4	15.1	24	19	22	28	53.4							
-□B-16BC	5	17.3	24	29	26	30	63.4							
SFC-060SA2-□B-16BC	5	17.3	24	29	26	30	69.6	68	53.6	25.2	7.75	17.5	26.5	2-M6

* The shape type is either TYPE B or TYPE C.

Ordering Information

SFC - 040 - SA2 - 14 B - 15 B

Size Type: SA2 Single element, aluminum hub
 Bore diameter: d1(small bore)-d2(big bore)
 B: Clamp hub
 BC: Taper adapter
 * Please indicate the BC to the d2.

SFC-DA2

Specification

Model	Permissible torque [N·m]	Max. permissible misalignment			Max. rotation speed [min ⁻¹]	Torsional stiffness [N·m/rad]	Radial displacement [N/mm]	Shape TYPE	Moment of inertia [kg·m ²]	Mass [kg]	Price
		Parallel offset [mm]	Angular misalignment [°]	Axial displacement [mm]							
SFC-005DA2	0.6	0.05	0.5 (one side)	±0.1	10000	250	70	C	0.36×10 ⁻⁶	0.010	-
SFC-010DA2	1.0	0.11	1 (one side)	±0.2	10000	700	70	C	0.79×10 ⁻⁶	0.015	-
SFC-020DA2	2.0	0.15	1 (one side)	±0.33	10000	1850	32	C	3.40×10 ⁻⁶	0.035	-
SFC-025DA2	4.0	0.16	1 (one side)	±0.38	10000	2800	30	C	5.26×10 ⁻⁶	0.040	-
SFC-030DA2	5.0	0.18	1 (one side)	±0.4	10000	4000	32	A	7.33×10 ⁻⁶	0.053	-
								B	9.39×10 ⁻⁶	0.061	-
								C	11.45×10 ⁻⁶	0.069	-
SFC-035DA2	8.0	0.24	1 (one side)	±0.5	10000	9000	56	C	26.78×10 ⁻⁶	0.123	-
SFC-040DA2	10	0.24	1 (one side)	±0.6	10000	10000	40	A	29.49×10 ⁻⁶	0.122	-
								B	36.05×10 ⁻⁶	0.136	-
								C	42.61×10 ⁻⁶	0.151	-
SFC-050DA2	25	0.28	1 (one side)	±0.8	10000	16000	24	A	96.94×10 ⁻⁶	0.246	-
								B	119.2×10 ⁻⁶	0.275	-
								C	141.4×10 ⁻⁶	0.304	-
SFC-060DA2	60	0.34	1 (one side)	±0.9	10000	35000	38.2	A	252.4×10 ⁻⁶	0.440	-
								B	314.8×10 ⁻⁶	0.498	-
								C	377.3×10 ⁻⁶	0.556	-
SFC-080DA2	100	0.52	1 (one side)	±1.10	10000	70000	64	C	1034×10 ⁻⁶	1.051	-
SFC-090DA2	180	0.52	1 (one side)	±1.30	10000	50000	54	C	1776×10 ⁻⁶	1.373	-
SFC-100DA2	250	0.55	1 (one side)	±1.48	10000	60000	55.5	C	2704×10 ⁻⁶	1.707	-

* The indicated values in the moment of inertia and mass are measured with the maximum bore diameter.

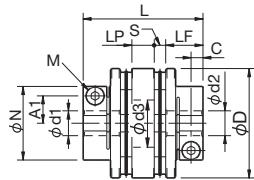
* The torsional stiffness indicates the actual measurement value of element.

* The maximum rotation speed does not consider the dynamic balance.

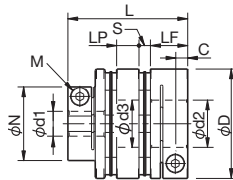
Dimensions



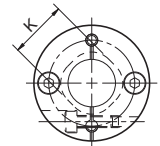
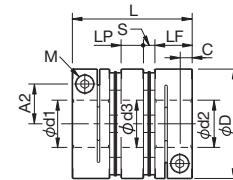
TYPE A



TYPE B



TYPE C



Unit [mm]

Model	d1*1		d2*1		D	N	L	LF	LP	S	A1	A2	C	d3	K	M	Tightening torque [N·m]	Shape TYPE	CAD file No.
	Min.	Max.	Min.	Max.															
SFC-005DA2	3	6	3	6	16	-	23.2	7.85	5.5	1.0	-	4.8	2.5	6.5	6.5	2-M2	0.4 to 0.5	C	C005D2B1
SFC-010DA2	3	8	3	8	19	-	25.9	9.15	5.5	1.05	-	5.8*2	3.15	8.5	8.5	2-M2.5*3	1.0 to 1.1*3	C	C010D2B1
SFC-020DA2	4	10	4	11	26	-	32.3	10.75	7.5	1.65	-	9.5	3.3	10.6	10.6	2-M2.5	1.0 to 1.1	C	C020D2B1
SFC-025DA2	5	14	5	14	29	-	32.8	10.75	7.5	1.9	-	11	3.3	15	14.5	2-M2.5	1.0 to 1.1	C	-
SFC-030DA2	5	10	5	10	34	21.6	37.8	12.4	8	2.5	8	-	3.75	15	14.5	2-M3	1.5 to 1.9	A	C030D2B1
	5	10	Over 10	16														B	C030D2B2
	Over 10	14	Over 10	16														C	C030D2B3
SFC-035DA2	6	16	6	18	39	-	48	15.5	11	3	-	14.0	4.5	17	17	2-M4	3.4 to 4.1	C	C035D2B1
SFC-040DA2	8	15	8	15	44	29.6	48	15.5	11	3	11	-	4.5	20	19.5	2-M4	3.4 to 4.1	A	C040D2B1
	8	15	Over 15	22														B	C040D2B2
	Over 15	19	Over 15	22														C	C040D2B3
SFC-050DA2	8	19	8	19	56	38	59.8	20.5	14	2.4	14.5	-	6	26	26	2-M5	7.0 to 8.5	A	C050D2B1
	8	19	Over 19	30														B	C050D2B2
	Over 19	25	Over 19	30														C	C050D2B3
SFC-060DA2	11	24	11	24	68	46	73.3	25.2	16.5	3.2	17.5	-	7.75	31	31	2-M6	14 to 15	A	C060D2B1
	11	24	Over 24	35														B	C060D2B2
	Over 24	30	Over 24	35														C	C060D2B3
SFC-080DA2	18	35	18	40	82	-	98	30	22	8	-	28	9	40	38	2-M8	27 to 30	C	C080D2B1
SFC-090DA2	25	40	25	45	94	-	98.6	30	22	8.3	-	34	9	47	42	2-M8	27 to 30	C	C090D2B1
SFC-100DA2	32	45	32	45	104	-	101.6	30	22	9.8	-	39	9	50	48	2-M8	27 to 30	C	C100D2B1

*1 Permissible torque could be limited depending on the bore diameter. Refer to the "Standard bore diameter" on page 17.

*2 indicates the value when d1 or d2 is ø3 to ø7. It will be 6.0 if d1 or d2 is ø8.

*3 indicates the value when d1 or d2 is ø3 to ø7. It will be M2 if d1 or d2 is ø8. The tightening torque of M2 is 0.4 to 0.5N·m.

* The dimensional tolerance of the target shaft is h7. However, for a shaft diameter of ø35, the tolerance is ^{0.010}0.025. Contact us for tolerances other than h7.



Standard bore diameter

Standard bore diameter	d1 [mm]		d2 [mm]																															
	min	max	3	4	5	6	6.35	7	8	9	9.525	10	11	12	14	15	16	17	18	19	20	22	24	25	28	30	32	35	38	40	42	45		
SFC-005DA2	3	6	●	●	●	●																												
SFC-010DA2	3	8	●	●	●	●	●	●																										
SFC-020DA2	4	10		●	●	●	●	●	●	●	●	○																						
SFC-025DA2	5	14			2.1	●	●	●	●	●	●	●	●	●																				
SFC-030DA2	5	14			2.8	3.4	●	●	●	●	●	●	●	●	○	○																		
SFC-035DA2	6	16				5.0	5.0	6.6	●	●	●	●	●	●	●	●	○	○																
SFC-040DA2	8	19							9.0	●	●	●	●	●	●	●	●	●	●	○	○													
SFC-050DA2	8	25							18	20	22	22	●	●	●	●	●	●	●	●	●	●	●	●	○	○								
SFC-060DA2	11	30										50	51	●	●	●	●	●	●	●	●	●	●	●	●	●	○	○						
SFC-080DA2	18	35																																
SFC-090DA2	25	40																																
SFC-100DA2	32	45																																

* The bore diameters with ● mark, ○ mark and value are supported as standard bore diameter.
 * Because the bore diameters marked ○ is limited by the element's inner diameter (K), only hub of the d2 side is supported. Not producible case: SFC-020SA2-11B-11B, Producibile case: SFC-020SA2-10B-11B
 * The permissible torque of small bore diameter indicated in the column with value is limited by the shaft locking mechanism. The value indicates its operating torque [N·m].
 * For bore diameters other than those above, processing cost is added to the standard price.

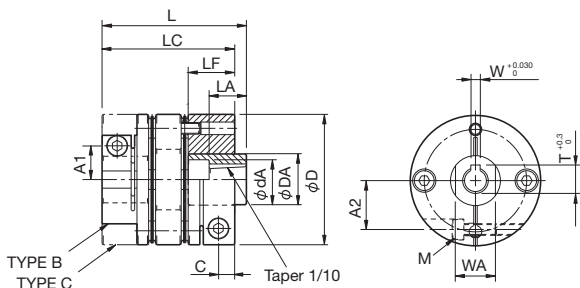
Optional: Taper shaft compatible

Specification SFC-□DA2-□B-□BC

Model	Permissible torque [N·m]	Max. permissible misalignment			Max. rotation speed [min ⁻¹]	Torsional stiffness [N·m/rad]	Radial displacement [N/mm]	Shape TYPE	Moment of inertia [kg·m ²]	Mass [kg]	Price
		Parallel offset [mm]	Angular misalignment [°]	Axial displacement [mm]							
SFC-050DA2-□B-11BC	25	0.28	1 (one side)	±0.8	10000	16000	24	B	125.5×10 ⁻⁶	0.331	-
								C	146.1×10 ⁻⁶	0.349	
SFC-050DA2-□B-14BC	25	0.28	1 (one side)	±0.8	10000	16000	24	B	131.1×10 ⁻⁶	0.362	-
								C	154.1×10 ⁻⁶	0.392	
SFC-050DA2-□B-16BC	25	0.28	1 (one side)	±0.8	10000	16000	24	B	138.1×10 ⁻⁶	0.400	-
								C	160.8×10 ⁻⁶	0.430	
SFC-060DA2-□B-16BC	60	0.34	1 (one side)	±0.9	10000	35000	38.2	B	339.4×10 ⁻⁶	0.638	-
								C	398.5×10 ⁻⁶	0.681	

* The indicated values in the moment of inertia and mass are measured with the maximum bore diameter.
 * The torsional stiffness indicates the actual measurement value of element only.
 * The maximum rotation speed does not consider the dynamic balance.

Dimensions SFC-□DA2-□B-□BC



Model	CAD file No.	
	Shape TYPE B	Shape TYPE C
SFC-050DA2-□B-11BC	C050D2C1	C050D2C2
SFC-050DA2-□B-14BC	C050D2C3	C050D2C4
SFC-050DA2-□B-16BC	C050D2C5	C050D2C6
SFC-060DA2-□B-16BC	C060D2C1	C060D2C2

Model	W	T	WA	LA	dA	DA	L	D	LC	LF	C	A1	A2	M
SFC-050DA2-□B-11BC	4	12.2	18	16	17	22	64.8	56	59.8	20.5	6	14.5	22	2-M5
-□B-14BC	4	15.1	24	19	22	28	69.8							
-□B-16BC	5	17.3	24	29	26	30	79.8							
SFC-060DA2-□B-16BC	5	17.3	24	29	26	30	89.3	68	73.3	25.2	7.75	17.5	26.5	2-M6

* The shape type is either TYPE B or TYPE C.

Ordering Information

SFC - 040 - DA2 - 14 B - 15 B

Size Type: DA2
 Double element, aluminum hub

Bore diameter: d1(small bore)-d2(big bore)
 B: Clamp hub
 BC: Taper adapter
 * Please indicate the BC to the d2.