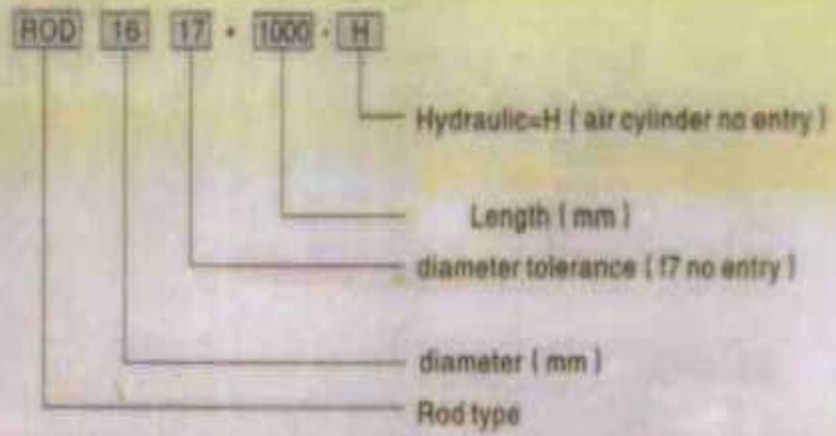
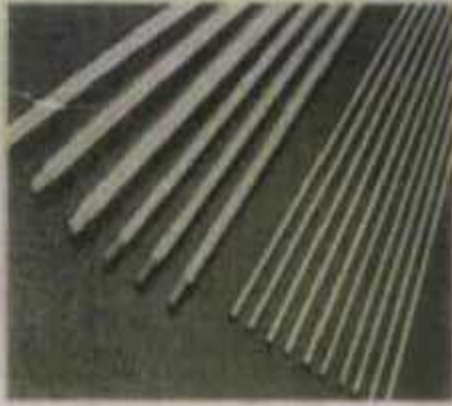


CNZ Cylinder Rod



● (Material): 45#

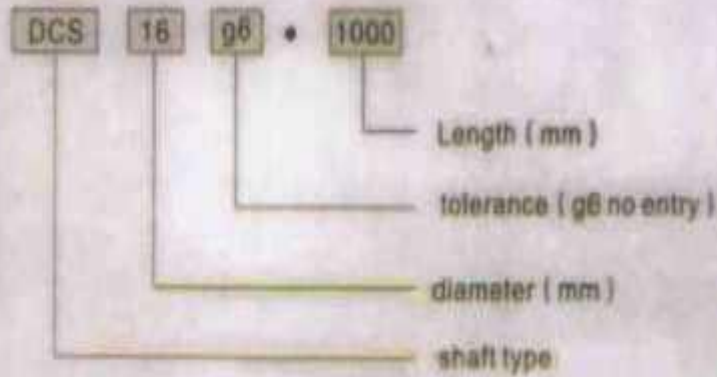
● (Specification): $\phi 4-\phi 80$

● (Maximum Length): 6M

● (Main Use):

● Tolerance: 17, 18

CNZ Machine Shaft



● (Material): 45#

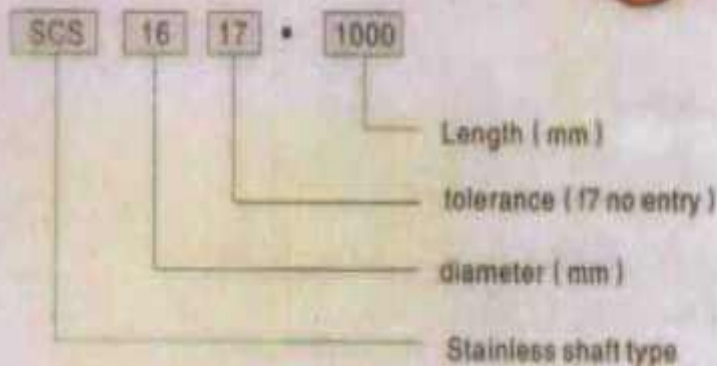
● (Specification): $\phi 4-\phi 80$

● (Maximum Length): 6M

● Main use: be used wood machine, food machine automatic machine etc.

● Tolerance: g6, 17, 18

CNZ Stainless Steel Machine Shaft



● (Material): 55#









● (Specification): $\phi 4-\phi 80$

● (Maximum Length): 6M

● Main use: printing machine, special oil cylinder, packing machine, automatic cutting machine etc.

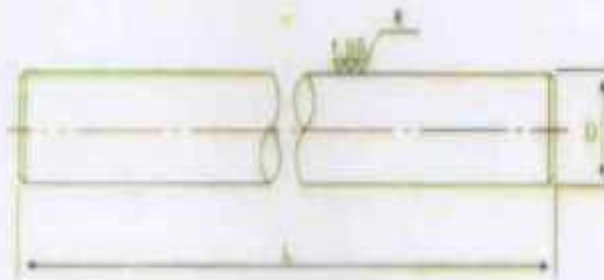
● Tolerance: g6, 17, 18

CNZ Linear Shaft Series

Type	Description	Material	Type
Standard Shaft 	 <p>The high precision shaft has a lot of application together with automatic moving facility such as industrial robot, measuring instrument, medical instrument, precision machine, pneumatic cylinder rod, automation slide system ect.</p>	Gcr15	SF SFC
Stainless Shaft 	 <p>Stainless steel: As the stainless shafts are highly anti-corrosive, that are most appropriate for use in the easily oxidizing environments such as water, chemical, vapor and sea water and so on.</p>	SUS440	SSF
Standard Pipe Shaft 	 <p>PIPE SHAFT, The pipe shafts contribute greatly to reducing weight and simplification of the equipment due to their pipe structure of which the inner are suitable for electric wiring for measurement, compressed air piping operation, lubricate and hydraulic piping or robot arms.</p>	Gcr15	PSF PSFC
Tapped Shaft 	 <p>Hole positions can be provided in accordance with the requirement of customers.</p>	Gcr15 or SUS440	TSF TSFC TSSF TPSF TPSFC

CNZ Linear Shaft Series

■ SF (C)



Outer Dia. (mm)	Type SF(C)	Tolerance μm (1 μm)	Standard Length (mm)																Turning Dept. (mm)	Weight (kg/m)	Outer Dia. (mm)				
			100	200	300	400	500	600	800	1000	1500	1800	2200	2700	3300	3800	4500	5500				6300			
3	SF(SFC,SSF)	3-2 -8																				OVER 1.0	0.06	3	
4	SF(SFC,SSF)4																						0.10	4	
5	SF(SFC,SSF)5	-4 -12																					0.16	5	
6	SF(SFC,SSF)6																						0.23	6	
8	SF(SFC,SSF)8	-5 -14																					0.40	8	
10	SF(SFC,SSF)10																						0.62	10	
12	SF(SFC,SSF)12	-6 -17																					0.89	12	
13	SF(SFC,SSF)13																						1.04	13	
16	SF(SFC,SSF)16	-7 -20																					1.58	16	
20	SF(SFC,SSF)20																						OVER 1.5	2.47	20
25	SF(SFC,SSF)25	-9 -25																					OVER 2.0	3.65	25
30	SF(SFC,SSF)30																						OVER 2.5	5.55	30
35	SF(SFC,SSF)35	-10 -29																					OVER 3.0	7.55	35
40	SF(SFC,SSF)40																						OVER 3.0	9.87	40
50	SF(SFC,SSF)50																						OVER 3.0	15.4	50
60	SF(SFC,SSF)60	-10 -29																					OVER 3.0	22.2	60
80	SF(SFC,SSF)80																						OVER 3.0	39.5	80

● We may accept requests for other major diameter tolerances.

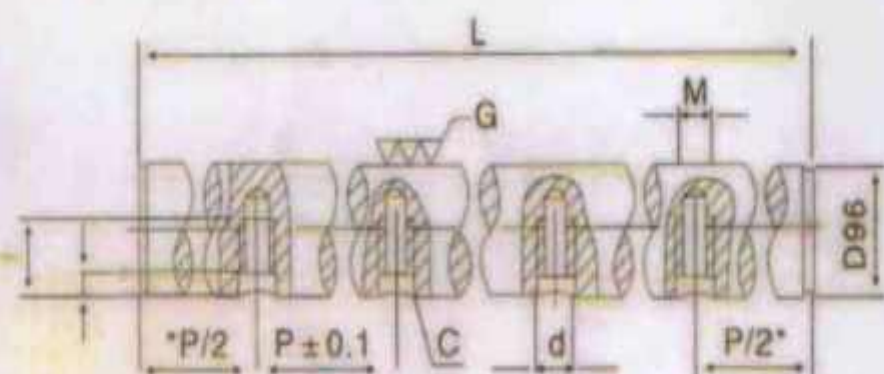
● Material: SF,SFC shaft High-carbon chromium bearing steel (GCr15); SSF shaft stainless steel shaft(SUS440)

● Hardness: SF,SFC shaft HRC58-64 or more. SSF shaft HRC above 56.

CNZ Tapped Linear Shaft Series

■ SFT, SFSST

If a deflection or other precision problem develops with a shaft because of a high or unbalanced load, the shaft may no longer maintain its functions. In this case, selecting another shaft with a larger diameter is an option; the best possible method would be using a shaft tapped on its center line (generatrix) in combination with an TBR/SBR type rail support. The center line tapped shafts have been standardized for easier selection.



■ Note:

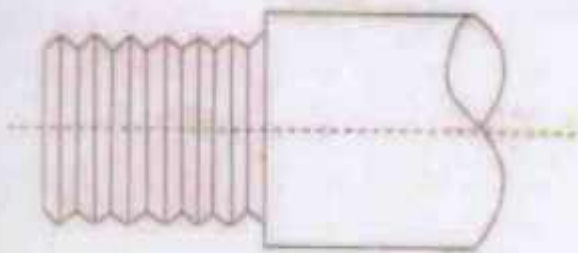
Dimensions marked with an asterisk * are not always $P/2$, depending on the overall length.

Diameter	Type	Pitch	Nominal screw size	Tap depth	Maximum length
D		P	M	I	L
10	SFT10	100	M4x0.7	4.5	1500
12	SFT12	100	M4x0.7	5.5	1800
13	SFT13	100	M4x0.7	6	2000
16	SFT16	150	M5x0.8	7	2000
20	SFT20	150	M6x1	9	3000
25	SFT25	200	M6x1	12	4000
30	SFT30	200	M8x1.25	15	4500
35	SFT35	200	M8x1.25	15	5000
40	SFT40	300	M8x1.25	18	6000
50	SFT50	300	M10x1.5	22	6000

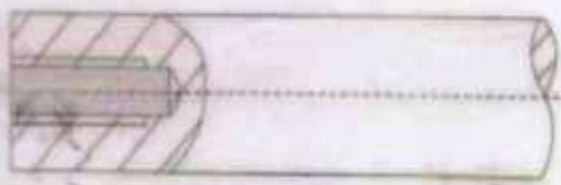
Diameter	Type	Pitch	Nominal screw size	Tap depth	Maximum length
D		P	M	I	L
16	SFSST16	150	M5x0.8	7	2000
20	SFSST20	150	M6x1	9	3000
25	SFSST25	200	M6x1	12	4000
30	SFSST30	200	M8x1.25	15	4500
35	SFSST35	200	M8x1.25	15	5000
40	SFSST40	300	M8x1.25	18	6000
50	SFSST50	300	M10x1.5	22	6500

■ **Special Machining for Shaft**

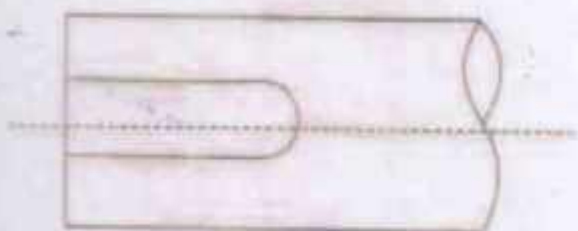
When you are special requirements on machining, such as threading, coaxial holes drilled and tapped, radial holes drilled and tapped, reduced shaft diameter etc, we can machine for you, and these special machines are finished after heat treatment and hard chromic so that ensure the precision of product. send us your detailed sketch or blue print for product quotation and action, you will be satisfied with our service.



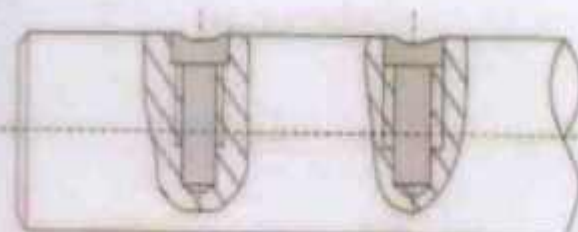
Threading



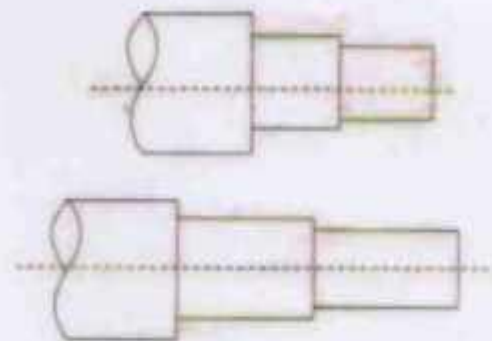
Coaxial holes drilled and tapped



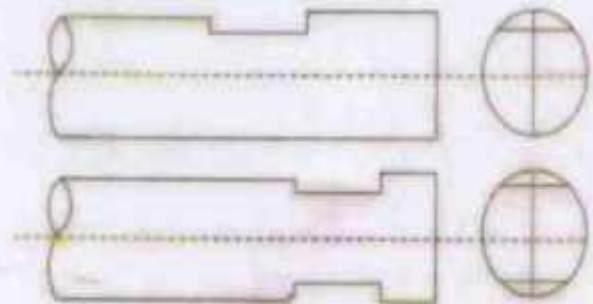
Kcy way



Radial holes drilled and tapped



Reduced shaft diameter



Flats-single or multiple



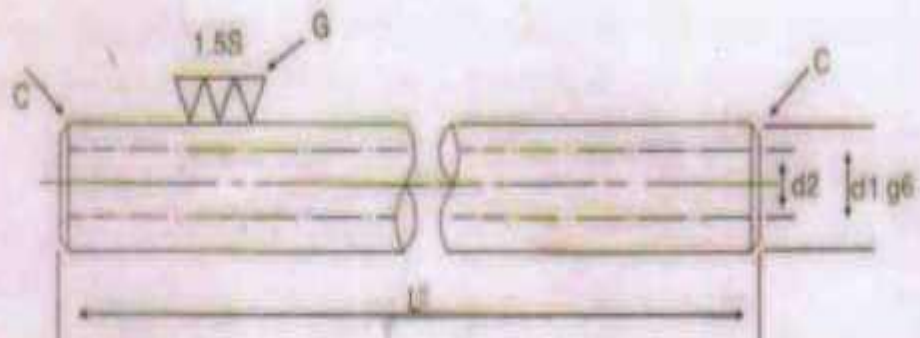
Snap ring grooves



Standard chamfer is 45° but another angle is also available

CNZ Pipe Linear Shaft Series

■ PSF



Out dia	In dia	Type	Tolerance	Standard length L(mm)																Harding Depth	Weight	Out dia	In dia					
D2 (mm)	D1 (mm)	PS	g6 (μm)	100	120	150	200	250	300	350	400	450	500	550	600	650	700	750	800	850	900	950	1000	(mm)	(kg/m)	d2 (mm)	d1 (mm)	
16	8	PSRPSFC16	-6																						OVER 1.5	1.18	16	8
			-17																							1.85	20	14
																										2.46	25	15
20	14	PSRPSFC20																						OVER 2.0	3.97	30	16	
			-7																				5.32		35	19		
			-20																						7.39	40	20	
35	19	PSRPSFC35																						OVER 2.5	11.3	50	25	
46	20	PSRPSFC40	-9																				15.9		60	32		
			-25																				25.3		80	40		
60	32	PSRPSFC60																						OVER 3.0	39.5	100	50	
60	40	PSRPSFC60	-10																									
			-29																									
100	50	PSRPSFC100	-12																									
			-34																									

We may accept requests for other major diameter tolerances.

- Material: High-carbon chromium bearing steel (Gcr15).
- Hardness: HRC60 or more.
- Surface roughness: 1.5μm.
- PSFC | PSF+Hard Chromic Plating



Linear Shaft Series

■ Heat Treatment

The slide shafts are annealed, quenched and tempered by processing techniques and skills developed. The heat treatment assures the slide shafts uniform hardness in both radial and axial directions, developing an appropriate hardened layer.

The martensite stainless steel (SUS440C) is also subjected to a sophisticated heat treatment to suppress distortion, assuring a uniform hardened layer and sufficient hardness.

■ High-frequency heat treatment

Heat treatment by induction heating using a radio frequency is called high-frequency heat treatment. This treatment is used mainly for surface quenching, it has been also used for annealing and tempering more recently.

■ Carburizing

Carburizing is a treatment to make carbon diffuse over the surface of steel and permeate the steel. Quenching a steel product after carburizing hardens the surface, providing the product with both a corrosion resistant surface and a core of considerable toughness.

■ Shaft hardness

The surface of the shaft is induction hardened to a depth of at least 0.4 up to 3.2mm, depending on the shaft diameter. Surface hardness and depth of hardness are extremely uniform, both in the radial and axial dimensional consistency and the long service life of Precision Steel Shafts.

Please contact us to obtain the depth of hardness for corrosion-resistant steel shafts.