

# Shaft Supports - Overview

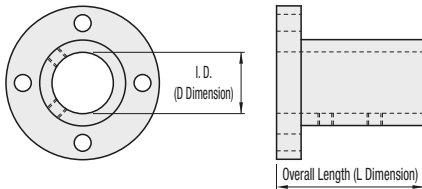
## About I.D. Accuracy

- Features
- Combination use of MISUMI Shafts (standard g6, f8 and h5) and MISUMI Shaft Supports are recommended.
  - Slit is machined after the mounting hole D is bored to H7 tolerance. The tolerance may become H8 or so depending on the machining condition.

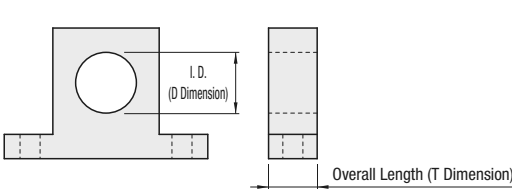
## Relationship between I.D. (D dimension) and Overall Length of Guide (L, T dimensions)

- Features
- Standard Type spec. is  $L, T=D \times 1.3$  or less approx.; Long Sleeve Type and Wide Type spec. is  $L, T=D \times 1.3$  to 2.0 approx.
  - Rigidity of Long Sleeve Type and Wide Type is enhanced as they have longer shaft holding area.
  - $L=D \times 2.0$  or more are available under the index of Posts. Please refer to **P.2115~2160**.

(Ex.) Flanged Mount



(Ex.) T-Shaped



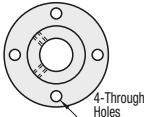
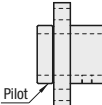
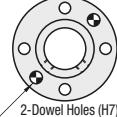
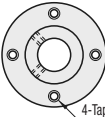
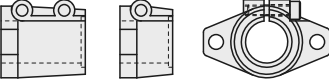

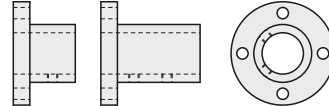





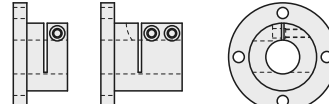



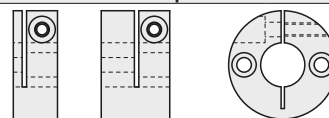





## Manufacturing Method

- Features
- MISUMI shaft supports are available in Machined Types and Cast Types.
  - Cast products are offered at lower prices than machined products. Precision cast supports have slight de-molding draft and gritty surfaces but the dimensions are precisely finished as shown in the catalog.



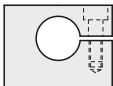
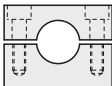
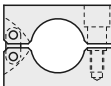
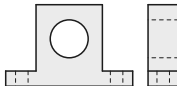









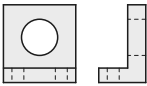













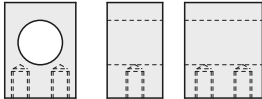





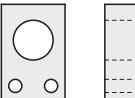





## About Materials

- Features
- EN 1.0038 Equiv., EN 1.1191 Equiv., EN 1.4301 Equiv. and Aluminum materials (EN AC-51300 Equiv. for Cast) are available.

• : Existing Products

Basic Shape		How to Mount	Through Hole	Pilot	Dowel Hole	Tapped Hole	
							
		Characteristic	Mounted by using tapped holes on mounting plate.	Easy positioning during assembly. Easy repeatability during maintenance.	Suitable when mounting plates are thin or may have insufficient strength like aluminum.		
Cast Product	Flanged Type		Features: Most economical. Longer sleeve than standard type improves shaft gripping power.				
				-	-	-	
	* Long Sleeve Type available.						
Machined Product	Set Screw		Features: Set screws may scratch the shaft during clamping; however, this is the most economical machined product.				
							
	* Long Sleeve Type available.						
Machined Product	Slit		Features: Tightening doesn't damage shafts during clamping.				
						-	
	* Long Sleeve Type available.						
Machined Product	Compact		Features: Small O.D. contributes to space saving. Tightening doesn't damage shafts.				
				-	-	-	
	* Long Sleeve Type available.						
Machined Product	Split		Features: Easy maintenance such as shaft removal, etc..				
				-	-	-	
Machined Product	Back Mount		Features: Shaft can be fastened securely using a tapped hole on the shaft end.				
				-	-	-	

• : Existing Products

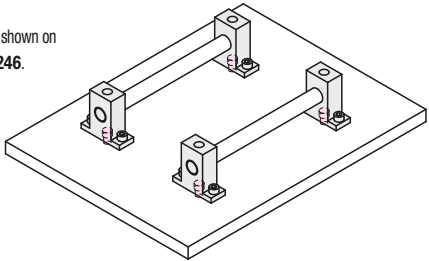
Basic Shape	Shaft Securing Method	Set Screw	Slit	Side Slit	Split	Hinged	
							
	Characteristic	Most economical.	Shafts can be secured without damage.		Easy maintenance.	Enhanced working efficiency with only one tightening screw.	
Cast, Machined Product	T-Shaped		Features: Suitable when lengthwise space is limited.				
		Cast Product					-
		Machined Product					
	* Dowel Hole Type available. * Wide Type available						
	L-Shaped		Features: Suitable when crosswise space is limited.				
		Cast Product					-
Machined Product							
Machined Product	Compact		Features: The most compact space-saving design in all dimensions.				
				-			-
		* Wide Type available					
	Bottom Mount		Features: Screw mount from underside is effective when the mounting host is too thin to tap, and in space limited applications.				
							
		* Wide Type available					
Side Mount		Features: Enables mounting on the plate side.					
							

## Positioning and Repeatability

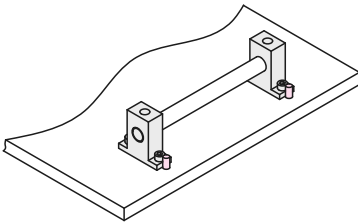
- Support units are located with dowel holes on the units and dowel pins pressed into the mounting plate.

Use With Dowel Hole Type shown on

P.233~238, P.245~246.

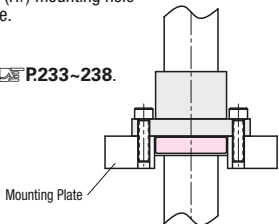


- Support units are located with dowel pins pressed into the mounting plate against unit housing's vertical faces.



- Support units are located with the housing pilot and a precision bored (H7) mounting hole made in the mounting plate.

Use Pilot Type shown on P.233~238.



- Use clearances of mounting holes (through holes) and make adjustments and positioning during uses.

