

Locating Pins

Screw Mounted / Pilot / Large Screw Mounted

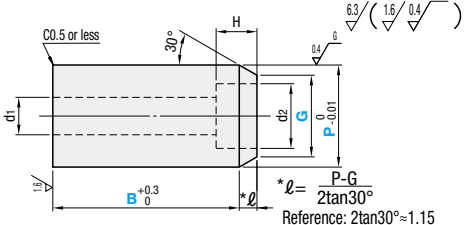
■Features: The pin body is secured by the bolts. You can use it for areas where you cannot use tapped screws since the bolt can be tightened from the top of the insertion guide.



RoHS

Material	Surface Treatment	Hardness	Type
S45C Equivalent	-	Treated Hardness: 45 ~ 50HRC	LPZ
S45C Equivalent	Black Oxide	Treated Hardness: 45 ~ 50HRC	LPZB
S45C Equivalent	Hard Chrome Plating	Treated Hardness: 45 ~ 50HRC	LPZR
SUS304	-	-	LPZS
SUS304	Hard Chrome Plating	-	LPZH
SUS40C Equivalent	-	Treated Hardness: 50 ~ 55HRC	LPZC

⚡ Hard Chrome Plating: Plating Thickness 3µm / Plating Hardness 750HV ~



Reference: $2\tan 30^\circ \approx 1.15$

Part Number		P	B	G	Unit Price					
Type	No.	0.01mm Increment	0.1mm Increment	1mm Increment	d1	d2	H	Applicable Screw	* Tightening Torque N·cm	
LPZ LPZB LPZR	3	11.00~15.00	10.0~25.0	9≤G<P	3.5	6.5	4	M3	147	LPZ
	4	12.00~20.00	10.0~25.0	10≤G<P	4.5	8	5	M4	333	LPZB
	5	14.00~20.00	10.0~30.0	12≤G<P	5.5	9.5	6	M5	676	LPZR
	6	15.00~25.00	12.0~40.0	13≤G<P	6.5	11	7	M6	1156	LPZS
LPZH LPZC	7	15.00~25.00	12.0~40.0	13≤G<P	6.5	11	7	M6	1156	LPZH
	8	18.00~25.00	14.0~50.0	16≤G<P	9	14	9	M8	2803	LPZC

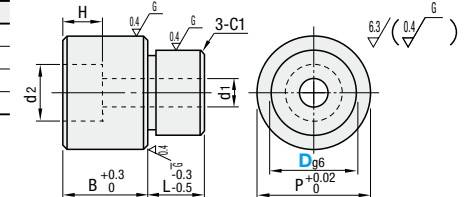
* Tightening torque (reference) will be within Strength Class of Tightening Torque on Technical Data **ex** P. 2297 (10.9). Not applicable when using locking materials or lock washers.



RoHS

Material	Surface Treatment	Hardness	Type
SKS3 Equivalent	-	Treated Hardness: 60 ~ 63HRC	JJPM
SKS3 Equivalent	Hard Chrome Plating	Treated Hardness: 50 ~ 55HRC	GJJPM
SUS304	-	-	SJJPM
SUS40C Equivalent	-	Treated Hardness: 50 ~ 55HRC	CJJPM

⚡ Hard Chrome Plating: Plating Thickness 3µm / Plating Hardness 750HV ~



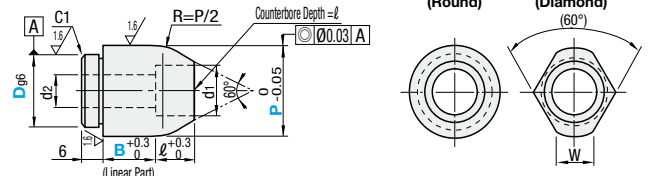
Part Number		P	d1	d2	H	B	L	Applicable Screw	* Tightening Torque N·cm	Unit Price			
Type	Dg6									JJPM	GJJPM	SJJPM	CJJPM
JJPM GJJPM SJJPM CJJPM	6	-0.004 -0.012	10	3.5	6.5	4	10	M3	147				
	8	-0.005 -0.014	12	4.5	8	5		M4	333				
	10	-0.014	15	5.5	9.5	6		M5	676				
	12	-0.006 -0.017	16	6.5	11	7		M6	1156				
	15	-0.006 -0.017	20	6.5	11	7	15	M8	2803				
	16	-0.007 -0.020		9	14	9		M10	5557				
	20	-0.007 -0.020		11	17.5	11		M12	9702				
	25	-0.020		14	20	13							

* Tightening torque (reference) will be within Strength Class of Tightening Torque on Technical Data **ex** P. 2297 (10.9). Not applicable when using locking materials or lock washers.



RoHS

Material	Surface Treatment	Hardness	Shape	Type
SCM435	-	Treated Hardness: 35 ~ 40HRC	Round	B Selectable B Configurable
			Diamond	LBNA LBND



Part Number		P	B	W	d1	d2	Applicable Screw	* Tightening Torque N·cm	Unit Price		
Type	Dg6	0.1mm Increment	Selection	1mm Increment					LBNA	LBND	LBFA
LBNA (Round) LBND (Diamond) LBFA (Round)	16	-0.023	22.0~24.9	5~20	7.5	7	M6	1156			
			25.0~29.9		11	10	M8	2803			
			30.0~37.9		13	10	M10	5557			
			38.0~39.9		16	12					
			40.0~49.9		20	16					
			50.0~59.9		25	20					
	30		60.0~80.0		35	28					

⚡ D dimension 16 is applicable to LBNA and LBND only.

* Tightening torque (reference) will be within Strength Class of Tightening Torque on Technical Data **ex** P. 2297 (10.9). Not applicable when using locking materials or lock washers.

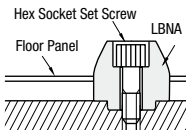
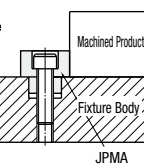


Part Number - P - B - G

LPZ5 - P16.00 - B25.5 - G15 (Screw Mounted)

JJPM15 - P30.0 - B10 (Pilot)

LBNA20 - P30.0 - B10 (Large Screw Mounted)



Locating Pins

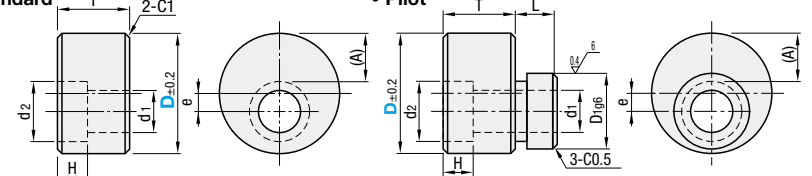
Eccentric / Flanged Flat

■Features: Locating Pins used when the hole location differs in the mounting area and the locating area. Use them by securing the flange with the bolts.



RoHS

Material	Surface Treatment	Hardness	Type
SKS3 Equivalent	-	Treated Hardness: 60 ~ 63HRC	JJPE
SKS3 Equivalent	Hard Chrome Plating	Treated Hardness: 50 ~ 55HRC / Plating Hardness: 750HV ~	GJJPE
SUS304	-	-	SJJPE
SUS40C Equivalent	-	Treated Hardness: 50 ~ 55HRC	CJJPE



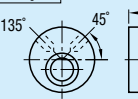
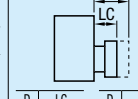
Part Number		D	d1	d2	T	H	Applicable Screw	* Tightening Torque N·cm	e	(A)	D1	D1g6	L	Unit Price			
Type														JJPE	GJJPE	SJJPE	CJJPE
JJPE GJJPE SJJPE CJJPE	Standard	10	3.5	6.5	6	4	M3	147	1	2.75	-	-	-				
	Pilot	12	4.5	8	8	5	M4	333	1.2	3.2	8	-0.006	8				
		16	5.5	9.5	10	6	M5	676	2	5.25	8	-0.017	8				
		20	6.5	11	12	7	M6	1156	2.5	7	11	-0.007	10				
		25	9	14	16	9	M8	2803	3.5	9	14	-0.020	12				
		32	11	17.5	20	11	M10	5557	5	12.25	17	-0.009	15				
		40	14	20	24	13	M12	9702	7	17	20	-0.025	18				

* Tightening torque (reference) will be within Strength Class of Tightening Torque on Technical Data **ex** P. 2297 (10.9). Not applicable when using locking materials or lock washers.



Part Number

JJPEA32 - JJPEIA25

Alterations	Wrench Hole	Pilot Cut
Code	LAC	LC
Spec.	Machines wrench holes. Selection: 45°, 135° Ordering Code: LAC45	Cuts the pilot section. Ordering Code: LC8 (1mm increment)
		
	D Wrench Hole Dia. ℓ	D LC D LC
	16, 20 3.5 3	12 6-7 25 8-11
	25, 32, 40 5 6	16 6-7 32 10-14
		20 6-9 40 12-17



Example

Machined Product

Fixture Body

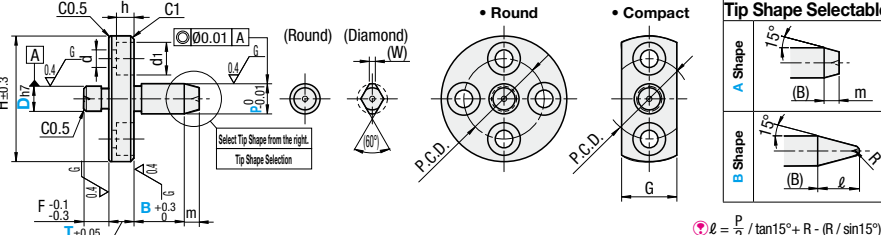
JJPEIA

Easy eccentric adjustment due to the presence of a pilot.



RoHS

Material	Surface Treatment	Hardness	Round Flange	Compact Flange
SKS3 Equivalent	-	Treated Hardness: 60 ~ 63HRC	Round Diamond	Round Diamond
SUS304	-	-	MASA MASD	MATA MATD
SUS304	Hard Chrome Plating	Plating Hardness: 750HV ~	SMASA -	SMATA -
			HMASA -	HMATA -



Part Number		P	B	T	F	H	G	P, C, D	d	d1	h	m	R	(W)
Type	Tip Shape	0.01mm Increment	0.1mm Increment	0.1mm Increment										
Round Flange Compact Flange MASA MASD SMASA SMATA HMASA HMATA	A	5 0	3.00~5.00	3.0~10.0	5.0~10.0	5	25	11	16	3.5	6.5	3.5	3	1.5
		6 -0.012	4.00~7.00	3.0~12.0										1.8
		8 0	6.00~9.00	3.0~15.0										2.2
		10 -0.015	7.00~11.00	4.0~20.0	7.0~15.0	5	36	16	24	5.5	9.5	5.5	4	2.3
	B	12 0	8.00~12.00	4.0~20.0										3.2
		16 -0.018	13.00~16.00	5.0~20.0	11.0~20.0	10	54	24	37	9	14	9	5	4.4
		20 -0.021	16.00~20.00	5.0~20.0										5.5



Part Number - P - B - T

MASAA8 - P6.50 - B7.5 - T8.2

Part Number		P	B	T
Type	Tip Shape	0.01mm Increment	0.1mm Increment	0.1mm Increment
Round Flange Compact Flange MASA MASD SMASA SMATA HMASA HMATA	A	5 0	3.00~5.00	3.0~10.0
		6 -0.012	4.00~7.00	3.0~12.0
		8 0	6.00~9.00	3.0~15.0
		10 -0.015	7.00~11.00	4.0~20.0
	B	12 0	8.00~12.00	4.0~20.0
		16 -0.018	13.00~16.00	5.0~20.0
		20 -0.021	16.00~20.00	5.0~20.0

Part Number		P	B	T
Type	Tip Shape	0.01mm Increment	0.1mm Increment	0.1mm Increment
Round Flange Compact Flange MASA MASD SMASA SMATA HMASA HMATA	A	5 0	3.00~5.00	3.0~10.0
		6 -0.012	4.00~7.00	3.0~12.0
		8 0	6.00~9.00	3.0~15.0
		10 -0.015	7.00~11.00	4.0~20.0
	B	12 0	8.00~12.00	4.0~20.0
		16 -0.018	13.00~16.00	5.0~20.0
		20 -0.021	16.00~20.00	5.0~20.0

⚡ For Compact Flange Type, D dimension 5, 6 are not applicable.