

Accurate Manufacturing Company



PUNCH PRESS ACCESSORIES



Established 1945



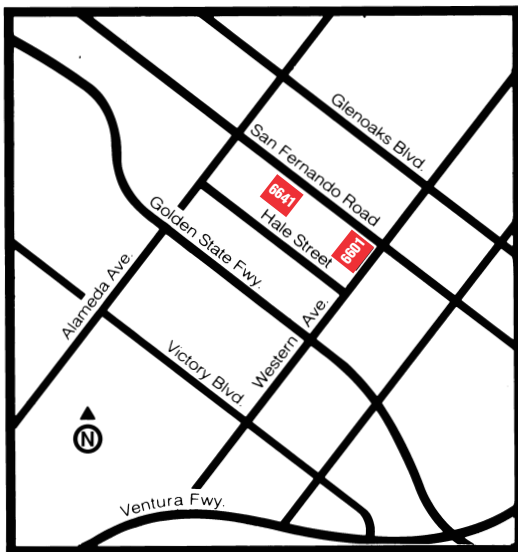
6641 San Fernando Road
Glendale, California 91201
(818) 240-4840 • Fax (818) 240-0966
(888) 925-4840
e-mail: sales@acc-mfg.com
website: www.acc-mfg.com

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Table of Contents

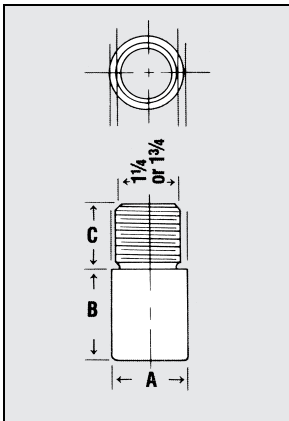
	Page
■ Shanks and Shank Adapters.....	2
■ Guide Pins	3-4
■ Straight Guide Bushings.....	5
■ Shoulder Bushings.....	6
■ Bronze Plated Shoulder Bushings	7
■ Clamping Arrangements.....	8
■ Springs.....	9
■ Fasteners.....	10



Located in Southern California, Accurate ships daily to all areas of the United States and Canada. Accurate Manufacturing Company has built its reputation on quality workmanship delivered on time at reasonable prices. *Call us* for your next job!

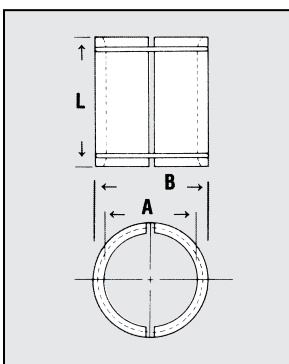
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Shanks and Shank Adapters



Shank Part Number 63-SH					
C	A = 1 1/2 B = 2 1/8	A = 1 9/16 B = 2 1/8	A = 2 B = 2 7/8	A = 2 1/2 B = 2 7/8	A = 3 B = 2 7/8
Thread Length	Size Number	Size Number	Size Number	Size Number	Size Number
1 3/8	150-0137	156-0137	200-0137	250-0137	300-0137
1 1/2	150-0150	156-0150	200-0150	250-0150	300-0150
1 3/4	150-0175	156-0175	200-0175	250-0175	300-0175
2	150-0200	156-0200	200-0200	250-0200	300-0200
2 1/4	150-0225	156-0225	200-0225	250-0225	300-0225
2 1/2	150-0250	156-0250	200-0250	250-0250	300-0250
3	150-0300	156-0300	200-3000	250-0300	300-0300
3 1/2	150-0350	156-0350	200-0350	250-0350	300-0350

When ordering, specify part number and size number.
For example: A Shank 1 1/2" diameter by 2 1/4" length is 63-SH-150-0225.



Shank Adapter Part Number 63-SA			
Length	A	B	Size Number
1 1/2	1	1 1/2	100-0150
		1 9/16	100-0156
2 1/8	1 1/2	2	150-0200
		2 1/2	150-0250
2 1/8	1 9/16	2	156-0200
		2 1/2	156-0250
2 1/8	2	2 1/2	200-0250
2 1/8		3	200-0300
2 1/8	2 1/2	3	250-0300

When ordering, specify part number and size number.
For example: A 1 1/2" to 2" Shank adapter is 63-SA-150-0200.

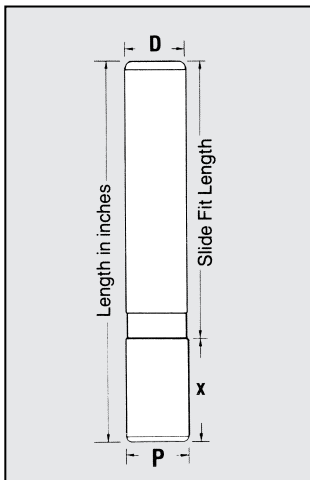
Guide Pins GP Series

D	P	Style	Part No.
± .0002	+ .002 + .0025	Standard Press Fit Pins	71-GP
± .0002		Standard Straight Pins	72-GP
Max + .012	Max + .012	When ordering Oversize Guide Pins, specify D and P dimensions.	73-GP



Material: Steel 8620L
Casehardened 60-63RC

All Accurate Guide Pins are available in three styles. When ordering please specify part number and size.
Example: A Standard Press Fit Guide Pin 1" diameter by 3 1/2" length is 71-GP-100-0350.
Unless otherwise specified Guide Pins will be considered Standard Press Fit.



D = Slide Fit diameter
P = Press Fit diameter
X = Press Fit length

Length	D = 3/4"	D = 7/8"
	X = 15/16	X = 1 3/16
	Size Number	Size Number
3	075-0300	
3 1/4	075-0325	
3 1/2	075-0350	087-0350
3 3/4	075-0375	087-0375
4	075-0400	087-0400
4 1/4	075-0425	087-0425
4 1/2	075-0450	087-0450
4 3/4	075-0475	087-0475
5	075-0500	087-0500
5 1/4	075-0525	087-0525
5 1/2	075-0550	087-0550
5 3/4	075-0575	087-0575
6	075-0600	067-0600
6 1/2	075-0650	087-0650
7	075-0700	087-0700
7 1/2	075-0750	087-0750
8	075-0800	087-0800
8 1/2	075-0850	087-0850
9	075-0900	087-0900
10	075-1000	087-1000
11	075-1100	087-1100
12	075-1200	087-1200
13	075-1300	087-1300
14	075-1400	087-1400
15	075-1500	087-1500
16	075-1600	087-1600
17		087-1700
18		087-1800
20		087-2000
22		
24		
26		

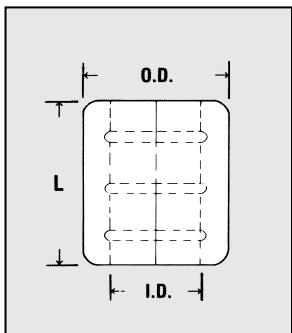
Other lengths and sizes available upon request.

Guide Pins GP Series

	D = 1" X = 1 ³ / ₈	D = 1 ¹ / ₄ " X = 1 ⁷ / ₁₆	D = 1 ¹ / ₂ " X = 1 ⁷ / ₁₆	D = 1 ³ / ₄ " X = 1 ¹¹ / ₁₆	D = 2" X = 1 ¹⁵ / ₁₆	D = 2 ¹ / ₂ " X = 2 ³ / ₈	D = 3" X = 2 ⁷ / ₈
Length	Size Number	Size Number	Size Number	Size Number	Size Number	Size Number	Size Number
3							
3 ¹ / ₄							
3 ¹ / ₂	100-0350						
3 ³ / ₄	100-0375						
4	100-0400						
4 ¹ / ₄	100-0425						
4 ¹ / ₂	100-0450	125-0450	150-0450				
4 ³ / ₄	100-0475	125-0475	150-0475				
5	100-0500	125-0500	150-0500				
5 ¹ / ₄	100-0525	125-0525	150-0525				
5 ¹ / ₂	100-0550	125-0550	150-0550				
5 ³ / ₄	100-0575	125-0575	150-0575				
6	100-0600	125-0600	150-0600	175-0600	200-0600		
6 ¹ / ₂	100-0650	125-0650	150-0650	175-0650	200-0650		
7	100-0700	125-0700	150-0700	175-0700	200-0700		
7 ¹ / ₂	100-0750	125-0750	150-0750	175-0750	200-0750		
8	100-0800	125-0800	150-0800	175-0800	200-0800	250-0800	300-8000
8 ¹ / ₂	100-0850	125-0850	150-0850	175-0850	200-0850	250-0850	300-0850
9	100-0900	125-0900	150-0900	175-0900	200-0900	250-0900	300-0900
10	100-1000	125-1000	150-1000	175-1000	200-1000	250-1000	300-1000
11	100-1100	125-1100	150-1100	175-1100	200-1100	250-1100	300-1100
12	100-1200	125-1200	150-1200	175-1200	200-1200	250-1200	300-1200
13	100-1300	125-1300	150-1300	175-1300	200-1300	250-1300	300-1300
14	100-1400	125-1400	150-1400	175-1400	200-1400	250-1400	300-1400
15	100-1500	125-1500	150-1500	175-1500	200-1500	250-1500	300-1500
16	100-1600	125-1600	150-1600	175-1600	200-1600	250-1600	300-1600
17	100-1700	125-1700	150-1700	175-1700	200-1700	250-1700	300-1700
18	100-1800	125-1800	150-1800	175-1800	200-1800	250-1800	300-1800
20	100-2000	125-2000	150-2000	175-2000	200-2000	250-2000	300-2000
22		125-2200	150-2200	175-2200	200-2200	250-2200	300-2200
24		125-2400	150-2400	175-2400	200-2400	250-2400	300-2400
26		125-2600	150-2600	175-2600	200-2600	250-2600	300-2600

Straight Guide Bushing Series AA

Material: 8620L
Casehardened,
hardness 60-63RC



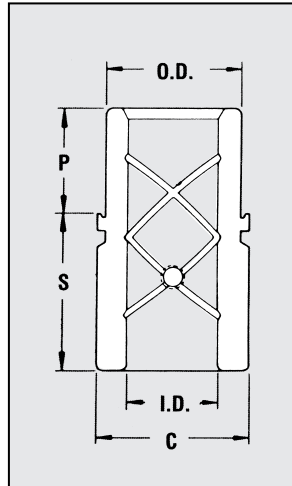
OD	Style	ID	Part Number
+ .0025 + .002	Standard Straight Guide Bushings	+ .0005	61-AA
		+ .0002	
+ .0025 + .002	Oversize Internal Diameter Bushings	+ .0015	63-AA
		+ .002	
		+ .0025	64-AA
		+ .003	
+ .0035 + .004			65-AA
+ .012 Max.	Oversize External Diameter Bushings Specify OD	+ .0005	66-AA
		+ .0002	

ID	OD	Length	Size Number
.750	1.127	1 3/4	075-0175
.875	1.377	1 3/4	087-0175
1.000	1.502	1 3/4	100-0175
1.000		3	100-0300
1.250	1.752	2	125-0200
1.250		3	125-0300
1.500	2.002	2	150-0200
1.500		3	150-0300
1.750	2.252	3	175-0300
2.000	2.502	3	200-0300

When ordering specify part number and size number.
Example: A Straight Guide Bushing 1" diameter by 1 3/4" length is 61-AA-100-0175.

Shoulder Bushings Series SB

Material: 8620L
Casehardened,
hardness 60-63RC



When ordering specify part number and size number.
Example: A Press Fit Bushing 1½" by 2" Shoulder (S dimension) is 61-SB-150-0200.

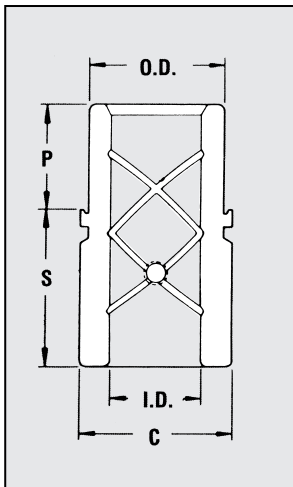
OD	Style	ID	Part Number
+ .0025	Standard Press Fit Bushings	+ .0005	61-SB
+ .0020		+ .0002	
±.0001	Standard Wring Fit Bushings	+ .0005	62-SB
		+ .0002	
+ .0025 + .002	Oversize Internal Diameter Bushings	+ .0015	63-SB
		+ .002	
		+ .0025	64-SB
		+ .003	
		+ .0035	65-SB
		+ .004	
+ .012 Max.	Oversize External Diameter Bushings When ordering specify OD dimension	+ .0005	66-SB
		+ .0002	

ID	OD*	P	S	C	Size Number
.750	1.127	1 ¹¹ / ₁₆	1 ³ / ₁₆	1 ⁵ / ₁₆	075-0081
			1 ³ / ₄		075-0175
			3		075-0300
.875	1.377	1 ⁵ / ₁₆	1 ³ / ₁₆	1 ⁹ / ₁₆	087-0081
			1 ³ / ₄		087-0175
			3		087-0300
1.000	1.502	1 ³ / ₁₆	1 ³ / ₁₆	1 ¹¹ / ₁₆	100-0081
			1 ³ / ₄		100-0175
			3		100-0300
1.250	1.752	1 ⁵ / ₁₆	1 ³ / ₁₆	1 ¹⁵ / ₁₆	125-0081
			2		125-0200
			3		125-0300
1.500	2.002	1 ⁷ / ₁₆	1 ³ / ₁₆	2 ³ / ₁₆	150-0081
			2		150-0200
1.750	2.252	1 ¹¹ / ₁₆	2	2 ¹ / ₂	175-0200
2.000	2.502	1 ¹⁵ / ₁₆	2	2 ⁷ / ₈	200-0200

*OD dimensions given are for Press Fit Bushings.

Bronze Plated Shoulder Bushing Series BP

Material: Steel
 Casehardened,
 hardness 60-63RC
 Bronze Plated on ID



OD	Style	ID	Part Number
+0.0025 +.002	Standard Press Fit Bronze Plated Bushings	+ .0005 + .0002	61-BP
+0.0000 -.0005	Standard Wring Fit Bushings Plated Bushings	+ .0005 + .0002	62-BP
+0.012 Max.	Oversize External Diameter Bushings	+ .0005 + .0002	66-BP

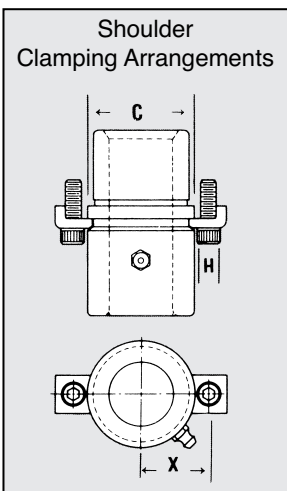
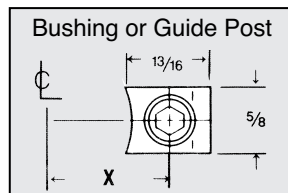
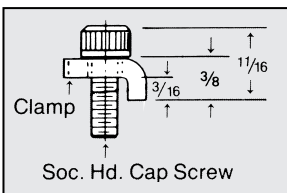
ID	OD	P	C	S	Size Number
.750	1.125	13/16	1 5/16	1 1/4	075-0125
				2	075-0200
				2 3/4	075-0275
.875	1.375	7/8	1 9/16	1 1/4	087-0125
				2 1/8	087-0212
				3 1/2	087-0350
1.000	1.500	7/8	1 3/4	1 1/4	100-0125
				2 1/4	100-0225
				3 1/2	100-0350
1.250	1.750	1 1/8	2 1/8	1 1/2	125-0150
				2 3/8	125-0237
				3 1/2	125-0350
1.500	2.000	1 3/8	2 3/8	1 1/2	150-0150
				2 3/4	150-0275
				3 1/2	150-0350
1.750	2.250	1 5/8	2 5/8	1 1/2	175-0150
				3	175-0300
2.000	2.500	1 7/8	3 1/8	1 1/2	200-0150
				3	200-0300
2.500	3.000	1 7/8	3 5/8	2	250-0200
				3 1/2	250-0350
3.000	3.625	1 7/8	4 3/8	2	300-0200
				4	300-0400

When ordering specify part number and size number.
 Example: A Standard Press Fit Bronze Plate Bushing with .750 ID and 1 1/4" shoulder length is 61-BP-075-0125.

Standard Clamp and Screw



	Catalog Number
Clamp and Screw	63-CS-037-0075



The location of any Clamping Screw (X) on any bushing can be determined by adding the outside shoulder diameter (C) to the diameter of the head (H) of the holding screw plus .050 divided by two.

$$X = \frac{C + H + .050}{2}$$

AVAILABLE CLAMPING ARRANGEMENTS

Clamp Arrangement Selection Data			Bushing Diameter
L-R Feed	F-B Feed	Round Dies	
 A	 D	 G	3/4" ID to 1 3/4" ID
 B	 E	 H	2" ID
 C	 F	 I	2 1/2" ID and 3" ID

Springs



Chrome Vanadium Die Springs	Color	Catalog Number	Range	
			Diameter	Length
Medium	Blue	77-MD	$\frac{3}{8}$ to 2"	1 to 12"
Medium Heavy	Red	77-MH	$\frac{3}{8}$ to 2"	1 to 12"
Heavy	Gold	77-HD	$\frac{3}{8}$ to 2"	1 to 12"
Extra Heavy	Green	77-XH	$\frac{3}{8}$ to 2"	1 to 12"

When ordering specify part number and size number.
 Example: A Medium duty die spring $\frac{3}{4}$ x 3 long is 77-MD-075-0300.

Music Wire Springs	Catalog Number	Range	
		Diameter	Length
Square Wire Die Springs (plain ends)	77-SR	.375 to 2.562	12"
Round Wire Springs (plain ends)	77-RW	.093 to .500	10"
Square & Ground Ends	77-WA	$\frac{3}{8}$ to $\frac{5}{8}$ "	1 to 4"

Solid Core Springs	Catalog Number	Range	
		Diameter	Length
Urethane Springs	77-UR	Unlimited	Unlimited
Urethane Bars	77-UB		
Urethane Slabs	77-US		
Marsh Mellow Spring (Firestone solid rubber core spring with hollow center and bias wrap)	77-MM	Unlimited	Unlimited

Fasteners

		Catalog Number	Range	
			Diameter	Length
	Stripper Bolt	85-SB	1/4 to 3/4"	3/8 to 6"
	Socket Head Cap Screw	85-CS	#0 to 1 1/4"	1/8 to 12"
	Dowel Pins	74-DP	1/16 to 1"	3/16 to 6"
	Flat Head Socket Screw	85-FH	#0 to 3/4"	1/8 to 3"
	Button Socket Screws	85-BH	#0 to 5/8"	1/8 to 2"
	Set Screws	85-SS	#0 to 1"	1/16 to 3"
	Pipe Plugs	85-PP	1/16 to 1/4"	5/16 to 13/16"
	Hex Key Sets Short Arm Long Arm	85-SA 85-LA	15 pieces @ .028 to 3/8" 9 pieces @ 5/64 to 3/8"	

Please specify catalog number, diameter and length when ordering. Example: A Flat Head Cap Screw 1/4 dia. x 1" is 85-FH-025-0100.

Available upon Request from Accurate

Ball Bearing Rollerball Systems



Ball Bearing Retainers



Straight Guide Posts



Press Fit Sleeve Bushings



Removable Guide Posts with Shoulder



Clamp Type Shoulder Bushings—Demountable



Removable Guide Posts with Tapered Bushing



Clamp Type Shoulder Bushings



Shoulder Guide Posts with and without groove for Ball Bearing Bushing