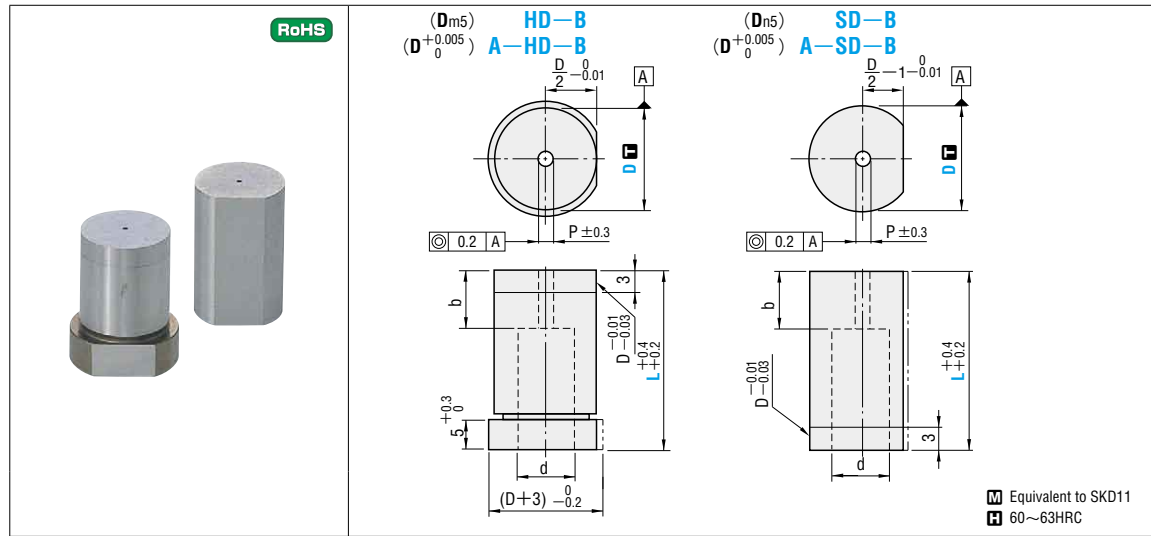


# BUTTON DIE BLANKS



D	Shank dia. tolerance		Catalog No.		L	P	b	d	Base unit price 1~9 pieces									
	D <sub>ms</sub>	D <sub>ns</sub>	Type	D					HD-B	A-HD-B	SD-B	A-SD-B						
6	+0.009 +0.004	—	(D <sub>ms</sub> ) HD-B	(D <sub>ns</sub> +0.005) A-HD-B	6	16	20	22	25	28	30	32	35					
8	+0.012 +0.006	+0.016 +0.010	(D <sub>ms</sub> ) HD-B	(D <sub>ns</sub> +0.005) A-HD-B	8	16	20	22	25	28	30	32	35	(40)				
10	+0.015 +0.007	+0.020 +0.012			10	16	20	22	25	28	30	32	35	(40)	(45)			
13	+0.015 +0.007	+0.020 +0.012			13	16	20	22	25	28	30	32	35	(40)	(45)			
16			(D <sub>ms</sub> ) SD-B	(D <sub>ns</sub> +0.005) A-SD-B	16	16	20	22	25	28	30	32	35	(40)	(45)			
20	+0.017 +0.008	+0.024 +0.015			(20)	16	20	22	25	28	30	32	35	(40)	(45)			
22	+0.017 +0.008	+0.024 +0.015			(22)	16	20	22	25	28	30	32	35	(40)	(45)			
25			(D <sub>ms</sub> ) SD-B	(D <sub>ns</sub> +0.005) A-SD-B	(25)	16	20	22	25	28	30	32	35	(40)	(45)			
32					(32)	16	20	22	25	28	30	32	35					
38	+0.020 +0.009	+0.028 +0.017			(38)	16	20	22	25	30	35							
45					(45)	20	22	25	30	35								
50					(50)	20	22	25	30	35								
56	+0.024 +0.011	+0.023 +0.020			(56)	20	22	25	30	35								

⚡ L = (40) is a specification available for HD-B, A-HD-B, and SD-B only. ⚡ L = (45) is a specification available for HD-B only.  
 ⚡ D = (20) ~ (56) are specifications available for shank diameter tolerance of D<sub>ms</sub> • D<sub>ns</sub> only.

Order Catalog No. — L  
SD-B 20 — 25

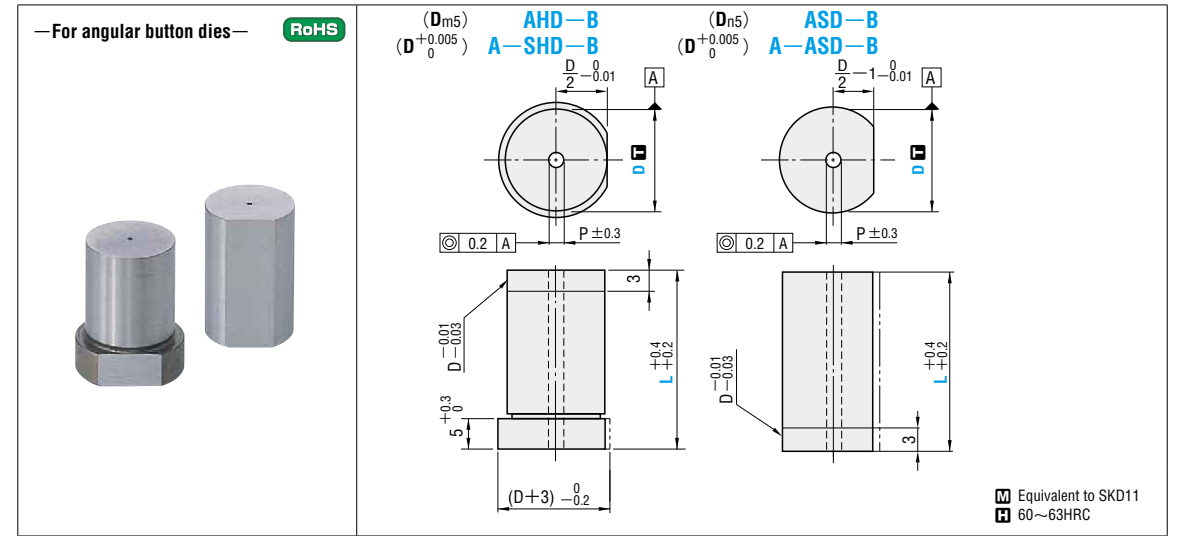
Price Quotation

Days to Ship Quotation

Alterations Catalog No. — L(LC) — (HC-TC, etc.)  
SD-B 25 — LC27 — WKC

Alteration	Code	Spec.	1Code
	HC	Head diameter change D ≤ HC < H 0.1 mm increments	Quotation
	TC	Head thickness change 2 ≤ TC < 5 0.1 mm increments Full length is shortened by (5-TC). If combined with LC, full length is equal to LC.	
	WKC	Addition of double key flats in parallel Cannot be used for L(LC) < 16.	
	NKC	No key flat Cannot be used for D > 16.	
	RC	Head thickness is machined to a tolerance of -0.04 ~ 0 relative to the retainer surface. Cannot be used for L < 30.	

Alteration	Code	Spec.	1Code
	LC	HD-B Full length change 10 ≤ L - (b-1) ≤ LC < L 0.1 mm increments Press-in lead is shortened by (L-LC).	Quotation
	SD	SD-B Full length change 10 ≤ LC < L 0.1 mm increments Press-in lead is shortened by (L-LC).	
	NHC	No start hole Cannot be used for D > 16.	



D	Shank dia. tolerance		Catalog No.		L	P	Base unit price 1~9 pieces									
	D <sub>ms</sub>	D <sub>ns</sub>	Type	D			AHD-B	A-AHD-B	ASD-B	A-ASD-B						
6	+0.009 +0.004	—	(D <sub>ms</sub> ) AHD-B	(D <sub>ns</sub> +0.005) A-AHD-B	6	16	20	22	25	30	35					
8	+0.012 +0.006	+0.016 +0.010	(D <sub>ms</sub> ) AHD-B	(D <sub>ns</sub> +0.005) A-AHD-B	8	16	20	22	25	30	35					
10	+0.015 +0.007	+0.020 +0.012			10	16	20	22	25	30	35	(40)				
13	+0.015 +0.007	+0.020 +0.012			13	16	20	22	25	30	35	(40)				
16			(D <sub>ms</sub> ) ASD-B	(D <sub>ns</sub> +0.005) A-ASD-B	16	16	20	22	25	30	35	(40)				
20	+0.017 +0.008	+0.024 +0.015			(20)	16	20	22	25	30	35					
25					(25)	16	20	22	25	30	35					

⚡ L = (40) is a specification available for AHD-B only. ⚡ D = (20) and (25) are specifications available for shank diameter tolerance of D<sub>ms</sub> and D<sub>ns</sub> only.

Order Catalog No. — L  
AHD-B 20 — 25

Days to Ship Quotation

Price Quotation

Alterations Catalog No. — L(LC) — (HC-TC-WKC, etc.)  
AHD-B 20 — 25 — TC3

Alteration	Code	Spec.	1Code
	HC	Head diameter change D ≤ HC < H 0.1 mm increments	Quotation
	TC	Head thickness change 2 ≤ TC < 5 0.1 mm increments Full length is shortened by (5-TC). If combined with LC, full length is equal to LC.	
	WKC	Addition of double key flats in parallel Cannot be used for L(LC) < 16.	
	NKC	No key flat Cannot be used for D > 16.	

Alteration	Code	Spec.	1Code
	LC	Full length change 10 ≤ LC < L 0.1 mm increments Press-in lead is shortened by (L-LC).	Quotation
	NHC	No start hole Cannot be used for D > 16.	