

MARYLAND METRICS

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TECHNICAL INFORMATION and DATA

Recommended core hole diameter d (H11) for thread cutting screws DIN 7513/16

Thread nominal diameter	M 2,5	M 3	M 4	M 5	M 6	M 8
Core hole diameter tolerance H 11	2,2	2,7	3,6	4,5	5,5	7,4

Recommended core hole diameter d (H11) for thread forming screws DIN 7500 (TAPTITE®)

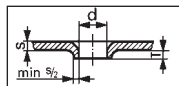
in materials of hardness up to HB 150

Material thickness	Thread, nominal diameter / nut, sheet material												St = steel		Al = aluminium		Cu = brass/copper		
	M 2		M 2,5		M 3		M 3,5		M 4		M 5		M 6		M 8		M 10		
	St, Al, Cu	St, Al, Cu	St, Al, Cu	St, Al, Cu	St, Al, Cu	St, Al, Cu	St, Al, Cu	St, Al, Cu	St, Al, Cu	St, Al, Cu	St, Al, Cu	St, Al, Cu	St	Al, Cu	St	Al	Cu		
< 2 mm	1,80	2,25	2,70	3,20	3,60	4,50	5,40	7,25	7,25										
< 3 mm	1,85	2,30	2,75	3,20	3,60 ¹	4,50	5,45	7,25	7,25	9,20	9,15	9,15							
< 4 mm		2,30	2,75	3,20	3,65	4,55	5,45	7,30	7,30	9,30	9,15	9,15							
< 5 mm		2,30	2,75	3,25	3,65	4,60	5,45 ¹	7,40	7,30	7,30	9,20	9,25							
< 6 mm		2,35	2,75	3,30	3,65 ¹	4,60	5,50	7,40	7,30	9,30	9,20	9,25							
< 7 mm				3,30	3,70	4,65	5,50 ¹	7,50	7,40	9,30	9,20	9,30							
< 8 mm				3,30	3,70	4,65	5,55	7,50	7,40	9,40	9,30	9,30							
< 10 mm					3,75	4,65	5,55	7,50	7,40	9,40	9,30	9,30							
< 12 mm						4,70	5,60	7,50	7,50	9,50	9,40	9,40							
< 15 mm								7,55	7,50	9,50	9,40	9,40							
> 15 mm								7,60	7,55	9,50	9,50	9,50							

1) for steel: drill or punch core hole diameter 0,05 mm larger

in thin sheet metals of steel St 37

Sheet metal thickness	Thread, nominal diameter																	
	M 2.5		M 3		M 3.5		M 4		M 5		M 6		M 8					
	d	T	d	T	d	T	d	T	d	T	d	T	d	T	d	T		
0,5	2,24	1,02	2,71	1,19	3,15	1,35												
0,8	2,26	1,02	2,74	1,19	3,18	1,35	3,59	1,52										
1,0	2,28	1,02	2,77	1,19	3,21	1,35	3,62	1,52	4,53	1,78	5,41							
1,6	2,30	1,02	2,80	1,19	3,24	1,35	3,65	1,55	4,56	1,78	5,44	1,91	7,27	2,11				
2,0	2,32	1,09	2,82	1,32	3,28	1,52	3,68	1,78	4,59	2,29	5,47	2,54	7,29	2,95				
3,0							3,72	1,91	4,61	2,41	5,49	2,67	7,32	3,18				
4,0											5,54		7,37					
5,0													7,45					
6,0													7,53					



Flanging
 s = sheet thickness
 d = diameter of the hole
 T = height of the flange

Thin sheet metals have to be flanged for bolting. By tapping the thread or using self cutting screws, the thin sheet will be weakened, whereas self forming screws create a cold strengthened, fully loadable thread.