4-48 Tap Drill Chart

Unified National Fine (UNF) · 48 threads per inch · ASME B1.1

TAP DRILL (68% THREAD)

#42 = 0.0935 in = 2.37 mm

Drills for 4-48 (50–85% thread)

DRILL	INCH	MM	% THREAD	
#40	0.0980	2.49	52%	
#41	0.0960	2.44	59%	
3/32"	0.0938	2.38	67%	
#42	0.0935	2.37	68%	Recommended
#43	0.0890	2.26	85%	

Clearance hole (bolt passes through)

FIT	DRILL	INCH	MM
Close	#31	0.1200	3.05
Normal	#30	0.1285	3.26
Loose	#29	0.1360	3.45

Thread dimensions (basic)

DIMENSION	INCH	MM
Major diameter (basic)	0.1120	2.84
Pitch diameter (basic)	0.0985	2.50
Minor diameter, internal (basic)	0.0894	2.27
Pitch (1/48 in)	0.0208	0.53

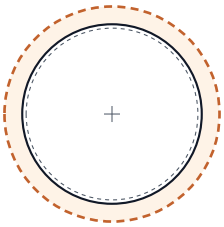
Actual size

Print at 100% scale ("Actual size", not "Fit to page"). Check with the rulers below.



Dashed copper circle: thread major diameter; solid: tap drill hole; dotted: basic minor diameter.

Enlarged 10x:



Tap drill, actual size (2.37 mm):







Scan for the interactive version:

whatsizeis.com/tap-drill/4-48/

Values from the ASME B1.1, ISO 261/68-1 and ASME B1.20.1 thread formulas; drill sizes per ASME B94.11M; clearance holes per ISO 273. Method: whatsizeis.com/how-we-calculate/