



RIGID TAPPING with FADAL CNC

FORMAT 1

N1 M6T1 (4-40 TAP)
N2 G0 G80 G90 S1500.2 M5 (SELECT CORRECT SPINDLE RANGE)
(DO NOT TURN THE SPINDLE ON!)
N3 G0 E1 X1. Y1. (RAPID TO FIRST HOLE LOCATION.)
N4 H1 Z4 M8 (RAPID TO .4 ABOVE PART AND TURN ON COOLANT)
N5 G84.1 G98 X1. Y1. Z-.5 R.4 Q.025 F1500 (RIGID TAP CYCLE, SEE VARIABLES BELOW)
N6 X2. Y2. (NEXT HOLE)
N7 G80 (CANCEL RIGID TAP)

X1. Y1. = FIRST HOLE LOCATION
Z-.5 = FINAL Z DEPTH
R.4 = RETURN TO .4 ABOVE PART
Q.025 = THREAD LEAD (1/THREADS PER INCH, 1/40=.025)
F1500.2 = SPINDLE SPEED IN HIGH RANGE

FORMAT 2

N1 M6T1 (4-40 TAP)
N2 G0 G80 G90 S1500.2 M5 (SELECT CORRECT SPINDLE RANGE)
(DO NOT TURN THE SPINDLE ON!)
N3 G0 E1 X1. Y1. (RAPID TO FIRST HOLE LOCATION.)
N4 H1 Z4 M8 (RAPID TO .4 ABOVE PART AND TURN ON COOLANT)
N5 G84.1 G98 X1. Y1. Z-.5 R.4 S1500 F37.5 (RIGID TAP CYCLE, SEE VARIABLES BELOW)
N6 X2. Y2. (NEXT HOLE)
N7 G80 (CANCEL RIGID TAP)

X1. Y1. = FIRST HOLE LOCATION
Z-.5 = FINAL Z DEPTH
R.4 = RETURN TO .4 ABOVE PART
S1500.2 = SPINDLE SPEED IN HIGH RANGE
F37.5 = FEED RATE ((1/TPI)*SPINDLE SPEED)
G98 = RETURN TO INITIAL PLANE

*****NOTE*****

SPINDLE SPEED IN LINE # 2 NEEDS HIGH/ LOW RANGE CODE AFTER SPINDLE SPEED.
1-749 RPM = .1 (LOW RANGE) EXAMPLE S500.1
750- 3000 RPM = .2 (HIGH RANGE) EXAMPLE S2000.2