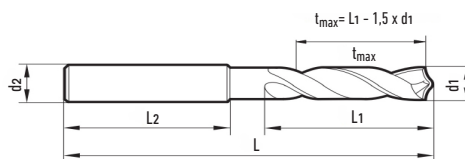


Tvrdokový vrták 166510

bez vnitřního chlazení / 5xD

- úhel čela 140°
- tolerance průměru m7
- stopka válcová




Popis	Průměr (mm)	L (mm)	L ₁ (mm)	L ₂ (mm)	Stopka (mm)
V.03000414.B5	3,00	66,0	28,0	36,0	6,000
V.03100414.B5	3,10	66,0	28,0	36,0	6,000
V.03170414.B5	3,17	66,0	28,0	36,0	6,000
V.03200414.B5	3,20	66,0	28,0	36,0	6,000
V.03250414.B5	3,25	66,0	28,0	36,0	6,000
V.03300414.B5	3,30	66,0	28,0	36,0	6,000
V.03400414.B5	3,40	66,0	28,0	36,0	6,000
V.03500414.B5	3,50	66,0	28,0	36,0	6,000
V.03570414.B5	3,57	66,0	28,0	36,0	6,000
V.03600414.B5	3,60	66,0	28,0	36,0	6,000
V.03700414.B5	3,70	66,0	28,0	36,0	6,000
V.03800414.B5	3,80	74,0	36,0	36,0	6,000
V.03900414.B5	3,90	74,0	36,0	36,0	6,000
V.03970414.B5	3,97	74,0	36,0	36,0	6,000
V.04000414.B5	4,00	74,0	36,0	36,0	6,000
V.04100414.B5	4,10	74,0	36,0	36,0	6,000
V.04200414.B5	4,20	74,0	36,0	36,0	6,000
V.04300414.B5	4,30	74,0	36,0	36,0	6,000
V.04370414.B5	4,37	74,0	36,0	36,0	6,000
V.04400414.B5	4,40	74,0	36,0	36,0	6,000
V.04500414.B5	4,50	74,0	36,0	36,0	6,000
V.04600414.B5	4,60	74,0	36,0	36,0	6,000
V.04650414.B5	4,65	74,0	36,0	36,0	6,000
V.04700414.B5	4,70	74,0	36,0	36,0	6,000
V.04760414.B5	4,76	82,0	44,0	36,0	6,000
V.04800414.B5	4,80	82,0	44,0	36,0	6,000
V.04900414.B5	4,90	82,0	44,0	36,0	6,000
V.05000414.B5	5,00	82,0	44,0	36,0	6,000
V.05100414.B5	5,10	82,0	44,0	36,0	6,000
V.05160414.B5	5,16	82,0	44,0	36,0	6,000
V.05200414.B5	5,20	82,0	44,0	36,0	6,000
V.05300414.B5	5,30	82,0	44,0	36,0	6,000
V.05400414.B5	5,40	82,0	44,0	36,0	6,000
V.05500414.B5	5,50	82,0	44,0	36,0	6,000
V.05550414.B5	5,55	82,0	44,0	36,0	6,000
V.05600414.B5	5,60	82,0	44,0	36,0	6,000
V.05700414.B5	5,70	82,0	44,0	36,0	6,000
V.05800414.B5	5,80	82,0	44,0	36,0	6,000
V.05900414.B5	5,90	82,0	44,0	36,0	6,000
V.05950414.B5	5,95	82,0	44,0	36,0	6,000
V.06000414.B5	6,00	82,0	44,0	36,0	6,000
V.06100414.B5	6,10	91,0	53,0	36,0	8,000
V.06200414.B5	6,20	91,0	53,0	36,0	8,000
V.06300414.B5	6,30	91,0	53,0	36,0	8,000
V.06350414.B5	6,35	91,0	53,0	36,0	8,000
V.06400414.B5	6,40	91,0	53,0	36,0	8,000
V.06500414.B5	6,50	91,0	53,0	36,0	8,000
V.06600414.B5	6,60	91,0	53,0	36,0	8,000
V.06700414.B5	6,70	91,0	53,0	36,0	8,000

Popis	Průměr (mm)	L (mm)	L ₁ (mm)	L ₂ (mm)	Stopka (mm)
V.06750414.B5	6,75	91,0	53,0	36,0	8,000
V.06800414.B5	6,80	91,0	53,0	36,0	8,000
V.06900414.B5	6,90	91,0	53,0	36,0	8,000
V.07000414.B5	7,00	91,0	53,0	36,0	8,000
V.07100414.B5	7,10	91,0	53,0	36,0	8,000
V.07140414.B5	7,14	91,0	53,0	36,0	8,000
V.07200414.B5	7,20	91,0	53,0	36,0	8,000
V.07300414.B5	7,30	91,0	53,0	36,0	8,000
V.07400414.B5	7,40	91,0	53,0	36,0	8,000
V.07500414.B5	7,50	91,0	53,0	36,0	8,000
V.07540414.B5	7,54	91,0	53,0	36,0	8,000
V.07600414.B5	7,60	91,0	53,0	36,0	8,000
V.07700414.B5	7,70	91,0	53,0	36,0	8,000
V.07800414.B5	7,80	91,0	53,0	36,0	8,000
V.07900414.B5	7,90	91,0	53,0	36,0	8,000
V.07940414.B5	7,94	91,0	53,0	36,0	8,000
V.08000414.B5	8,00	91,0	53,0	36,0	8,000
V.08100414.B5	8,10	103,0	61,0	40,0	10,000
V.08200414.B5	8,20	103,0	61,0	40,0	10,000
V.08300414.B5	8,30	103,0	61,0	40,0	10,000
V.08330414.B5	8,33	103,0	61,0	40,0	10,000
V.08400414.B5	8,40	103,0	61,0	40,0	10,000
V.08500414.B5	8,50	103,0	61,0	40,0	10,000
V.08600414.B5	8,60	103,0	61,0	40,0	10,000
V.08700414.B5	8,70	103,0	61,0	40,0	10,000
V.08730414.B5	8,73	103,0	61,0	40,0	10,000
V.08800414.B5	8,80	103,0	61,0	40,0	10,000
V.08900414.B5	8,90	103,0	61,0	40,0	10,000
V.09000414.B5	9,0	103,0	61,0	40,0	10,000
V.09100414.B5	9,10	103,0	61,0	40,0	10,000
V.09130414.B5	9,13	103,0	61,0	40,0	10,000
V.09200414.B5	9,20	103,0	61,0	40,0	10,000
V.09250414.B5	9,25	103,0	61,0	40,0	10,000
V.09300414.B5	9,30	103,0	61,0	40,0	10,000
V.09400414.B5	9,40	103,0	61,0	40,0	10,000
V.09500414.B5	9,50	103,0	61,0	40,0	10,000
V.09520414.B5	9,52	103,0	61,0	40,0	10,000
V.09600414.B5	9,60	103,0	61,0	40,0	10,000
V.09700414.B5	9,70	103,0	61,0	40,0	10,000
V.09800414.B5	9,80	103,0	61,0	40,0	10,000
V.09900414.B5	9,90	103,0	61,0	40,0	10,000
V.09920414.B5	9,92	103,0	61,0	40,0	10,000
V.10000414.B5	10,00	118,0	71,0	40,0	10,000
V.10100414.B5	10,10	118,0	71,0	45,0	12,000
V.10200414.B5	10,20	118,0	71,0	45,0	12,000
V.10300414.B5	10,30	118,0	71,0	45,0	12,000
V.10320414.B5	10,32	118,0	71,0	45,0	12,000
V.10400414.B5	10,40	118,0	71,0	45,0	12,000
V.10500414.B5	10,50	118,0	71,0	45,0	12,000
V.10600414.B5	10,60	118,0	71,0	45,0	12,000

Popis	Průměr (mm)	L (mm)	L ₁ (mm)	L ₂ (mm)	Stopka (mm)
V.10700414.B5	10,70	118,0	71,0	45,0	12,000
V.10800414.B5	10,80	118,0	71,0	45,0	12,000
V.10900414.B5	10,90	118,0	71,0	45,0	12,000
V.11000414.B5	11,00	118,0	71,0	45,0	12,000
V.11100414.B5	11,10	118,0	71,0	45,0	12,000
V.11110414.B5	11,11	118,0	71,0	45,0	12,000
V.11200414.B5	11,20	118,0	71,0	45,0	12,000
V.11300414.B5	11,30	102,0	71,0	45,0	12,000
V.11400414.B5	11,40	118,0	71,0	45,0	12,000
V.11500414.B5	11,50	118,0	71,0	45,0	12,000
V.11600414.B5	11,60	118,0	71,0	45,0	12,000
V.11700414.B5	11,70	118,0	71,0	45,0	12,000
V.11800414.B5	11,80	118,0	71,0	45,0	12,000
V.11900414.B5	11,90	118,0	71,0	45,0	12,000
V.11910414.B5	11,91	118,0	71,0	45,0	12,000
V.12000414.B5	12,00	118,0	71,0	45,0	12,000
V.12100414.B5	12,10	124,0	77,0	45,0	14,000
V.12200414.B5	12,20	124,0	77,0	45,0	14,000
V.12500414.B5	12,50	124,0	77,0	45,0	14,000
V.12700414.B5	12,70	124,0	77,0	45,0	14,000
V.13000414.B5	13,00	124,0	77,0	45,0	14,000
V.13100414.B5	13,10	124,0	77,0	45,0	14,000
V.13500414.B5	13,50	124,0	77,0	45,0	14,000
V.13700414.B5	13,70	124,0	77,0	45,0	14,000
V.13800414.B5	13,80	124,0	77,0	45,0	14,000
V.14000414.B5	14,00	124,0	77,0	45,0	14,000
V.14100414.B5	14,10	133,0	83,0	48,0	16,000
V.14200414.B5	14,20	133,0	83,0	48,0	16,000
V.14290414.B5	14,29	133,0	83,0	48,0	16,000
V.14500414.B5	14,50	133,0	83,0	48,0	16,000
V.14700414.B5	14,70	133,0	83,0	48,0	16,000
V.15000414.B5	15,00	133,0	83,0	48,0	16,000
V.15100414.B5	15,10	133,0	83,0	48,0	16,000
V.15200414.B5	15,20	133,0	83,0	48,0	16,000
V.15500414.B5	15,50	133,0	83,0	48,0	16,000
V.15700414.B5	15,70	133,0	83,0	48,0	16,000
V.16000414.B5	16,00	133,0	83,0	48,0	16,000
V.16500414.B5	16,50	143,0	93,0	48,0	18,000
V.17000414.B5	17,00	143,0	93,0	48,0	18,000
V.17500414.B5	17,50	143,0	93,0	48,0	18,000
V.18000414.B5	18,00	143,0	93,0	48,0	18,000
V.18500414.B5	18,50	153,0	101,0	50,0	20,000
V.19000414.B5	19,00	153,0	101,0	50,0	20,000
V.19500414.B5	19,50	153,0	101,0	50,0	20,000
V.20000414.B5	20,00	153,0	101,0	50,0	20,000

Tvrdokovový vrták 166510

bez vnitřního chlazení / 5xD



Řezné podmínky

	Typ materiálu	Pevnost v tahu (N/mm ²) Tvrdost	V _c (m/min.)	Posuv (mm/ot.)			
				3,0 - 7,9	8,0 - 15,9	16,0 - 20,0	
P	Konstrukční ocel	≤500	130	0,125 - 0,160 - 0,200	0,250 - 0,315	0,400 - 0,500	
		≤1000	110	0,100 - 0,125 - 0,160	0,200 - 0,250	0,315 - 0,400	
	Automatová ocel	≤850	145	0,160 - 0,200 - 0,250	0,315 - 0,400	0,500 - 0,630	
		≤1000	110	0,125 - 0,160 - 0,200	0,250 - 0,315	0,400 - 0,500	
	Nelegovaná kalená ocel	≤700	120	0,125 - 0,160 - 0,200	0,250 - 0,315	0,400 - 0,500	
		≤850	110	0,125 - 0,160 - 0,200	0,250 - 0,315	0,400 - 0,500	
		≤1000	105	0,125 - 0,160 - 0,200	0,250 - 0,315	0,400 - 0,500	
	Legovaná kalená ocel	≤1000	105	0,125 - 0,160 - 0,200	0,250 - 0,315	0,400 - 0,500	
		≤1400	100	0,100 - 0,125 - 0,160	0,200 - 0,250	0,315 - 0,400	
	Nelegovaná cementovaná ocel	≤850	130	0,160 - 0,200 - 0,250	0,315 - 0,400	0,500 - 0,630	
	Legovaná cementovaná ocel	≤1000	120	0,125 - 0,160 - 0,200	0,250 - 0,315	0,400 - 0,500	
		≤1400	85	0,080 - 0,100 - 0,125	0,160 - 0,200	0,250 - 0,315	
	Nitridovaná ocel	≤1000	100	0,100 - 0,125 - 0,160	0,200 - 0,250	0,315 - 0,400	
		≤1400	90	0,080 - 0,100 - 0,125	0,160 - 0,200	0,250 - 0,315	
Nástrojová ocel	≤850	65	0,100 - 0,125 - 0,160	0,200 - 0,250	0,315 - 0,400		
	≤1400	55	0,080 - 0,100 - 0,125	0,160 - 0,200	0,250 - 0,315		
M	Nerezová ocel	≤900	40	0,063 - 0,080 - 0,100	0,125 - 0,160	0,200 - 0,250	
		austenititická	≤1100	15	0,063 - 0,080 - 0,100	0,125 - 0,160	0,200 - 0,250
		Martenzitická	≤1500	35	0,050 - 0,063 - 0,080	0,100 - 0,125	0,160 - 0,200
H	Kalená ocel	≤48 HRC	35	0,050 - 0,063 - 0,080	0,100 - 0,125	0,160 - 0,200	
		≤66 HRC	20	0,040 - 0,050 - 0,063	0,080 - 0,100	0,125 - 0,160	
K	Litina	≤240 HB	210	0,160 - 0,200 - 0,250	0,315 - 0,400	0,500 - 0,630	
		≤350 HB	155	0,160 - 0,200 - 0,250	0,315 - 0,400	0,500 - 0,630	
	Temperovaná litina	≤240 HB	155	0,125 - 0,160 - 0,200	0,250 - 0,315	0,400 - 0,500	
		≤350 HB	125	0,125 - 0,160 - 0,200	0,250 - 0,315	0,400 - 0,500	
	Tvrzená litina	≤350 HB	35	0,050 - 0,063 - 0,080	0,100 - 0,125	0,160 - 0,200	
S	Titan a slitiny Titanu	≤850	15	0,063 - 0,080 - 0,100	0,125 - 0,160	0,200 - 0,250	
		≤1400	15	0,050 - 0,063 - 0,080	0,100 - 0,125	0,160 - 0,200	
N	Hliník a slitiny hliníku	≤400	260	0,160 - 0,200 - 0,315	0,315 - 0,500	0,500 - 0,630	
		Kovaný hliník	≤650	260	0,160 - 0,200 - 0,315	0,315 - 0,500	0,500 - 0,630
	Slitiny hliníku ≤ 10 % Si	≤600	220	0,160 - 0,200 - 0,250	0,315 - 0,400	0,500 - 0,630	
		> 10 % Si	≤600	180	0,160 - 0,200 - 0,250	0,315 - 0,400	0,500 - 0,630
	Hořčík a slitiny hořčíku	≤400	260	0,160 - 0,200 - 0,250	0,315 - 0,400	0,500 - 0,630	
	Měď	≤500	105	0,125 - 0,160 - 0,200	0,250 - 0,315	0,400 - 0,500	
		Mosaz	≤600	270	0,160 - 0,200 - 0,250	0,315 - 0,400	0,500 - 0,630
			≤600	180	0,125 - 0,160 - 0,200	0,250 - 0,315	0,400 - 0,500
		Bronz	≤600	105	0,100 - 0,125 - 0,160	0,200 - 0,250	0,315 - 0,400
			≤850	85	0,100 - 0,125 - 0,160	0,200 - 0,250	0,315 - 0,400
		Bronz	≤850	80	0,080 - 0,100 - 0,125	0,160 - 0,200	0,250 - 0,315
	≤1000	60	0,080 - 0,100 - 0,125	0,160 - 0,200	0,250 - 0,315		