INFO
TYPHOON TA-HTA-4HTA
TYPHOON PU-HPU
TYPHOON SUH
TYPHOON ALH
TYPHOON HRC
TYPHOON SUH MINI
TYPHOON HL
C-SD-TA
LFTA
SUTA
HSS-HSS/CO DRILLS
G2
MDTA
HF VH/UP
MEF
ALU
MEX
UH
HSS/CO-HSSP END MILLS
CARBIDE BURRS

MDCSA3

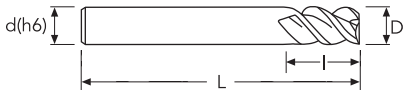
cylindrical shank, 3 flutes, polished

OSAWA NORM | ALU | MG POLISHED | 55° | SQUARE | Z3

P	M	K	N	S	H
			★		

★ 1st choice ☆ suitable

SLOTTING | SIDE MILLING



D	D Tol.	C	C Tol.	d(h6)	l	l1	L	z	EDP No.	Stock
1	0/-0.020			4	3		50	3	MDCSA3010	●
1.5	0/-0.020			4	4.5		50	3	MDCSA3015	●
2	0/-0.020			4	6		50	3	MDCSA3020	●
3	0/-0.020			4	8		50	3	MDCSA3030	●
4	0/-0.020			4	11		50	3	MDCSA3040	●
5	0/-0.020			6	13		50	3	MDCSA3050	●
6	0/-0.020			6	15		50	3	MDCSA3060	●
8	0/-0.025			8	20		60	3	MDCSA3080	●
10	0/-0.025			10	25		75	3	MDCSA3100	●
12	0/-0.025			12	30		75	3	MDCSA3120	●
16	0/-0.030			16	40		100	3	MDCSA3160	●
20	0/-0.030			20	40		100	3	MDCSA3200	●

● stock standard ○ non-standard stock ∇ stock exhaustion

MDCSA3

SLOTTING													
	Material Group ISO 513	N1			N2 N3			N4			N5		
	Material	Alluminium ≤ 12% Si - Copper Alloy			Alluminium > 12% Si - Copper Alloy			Brass and bronze			Plastics		
	ap x ae	0.5D x D			0.5D x D			0.5D x D			0.5D x D		
	Vc (m/min)	200-600			150-350			150-250			500-900		
	D (mm)	n (rpm)	fz (mm/z)	Vf (mm/min)	n (rpm)	fz (mm/z)	Vf (mm/min)	n (rpm)	fz (mm/z)	Vf (mm/min)	n (rpm)	fz (mm/z)	Vf (mm/min)
	1	50000	0.010	1510	50000	0.009	1290	50000	0.007	1060	50000	0.010	1510
	1.5	50000	0.015	2270	50000	0.013	1930	42460	0.011	1350	50000	0.015	2270
	2	50000	0.020	3020	39810	0.017	2050	31850	0.014	1350	50000	0.020	3020
	3	37150	0.025	2830	26540	0.022	1720	21230	0.018	1130	50000	0.025	3810
	4	27870	0.034	2820	19900	0.029	1710	15920	0.024	1130	50000	0.034	5070
	5	22290	0.042	2830	15920	0.036	1720	12740	0.030	1130	44590	0.042	5660
	6	18580	0.051	2830	13270	0.043	1720	10620	0.035	1130	37150	0.051	5650
	8	13930	0.067	2810	9950	0.057	1710	7960	0.047	1130	27870	0.067	5630
	10	11150	0.084	2820	7960	0.072	1710	6370	0.059	1130	22290	0.084	5640
	12	9290	0.101	2810	6630	0.086	1700	5310	0.071	1120	18580	0.101	5620
	14	7960	0.117	2800	5690	0.100	1700	4550	0.082	1120	15920	0.117	5610
	16	6970	0.133	2780	4980	0.113	1690	3980	0.093	1110	13930	0.133	5560
	18	6190	0.150	2780	4420	0.127	1690	3540	0.105	1110	12380	0.150	5560
	20	5570	0.166	2780	3980	0.141	1690	3180	0.116	1110	11150	0.166	5560

< D3 ap x ae 0.25D x D

SIDE MILLING													
	Material Group ISO 513	N1			N2 N3			N4			N5		
	Material	Alluminium ≤ 12% Si - Copper Alloy			Alluminium > 12% Si - Copper Alloy			Brass and bronze			Plastics		
	ap x ae	1.5D x 0.3D			1.5D x 0.3D			1.5D x 0.3D			1.5D x 0.3D		
	Vc (m/min)	300-500			200-400			150-350			600-1000		
	D (mm)	n (rpm)	fz (mm/z)	Vf (mm/min)	n (rpm)	fz (mm/z)	Vf (mm/min)	n (rpm)	fz (mm/z)	Vf (mm/min)	n (rpm)	fz (mm/z)	Vf (mm/min)
	1	50000	0.012	1810	50000	0.010	1540	50000	0.008	1270	50000	0.012	1810
	1.5	50000	0.018	2720	50000	0.015	2310	50000	0.013	1910	50000	0.018	2720
	2	50000	0.024	3630	50000	0.021	3080	39810	0.017	2020	50000	0.024	3630
	3	42460	0.030	3880	31850	0.026	2480	26540	0.021	1700	50000	0.030	4570
	4	31850	0.041	3870	23890	0.034	2470	19900	0.028	1690	50000	0.041	6080
	5	25480	0.051	3880	19110	0.043	2480	15920	0.036	1700	50000	0.051	7620
	6	21230	0.061	3880	15920	0.052	2470	13270	0.043	1700	42460	0.061	7750
	8	15920	0.081	3860	11940	0.069	2460	9950	0.057	1690	31850	0.081	7720
	10	12740	0.101	3860	9550	0.086	2460	7960	0.071	1690	25480	0.101	7730
	12	10620	0.121	3850	7960	0.103	2460	6630	0.085	1680	21230	0.121	7700
	14	9100	0.141	3850	6820	0.120	2450	5690	0.099	1680	18200	0.141	7690
	16	7960	0.160	3810	5970	0.136	2430	4980	0.112	1670	15920	0.160	7630
	18	7080	0.180	3820	5310	0.153	2430	4420	0.126	1670	14150	0.180	7630
	20	6370	0.200	3810	4780	0.170	2430	3980	0.140	1670	12740	0.200	7630

< D3 ap x ae D x 0.1D