

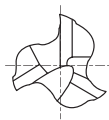


MICROGRAIN
CARBIDE END MILLS **G9F43**

SERIES PLAIN SHANK
GLATTER ZYLINDERSCHAFT

CARBIDE, 3 FLUTE SHORT LENGTH
VOLLHARTMETALL, 3 SCHNEIDEN KURZ

- Suitable for dry milling applications at high temperatures.
 - Excellent high-performance end mills.
 - 3 flute design possess the advantage of 2 flute and 4 flute end mill.
- Für die Trockenbearbeitung.
 - Hervorragendes Preis - Leistungsverhältnis.
 - 3 Schneiden verbinden die Vorteile von 2 - und 4 - schneidigen Schaftfräsern.



Unit : mm

Description	Mill Diameter	Shank Diameter	Lenght of Cut	Overall Lenght
G9F43010N	1	4	3	50
G9F43020N	2	4	6	50
G9F43030N	3	4	8	50
G9F43040N	4	4	11	50
G9F43050N	5	6	13	50
G9F43060N	6	6	16	50
G9F43080N	8	8	20	60
G9F43100N	10	10	25	75
G9F43120N	12	12	32	75
G9F43140N	14	14	32	75
G9F43160N	16	16	32	75
G9F43200N	20	20	32	100

Mill Dia. Tolerance(mm)	Shank Dia. Tolerance
0~-0.03	h6

0 : Excellent • : Good

Carbon Steels	Alloy Steels	Prehardened Steels	Hardened Steels		High Hardened Steels	Copper	Graphite	Cast Iron	Aluminum	Stainless Steels	Titanium	Inconel
~HB225	HB225~325	HRC30~40	HRc40~45	HRc45~55	HRc55~70							
0	0	0				•		•	•	•	•	•



MICROGRAIN
CARBIDE END MILLS

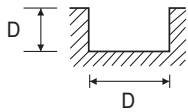
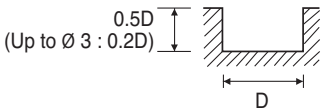
RECOMMENDED CUTTING CONDITIONS
EMPFOHLENE SCHNEIDKONDITIONEN

HSS

CARBIDE, 3 FLUTE FINISH SLOTTING
VOLLHARTMETALL, 3 SCHNEIDEN SCHLICHTEN NUTENFRÄSEN

G9F43 SERIES

MATERIAL	NON-ALLOYED STEELS ALLOY STEELS TOOL STEELS		ALLOY STEELS, HEAT RESISTANT STEELS		STAINLESS STEELS		CAST IRON		ALUMINUM ALLOYS		COPPER. BRASS NON-FERROUS METALS	
HARDNESS STRENGTH	~ HRc 30 ~1000N/mm²		HRc 30 ~ HRc 45 1000~1500N/mm²									
DIAMETER	RPM	FEED	RPM	FEED	RPM	FEED	RPM	FEED	RPM	FEED	RPM	FEED
1.0	14300	75	8500	45	7150	35	18700	185	44000	300	24700	180
2.0	7850	110	5150	70	4300	55	9350	200	22000	420	16500	310
3.0	6100	125	3800	85	3150	70	6050	200	15400	430	11000	310
4.0	5150	180	3150	110	2650	90	4600	185	11000	420	8800	310
5.0	4300	190	2550	110	2150	95	3650	200	9150	420	6800	310
6.0	3800	210	2300	135	1950	110	2950	230	7600	440	5700	340
8.0	2850	230	1700	120	1450	110	2200	240	5700	440	4400	330
10.0	2200	195	1350	95	1150	95	1850	255	4600	440	3400	330
12.0	1850	170	1150	75	950	75	1450	275	3750	430	2850	330
14.0	1700	150	1050	70	850	70	1300	285	3300	430	2400	330
16.0	1500	130	950	65	700	65	1100	285	2850	430	2200	330
20.0	1150	100	700	50	550	50	900	310	2200	430	1700	330



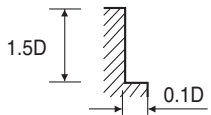
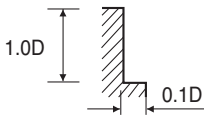
- The FEED, in long & extra long types, should be reduced by around 50%

RPM = rev./min. FEED = mm/min.

CARBIDE, 3 FLUTE FINISH SIDE CUTTING
VOLLHARTMETALL, 3 SCHNEIDEN SCHLICHTEN SEITENFRÄSEN

G9F43 SERIES

MATERIAL	NON-ALLOYED STEELS ALLOY STEELS TOOL STEELS		ALLOY STEELS, HEAT RESISTANT STEELS		STAINLESS STEELS		CAST IRON		ALUMINUM ALLOYS		COPPER. BRASS NON-FERROUS METALS	
HARDNESS STRENGTH	~ HRc 30 ~1000N/mm²		HRc 30 ~ HRc 45 1000~1500N/mm²									
DIAMETER	RPM	FEED	RPM	FEED	RPM	FEED	RPM	FEED	RPM	FEED	RPM	FEED
1.0	17600	110	10250	65	8650	55	18700	460	44000	750	24700	450
2.0	9850	180	6450	120	5350	100	9350	475	22000	1035	16500	770
3.0	7600	205	4750	130	3950	105	6050	475	15400	990	11000	760
4.0	6450	365	3950	220	3300	180	4600	485	11000	1035	8800	770
5.0	5350	385	3200	230	2700	195	3650	485	9150	1010	6800	760
6.0	4750	425	2850	265	2400	215	2950	570	7600	1100	5700	825
8.0	3550	450	2150	245	1800	225	2200	615	5700	1100	4400	825
10.0	2750	390	1700	195	1450	195	1850	640	4600	1100	3400	825
12.0	2350	330	1450	160	1150	155	1450	670	3750	1100	2850	825
14.0	2100	465	1300	145	1050	140	1300	705	3300	1100	2400	825
16.0	1850	265	1150	130	900	130	1100	725	2850	1100	2200	825
20.0	1450	205	900	100	700	100	900	770	2200	1100	1700	825



- The FEED, in long & extra long types, should be reduced by around 50%

RPM = rev./min. FEED = mm/min.