

CARBIDE, DREAM DRILLS - HIGH FEED with COOLANT HOLES

LONG

 **DREAM DRILLS HIGH FEED mit KÜHLKANAL**

KURZ

 **Forets DREAM DRILLS carbure Grande Avance avec arrosage central, série longue**

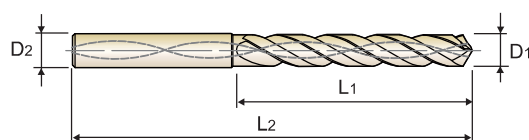
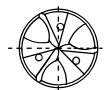
LONGUE

 **PUNTE DREAM DRILL HIGH FEED (con i fori di refrigerazione)**

LUNGA

- ▶ Drilling for Carbon Steels, Alloy Steels(-HRC35) and Cast Iron
- ▶ Higher productivity due to 1.5 to 2 times faster feeding speed than 2-flute drill
- ▶ Multi-Layer coating delivers much better productivity and reliability
- ▶ Self centering and chip breaking by R-thinning and coolant holes

- ▶ Bohren von Kohlenstoff-Stählen, legierten Stählen(-HRC35) und Gusseisen
- ▶ Höhere Produktivität durch den 1,5 bis 2-fach höheren Vorschub gegenüber herkömmlichen zweischneidigen Bohren
- ▶ Die Multi-Layer Beschichtung ermöglicht eine bessere Produktivität und Zuverlässigkeit
- ▶ Selbst zentrierend und guter Spanbruch durch die R-Ausspitzung

DIN
6537

CARBIDE

30°

h6

m7

140°

20 bar

P.105

5 × D

Unit : mm

EDP No.	Drill Diameter	Shank Diameter	Flute Length	Overall Length
H-Coating	D1	D2	L1	L2
DGR495050	5.0	6	44	82
DGR495051	5.1	6	44	82
DGR495052	5.2	6	44	82
DGR495053	5.3	6	44	82
DGR495054	5.4	6	44	82
DGR495055	5.5	6	44	82
DGR495056	5.6	6	44	82
DGR495057	5.7	6	44	82
DGR495058	5.8	6	44	82
DGR495059	5.9	6	44	82
DGR495060	6.0	6	44	82
DGR495061	6.1	8	53	91
DGR495062	6.2	8	53	91
DGR495063	6.3	8	53	91
DGR495064	6.4	8	53	91
DGR495065	6.5	8	53	91
DGR495066	6.6	8	53	91
DGR495067	6.7	8	53	91
DGR495068	6.8	8	53	91
DGR495069	6.9	8	53	91
DGR495070	7.0	8	53	91
DGR495071	7.1	8	53	91
DGR495072	7.2	8	53	91
DGR495073	7.3	8	53	91

EDP No.	Drill Diameter	Shank Diameter	Flute Length	Overall Length
H-Coating	D1	D2	L1	L2
DGR495074	7.4	8	53	91
DGR495075	7.5	8	53	91
DGR495076	7.6	8	53	91
DGR495077	7.7	8	53	91
DGR495078	7.8	8	53	91
DGR495079	7.9	8	53	91
DGR495080	8.0	8	53	91
DGR495081	8.1	10	61	103
DGR495082	8.2	10	61	103
DGR495083	8.3	10	61	103
DGR495084	8.4	10	61	103
DGR495085	8.5	10	61	103
DGR495086	8.6	10	61	103
DGR495087	8.7	10	61	103
DGR495088	8.8	10	61	103
DGR495089	8.9	10	61	103
DGR495090	9.0	10	61	103
DGR495091	9.1	10	61	103
DGR495092	9.2	10	61	103
DGR495093	9.3	10	61	103
DGR495094	9.4	10	61	103
DGR495095	9.5	10	61	103
DGR495096	9.6	10	61	103
DGR495097	9.7	10	61	103

▶ Other shank types are available on your request.

▶ NEXT PAGE

◎ : Excellent ○ : Good

ISO	P										M				K							
Material Description	Non-alloy steel					Low alloy steel				High alloyed steel, and tool steel		Stainless steel				Grey cast iron		Nodular cast iron		Malleable cast iron		
VDI 3323	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20		
HRC		13	25	28	32	10	29	32	38	15	35	15	23	10	10	26	3	25		21		
HB	125	190	250	270	300	180	275	300	350	200	325	200	240	180	180	260	160	250	130	230		
Recommended		◎	◎	◎	○	◎	◎	○	○	◎	○				◎	○	◎	○	◎	○		
ISO	N										S						H					
Material Description	Aluminum-wrought alloy		Aluminum-cast, alloyed			Copper and Copper Alloys (Bronze / Brass)			Non Metallic Materials		Heat Resistant Super Alloys				Titanium Alloys		Hardened steel		Chilled Cast iron		Hardened Cast iron	
VDI 3323	21	22	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	38	39	40	41	
HRC											15	30	25	38	34			55	60	42	55	
HB	60	100	75	90	130	110	90	100			200	280	250	350	320	400Rm	1050Rm	550	630	400	550	
Recommended																						


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Forets DREAM DRILLS carbure Grande Avance avec arrosage central, série longue

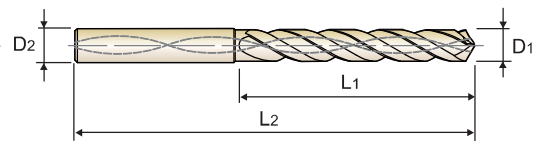
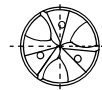
LONGUE

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P.105

5 × D

Unit : mm

EDP No.	Drill Diameter	Shank Diameter	Flute Length	Overall Length
H-Coating	D1	D2	L1	L2
DGR495098	9.8	10	61	103
DGR495099	9.9	10	61	103
DGR495100	10.0	10	61	103
DGR495101	10.1	12	71	118
DGR495102	10.2	12	71	118
DGR495103	10.3	12	71	118
DGR495104	10.4	12	71	118
DGR495105	10.5	12	71	118
DGR495106	10.6	12	71	118
DGR495107	10.7	12	71	118
DGR495108	10.8	12	71	118
DGR495109	10.9	12	71	118
DGR495110	11.0	12	71	118
DGR495111	11.1	12	71	118
DGR495112	11.2	12	71	118
DGR495113	11.3	12	71	118
DGR495114	11.4	12	71	118
DGR495115	11.5	12	71	118
DGR495116	11.6	12	71	118
DGR495117	11.7	12	71	118

EDP No.	Drill Diameter	Shank Diameter	Flute Length	Overall Length
H-Coating	D1	D2	L1	L2
DGR495118	11.8	12	71	118
DGR495119	11.9	12	71	118
DGR495120	12.0	12	71	118
DGR495125	12.5	14	77	124
DGR495130	13.0	14	77	124
DGR495135	13.5	14	77	124
DGR495140	14.0	14	77	124
DGR495145	14.5	16	83	133
DGR495150	15.0	16	83	133
DGR495155	15.5	16	83	133
DGR495160	16.0	16	83	133
DGR495165	16.5	18	93	143
DGR495170	17.0	18	93	143
DGR495175	17.5	18	93	143
DGR495180	18.0	18	93	143
DGR495185	18.5	20	101	153
DGR495190	19.0	20	101	153
DGR495195	19.5	20	101	153
DGR495200	20.0	20	101	153

▶ Other shank types are available on your request.

◎ : Excellent ○ : Good

ISO	P										M				K						
Material Description	Non-alloy steel					Low alloy steel				High alloyed steel, and tool steel		Stainless steel			Grey cast iron		Nodular cast iron		Malleable cast iron		
VDI 3323	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	
HRC		13	25	28	32	10	29	32	38	15	35	15	23	10	10	26	3	25		21	
HB	125	190	250	270	300	180	275	300	350	200	325	200	240	180	180	260	160	250	130	230	
Recommended		◎	◎	◎	○	◎	◎		○	◎	○				◎	○	◎	○	◎	○	
ISO	N										S						H				
Material Description	Aluminum-wrought alloy		Aluminum-cast, alloyed			Copper and Copper Alloys (Bronze / Brass)			Non Metallic Materials		Heat Resistant Super Alloys					Titanium Alloys		Hardened steel	Chilled Cast iron	Hardened Cast iron	
VDI 3323	21	22	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	38	39	40	41
HRC											15	30	25	38	34			55	60	42	55
HB	60	100	75	90	130	110	90	100			200	280	250	350	320	400Rm	1050Rm	550	630	400	550
Recommended																					

DRG493, DRG495 SERIES with COOLANT HOLES

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

ISO	VDI 3323	Material Description	Vc (m/min)	Parameter	Drill Diameter (mm)								
					5.0	6.0	8.0	10.0	12.0	14.0	16.0	18.0	20.0
P	1	Non-alloy steel											
	2		100	RPM FEED	6370 0.2-0.25	5310 0.24-0.3	3980 0.32-0.4	3180 0.4-0.5	2650 0.48-0.6	2270 0.56-0.7	1990 0.56-0.72	1770 0.63-0.81	1590 0.7-0.88
	3		100	RPM FEED	6370 0.2-0.25	5310 0.24-0.3	3980 0.32-0.4	3180 0.4-0.5	2650 0.48-0.6	2270 0.56-0.7	1990 0.56-0.72	1770 0.63-0.81	1590 0.7-0.88
	4		100	RPM FEED	6370 0.16-0.21	5310 0.2-0.26	3980 0.26-0.34	3180 0.34-0.42	2650 0.41-0.47	2270 0.47-0.54	1990 0.47-0.55	1770 0.5-0.59	1590 0.54-0.67
	5		80	RPM FEED	5090 0.16-0.21	4240 0.2-0.26	3180 0.26-0.34	2550 0.34-0.42	2120 0.41-0.47	1820 0.47-0.54	1590 0.47-0.55	1410 0.5-0.59	1270 0.54-0.67
	6	Low alloy steel	100	RPM FEED	6370 0.2-0.25	5310 0.24-0.3	3980 0.32-0.4	3180 0.4-0.5	2650 0.48-0.54	2270 0.56-0.63	1990 0.56-0.64	1770 0.63-0.72	1590 0.68-0.81
	7		80	RPM FEED	5090 0.2-0.25	4240 0.24-0.3	3180 0.32-0.4	2550 0.4-0.5	2120 0.48-0.54	1820 0.56-0.63	1590 0.56-0.64	1410 0.63-0.72	1270 0.68-0.81
	8		80	RPM FEED	5090 0.16-0.21	4240 0.2-0.26	3180 0.26-0.34	2550 0.34-0.42	2120 0.41-0.47	1820 0.47-0.54	1590 0.47-0.55	1410 0.5-0.59	1270 0.54-0.67
	9		40	RPM FEED	2550 0.13-0.18	2120 0.16-0.22	1590 0.21-0.29	1270 0.26-0.36	1060 0.32-0.38	910 0.36-0.43	800 0.36-0.45	710 0.38-0.47	640 0.41-0.54
	10	High alloyed steel, and tool steel	70	RPM FEED	4460 0.16-0.21	3710 0.2-0.26	2790 0.26-0.34	2230 0.34-0.42	1860 0.41-0.47	1590 0.47-0.54	1390 0.47-0.55	1240 0.5-0.59	1110 0.54-0.67
	11		40	RPM FEED	2550 0.13-0.18	2120 0.16-0.22	1590 0.21-0.29	1270 0.26-0.36	1060 0.32-0.38	910 0.36-0.43	800 0.36-0.45	710 0.38-0.47	640 0.41-0.54
M	12	Stainless steel											
	13												
	14												
K	15	Grey cast iron	100	RPM FEED	6370 0.23-0.30	5310 0.27-0.36	3980 0.36-0.48	3180 0.45-0.60	2650 0.54-0.72	2270 0.63-0.84	1990 0.64-0.80	1770 0.72-0.90	1590 0.80-0.98
	16		80	RPM FEED	5090 0.20-0.25	4240 0.24-0.30	3180 0.32-0.40	2550 0.40-0.50	2120 0.48-0.60	1820 0.56-0.70	1590 0.56-0.72	1410 0.63-0.81	1270 0.70-0.90
	17	Nodular cast iron	100	RPM FEED	6370 0.23-0.30	5310 0.27-0.36	3980 0.36-0.48	3180 0.45-0.60	2650 0.54-0.72	2270 0.63-0.84	1990 0.64-0.80	1770 0.72-0.90	1590 0.80-0.98
	18		70	RPM FEED	4460 0.20-0.25	3710 0.24-0.30	2790 0.32-0.40	2230 0.40-0.50	1860 0.48-0.60	1590 0.56-0.70	1390 0.56-0.72	1240 0.63-0.81	1110 0.70-0.90
	19	Malleable cast iron	80	RPM FEED	5090 0.23-0.30	4240 0.27-0.36	3180 0.36-0.48	2550 0.45-0.60	2120 0.54-0.72	1820 0.63-0.84	1590 0.64-0.80	1410 0.72-0.90	1270 0.80-0.98
	20		70	RPM FEED	4460 0.20-0.25	3710 0.24-0.30	2790 0.32-0.40	2230 0.40-0.50	1860 0.48-0.60	1590 0.56-0.70	1390 0.56-0.72	1240 0.63-0.81	1110 0.70-0.90
N	21	Aluminum- wrought alloy											
	22												
	23	Aluminum-cast, alloyed											
	24												
	25												
	26												
	27	Copper and Copper Alloys (Bronze / Brass)											
	28												
	29	Non Metallic Materials											
	30												
S	31	Heat Resistant Super Alloys											
	32												
	33												
	34												
	35												
	36	Titanium Alloys											
	37												
H	38	Hardened steel											
	39												
	40	Chilled Cast Iron											
	41	Hardened Cast Iron											