



Leading Through Innovation

SOLID CARBIDE

DREAM DRILLS INOX

- For Tough Materials like Stainless Steels



RECOMMENDED CUTTING CONDITIONS

DH463, DH714, DH464, DH715, DH451, DH452, DH453 SERIES
with COOLANT HOLES

ISO	VDI 3323	Material Description	SFM	Drill Diameter			SFM	Drill Diameter							
				METRIC	1.0	2.0		METRIC	3.0	-	4.0	-	5.0	6.0	-
				FRACTIONAL	-	-		FRACTIONAL	-	1/8	-	3/16	-	-	1/4
				DECIMAL	.0394	.0787		DECIMAL	.1181	.1250	.1575	.1875	.1969	.2362	.2500
P	2	Non-alloy steel	230	RPM	22280	11140	329	RPM	10610	7960	6370	5310			
				FEED	.0008-.0016	.0016-.0024		FEED	.0016-.0039	.0024-.0047	.0047-.0071	.0055-.0079			
			3	230	RPM	22280	11140	329	RPM	10610	7960	6370	5310		
					FEED	.0008-.0016	.0016-.0024		FEED	.0016-.0039	.0024-.0047	.0047-.0071	.0055-.0079		
	6	Low alloy steel	230	RPM	22280	11140	329	RPM	10610	7960	6370	5310			
				FEED	.0008-.0016	.0016-.0024		FEED	.0016-.0039	.0024-.0047	.0047-.0071	.0055-.0079			
			7	160	RPM	15920	7960	230	RPM	7430	5570	4460	3710		
					FEED	.0008-.0016	.0016-.0024		FEED	.0016-.0039	.0024-.0047	.0047-.0071	.0055-.0079		
M	12	Stainless steel	130	RPM	12730	6370	165	RPM	5310	3980	3180	2650			
				FEED	.0008-.0016	.0008-.0016		FEED	.0012-.0020	.0020-.0035	.0028-.0043	.0035-.0051			
	13		80	RPM	7960	3980	132	RPM	4240	3180	2550	2120			
				FEED	.0008-.0016	.0008-.0016		FEED	.0012-.0020	.0020-.0035	.0028-.0043	.0035-.0051			
	14		150	RPM	14320	7160	198	RPM	6370	4770	3820	3180			
				FEED	.0008-.0016	.0008-.0016		FEED	.0016-.0024	.0024-.0039	.0031-.0047	.0039-.0055			
N	21	Aluminum-wrought alloy	430	RPM	41380	20690	659	RPM	21220	15920	12730	10610			
				FEED	.0016-.0039	.0031-.0055		FEED	.0055-.0079	.0075-.0098	.0079-.0102	.0087-.0110			
	22	430	RPM	41380	20690	659	RPM	21220	15920	12730	10610				
			FEED	.0016-.0039	.0031-.0055		FEED	.0055-.0079	.0075-.0098	.0079-.0102	.0087-.0110				
	23	Aluminum-wrought alloy	360	RPM	35010	17510	593	RPM	19100	14320	11460	9550			
				FEED	.0016-.0039	.0031-.0055		FEED	.0055-.0079	.0075-.0098	.0079-.0102	.0087-.0110			
	24	Aluminum-wrought alloy	360	RPM	35010	17510	593	RPM	19100	14320	11460	9550			
				FEED	.0016-.0039	.0031-.0055		FEED	.0055-.0079	.0075-.0098	.0079-.0102	.0087-.0110			
	25	Aluminum-wrought alloy	300	RPM	28650	14320	494	RPM	15920	11940	9550	7960			
				FEED	.0016-.0031	.0024-.0039		FEED	.0047-.0071	.0063-.0087	.0067-.0091	.0075-.0098			
S	37	Titanium alloys	80	RPM	7960	3980	132	RPM	4240	3180	2550	2120			
				FEED	.0004-.0012	.0004-.0012		FEED	.0008-.0016	.0016-.0031	.0024-.0039	.0031-.0047			

▶ NEXT PAGE

SFM = ft/min.
RPM = rev./min.
FEED = inch/rev.

▶ Recommend to reduce the feed rate as following
Feed 100% : DH463/DH714/DH451(3xD), DH464/DH714/DH452(5xD)
Feed 85% : DH453(8xD)

HSS

i-ONE DRILLS

i-DREAM DRILLS

DREAM DRILLS -PRO

DREAM DRILLS -GENERAL

DREAM DRILLS -HIGH FEED

DREAM DRILLS -FLAT BOTTOM

DREAM DRILLS -INOX

DREAM DRILLS -ALU

DREAM DRILLS -MQL TYPE

DREAM DRILLS for HIGH HARDENED STEELS

STANDARD CARBIDE DRILLS

MULTI-1 DRILLS

HPD DRILLS

GOLD-P DRILLS

STRAIGHT SHANK DRILLS

AIRCRAFT DRILLS

SILVER & DEMING DRILLS

TAPER SHANK DRILLS

NC-SPOTTING DRILLS

COMBINATION DRILLS & COUNTERSINK

SPADE DRILLS

REAMERS

TECHNICAL DATA



DH463, DH714, DH464, DH715, DH451, DH452, DH453 SERIES

with COOLANT HOLES

ISO	VDI 3323	Material Description	SFM	Drill Diameter																	
				METRIC	-	8.0	-	10.0	12.0	-	14.0	-	16.0	18.0	-	20.0					
				FRACTIONAL	5/16	-	3/8	-	-	1/2	-	9/16	5/8	-	-	3/4	-				
				DECIMAL	.3125	.3150	.3750	.3937	.4724	.5000	.5512	.5625	.6250	.6299	.7087	.7500	.7874				
P	2	Non-alloy steel	329	RPM	3980		3180		2650		2510		2270		1990		1770		1680		1590
			FEED	.0063-.0087		.0079-.0102		.0071-.0110		.0071-.0110		.0079-.0118		.0087-.0126		.0102-.0142		.0102-.0142		.0102-.0142	
	3	Non-alloy steel	329	RPM	3980		3180		2650		2510		2270		1990		1770		1680		1590
			FEED	.0063-.0087		.0079-.0102		.0071-.0110		.0071-.0110		.0079-.0118		.0087-.0126		.0102-.0142		.0102-.0142		.0102-.0142	
	6	Low alloy steel	329	RPM	3980		3180		2650		2510		2270		1990		1770		1680		1590
			FEED	.0063-.0087		.0079-.0102		.0071-.0110		.0071-.0110		.0079-.0118		.0087-.0126		.0102-.0142		.0102-.0142		.0102-.0142	
	7	Low alloy steel	230	RPM	2790		2230		1860		1760		1590		1390		1240		1170		1110
FEED			.0063-.0087		.0079-.0102		.0071-.0110		.0071-.0110		.0079-.0118		.0087-.0126		.0102-.0142		.0102-.0142		.0102-.0142		.0110-.0150
M	12	Stainless steel	165	RPM	1990		1590		1330		1260		1140		990		880		840		800
			FEED	.0035-.0051		.0039-.0059		.0043-.0063		.0043-.0063		.0047-.0067		.0051-.0071		.0055-.0075		.0055-.0075		.0055-.0075	
	13	Stainless steel	132	RPM	1590		1270		1060		1010		910		800		710		670		640
14	Stainless steel	198	RPM	2390		1910		1590		1510		1360		1190		1060		1010		950	
		FEED	.0039-.0055		.0043-.0063		.0047-.0067		.0047-.0067		.0051-.0071		.0055-.0075		.0059-.0079		.0059-.0079		.0059-.0079		.0063-.0083
N	21	Aluminum-wrought alloy	659	RPM	7960		6370		5310		5030		4550		3980		3540		3360		3180
			FEED	.0094-.0118		.0114-.0138		.0114-.0138		.0114-.0138		.0118-.0157		.0118-.0157		.0130-.0169		.0130-.0169		.0130-.0169	
	22	Aluminum-wrought alloy	659	RPM	7960		6370		5310		5030		4550		3980		3540		3360		3180
			FEED	.0094-.0118		.0114-.0138		.0114-.0138		.0114-.0138		.0118-.0157		.0118-.0157		.0130-.0169		.0130-.0169		.0130-.0169	
	23	Aluminum-wrought alloy	593	RPM	7160		5730		4770		4530		4090		3580		3180		3020		2860
FEED			.0094-.0118		.0114-.0138		.0114-.0138		.0114-.0138		.0118-.0157		.0118-.0157		.0130-.0169		.0130-.0169		.0130-.0169		.0138-.0177
24	Aluminum-wrought alloy	593	RPM	7160		5730		4770		4530		4090		3580		3180		3020		2860	
		FEED	.0094-.0118		.0114-.0138		.0114-.0138		.0114-.0138		.0118-.0157		.0118-.0157		.0130-.0169		.0130-.0169		.0130-.0169		.0138-.0177
25	Aluminum-wrought alloy	494	RPM	5970		4770		3980		3770		3410		2980		2650		2520		2390	
		FEED	.0087-.0110		.0094-.0118		.0094-.0118		.0094-.0118		.0098-.0138		.0098-.0138		.0110-.0150		.0110-.0150		.0110-.0150		.0118-.0157
S	37	Titanium alloy	132	RPM	1590		1270		1060		1010		910		800		710		670		640
			FEED	.0031-.0047		.0035-.0055		.0039-.0059		.0039-.0059		.0043-.0063		.0047-.0067		.0051-.0071		.0051-.0071		.0051-.0071	

SFM = ft/min.
RPM = rev./min.
FEED = inch/rev.

- Recommend to reduce the feed rate as following
- Feed 100%** : DH463/DH714/DH451(3xD), DH464/DH714/DH452(5xD)
- Feed 85%** : DH453(8xD)