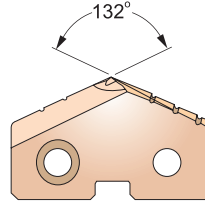


### SM-POINT SPADE DRILL INSERTS - CARBIDE(K20) SM-POINT EINWEG BOHREINSATZ - VOLLHARTMETALL(K20)

- ▶ For use in Gray cast iron up to 220 Brinell, nonferrous metals, copper, brass and aluminum.
- ▶ Improved stability and hole straightness by newly developed thinning design.
- ▶ Less thrust force and excellent self-centering.
- ▶ Any non-standard size available.

- ▶ Zur Anwendung in Grauguss bis 220 Brinell, Nichteisen - Metallen, Kupfer, Messing und Aluminium
- ▶ Erhöhte Stabilität und Fluchtgenauigkeit durch neu entwickelte Querschnidengeometrie
- ▶ Verminderte Bohrkraft und ausgezeichnete Selbstzentrierung
- ▶ Jede Abmessung außerhalb des Kataloges lieferbar



cutting conditions : p.284

Series Min. to Max. (mm/inch)	Diameter			Thick Metric (mm/inch)	EDP No.		
	Inch (inch)	Metric (mm)	Decimal (inch)		CARBIDE (K20)		
					TiN	TiCN	TiAlN
<b>Y</b>  9.50 (.374") to 11.07 (.436")		9.50	.3740"	2.4 (3/32")	SM755095	SM760095	SM765095
	3/8"	9.53	.3750"		SM705024	SM710024	SM715024
		9.80	.3858"		SM755098	SM760098	SM765098
	25/64"	9.92	.3906"		SM705025	SM710025	SM715025
		10.00	.3937"		SM755100	SM760100	SM765100
		10.20	.4016"		SM755102	SM760102	SM765102
	13/32"	10.32	.4062"		SM705026	SM710026	SM715026
		10.50	.4134"		SM755105	SM760105	SM765105
	27/64"	10.72	.4219"		SM705027	SM710027	SM715027
		10.80	.4252"		SM755108	SM760108	SM765108
<b>Z</b>  11.11(.437") to 12.95(.510")		11.00	.4331"	2.4 (3/32")	SM755110	SM760110	SM765110
	7/16"	11.11	.4375"		SM705028	SM710028	SM715028
		11.50	.4528"		SM755115	SM760115	SM765115
	29/64"	11.51	.4531"		SM705029	SM710029	SM715029
	15/32"	11.91	.4688"		SM705030	SM710030	SM715030
		12.00	.4724"		SM755120	SM760120	SM765120
	31/64"	12.30	.4844"		SM705031	SM710031	SM715031
		12.50	.4921"		SM755125	SM760125	SM765125
	1/2"	12.70	.5000"		SM705032	SM710032	SM715032
		13.00	.5118"		SM755130	SM760130	SM765130
<b>0</b>  12.98 (.511") to 17.65 (.695")		13.10	.5156"	3.2 (1/8")	SM705033	SM710033	SM715033
	33/64"	13.49	.5312"		SM705034	SM710034	SM715034
	17/32"	13.50	.5315"		SM755135	SM760135	SM765135
		13.89	.5469"		SM705035	SM710035	SM715035
	35/64"	14.00	.5512"		SM755140	SM760140	SM765140
		14.29	.5625"		SM705036	SM710036	SM715036
	9/16"	14.50	.5709"		SM755145	SM760145	SM765145
		14.68	.5781"		SM705037	SM710037	SM715037
	37/64"	15.00	.5906"		SM755150	SM760150	SM765150
		15.08	.5938"		SM705038	SM710038	SM715038
	19/32"	15.48	.6094"		SM705039	SM710039	SM715039
	39/64"	15.50	.6102"		SM755155	SM760155	SM765155
		15.88	.6250"		SM705040	SM710040	SM715040
	5/8"	16.00	.6299"		SM755160	SM760160	SM765160

◎ : Excellent ○ : Good

Non- alloyed Steels, Free Machining Steels	Carbon Steels		Alloy Steels		High Alloyed steels		Structural Steels		Tool Steels		Stainless Steels	Cast Iron		Aluminum	Copper Alloys
	-HRc24 (-HB250)	-HRc28 (-HB275)	HRc28~ (HB275~)	-HRc28 (-HB275)	HRc28~ (HB275~)	-HRc37 (-HB350)	HRc37~ (HB350~)	-HRc24 (-HB250)	HRc24~ (HB250~)	-HRc13 (-HB200)	HRc13~ (HB200~)	-HRc28 (-HB275)	-HRc19 (-HB220)	HRc19~ (HB220~)	-HRc8 (-HB180)
○	○	○	○	○	◎	◎	○	○	○	○	◎	○	○	◎	◎

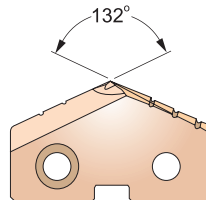
**YG SPADE DRILLS**

**SERIES 0,1**

**SM-POINT SPADE DRILL INSERTS - CARBIDE(K20)**  
**SM-POINT EINWEG BOHREINSATZ - VOLLHARTMETALL(K20)**

- ▶ For use in Gray cast iron up to 220 Brinell, nonferrous metals, copper, brass and aluminum.
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- ▶ Zur Anwendung in Grauguss bis 220 Brinell, Nichteisen - Metallen, Kupfer, Messing und Aluminium
- ▶ Erhöhte Stabilität und Fluchtgenauigkeit durch neu entwickelte Querschnittsgeometrie
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- ▶ Jede Abmessung außerhalb des Kataloges lieferbar



cutting conditions : p.284

Series Min. to Max. (mm/inch)	Diameter			Thick Metric (mm/inch)	EDP No. CARBIDE (K20)		
	Inch (inch)	Metric (mm)	Decimal (inch)		TiN	TiCN	TiAlN
<b>0</b>  12.98(.511") to 17.65(.695")	41/64"	16.27	.6406"	3.2 (1/8")	SM705041	SM710041	SM715041
		16.50	.6496"		SM755165	SM760165	SM765165
	21/32"	16.67	.6562"		SM705042	SM710042	SM715042
		17.00	.6693"		SM755170	SM760170	SM765170
	43/64"	17.07	.6719"		SM705043	SM710043	SM715043
		11/16"	17.46		.6875"	SM705044	SM710044
			17.50		.6890"	SM755175	SM760175
		45/64"	17.86		.7031"	SM705045	SM710045
			18.00		.7087"	SM755180	SM760180
	23/32"	18.26	.7188"		SM705046	SM710046	SM715046
		18.50	.7283"	SM755185	SM760185	SM765185	
47/64"	18.65	.7344"	SM705047	SM710047	SM715047		
		19.00	.7480"	SM755190	SM760190	SM765190	
3/4"	19.05	.7500"	SM705048	SM710048	SM715048		
	49/64"	19.45	.7656"	SM705049	SM710049	SM715049	
		19.50	.7677"	SM755195	SM760195	SM765195	
<b>1</b>  17.53 (.690") to 24.38 (.960")	25/32"	19.84	.7812"	4.0 (5/32")	SM705050	SM710050	SM715050
		20.00	.7874"		SM755200	SM760200	SM765200
	51/64"	20.24	.7969"		SM705051	SM710051	SM715051
		20.50	.8071"		SM755205	SM760205	SM765205
	13/16"	20.64	.8125"		SM705052	SM710052	SM715052
		21.00	.8268"		SM755210	SM760210	SM765210
	27/32"	21.43	.8438"		SM705054	SM710054	SM715054
		55/64"	21.83		.8594"	SM705055	SM710055
			22.00		.8661"	SM755220	SM760220
	7/8"	22.23	.8750"		SM705056	SM710056	SM715056
57/64"		22.62	.8906"	SM705057	SM710057	SM715057	
		23.00	.9055"	SM755230	SM760230	SM765230	
29/32"	23.02	.9062"	SM705058	SM710058	SM715058		
	59/64"	23.42	.9219"	SM705059	SM710059	SM715059	
15/16"		23.81	.9375"	SM705060	SM710060	SM715060	
		24.00	.9449"	SM755240	SM760240	SM765240	

◎ : Excellent ○ : Good

Non-alloyed Steels, Free Machining Steels	Carbon Steels		Alloy Steels		High Alloyed steels		Structural Steels		Tool Steels		Stainless Steels	Cast Iron		Aluminum	Copper Alloys
	-HRc24 (-HB250)	-HRc28 (-HB275)	HRc28~ (-HB275~)	-HRc28 (-HB275)	HRc28~ (-HB275~)	-HRc37 (-HB350)	HRc37~ (-HB350~)	-HRc24 (-HB250)	HRc24~ (-HB250~)	-HRc13 (-HB200)		HRc13~ (-HB200~)	-HRc28 (-HB275)		
○	○	○	○	○	◎	◎	○	○	○	○	◎	○	○	◎	◎