NEW

Member IMC Group
Ingersoll
Cutting Tools

GOLDTWIST
WINTWIST

WINSFEED

HEAD CHANGEABLE MODULAR DRILLS
WITH CHIPSURFER CONNECTION

HEAD CHANGEABLE MODULAR DRILLS WITH CHIPSURFER CONNECTION

- *Simplified clamping system due to ChipSurfer connection*
- *Modular design with interchangeable heads*
- *Reduced tool change and set-up time*
- *Easy use on Multi-spindle and Swiss type machines*
- *Available in internal coolant type*

No. 233 E / 1-2024

Product Overview

WinTwist drill line now includes the head changeable GoldTwist type holders.

To improve the productivity of the modular head type **WinTwist** line, they have been redesigned with the **ChipSurfer** connection, which includes a simplified clamping system and reduced set-up time.

Technical Features & Advantages

- **GoldTwist** type modular drill holders
- Modular design with interchangeable heads for reduced tool change and set-up time
- Shorter tool lengths allow for ease of use on multi-spindle and Swiss type machines
- Compatibility with the existing **GoldTwist** heads: **TPA/TPC/TPM/TPK/TPN/TPF**
- Available in internal coolant type

Flat contact face for precise axial runout

Taper contact face for self-centering and precise radial runout

Quick and rigid unique threading

Compatible with Various ChipSurfer Type Shanks

cylindrical shank steel, carbide, heavy metall

conical shank steel, solid carbide, heavy metall

carbide extension TS

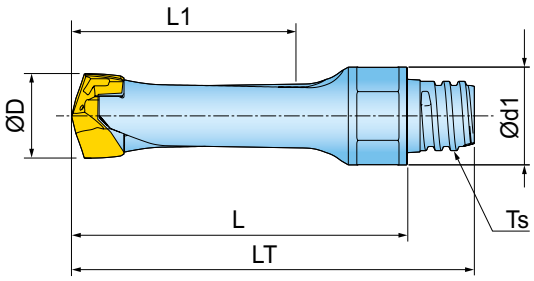
ChipSurfer adapter connection HSKA63, DIN69871-A40, PSK

adapter for metric thread

ER..SA_collets cylindrical/conical

EXCHANGEABLE HEAD DRILL 2D ...T Ø6,0-Ø10,4

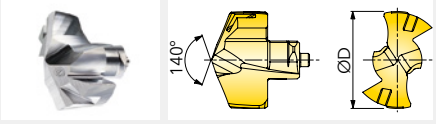
FOR EXCHANGEABLE HEADS



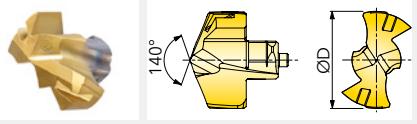
Designation	D min.	D max.	d1	LT	L	L1	Ts	Z	wrench	IK	kg
TD0600012T6R00	6,0	6,4	9,6	34,3	28,0	13,0	T6	2	KTD6,0-9,9	✓	0,08
TD0800019T6R00	8,0	8,4	9,6	39,2	32,9	17,2	T6	2	KTD6,0-9,9	✓	0,09
TD1000020T8R00	10,0	10,4	11,6	47,3	39,8	21,5	T8	2	KTD10,0-19,9	✓	0,13

DRILL HEADS FOR WINTWIST DRILLS

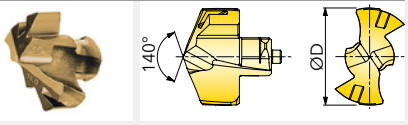
aluminum machining



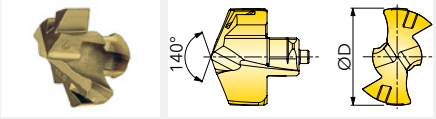
cast iron machining



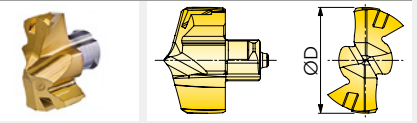
stainless steel machining



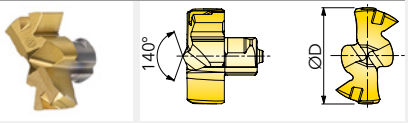
steel machining



steel-C machining



flat ground machining (1,5xD/3xD/5xD)



	Designation						
D	aluminum	cast iron	stainless steel	steel	steel-C	flat ground	grade
6,0	TNA0600R01						IN 05S
6,0		TKA0600R01	TMA0600R01	TPA0600R01	TPC0600R01		IN 2505
6,1		TKA0610R01	TMA0610R01	TPA0610R01			IN 2505
6,2		TKA0620R01	TMA0620R01	TPA0620R01			IN 2505
6,3		TKA0630R01	TMA0630R01	TPA0630R01			IN 2505
6,4		TKA0640R01	TMA0640R01	TPA0640R01			IN 2505
8,0	TNA0800R01						IN 05S
8,0		TKA0800R01	TMA0800R01	TPA0800R01	TPC0800R01	TPF0800R01	IN 2505
8,1		TKA0810R01	TMA0810R01	TPA0810R01			IN 2505
8,2		TKA0820R01	TMA0820R01	TPA0820R01			IN 2505
8,3		TKA0830R01	TMA0830R01	TPA0830R01			IN 2505
8,4		TKA0840R01	TMA0840R01	TPA0840R01			IN 2505
10,0	TNA1000R01						IN 05S
10,0		TKA1000R01	TMA1000R01	TPA1000R01	TPC1000R01	TPF1000R01	IN 2505
10,1		TKA1010R01	TMA1010R01	TPA1010R01			IN 2505
10,2	TNA1020R01						IN 05S
10,2		TKA1020R01	TMA1020R01	TPA1020R01	TPC1020R01		IN 2505
10,3		TKA1030R01	TMA1030R01	TPA1030R01			IN 2505
10,4		TKA1040R01	TMA1040R01	TPA1040R01			IN 2505

Recommended Cutting Data

ISO	Material		Condition	Tensile Strength (N/mm²)	Hardness HB	Material No.	Cutting speed Vc (m/min)	Feed (mm/rev) vs. drill diameter		
								Ø6 - Ø7,9	Ø8 - Ø9,9	Ø10 - Ø11,9
P	Non-alloy steel and cast steel, free cutting steel	<0,25%C	Annealed	420	125	1	80-140	0,09-0,13	0,12-0,22	0,15-0,28
		≥0,25%C	Annealed	650	190	2	80-130	0,09-0,13	0,12-0,22	0,15-0,28
		<0,55%C	Quenched and tempered	850	250	3	80-120	0,09-0,13	0,12-0,22	0,15-0,28
		≥0,55%C	Annealed	750	220	4	70-110	0,09-0,13	0,12-0,22	0,15-0,28
			Quenched and tempered	1000	300	5	50-90	0,09-0,13	0,12-0,22	0,15-0,28
	Low alloy steel and cast steel (less than 5% of alloying elements)		Annealed	600	200	6	70-120	0,09-0,15	0,12-0,25	0,14-0,28
			Quenched and tempered	930	275	7	70-110	0,09-0,15	0,12-0,25	0,14-0,28
				1000	300	8	50-90	0,09-0,15	0,12-0,25	0,14-0,28
				1200	350	9	40-70	0,09-0,15	0,12-0,25	0,14-0,28
	High alloy steel, cast steel and tool steel		Annealed	680	200	10	50-90	0,09-0,12	0,12-0,20	0,12-0,22
			Quenched and tempered	1100	325	11	40-80	0,09-0,12	0,12-0,20	0,12-0,22
M	Stainless steel and cast steel		Ferritic / martensitic	680	200	12	40-70	0,08-0,10	0,10-0,15	0,12-0,18
			Martensitic	820	240	13	40-70	0,08-0,10	0,10-0,15	0,12-0,18
			Austenitic	600	180	14	30-70	0,08-0,10	0,10-0,15	0,12-0,18
K	Grey cast iron (GG)		Ferritic / pearlitic	-	160	15	90-160	0,12-0,18	0,15-0,30	0,20-0,35
			Pearlitic	-	250	16	80-140	0,12-0,18	0,15-0,30	0,20-0,35
	Cast iron nodular (GGG)		Ferritic	-	180	17	90-180	0,12-0,18	0,15-0,30	0,20-0,35
			Pearlitic	-	260	18	80-140	0,12-0,18	0,15-0,30	0,20-0,35
	Malleable cast iron		Ferritic	-	130	19	90-160	0,12-0,18	0,15-0,30	0,20-0,35
			Pearlitic	-	230	20	80-140	0,12-0,18	0,15-0,30	0,20-0,35
N	Aluminum-wrought alloy		Not cureable	-	60	21	90-220	0,15-0,30	0,20-0,35	0,25-0,40
			Cured	-	100	22	90-220	0,15-0,30	0,20-0,35	0,25-0,40
	Aluminum-cast, alloyed	≤12% Si	Not cureable	-	75	23	90-220	0,15-0,30	0,20-0,35	0,25-0,40
			Cured	-	90	24	90-220	0,15-0,30	0,20-0,35	0,25-0,40
		>12% Si	High temperature	-	130	25	80-160	0,15-0,30	0,20-0,35	0,25-0,40
	Copper alloys	>1% Pb	Free cutting	-	110	26	90-220	0,15-0,30	0,20-0,35	0,25-0,40
			Brass	-	90	27	90-220	0,15-0,30	0,20-0,35	0,25-0,40
			Electrolitic copper	-	100	28	90-220	0,15-0,30	0,20-0,35	0,25-0,40
	Non-metallic		Duroplastics, fiber plastics	-	-	29	-	-	-	-
			Hard rubber	-	-	30	-	-	-	-
S	High temp. alloys	Fe based	Annealed	-	200	31	30-60	0.05-0.07	0.06-0.11	0.08-0.13
			Cured	-	280	32	20-50	0.05-0.07	0.06-0.11	0.08-0.13
		Ni or Co based	Annealed	-	250	33	20-50	0.05-0.07	0.06-0.11	0.08-0.13
			Cured	-	350	34	20-50	0.05-0.07	0.06-0.11	0.08-0.13
			Cast	-	320	35	20-50	0.05-0.07	0.06-0.11	0.08-0.13
	Titanium and Ti alloys			Rm 400	-	36	20-50	0.05-0.07	0.06-0.12	0.08-0.15
			Alpha+beta alloys cured	Rm 1050	-	37	20-50	0.05-0.07	0.06-0.12	0.08-0.15
H	Hardened steel		Hardened	-	55HRC	38	20-50	0.05-0.07	0.06-0.12	0.08-0.15
			Hardened	-	60HRC	39	20-50	0.05-0.07	0.06-0.12	0.08-0.15
	Chilled cast iron		Cast	-	400	40	-	-	-	-
	Cast iron nodular (GGG)		Hardened	-	55HRC	41	-	-	-	-

Member IMC Group
Ingersoll Cutting Tools

Order-no.: none • digital version 1-2024
Printing errors and changes reserved.

Ingersoll Cutting Tools
Marketing & Technology

Germany
Ingersoll Werkzeuge GmbH

Kalteiche-Ring 21-25
35708 Haiger, Germany
Phone: +49 2773 742-0
Email: info@ingersoll-imc.de
Internet: www.ingersoll-imc.de

France
Ingersoll France

22, rue Albert Einstein
F-77420 CHAMPS-sur-MARNE
Téléphone: +33 164684536
E-Mail: info@ingersoll-imc.fr
Site web: www.ingersoll-imc.fr

www.ingersoll-imc.de