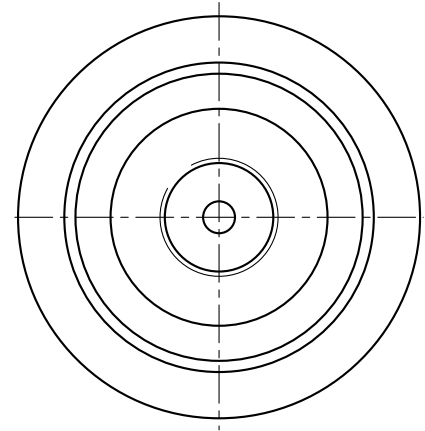
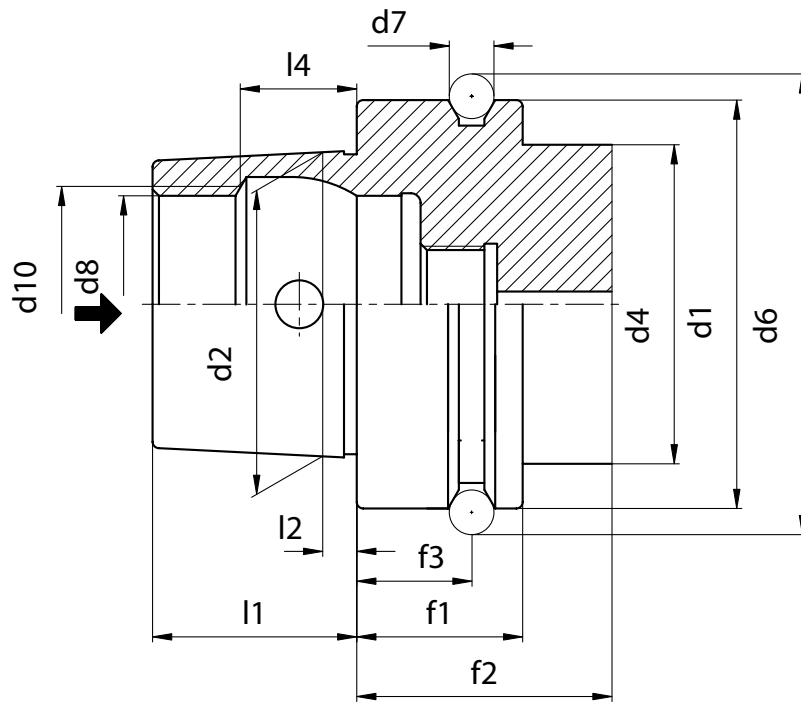




HSK DIN 69893 E

**TECHNISCHE DATEN DER STEILKEGELWERKZEUGE
TAPER SHANKS DATA SHEET
DONNES TECHNIQUES QUEUE D'OUTILS
DATI TECNICI CONI D'ATTACCO**



	HSK 40	HSK 50	HSK 63
d1	40	50	63
d2	30	38	48
d4	34	42	53
d6	45	59,3	72,3
d7	4	7	7
d8	21	26	34
d10	23	29	37
f1	20	26	26
f2	35	42	42
f3	16	18	18
l1	20	25	32
l2	4	5	6,3
l4	11,42	14,13	18,13



Forma E

- Usato su elettromandri e su macchine per il legno.
- Rotazione simmetrica senza chiavette di trascinamento.
- Coppia trasmessa solo per attrito tra le superfici.
- Adduzione refrigerante dal centro.



Form E

- Anwendung für Hochfrequenzspindeln, Holzbearbeitungsmaschinen.
- Rotationssymmetrisch, ohne Mitnehmernuten.
- Drehmomentübertragung über Reibschluss.
- Zentrale Kühlmittelzufuhr über Kühlmittelrohr möglich.



Form E

- Used for high frequency spindles and wood machining.
- Rotationally symmetrical, without key slots.
- Torque transmission via friction resistance.
- Central coolant supply possible through coolant tube.

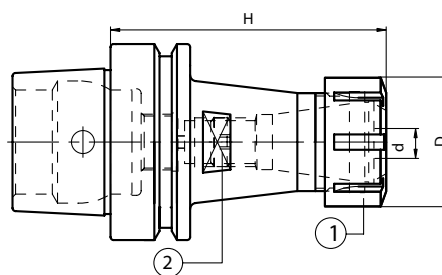


Forme E

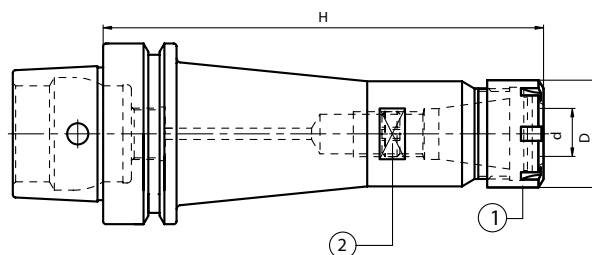
- Utilisation pour des broches à hautes fréquences, les machines à usiner le bois.
- Symétrie de rotation, sans gorges d'entraînement.
- Transmission du couple par friction.
- Possibilité d'alimentation centrale du liquide de lubrification par tube d'arrosage.

SPANNZANGENFUTTER ER TYP
ER COLLET CHUCK
MANDRINS A PINCES TYPE ER
MANDRINI PORTAPINZA TIPO ER

DIN 6499





	HSK	Code N.	Description	H	d	D	ER
STANDARD	40	214-37301	HSK40EH70ER16M	70	0,5÷10	22	16M
	40	214-37302	HSK40EH80ER25M	80	1÷16	35	25M
	50	214-37303	HSK50EH80ER16M	80	0,5÷10	22	16M
	50	214-37304	HSK50EH95ER25	95	1÷16	42	25
	50	214-37305	HSK50EH100ER32	100	2÷20	50	32
	63	214-37306	HSK63EH90ER16M	90	0,5÷10	22	16M
	63	214-37307	HSK63EH90ER25	90	1÷16	42	25
	63	214-37308	HSK63EH100ER32	100	2÷20	50	32
	63	214-37309	HSK63EH80ER40	80	3÷30	63	40
	63	214-37310	HSK63EH120ER40	120	3÷30	63	40



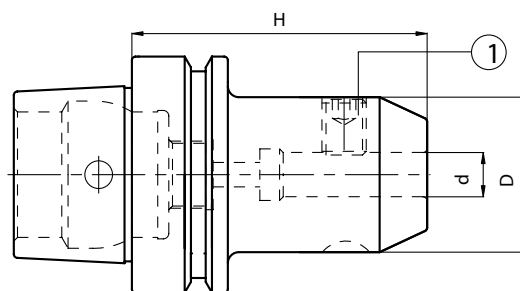
	HSK	Code N.	Description	H	d	D	ER
EXTENDED	40	214-37311	HSK40EH120ER16M	120	0,5÷10	22	16M
	40	214-37312	HSK40EH120ER25M	120	1÷16	35	25M
	50	214-37313	HSK50EH150ER16M	150	0,5÷10	22	16M
	50	214-37314	HSK50EH150ER25M	150	1÷16	35	25M
	50	214-37315	HSK50EH150ER32	150	2÷20	50	32
	63	214-37316	HSK63EH160ER16M	160	0,5÷10	22	16M
	63	214-37317	HSK63EH160ER25M	160	1÷16	35	25M
	63	214-37318	HSK63EH160ER32	160	2÷20	50	32

Ersatzteile / Spare parts / Pieces detachees / Componenti

ER	Nut	Stop screw
		
	1	2
16M	812-203043	811-303119
25M	812-203045	811-303121
25	812-203016	811-303121
32	812-203017	811-303118
40/H120	812-203018	811-303122
40/H80	812-203018	-

ZYLINDERSCHAFTAUFNAHME WELDON
 END MILL HOLDERS WELDON
 MANDRINS POUR OUTIL TYPE WELDON
 MANDRINI PORTAFRESE TIPO WELDON

DIN 1835/B



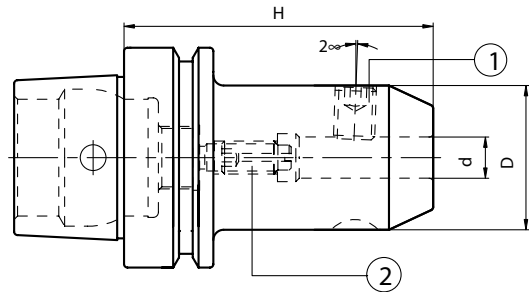
HSK	Code N.	Description	H	d	D
40	213-17301	HSK40EH60WE06	60	6	25
40	213-17302	HSK40EH60WE08	60	8	28
40	213-17303	HSK40EH65WE10	65	10	35
40	213-17304	HSK40EH70WE12	70	12	42
40	213-17331	HSK40EH70WE14	70	14	44
40	213-17305	HSK40EH70WE16	70	16	48
40	213-17332	HSK40EH70WE18	70	18	50
40	213-17306	HSK40EH80WE20	80	20	52
50	213-17307	HSK50EH65WE06	65	6	25
50	213-17308	HSK50EH65WE08	65	8	28
50	213-17309	HSK50EH70WE10	70	10	35
50	213-17310	HSK50EH80WE12	80	12	42
50	213-17333	HSK50EH80WE14	80	14	44
50	213-17311	HSK50EH80WE16	80	16	48
50	213-17334	HSK50EH80WE18	80	18	50
50	213-17312	HSK50EH85WE20	85	20	52
50	213-17313	HSK50EH105WE25	105	25	65
63	213-17314	HSK63EH65WE06	65	6	25
63	213-17315	HSK63EH65WE08	65	8	28
63	213-17316	HSK63EH70WE10	70	10	35
63	213-17321	HSK63EH80WE12	80	12	42
63	213-17335	HSK63EH80WE14	80	14	44
63	213-17317	HSK63EH80WE16	80	16	48
63	213-17336	HSK63EH80WE18	80	18	50
63	213-17318	HSK63EH85WE20	85	20	52
63	213-17319	HSK63EH105WE25	105	25	65
63	213-17323	HSK63EH110WE32	110	32	72

Ersatzteile / Spare parts / Pieces detachees / Componenti

D	Locking screw	Quantity
6	811-106001	1
8	811-106002	1
10	811-106004	1
12;14	811-106005	1
16;18	811-106006	1
20	811-106007	1
25	811-106008	2
32	811-106009	2



ZYLINDERSCHAFTAUFNAHME WHISTLE-NOTCH
 END MILL HOLDERS WHISTLE-NOTCH
 MANDRINS POUR OUTIL TYPE WHISTLE-NOTCH
 MANDRINI PORTAFRESE TIPO WHISTLE-NOTCH

DIN 1835/E



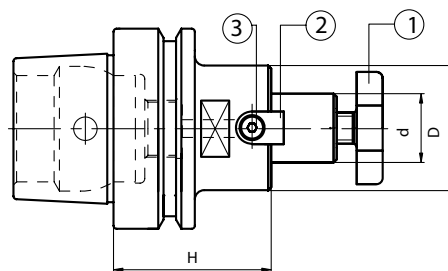
HSK	Code N.	Description	H	d	D
40	213-37301	HSK40EH80WN06	80	6	25
40	213-37302	HSK40EH80WN08	80	8	28
40	213-37303	HSK40EH80WN10	80	10	35
40	213-37304	HSK40EH90WN12	90	12	42
40	213-37305	HSK40EH90WN14	90	14	44
40	213-37306	HSK40EH100WN16	100	16	48
40	213-37307	HSK40EH100WN18	100	18	50
40	213-37308	HSK40EH100WN20	100	20	52
50	213-37309	HSK50EH80WN06	80	6	25
50	213-37310	HSK50EH80WN08	80	8	28
50	213-37311	HSK50EH80WN10	80	10	35
50	213-37312	HSK50EH90WN12	90	12	42
50	213-37313	HSK50EH90WN14	90	14	44
50	213-37314	HSK50EH100WN16	100	16	48
50	213-37315	HSK50EH100WN18	100	18	50
50	213-37316	HSK50EH100WN20	100	20	52
50	213-37317	HSK50EH110WN25	110	25	65
50	213-37318	HSK50EH120WN32	120	32	72
63	213-37319	HSK63EH80WN06	80	6	25
63	213-37320	HSK63EH80WN08	80	8	28
63	213-37321	HSK63EH80WN10	80	10	35
63	213-37322	HSK63EH90WN12	90	12	42
63	213-37323	HSK63EH90WN14	90	14	44
63	213-37324	HSK63EH100WN16	100	16	48
63	213-37325	HSK63EH100WN18	100	18	50
63	213-37326	HSK63EH100WN20	100	20	52
63	213-37327	HSK63EH110WN25	110	25	65
63	213-37328	HSK63EH120WN32	120	32	72

Ersatzteile / Spare parts / Pieces detachees / Componenti

d	Locking screw	Quantity	Stop screw
			
6	811-106001	1	811-303043
8	811-106002	1	811-303081
10	811-106004	1	811-303089
12;14	811-106005	1	811-303090
16;18	811-106006	1	811-303091
20	811-106007	1	811-303091
25	811-106008	2	811-303091
32	811-106009	2	811-303091

**AUFSTECKFRÄSDORNE FÜR FRÄSER MIT QUERNUT
FACE MILL HOLDERS-TENONS DRIVE
MANDRINS PORTE-FRAISE-ENTRAINEMENT PAR TENONS
MANDRINI PORTAFRESE A TRASCINAMENTO FISSO**

ISO 3937



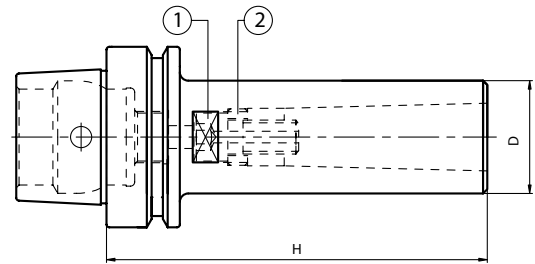
HSK	Code N.	Description	H	d	D
40	216-77301	HSK40EH45D16F	45	16	38
40	216-77302	HSK40EH50D22F	50	22	48
40	216-77303	HSK40EH55D27F	55	27	58
50	216-77304	HSK50EH45D16F	45	16	38
50	216-77305	HSK50EH55D22F	55	22	48
50	216-77306	HSK50EH55D27F	55	27	58
50	216-77307	HSK50EH60D32F	60	32	78
63	216-77308	HSK63EH45D16F	45	16	38
63	216-77309	HSK63EH50D22F	50	22	48
63	216-77310	HSK63EH55D27F	55	27	58
63	216-77311	HSK63EH60D32F	60	32	78
63	216-77313	HSK63EH65D40F	65	40	88

Ersatzteile / Spare parts / Pieces detachees / Componenti

d	Cross screw	Dog	Screw
16	811-107003	814-20228	811-101004
22	811-107004	814-20225	811-101011
27	811-107005	814-20227	811-101018
32	811-107006	814-20263	811-101029
40	811-107007	814-20271	811-101029



ZWISCHENHÜLSEN FÜR MORSEKEGEL MIT ANZUGSGEWINDE
MORSE TAPER ADAPTER WITH TREAD
DOUILLES POUR CONE MORSE AVEC TARAUDAGE
MANDRINI PORTAFRESE ATTACCO CONO MORSE

DIN 228-2 C



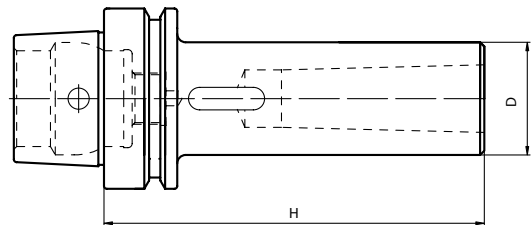
HSK	Code N.	Description	Morse	H	D
40	212-27301	HSK40EH100CM1F	1	100	25
40	212-27302	HSK40EH115CM2F	2	115	32
50	212-27303	HSK50EH100CM1F	1	100	25
50	212-27304	HSK50EH115CM2F	2	115	32
50	212-27305	HSK50EH140CM3F	3	140	40
63	212-27306	HSK63EH100CM1F	1	100	25
63	212-27307	HSK63EH125CM2F	2	125	32
63	212-27308	HSK63EH145CM3F	3	145	40
63	212-27309	HSK63EH165CM4F	4	165	48

Ersatzteile / Spare parts / Pieces detachees / Componenti

HSK/MORSE	Screw	Ring
		
40/1	811-401100	811-302037
40/2	811-401079	811-302031
50/1	811-401100	811-302037
50/2	811-401066	811-302031
50/3	811-401067	811-302032
63/1	811-401100	811-302037
63/2	811-401099	811-302031
63/3	811-401078	811-302032
63/4	811-401091	811-302036

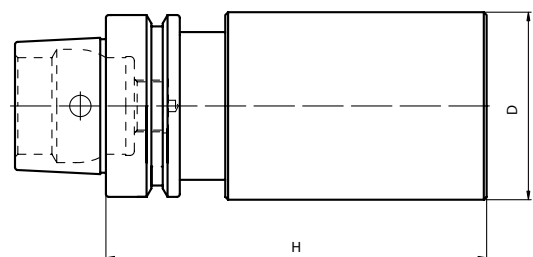
ZWISCHENHÜLSEN FÜR MORSEKEGEL MIT AUSTREIBBLAPPEN
MORSE TAPER ADAPTORS FOR DRILLS
DOUILLES POUR CONE MORSE A TENON
MANDRINI PORTAPUNTE ATTACCO CONO MORSE

DIN 228-2 D



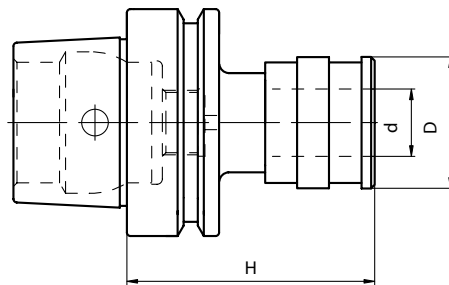
HSK	Code N.	Description	Morse	H	D
40	212-47301	HSK40EH110CM1P	1	110	25
40	212-47302	HSK40EH120CM2P	2	120	32
50	212-47303	HSK50EH115CM1P	1	115	25
50	212-47304	HSK50EH130CM2P	2	130	32
50	212-47305	HSK50EH150CM3P	3	150	40
63	212-47306	HSK63EH105CM1P	1	105	25
63	212-47307	HSK63EH120CM2P	2	120	32
63	212-47308	HSK63EH140CM3P	3	140	40
63	212-47309	HSK63EH165CM4P	4	165	48

ROHLINGE
BLANK TOOLHOLDERS
EBAUCHE
MANDRINI SEMILAVORATI A STELO TENERO



HSK	Code N.	Description	H	D
40	217-17301	HSK40EH150D50SM	150	50
50	217-17302	HSK50EH200D63SM	200	63
63	217-17303	HSK63EH200D63SM	200	63

GEWINDESCHNEID-SCHNELLWECHSELFUTTER MIT LÄNGENAUSGLEICH
TENSION AND COMPRESSION TAPPING HEAD
MANDRINS DE TARAUDAGE A CHANGEMENT RAPIDE A DOUBLE USAGE
MASCHIATORI A DOPPIA COMPENSAZIONE



HSK	Code N.	Description	SIZE	Top range	PRESS.	EXT.	d	D	H
40	MEH1040	HSK40EH80GR1	1	M3÷M12	7.5	7.5	19	41	80
40	MEH2040	HSK40EH103GR2	2	M6÷M20	10	10	31	60	103
50	MEH1050	HSK50EH72GR1	1	M3-M12	7.5	7.5	19	41	72
50	MEH2050	HSK50EH110GR2	2	M6-M20	10	10	31	60	110
63	MEH1063	HSK63EH72GR1	1	M3-M12	7.5	7.5	19	41	72
63	MEH2063	HSK63EH110GR2	2	M6-M20	10	10	31	60	110

