

3. Planing and profiling

3.2 Planing

3.2.1 Cutterheads for pre-planing



Planerhead HeliPlan with 4 edge HW turnblade knives

Application:

Pre-planing, surfacing and jointing all types of wood with large chip removal. Also suitable for finish planing if quality demands are less important or in combination with subsequent sanding.

Machine:

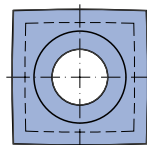
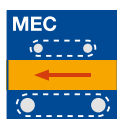
Four-sided moulders with HSK 85 WS interfaces.

Workpiece material:

Softwood and hardwood.

Technical information:

Pre-planing cutterhead with 4 edge HW turnblade knives. Low noise and energy efficient due to spiral, segmented edge arrangement. Smooth finish through radiused cutting edges. Aluminium tool body. Tool and HSK are shrink-fit together. Optional steel reference cutterhead for machines with fence.



Aluminium tool body, with HSK 85 WS

WL 210 2 02

D	SB	A	Z	AM	n _{max}	ID	ID
mm	mm	mm		PCS	min ⁻¹	bottom	top
125	130	26	2/2	22	12000	132000	132001
125	166	26	2/2	28	12000	132022	132023
125	210	26	2/2	36	12000	132008	132009
125	236	26	2/2	40	12000	132024	132025
125	270	26	2/2	46	8000	132012	132013
125	310	26	2/2	54	8000	132014	132015

Aluminium tool body, HSK 85 WS with reference cutterhead

WL 403 2 02

D	SB	A	Z	V	AM	n _{max}	DRI	ID
mm	mm	mm			PCS	min ⁻¹		
125	236	26	2/2	2	40	12000	bottom	132066
125	310	26	2/2	2	54	8000	bottom	132065

Design with HW cutting edges.

Further dimensions and inch dimensions available on request.

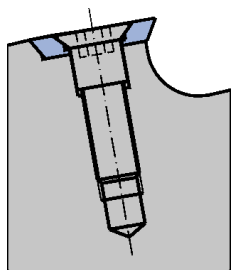
Spare knives:

BEZ	ABM	QAL	VE	ID
	mm		PCS	
Turnblade knife	15x15x2.5	HW	10	009535
Turnblade knife	15x15x2.5	TDC		602901

Spare parts:

BEZ	ABM	ID
	mm	
Countersink screw, Torx® 20	M5x14.2-8.8	007394
Torx® key	Torx® 20	006091

HW turnblade knife



Knives mounted on periphery

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Киргизия (996)312-96-26-47

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Череповец (8202)49-02-64
Ярославль (4852)69-52-93



Hydro Planerhead HeliPlan

Application:

Pre-planing, surface cutting of all types of wood with large chip removal. Finish cutting of glueable surfaces and workpieces with secondary quality demands.

Machine:

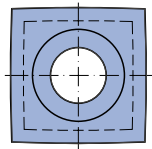
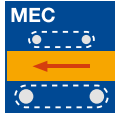
Four-sided moulders and profiling machines.

Workpiece material:

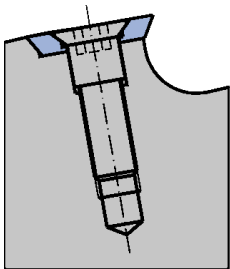
Softwood and hardwood.

Technical information:

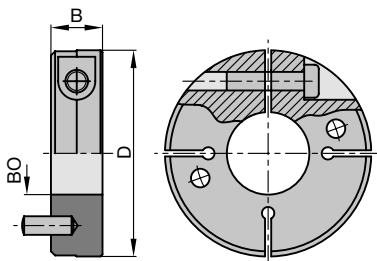
Pre-planing cutterhead with 4-time HW turnblades. Low noise and energy efficient through spiral, segmented edge arrangement. Plane surfaces through radiused cutting edges. Tool bodies of lightweight aluminium with integrated hydro clamping system. Activated by a grease gun.



HW turnblade knife



Knives mounted on periphery



Clamping collar without thread

Aluminium tool body

HW 230-2

D	SB	BO	Z	n_{max}	ID
mm	mm	mm		min^{-1}	
160	150	50	4/4	11000	132200
160	180	50	4/4	11000	132201
160	200	50	4/4	11000	132202
160	230	50	4/4	11000	132203
160	310	50	4/4	11000	132204
200	150	50	6/6	8000	132205
200	180	50	6/6	8000	132206
200	200	50	6/6	8000	132207
200	230	50	6/6	8000	132208
200	310	50	6/6	8000	132209
250	150	50	8/8	6900	132210
250	180	50	8/8	6900	132211
250	200	50	8/8	6900	132212
250	230	50	8/8	6900	132213
250	310	50	8/8	6900	132214

Design in steel/lightweight aluminium on request. This version combines the advantages of a light weight tool and a wear resistant knife seating and gullet area.

Spare knives:

BEZ	ABM	QAL	VE	ID
	mm		PCS	
Turnblade knife	15x15x2.5	HW	10	009535 ●
Turnblade knife	15x15x2.5	TDC		602901 ●

Spare parts:

BEZ	ABM	ID
	mm	
Countersink screw, Torx® 20	M5x14.2-8.8	007394 ●
Torx® key	Torx® 20	006091 ●

Clamping collars without thread

TD 870 0

D	B	BO	ID
mm	mm	mm	
100	25	40	030700 ●
100	25	50	030702 ●



Turnblade jointing / bevel cutter

Application:

Router cutter for edge trimming or bevelling on machines with copy shaping guide ring, side stop or guide rail systems.

Machine:

Portable routers.

Workpiece material:

Softwood and hardwood, chipboard and fibre materials (MDF, HDF etc.), uncoated, plastic coated, veneered etc., laminated veneer lumber (plywood, multiplex plywood etc.).

Technical information:

Tools with ball bearing guide ring for use with templates or guided by the workpiece edge. Replaceable tungsten carbide turnblade knives.



HW, Z 2, with ball bearing guide ring

WL 220 1, WL 320 1

Class.	D mm	GL mm	NL mm	S mm	FAW °	DRI	ID
WL 220 1	19	52.7	12	8x30	0°	RH	072776 □
WL 220 1	19	64.5	20	8x30	0°	RH	040765 ●
WL 220 1	19	74.5	30	8x30	0°	RH	040774 ●
WL 320 1	27	60		8x30	45°	RH	072767 □

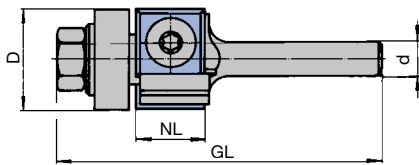
RPM: n = 18000 - 30000 min⁻¹

Spare knives:

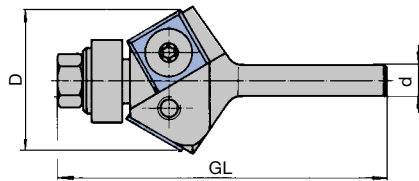
BEZ	Knife	BEM	ABM mm	QAL	VE PCS	ID
Turnblade knife	Peripheral tip	Bevel 45°	12x12x1.5	HW-05F	10	005081 ●
Turnblade knife	Peripheral tip		20x12x1.5	HW-05F	10	005083 ●
Turnblade knife	Peripheral tip		30x12x1.5	HW-05F	10	005084 ●

Spare parts:

BEZ	BEM	ABM mm	ID
Ball bearing	D19	19x6x6	008082 ●
Ball bearing	D27/45°	12.7x4.97x4.76	008088 ●
Nut	NL30	M6	005651 ●
Oval head screw Torx® 15	NL12	M4x5	007038 ●
Clamping screw, Torx® 15	NL12/45°	M4x9	007887 ●
Oval head screw Torx® 15	NL20/30	M4x6	006225 ●
Torx® key		Torx® 15	005457 ●

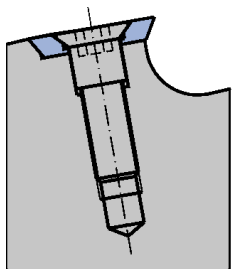


WL 220 1/0°-jointing cutter with guide ring



WL 320 1/30°-bevel cutter with guide ring

HW turnblade knife



Knives mounted on periphery

Aluminium tool body, HSK 85 WS with reference cutterhead

WL 403 2 02

D mm	SB mm	A mm	Z	V	AM PCS	n _{max} min ⁻¹	DRI	ID
125	236	26	2/2	2	40	12000	bottom	132066 □
125	310	26	2/2	2	54	8000	bottom	132065 □

Design with HW cutting edges.

Further dimensions and inch dimensions available on request.

Spare knives:

BEZ	ABM mm	QAL	VE PCS	ID
Turnblade knife	15x15x2.5	HW	10	009535 ●
Turnblade knife	15x15x2.5	TDC		602901 ●

Spare parts:

BEZ	ABM mm	ID
Countersink screw, Torx® 20	M5x14.2-8.8	007394 ●
Torx® key	Torx® 20	006091 ●

5. Routing

5.2 Jointing, rebating and bevelling

5.2.1 Jointing and rebating tools



Turnblade jointing / rebating cutterhead

Application:

For jointing and rebating with constant tool diameter.

Machine:

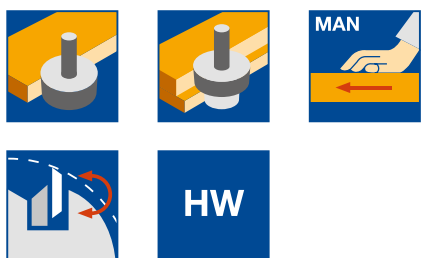
Stationary routers with/without CNC control, machining centres.

Workpiece material:

Softwood and hardwood, chipboard and fibre materials (MDF, HDF etc.), uncoated, plastic coated, veneered etc., laminated veneer lumber (plywood, multiplex plywood etc.).

Technical information:

HW turnblades Z 2 with straight cut for offset-free areas on pre-cut workpieces or on workpieces sized with roughing cutters. Mounted spurs especially for the production of tear-free rebates in softwood and hardwood. Smooth running through closed, round shape of the tool body.



HW, Z 2 / V 2

WL 402 1

D	GL	SB	S	ID
mm	mm	mm	mm	
40	120	50	25x60	039235 ●
50	120	50	25x60	039239 ●
60	113	50	25x60	039243 ●

RPM: $n_{\max} = 18000 \text{ min}^{-1}$

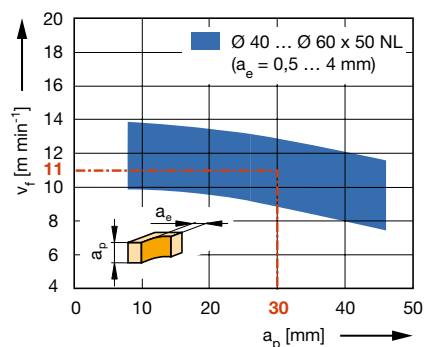
Spare knives:

Part-no.	BEZ	ABM	QAL	VE	ID
		mm		PCS	
1	Turnblade spur VS1	14x14x2	HW-F	10	005099 ●
2	Turnblade knife	50x12x1.5	HW-05F	10	005086 ●

Spare parts:

Part-no.	BEZ	ABM	for D	ID
		mm	mm	
3	Clamping wedge	48x11.6x9		009871 ●
4	Screw with slot	M5x12		005744 ●
5	Allen screw	M8x8	40/50	006245 ●
5	Allen screw	M8x14	60	006073 ●
	Allen key	SW 4		005445 ●

Feed speed v_f depending on cutting depth a_p



Workpiece material: Plastic coated chipboard

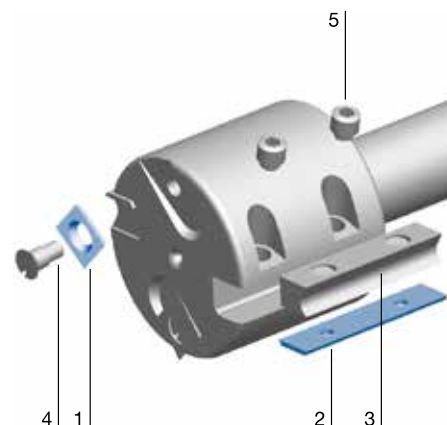
Operation: Jointing

Speed: $n = 16000 \text{ min}^{-1}$

Correction factor for v_f : MDF = 0.9;

Paper coated = 0.8;

Machining across grain = 0.7



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