

Mini MILLHOG®

*I.D. Clamping Pipe and Tube
Portable Beveling Tool
1.25" I.D. to 6.625" O.D.
31.8 mm I.D. to 168.3 mm O.D.*

Bevels heavy wall pipe or tube, is fast, chatter-free and easy to use...

Key Features

- Tool rigidly mounts to pipe or tube I.D.
- Self-Centering
- Heavy duty spur gear drive train delivers optimum rpm, torque and maximum durability
- One mandrel covers the majority of the tool's range
- EscoLock cutter blade holding system achieve chatter-free bevels on tough tube and pipe alloys
- Removes tube stub welds and prepares the header
- Removes tube weld overlay and cladding
- Torque-free
- Choice of pneumatic or electric motors
- Produces clean continuous chip without cutting fluids
- Lightweight and simple to operate and maintain

Rugged, Fast and Reliable

The Mini MILLHOG® is a ruggedly built beveling tool with a spur gear drive train and bevels all tube and pipe alloys to 6.625" O.D. It's combination of rpm and torque also make it ideal for tube stub weld removal and tube overlay and cladding removal.

All clamping components including the draw rod are heat treated and provide the strength to rigidly secure the tool on the inside diameter of the tube or pipe. The EscoLock cutter blade holding system securely holds the cutters in the tool post and helps reduce chatter and produce a clean, continuous chip on most pipe and tube alloys without cutting fluids.

Easy to operate and maintain, this tool delivers a lot of performance in a small package and is available with either a pneumatic or electric motor.

Pneumatic



Electric



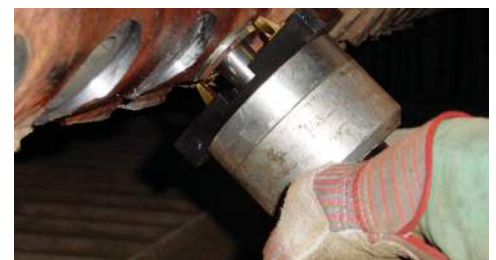
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Electric and Pneumatic motors offer plenty of power for end prepping a wide range of pipe and tube alloy.



Overlay is removed from new and existing tubes and their ends are prepared for welding to new tubes.



Portable, for on-site and tube beveling. Tube stub weld removal from header also prepares the header for new tube installation.

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Available for Sale or Rent • www.escotool.com

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Two Mandrels are offered, with the 1.80" is standard. The 1.25" Mandrels can be substituted or ordered as optional equipment. The 1.25" Mandrel uses the H Series Clamps.

Mini Clamp Rib Selector and Corresponding Spares Clamp Rib Sets, Mandrel, Draw Rod, Actuator, Roll Pin, Retention Band and Springs

Clamp Set	I.D. Range				Mandrel		Draw		Roll	Retention
	in		mm		Part #	Size	Rod	Actuator	Pin	Spring
H-01	1.250	1.600	31.8	40.6	M-361	1.250	M-65	H-12	H-11	H-14B
H-02	1.525	1.925	38.8	48.9	M-361	1.250	M-65	H-12	H-11	H-14B
M-01	1.800	2.270	45.8	57.6	M-36	1.800	M-53	M-46	M-47	M-52
M-02	2.240	2.695	56.9	68.4	M-36	1.800	M-53	M-46	M-47	M-52
M-03	2.665	3.120	67.7	79.2	M-36	1.800	M-53	M-46	M-47	M-52
M-04	3.050	3.500	77.4	88.9	M-36	1.800	M-53	M-46	M-47	M-52
M-02 & M-05	3.415	3.865	86.7	98.1	M-36	1.800	M-53	M-46	M-47	M-52
M-03 & M-05	3.780	4.230	96.0	107.4	M-36	1.800	M-53	M-46	M-47	M-52
M-04 & M-05	4.145	4.595	105.3	116.7	M-36	1.800	M-53	M-46	M-47	M-52
M-02 & M-08	4.510	4.960	114.5	126.0	M-36	1.800	M-53	M-46	M-47	M-52
M-03 & M-08	4.875	5.325	123.8	135.2	M-36	1.800	M-53	M-46	M-47	M-52
M-04 & M-08	5.240	5.690	133.1	144.5	M-36	1.800	M-53	M-46	M-47	M-52
M-02 & M-11	5.605	6.055	142.3	153.8	M-36	1.800	M-53	M-46	M-47	M-52
M-03 & M-11	5.970	6.420	151.6	163.0	M-36	1.800	M-53	M-46	M-47	M-52



M Series Clamp Ribs
M-01, M-02, M-03 and M-04



M Series Clamp Pads
M-05, M-08 and M-11



H Series Clamp Ribs
H-01 and H-02



1.8" Mandrel
M-36



1.2" Mandrel
M-361



Roll Pin, Actuator, Draw Rod and
Retention Spring
H-11, H-12, M-53 and H-14B



Roll Pin, Actuator, Draw Rod and
Retention Spring
M-47, M-46, M-53 and M-52

Tool Post

Tool Post Part #	Size		Blade Lock		Blade Lock Screw	
	in	mm	Part #	Qty	Part #	Per Lock
M-68	6.625	168.3	M-48	8	M-51	1
M-68A	4.5	114.3	M-48	6	M-51	1

The Tool Post rigidly holds up to two different Cutter Blades. It can accommodate a bevel and face Cutter Blade simultaneously and a third post can be added for other bevel functions. Numerous variations of tool post options are available. Please consult the factory with your application.

The blade locks and the double threaded (right and left hand) blade lock screws produce unmatched holding force and hold the Cutter Blades rigidly in the tool post.



Tool Post
M-68



Tool Post
M-68A



Blade Lock and Blade
Lock screw
M-48 and M-51



Tool Post M-68 Shown

Mini Membrane Removal Heads

Membrane Head		Base Head		Inserts	
Size	Part #	Part #	Part #	Qty	
2.5	MO-113	MMB-113	MRB-8	7	
2.75	MO-114	MMB-113	MRB-8	7	
3	MO-115	MMB-113	MRB-8	8	



Base Head
MMB-113



Base Head with bevel blade
and Membrane head.



Mini Overlay Removal Heads

Overlay Head		Base Head		Inserts	
Size	Part #	Part #	Part #	Qty	
2.5	MO-213	MMB-113	MRB-8	7	
2.75	MO-214	MMB-113	MRB-8	7	
3	MO-215	MMB-113	MRB-8	8	



Membrane Heads
MO-113, MO-114 and MO-115



Overlay Heads
MO-213, MO-214 and MO-215

Membrane and Overlay removal heads fit over the tube O.D. and remove the membrane from between boiler waterwall tubes. Additionally, Overlay Heads remove cladding and weld overlay from the tube O.D.

Membrane and Membrane/Overlay heads look similar but Overlay heads have a slightly smaller diameter. Both share a common base head.

The Golf T shaped insert has a precision ground cutting edge that gets under the surface of the material being removed and transfers heat away from the milling action. This allows it to run relatively cool without cutting fluids. It features a tapered shank that slides into a corresponding hole in the Membrane or Membrane/Overlay Head and, with a tap and small hammer, it is easily secured. Just as quickly, it can be removed and rotated to take advantage the multiple cutting surfaces the round insert offers.

Specifications: Mini MILLHOG®

Working Range		1.250in (31.8 mm) I.D. to 6.625in (168.3 mm) O.D.	
Motor	Pneumatic		Electric
	1.25 hp (932 W)	90 psi (6.2 bar)	120 V AC 50/60 Hz 1800 W, or 230 V AC 50/60 Hz 1800 W
Speed	40 cfm (1133 lt/min)	55 rpm	19 rpm - 66 rpm
Minimum Clearance	6.625in (168.3 mm)		6.625in (168.3 mm)
	5.30in (134.6 mm)		5.30in (134.60 mm)
Head Length	14.25in (362 mm)		14.25in (362 mm)
Working Weight	27.5 lbs (12.5 kg)		38.8 lbs (17.6 kg)
Shipping Weight	65 lbs (29.5 kg)		75lbs (34.5 kg)
Shipping Dimensions	(17in x 31in x 6in)		(24in x 21in x 7in)
	431.8 mm x 787.5 mm x 152 mm		610 mm x 533.48 mm x 178 mm