CONQUEST® Flangeless Piping



Tooling used for Fabricating 1" - 4" CONQUEST Flangeless Piping

Flangeless piping products lined with polypropylene (PP), polyvinylidene fluoride/hexafluoropropylene copolymer (PVDF/HFP), and polytetrafluoroethylene (PTFE), in 1" through 4" diameter sizes, are available from RESISTOFLEX. Additionally, RESISTOFLEX offers perfluoroalkoxy (PFA) flangeless piping in 1", 1-1/2", and 2" diameter sizes. This bulletin explains the tooling used to field fabricate and install CONQUEST flangeless piping.

Equipment Type	Item No.	Tooling Description	Resistoflex Part No.¹	Supplier Model / Part No.	Supplier Information
Tool Sets					
	1a	Complete set of fabrication tools for 1" - 2" diameter sizes ²	7219819	N/A	N/A
	1b	Complete set of fabrication tools for 3" - 4" diameter sizes ²	7219835	N/A	N/A
	1c	Complete set of fabrication tools for 1" - 4" diameter sizes ²	7219827	N/A	N/A
Pipe Cutting Equipment					
	2a	Ridgid Heavy-Duty Pipe Cutter for 1/8" - 2" pipe is used on small jobs for making cut-backs on steel pipe sections and on MULTI-AXIS® pipe. The Ridgid cutter can also be used in a pipe truss or rack for making cut-backs.	7218944	2-A/32820	Ridgid Tool Co. 400 Clark St.Elyria, OH 44036 216-329-4043
	2b	Ridgid Heavy-Duty Pipe Cutter for 2" - 4" pipe is used on small jobs for making cut-backs on steel pipe sections and on MULTI-AXIS pipe. The Ridgid cutter can also be used in a pipe truss or rack for making cut-backs.	7219793	4-S/32840	

¹ Items with Resistoflex Part No. are available for lease. Other tooling must be purchased directly from the supplier.

² Must specify liner types being welded. Choices are A) PP & PVDF/HFP or B) PTFE & PFA.

Equipment Type	Item No.	Tooling Description	Resistoflex Part No.¹	Supplier Model / Part No.	Supplier Information
McElroy Butt-Fusion Welding Equipment					
	3	Special Number 14 Butt-Fusion Welder is used for butt-welding plastic liners. It can be used on the ground or in the piping truss.	0400879	426801	McElroy Manufacturing, Inc. 833 N. Fulton Tulsa, OK 74115 918-836-8611
	4a	Multi-Mc Butt-Fusion Heater Assembly is used to heat the plastic liner for PP and PVDF.	0400887	242304	
31	4b	Multi-Mc Butt-Fusion Heater Assembly is used to heat the plastic liner for PTFE and PFA.	0118978	N/A	
	5	Butt-Fusion Adapters are anti-stick plates mounted to the heater that prevent the plastic from adhering to the heater for PP and PVDF. Replacement heater plates for 4a.	0400895	A425201	
M	6	Heater Sling insulates and protects the Multi-Mc butt-fussion heater for Item 4a.	0400903	MJQ00041	

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McElroy Butt-Fusion Welding Equipment					
	7	Pipe Facer is used to square and clean the plastic ends of the pipe.	0400937	426701	McElroy Manufacturing, Inc. 833 N. Fulton Tulsa, OK 74115 918-836-8611
9999	8	IPS 1" Insert is affixed to the IPS 2" insert and is mounted in the welding unit to accommodate 1" plastic-lined pipe.	0400952	427801	
9999	9	IPS 1.5" Insert is affixed to the IPS 2" insert and is mounted in the welding unit to accommodate 1.5" plastic-lined pipe.	0400960	427901	
eeee	10	IPS 2" Insert is mounted in the welding unit to accommodate 2" plastic-lined pipe.	0400978	428001	
	11	IPS 3" Insert is mounted in the welding unit to accommodate 3" plastic-lined pipe.	0400986	428101	
END OF SPILE PIPE OF JUST OF J	12a	Pipe Stand-Off Gauge is used to set the length of the pipe exposed from the inside surface of the welding unit pipe clamp. This sets the amount of plastic shaved off the liner during facing for PP, PVDF/HFP, & PFA.	0400945	427701	
DAY	12b	Pipe Stand-Off Gauge is used to set the length of the pipe exposed from the inside surface of the welding unit pipe clamp. This sets the amount of plastic shaved off the liner during facing for PTFE.	0119776	N/A	

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Equipment Type	Item No.	Tooling Description	Resistoflex Part No.¹	Supplier Model / Part No.	Supplier Information
Installation Equipment					
	13a	LOKTOOL Installation Tool Kit for RESISTOFLEX 1", 1.5", and 2" Plastic-Lined Pipe is used to install the coupling.	0400853	MTK60- Resistoflex- F/R-P16/P24/- P32	Lokring Corp.3 96 Hatch Drive Foster City, CA 94404 918-836-8611
	13b	Installation Tool Kit for RESISTOFLEX 3" and 4" Plastic- Lined Pipe is used to install the coupling.	7219777	N/A	
	14a	Enerpac 1/2 H.P. Portable Electric-Powered Pump is used to drive the Lokring tooling: 10,000 psi. Used for 1" - 2" diameter sizes.	7218928	PUD-1100B	Enerpac 13000 W. Silver Spring Dr. Butler, WI 53007 800-558-0530 414-781-6600
	14b	Enerpac 1/2 H.P. Portable Electric-Powered Pump is used to drive the Lokring tooling: 12,000 psi.	7219785	PME-10027	
Miscellaneous Tools		Used for 1" - 2" diameter sizes.			
and Equipment					
	15	Ridgid Jack Pipe Stand or equivalent is used to support pipe for making cut-backs on the steel and fabricating piping assemblies on the ground.	0118981	VJ-98/56657	Ridgid Tool Co. 400 Clark St.Elyria, OH 44036 216-329-4043
	16	Ridgid Ball Transfer Head or equivalent is an accessory to the pipe stand that permits pipe to freely slide back and forth.	Order from Supplier	BTH-9/37997	
	17	Hack Saw Frame or equivalent is used for small volume pipe cutting. The Redgid cutter is used first to penetrate the steel, the hack saw is used to complete the cut.	0122174		
	18	Cold chisel	0122173		
1	19	16 oz. Ball Peen Hammer w/Wood Handle or equivalent is used for tapping off steel rings after completing cut-backs on pipe sections.	0122172	N/A	N/A
	20	Plastic Bucket w/Handle, 5-gallon capacity is used to carry the McElroy heater and sling.	0122180		
	21	Vice Grip 12LC	0122178		

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Miscellaneous Tools and Equipment cont'					
	22	1/2" Drive Ratchet is used for turning blades when the facer handle has to be removed because of interference with piping.	0122176	N/A	N/A
	23	7/8" Socket or equivalent is used with 1/2" drive ratchet.	0122177		
	24	Alignment Brackets used to hold PFA film when welding together PTFE liners.	0119693		
	25	Wind Deterrent Chamber used primarily for outside installations to insulate liner ends during welding.	0121355		

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