MIG (GMAW) AND FLUX CORED (FCAW) WELDING



FUME EXTRACTION MIG GUN

APPLICATIONS	Heavy Equipment
PROCESSES	• MIG (GMAW) • Flux Cored (FCAW)
WIRE SIZE	• 0.023"- 3/32" (0.06mm-2.4mm)
RATED OUTPUT	•300A •400A •500A
DUTY CYCLE	• 60% with Mixed Gases

Closely matching the weight, handle size and industrial-grade performance as Bernard® BTB Semi-Automatic Air-Cooled MIG Guns, the Bernard® Clean Air™ Fume Extraction MIG Gun is an industrial duty capture solution that helps to provide a cleaner, more compliant work environment.

Choose between:
AccuLock™, Centerfire™
and TOUGH LOCK™
Consumables



- Suitable for use with solid and flux-cored wire
- Compatible with vacuum systems from most major manufacturers
- Crush- and snag-resistant vacuum hose has threaded connections for easy replacement and eliminates the need for a protective cover
- Suction Control Valve allows balance of suction with shielding gas flow to protect against porosity
- Rubber overmold on straight handle model provides comfort and control



CONFIGURE YOUR
MIG GUN ONLINE
BUILD YOUR FUME EXTRACTION GUN
TO MATCH YOUR APPLICATION

 $\Diamond \Diamond$

IMPROVED FLEXIBILITY REDUCED WRIST FATIGUE REDUCE WRIST AND HAND FATIGUE WITH HOSE SWIVEL

CONSUMABLES

(AVAILABLE THROUGH CONFIGURATOR)

ACCULOCK™ S CONSUMABLE SERIES

Contact Tip	s	Nozzles – I	_arge	Nozzles – I	_arge
T-A035CH T-A045CH T-A052CH T-A062CH	0.035" (0.9 mm) 0.045" (1.2 mm) 0.052" (1.4 mm) 1/16" (1.6 mm)	N-A3400C N-A3418C N-A3414C N-A3418B	3/4" bore, flush, copper 3/4" bore, 1/8" recess, copper 3/4" bore, 1/4" recess, copper 3/4" bore, 1/8" recess, brass	N-A5800C N-A5818C N-A5814C N-A5818B	5/8" bore, flush, copper 5/8" bore, 1/8" recess, copper 5/8" bore, 1/4" recess, copper 5/8" bore, 1/8" recess, brass
		N-A3414B Nozzles — \$		N-A5814B Nozzles — S	
		NS-A5800C NS-A5818C NS-A5800B NS-A5818B NS-A1200B NS-A1218B	5/8" bore, flush, copper 5/8" bore, 1/8" recess, copper 5/8" bore, flush, brass 5/8" bore, 1/8" recess, brass 1/2" bore, flush, brass 1/2" bore, 1/8" recess, brass	NS-A1218C NST-A3800B NST-A3818B NST-A38XTB NST-A1218B	1/2" bore, 1/8" recess, copper 3/8" bore, flush, brass 3/8" bore, 1/8" recess, brass 3/8" bore, 1/8" ext., brass 1/2" bore, 1/8" recess, brass

Diffusers	For use with Front Load Liners
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Diffusers For use with Bernard® Rear Laod Liners

D-A1	Large, brass, thread-on	DS-A1	Small, brass, thread-on	D-A1-C	Large, brass, thread-on	DS-A1-C	Small, brass, thread-on
D-A2	Large, brass, slip-on	DS-A2	Small, brass, slip-on	D-A2-C	Large, brass, slip-on	DS-A2-C	Small, brass, slip-on

CENTERFIRE™ CONSUMABLE SERIES

Contact 1	Гірѕ			Nozzles		Diffusers	
T-023	0.023" (0.6 mm)	T-062	1/16" (1.6 mm)	N-5818C	5/8" Bore, 1/8" Recess, Copper	DS-1*	Small, Brass
T-030	0.030" (0.8 mm)	T-072	0.072" (1.8 mm)	N-5814C	5/8" Bore, 1/4" Recess, Copper	D-1	Large, Brass
T-035	0.035" (0.9 mm)	T-078	5/64" (2.0 mm)	N-3414C	3/4" Bore, 1/4" Recess, Copper		
T-039	0.039" (1.0 mm)	T-094	3/32" (2.4 mm)	NS-1218B*	1/2" Bore, 1/8" Recess, Brass	Nozzle Sh	rouds
T-045	0.045" (1.2 mm)			NS-1218C*	1/2" Bore, 1/8" Recess, Copper	1390132*	Standard (long)
T-052	0.052" (1.4 mm)			NS-5818C*	5/8" Bore, 1/8" Recess, Copper	1390134	Standard (long)
						1390142	Short (not configurable;
* FOR 300 AN	MP ONLY						purchase separately)

TOUGH LOCK® CONSUMABLE SERIES

Contact Tip	os		Nozzles		Retaining	Head
403-20-30	0.030" (0.8 mm)	403-20-1.4 0.055" (1.4 mm)	401-6-62	5/8" Bore, 1/8" Recess, Copper	404-44	Brass
403-20-35	0.035" (0.9 mm)	403-20-116 1/16" (1.6 mm)	401-5-75	3/4" Bore, 1/4" Recess, Copper		
403-20-1.0	0.040" (1.0 mm)	403-20-1.8 0.070" (1.8 mm)				
403-20-45	0.045" (1.2 mm)	403-20-78 0.078" (2.0 mm)			Nozzle Sh	rouds
403-20-364	3/64" (1.2 mm)	403-20-564 5/64" (2.0 mm)			1390135	Standard (long)
403-20-52	0.052" (1.3 mm)				1390142	Short (not configurable;
						purchase separately)

LINERS

(AVAILABLE THROUGH CONFIGURATOR)

FRONT-LOAD LINERS

SEE ACCULOCKTM S CONSUMABLES SPEC SHEET (SP-ALS) FOR PART NUMBERS AND MORE INFORMATION AND ADDITIONAL OPTIONS THAT CAN BE ORDERED SEPERATELY.

REAR LOAD LINER

10' (3.05	10' (3.05 m) Gun Lengths	15' (4.57 n	n) Gun Lengths	25' (7.62 n	25' (7.62 m) Gun Lengths		
L3A-10	for 0.035" - 0.045" wire	L2A-15	for 0.030" - 0.035" wire	L2A-25	for 0.030" - 0.035" wire		
L4A-10	for 0.045" - 1/16" wire	L3A-15	for 0.035" - 0.045" wire	L3A-25	for 0.035" - 0.045" wire		
		L4A-15	for 0.045" - 1/16" wire	L4A-25	for 0.045" - 1/16" wire		
		L6A-15	for 5/64" wire	L7A-25	for 3/32" wire		
		L7A-15	for 3/32" wire				

NECK ASSEMBLIES

(AVAILABLE THROUGH CONFIGURATOR)

The below neck assembly part numbers include both the neck and vaccum tube assembly.

NECKS FOR STRAIGHT HANDLE MODEL

2390049 45°, Medium **2390050** 60°, Medium

POWER PINS

(AVAILABLE THROUGH CONFIGURATOR)

MILLER®	EURO™	LINCOLN®
MILLERS	EURU	LINLULNS

POWER PINS SHOWN ARE FOR USE WITH REAR LOAD LINERS ONLY.

2520077	Strain Relief	2520080	Strain Relief	2520077	Strain Relief
2200137	Power Pin (Includes O-Rings)	5060T	Euro Block Assembly	214-2-1	Power Pin
214-116	Power Pin Tip for 0.023"-1/16"	4816	Adapter Nut	414-400-35	Power Pin Insulator
214-332	Power Pin Tip for 5/64"-3/32"			GLM1	Gas Line Assy.
214-9	Power Pin Tip for 7/64"-1/8"			SCL1N	Trigger Control Plug
GN2021	Trigger Control Plug				

TWEC0® #4 TWEC0® #5

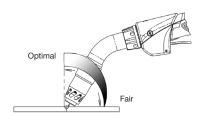
2520077	Strain Relief	2520077	Strain Relief
214	Power Pin (Includes O-Rings)	214-12	Power Pin (Includes O-Rings)
414-400-30	Power Pin Insulator	414-400-29	Power Pin Insulator
GN2021	Trigger Cable Adaptor, Miller®	GN2021	Trigger Control Plug, Miller®
SCT1N	Trigger Control Lead, Standard	SCT1N	Trigger Control Lead, Standard
SCL1N	Trigger Control Lead, Lincoln®	SCL1N	Trigger Control Lead, Lincoln®
SCX1N	Trigger Control Plug, NAS Plug	SCX1N	Trigger Control Plug, NAS Plug

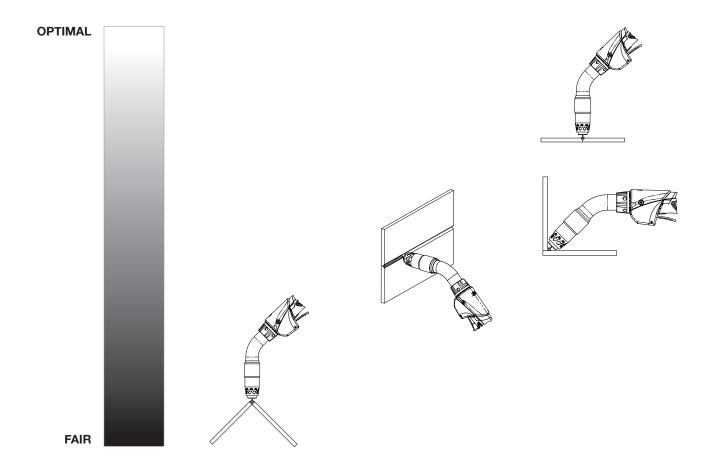
SEE ACCULOCK™ S CONSUMABLES SPEC SHEET (SP-ALS) FOR POWER PIN PART NUMBERS AND INFORMATION WHEN USING FRONT LOAD LINERS.

FUME CAPTURE OPTIMIZATION

Follow the diagram below for optimizing the efficiency of fume capture when welding with a fume extraction MIG gun. The joints and positions of welds will affect the efficiency of fume capture.

Optimal capture efficiency is achieved when fume gun is positioned directly above the weld puddle.





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NOTES

ORDERING INFORMATION

Amperage	Cable Length	Handle & Trigger	Neck	Contact Tip	Wire	e Size	Power Pin	Liner
C L 3 0	15	N	J	8		E	M	С
CL30 300 amp Max. wire size 5/64" CL40 400 amp Max. wire size 5/64" CL50 500 amp Max. wire size 3/32"	10 10' (3.05 m) 15 15' (4.57 m) 20 20' (6.16 m) 25 25' (7.63 m)	N Straight Std Trigger	J Fixed, Med. 45° K Fixed, Med. 60°	3 TOUGH LOCK® Heavy Duty 4 AccuLock™ S ^{††} 8 Centerfire™ 9 AccuLock™ S ^{††}	C (D (E (0.030" 0.035" 0.039" 0.045" 0.052" 1/16"	L Lincoln® M Miller® S Tweco® (Lincoln lead) T Tweco® #4 (std. lead) U Tweco® #4	A Front Load Liner**** C Rear Load Liner
AVAILABLE WITH 300 A "AVAILABLE WITH CUR "AVAILABLE WITH CEN" "ACOMPATIBLE WITH V NOT COMPATIBLE WITH † NOT COMPATIBLE WITH † ONLY AVAILABLE WI MUST BE USED WITH F	NAMES SHOWN ABOVE MP AND 400 AMP MOD IVED HANDLE MODEL O TERFIRE CONTACT TIP (VIRE SIZES BETWEEN 0. H WIRE SIZE OPTIONS F TH ACCULOCK S CONT. TH MILLER®, LINCOLNO RONT LOAD LINERS. BERNARD REAR LOAD	ELS ONLY. NLY. OPTION ONLY. 023" AND 3/32" AND C OR ALUMINUM. ACT TIP, CONFIGURATI 9, TWECO® #4 AND TV	CABLE LENGTHS UP OR 4 OPTION. VECO #5 POWER PIP	TO 15' (4.57 M);	ALUM Q R	5/64" 3/32" MINUM† 0.035" 3/64" 1/16"	(NAS Plug) W Tweco® #5 (std. lead)	

BERNARD®, ACCULOCK™, CENTERFIRE™, CLEAN AIR™ ARE TRADEMARKS OF BERNARD, A DIVISION OF MILLER ELECTRIC MFG. LLC TREGASKISS® AND TOUGH LOCK™ ARE TRADEMARKS OF TREGASKISS, A DIVISION OF ITW CANADA INC.

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