

# Clean Air™ Fume Extraction MIG Gun

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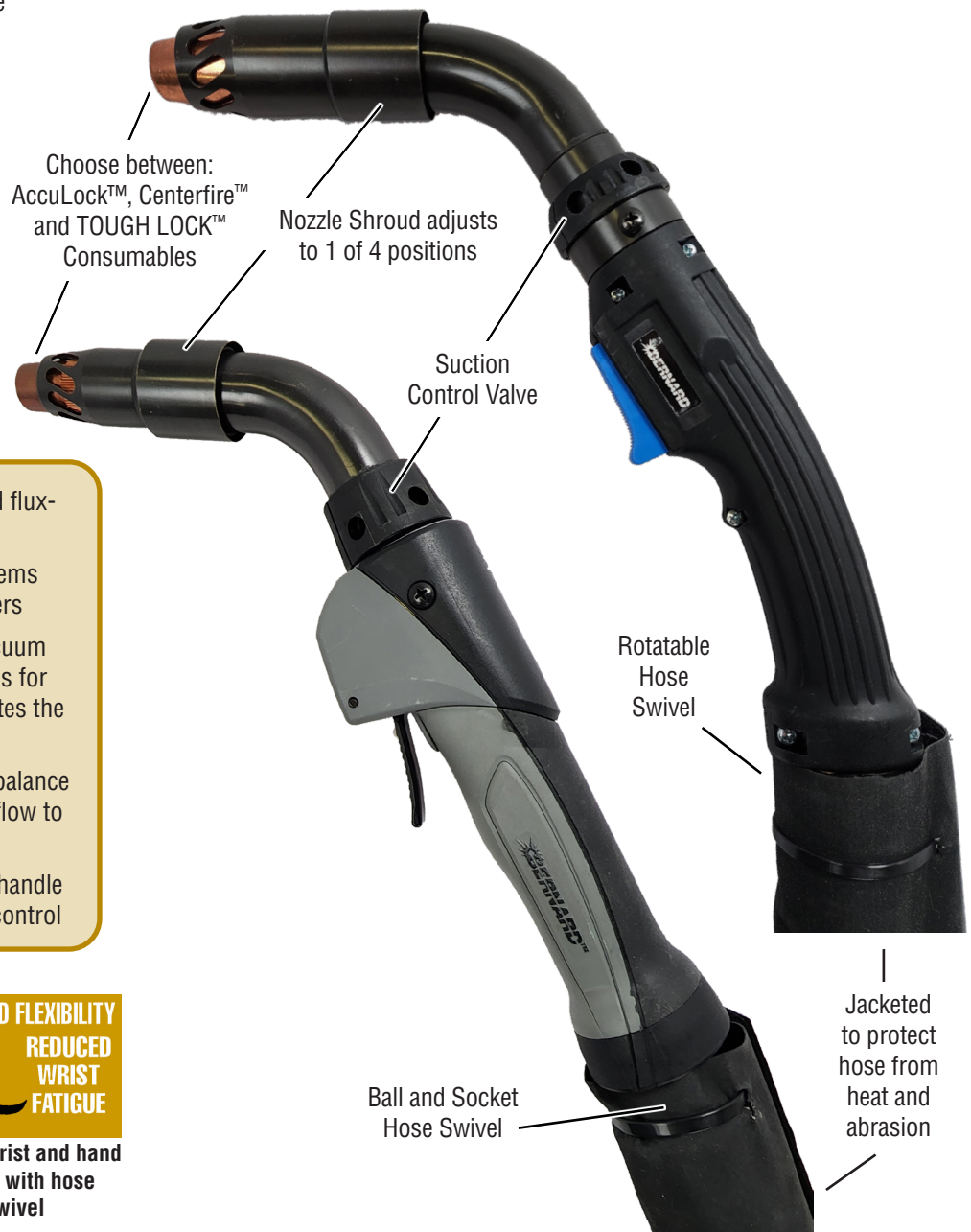
Fume Extraction  
MIG Welding Guns



<b>Quick Specs</b>	<b>Applications</b>	<b>Processes</b>	<b>Wire Size</b>	<b>Rated Output</b>
	Heavy Equipment Shipbuilding & Repair Fabrication	MIG (GMAW) Flux Cored (FCAW)	0.023" - 1/8" (0.06 mm - 3.2 mm)	300A, 400A 500A, 600A
				<b>Duty Cycle</b>
				100% CO <sub>2</sub> Gas 60% Mixed Gas

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.

Now with **even more options** to meet the needs of your welding application, Clean Air Guns are fully configurable with your choice of straight handle or **new curved handle**.

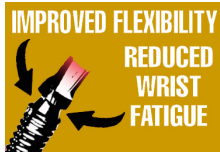


- Suitable for use with solid and flux-cored wire
- Compatible with vacuum systems from most major manufacturers
- Crush- and snag-resistant vacuum hose has threaded connections for easy replacement and eliminates the need for a protective cover
- Suction Control Valve allows balance of suction with 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



**IMPROVED FLEXIBILITY  
REDUCED  
WRIST  
FATIGUE**

Reduce wrist and hand fatigue with hose swivel



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## AccuLock™ S Consumable Series

### Contact Tips

<b>T-A035CH</b>	0.035" (0.9 mm)
<b>T-A045CH</b>	0.045" (1.2 mm)
<b>T-A052CH</b>	0.052" (1.4 mm)
<b>T-A062CH</b>	1/16" (1.6 mm)

### Nozzles — Large

<b>N-A3400C</b>	3/4" bore, flush, copper
<b>N-A3418C</b>	3/4" bore, 1/8" recess, copper
<b>N-A3414C</b>	3/4" bore, 1/4" recess, copper
<b>N-A3418B</b>	3/4" bore, 1/8" recess, brass
<b>N-A3414B</b>	3/4" bore, 1/4" recess, brass

### Nozzles — Small

<b>NS-A5800C</b>	5/8" bore, flush, copper
<b>NS-A5818C</b>	5/8" bore, 1/8" recess, copper
<b>NS-A5800B</b>	5/8" bore, flush, brass
<b>NS-A5818B</b>	5/8" bore, 1/8" recess, brass
<b>NS-A1200B</b>	1/2" bore, flush, brass
<b>NS-A1218B</b>	1/2" bore, 1/8" recess, brass

### Nozzles — Large

<b>N-A5800C</b>	5/8" bore, flush, copper
<b>N-A5818C</b>	5/8" bore, 1/8" recess, copper
<b>N-A5814C</b>	5/8" bore, 1/4" recess, copper
<b>N-A5818B</b>	5/8" bore, 1/8" recess, brass
<b>N-A5814B</b>	5/8" bore, 1/4" recess, brass

### Nozzles — Small

<b>NS-A1218C</b>	1/2" bore, 1/8" recess, copper
<b>NST-A3800B</b>	3/8" bore, flush, brass
<b>NST-A3818B</b>	3/8" bore, 1/8" recess, brass
<b>NST-A38XTB</b>	3/8" bore, 1/8" ext., brass
<b>NST-A1218B</b>	1/2" bore, 1/8" recess, brass

### Diffusers - For use with AccuLock S Liners (front-loading)

<b>D-A1</b>	Large, brass, thread-on	<b>DS-A1</b>	Small, brass, thread-on
<b>D-A2</b>	Large, brass, slip-on	<b>DS-A2</b>	Small, brass, slip-on

### Diffusers - For use with Bernard® Conventional Liners (rear-loading)

<b>D-A1</b>	Large, brass, thread-on	<b>DS-A1</b>	Small, brass, thread-on
<b>D-A2</b>	Large, brass, slip-on	<b>DS-A2</b>	Small, brass, slip-on

## Centerfire™ Consumable Series

### Contact Tips

<b>T-023</b>	0.023" (0.6 mm)	<b>T-062</b>	1/16" (1.6 mm)
<b>T-030</b>	0.030" (0.8 mm)	<b>T-072</b>	0.072" (1.8 mm)
<b>T-035</b>	0.035" (0.9 mm)	<b>T-078</b>	5/64" (2.0 mm)
<b>T-039</b>	0.039" (1.0 mm)	<b>T-094</b>	3/32" (2.4 mm)
<b>T-045</b>	0.045" (1.2 mm)		
<b>T-052</b>	0.052" (1.4 mm)		

\* For 300 amp only

### Nozzles

<b>N-5818C</b>	5/8" Bore, 1/8" Recess, Copper
<b>N-5814C</b>	5/8" Bore, 1/4" Recess, Copper
<b>N-3414C</b>	3/4" Bore, 1/4" Recess, Copper
<b>NS-1218B*</b>	1/2" Bore, 1/8" Recess, Brass
<b>NS-1218C*</b>	1/2" Bore, 1/8" Recess, Copper
<b>NS-5818C*</b>	5/8" Bore, 1/8" Recess, Copper

### Diffusers

<b>DS-1*</b>	Small, Brass
<b>D-1</b>	Large, Brass

### Nozzle Shrouds

<b>1390132*</b>	Standard (long)
<b>1390134</b>	Standard (long)
<b>1390142</b>	Short ( <i>not configurable; purchase separately</i> )

## TOUGH LOCK® Consumable Series

### Contact Tips

<b>403-20-30</b>	0.030" (0.8 mm)	<b>403-20-1.4</b>	0.055" (1.4 mm)
<b>403-20-35</b>	0.035" (0.9 mm)	<b>403-20-116</b>	1/16" (1.6 mm)
<b>403-20-1.0</b>	0.040" (1.0 mm)	<b>403-20-1.8</b>	0.070" (1.8 mm)
<b>403-20-45</b>	0.045" (1.2 mm)	<b>403-20-78</b>	0.078" (2.0 mm)
<b>403-20-364</b>	3/64" (1.2 mm)	<b>403-20-564</b>	5/64" (2.0 mm)
<b>403-20-52</b>	0.052" (1.3 mm)		

### Nozzles

<b>401-6-62</b>	5/8" Bore, 1/8" Recess, Copper
<b>401-5-75</b>	3/4" Bore, 1/4" Recess, Copper

### Retaining Head

<b>404-44</b>	Brass
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### Nozzle Shrouds

<b>1390135</b>	Standard (long)
<b>1390142</b>	Short ( <i>not configurable; purchase separately</i> )

## Liners

(available through configurator)

### AccuLock™ S Liners (front-loading)

See AccuLock S Consumables spec sheet ([SP-ALS](#)) for part numbers and more information and additional options that can be ordered separately.

#### Conventional Liner

##### 10' (3.05 m) Gun Lengths

<b>L3A-10</b>	for 0.035" - 0.045" wire
<b>L4A-10</b>	for 0.045" - 1/16" wire

##### 15' (4.57 m) Gun Lengths

<b>L1A-15</b>	for 0.023" - 0.030" wire
<b>L2A-15</b>	for 0.030" - 0.035" wire
<b>L3A-15</b>	for 0.035" - 0.045" wire
<b>L4A-15</b>	for 0.045" - 1/16" wire
<b>L6A-15</b>	for 5/64" wire
<b>L7A-15</b>	for 3/32" wire
<b>L8A-15</b>	for 7/64" - 1/8" wire

##### 25' (7.62 m) Gun Lengths

<b>L1A-25</b>	for 0.023" - 0.030" wire
<b>L2A-25</b>	for 0.030" - 0.035" wire
<b>L3A-25</b>	for 0.035" - 0.045" wire
<b>L4A-25</b>	for 0.045" - 1/16" wire
<b>L7A-25</b>	for 3/32" wire
<b>L8A-25</b>	for 7/64" - 1/8" wire

## Neck Assemblies

(available through configurator)

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

#### Necks for Straight Handle Model

<b>2390049</b>	45°, Medium
<b>2390050</b>	60°, Medium

#### Necks for Curved Handle Model

<b>2390047</b>	45°, Medium
<b>2390048</b>	60°, Medium

## Power Pins

(available through configurator)

#### Miller®

<b>2520077</b>	Strain Relief
<b>2200137</b>	Power Pin (Includes O-Rings)
<b>214-116</b>	Power Pin Tip for 0.023"-1/16"
<b>214-332</b>	Power Pin Tip for 5/64"-3/32"
<b>214-9</b>	Power Pin Tip for 7/64"-1/8"
<b>GN2021</b>	Trigger Control Plug

#### Euro™

<b>2520080</b>	Strain Relief
<b>5060T</b>	Euro Block Assembly
<b>4816</b>	Adapter Nut

#### Lincoln®

<b>2520077</b>	Strain Relief
<b>214-2-1</b>	Power Pin
<b>414-400-35</b>	Power Pin Insulator
<b>GLM1</b>	Gas Line Assy.
<b>SCL1N</b>	Trigger Control Plug

#### Tweco® #4

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

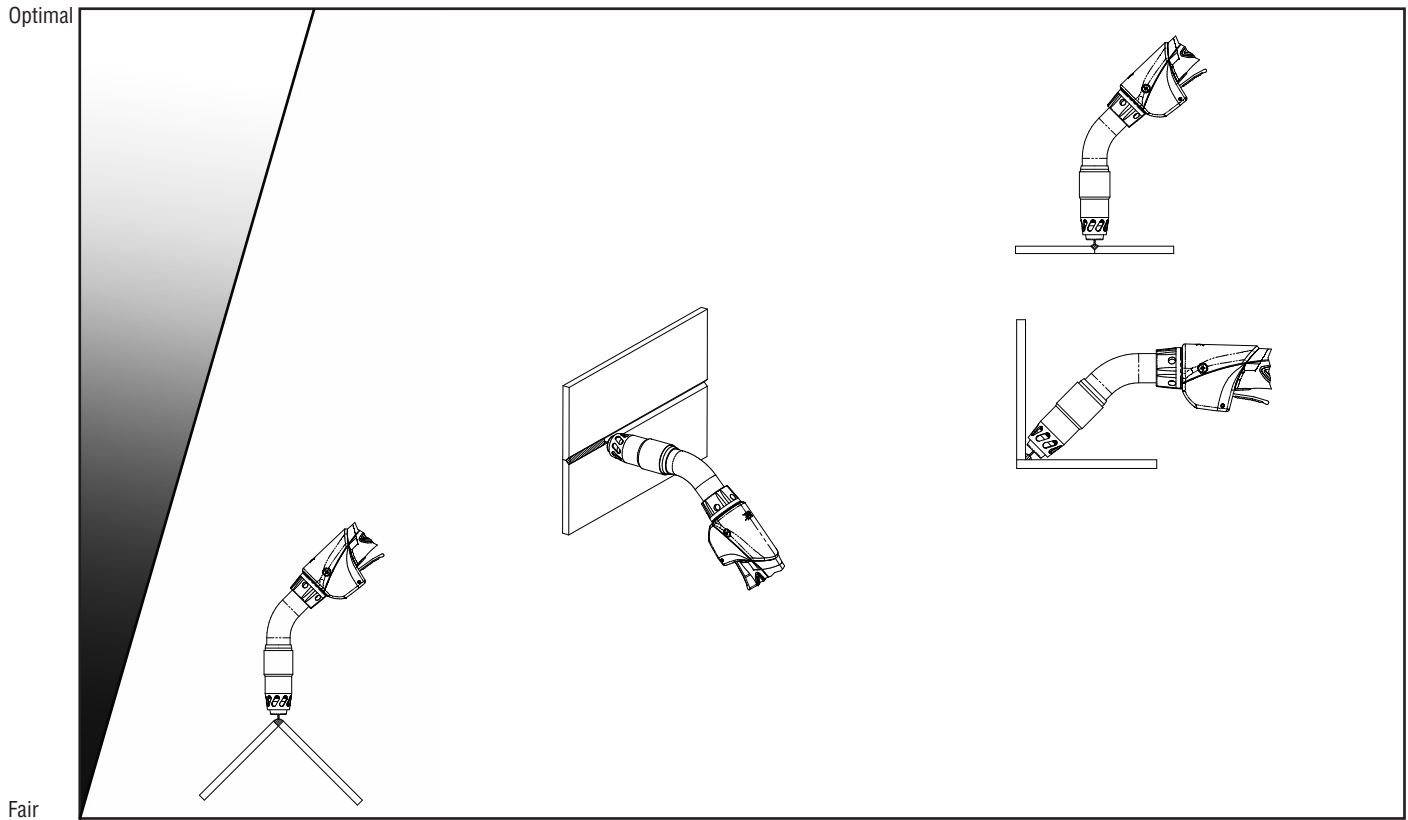
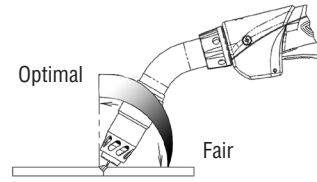
#### Tweco #5

<b>2520077</b>	Strain Relief
<b>214-12</b>	Power Pin (Includes O-Rings)
<b>414-400-29</b>	Power Pin Insulator
<b>GN2021</b>	Trigger Control Plug, Miller
<b>SCT1N</b>	Trigger Control Lead, Standard
<b>SCL1N</b>	Trigger Control Lead, Lincoln
<b>SCX1N</b>	Trigger Control Plug, NAS Plug

# 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.





# Ordering Information

Amperage	Cable Length	Handle & Trigger	Neck	Contact Tip	Wire Size	Power Pin	Liner
<b>CL30</b>	<b>15</b>	<b>N</b>	<b>J</b>	<b>8</b>	<b>E</b>	<b>M</b>	<b>C</b>
<b>CL30</b> 300 amp <i>Max. wire size 5/64"</i>	<b>08</b> 8 ft. (2.44 m)	<b>N</b> Straight Std Trigger	<b>J</b> Fixed, Med. 45°	<b>3</b> TOUGH LOCK® Heavy Duty	<b>A</b> <sup>^</sup> 0.023" (.6 mm)	<b>E</b> Euro	<b>A</b> AccuLock S Liner <sup>††††</sup>
<b>CL40</b> 400 amp <i>Max. wire size 5/64"</i>	<b>10</b> 10 ft. (3.05 m)	<b>T*</b> Curved Std Trigger	<b>K</b> Fixed, Med. 60°	<b>4</b> AccuLock™ S <sup>††</sup>	<b>B</b> 0.030" (.8 mm)	<b>L</b> Lincoln®	<b>C</b> Conventional Liner
<b>CL50</b> 500 amp <i>Max. wire size 3/32"</i>	<b>12</b> 12 ft. (3.66 m)			<b>8</b> Centerfire™	<b>C</b> 0.035" (.9 mm)	<b>M</b> Miller®	
<b>CL60</b> 600 amp <i>Max. wire size 1/8"</i>	<b>15</b> 15 ft. (4.57 m)			<b>9</b> AccuLock S <sup>†††</sup>	<b>D</b> 0.039" (1.0 mm)	<b>S</b> Tweco® (Lincoln Lead)	
	<b>20</b> 20 ft. (6.16 m)				<b>E</b> 0.045" (1.2 mm)	<b>T</b> Tweco #4 (Std. Lead)	
	<b>25</b> 25 ft. (7.63 m)				<b>H</b> 0.052" (1.4 mm)	<b>U</b> Tweco #4 (NAS Plug)	
					<b>I</b> 1/16" (1.6 mm)	<b>W</b> Tweco #5 (Std. Lead)	
					<b>K</b> 5/64" (2.0 mm)		
					<b>L</b> 3/32" (2.4 mm)		
					<b>M</b> 7/64" (2.8 mm)		
					<b>N</b> 1/8" (3.2 mm)		
					<b>Aluminum</b> <sup>†</sup>		
					<b>Q</b> 0.035" (.9 mm)		
					<b>R</b> 3/64" (1.19 mm)		
					<b>S</b> 1/16" (1.6 mm)		

Brand and product names shown above are trademarks of their respective owners.

\*Available with 300 amp and 400 amp models only.

\*\* Available with curved handle model only.

^ Available with Centerfire contact tip option only.

^^ Compatible with wire sizes between 0.023" and 3/32" and cable lengths up to 15' (4.57 m); Not compatible with wire size options for aluminum.

† Not compatible with AccuLock S contact tip, configurator 4 option.

†† Only available with Miller®, Lincoln®, Tweco® #4 and Tweco #5 power pin options; Must be used with AccuLock S Liners.

††† Compatible with Bernard conventional liners on Miller Packages.

†††† Compatible with AccuLock contact tip option.

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Subject to Change - The information presented in this spec sheet is accurate to the best of our knowledge at the time of printing.  
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