

A welder wearing a black helmet with "REBEL" written on it, a yellow and black jacket, and ESAB gloves is welding a metal pipe. Bright sparks are flying from the welding point. The background is dark, suggesting an industrial setting.

# MIG GUNS, WELDING ACCESSORIES & CONSUMABLES 2019 CATALOG

**TWECO**  
AN ESAB BRAND

[esab.com](http://esab.com)

**Intentionally Left Blank**

## Tweco® - a world leader in welding for over 80 years.

In 1936, the Townsend Welding Equipment Company was born in the basement of Ray Townsend's Wichita, Kansas home. Since then, Tweco has grown to be a world leader in producing quality welding equipment and accessories. Tweco has produced more than two million MIG guns and is an industry leader in MIG guns and lead cables, manual arc welding electrode holders, consumables and accessories.

Still today, we strive to achieve what Ray Townsend began with a mission to provide our customers with quality, safe, and reliable products. Tweco products have been the reliable, dependable tools that everyone from the Do-It-Yourselfer to the expert welding professional has trusted. Tweco is the name you know you know and trust, for over 80 years.

ESAB® is a global manufacturer dedicated to developing innovative solutions for your cutting, gas control and specialty welding applications. With over a century of heritage of authenticity, innovation and a deep connection with end users, our brands include Victor®, Tweco®, Arcair®, Thermal Dynamics®, Stoodly®, TurboTorch®, Firepower® and CIGWELD®.

# EASY FIND GUIDE - Simplified Selection Guide

For your convenience and ease of use, we have incorporated a system in this catalog we call the **EASY FIND GUIDE**.

When you see this graphic symbol ...



It will refer you to a page where additional details and specifications can be found regarding the product you are interested in. The **EASY FIND GUIDE** will also provide information for Optional Accessories & Replacement Parts to improve the performance of your equipment.

## Icons

This catalog uses icons throughout to instantly identify features and basic product specifications. You might find it useful to

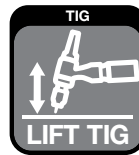
familiarize yourself with the symbols below to assist in understanding each product quickly and easily.



**MIG Welding**  
Gas Metal Arc Welding (GMAW)  
also Flux Cored (FCAW)



**STICK Welding**  
Shielded Metal Arc Welding (SMAW)



**TIG Welding**  
Gas Tungsten Arc Welding (GTAW)  
with Lift Start capability



**High Frequency TIG Welding**  
Gas Tungsten Arc Welding (GTAW)



**Carbon Arc Gouging**  
Carbon Arc Gouging  
Carbon Arc Cutting - Air (CAC-A)



**Plasma Welding**  
Plasma Arc Welding (PAW)



**Type of Coolant**  
Either Air Cooled  
or Water Cooled  
MIG Guns



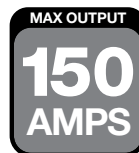
**Application Usage**  
Light, Medium  
or Heavy Duty  
Fabrications



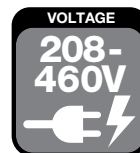
**Current Range**  
Alternating Current (AC)  
Direct Current (DC)  
or Both (AC/DC)



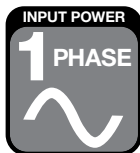
**Current Output**  
Constant Current (CC)  
Constant Voltage (CV)  
or Both (CC/CV)



**Maximum Output Power**  
Measured in Amps  
10A up to 600A



**Power Supply Voltage Range**  
Measured in Volts  
208V up to 440V



**Input Power**  
Single Phase  
Three Phase  
or Both



**Power Supply Frequency**  
50 or 60 Hertz  
or Both



**Duty Cycle**  
Amount of Time  
used before  
overheating occurs



**Maximum Wire Size**  
used by  
MIG Guns

# Table of Contents - MIG Guns, Welding Accessories & Consumables

## MIG Guns & Accessories

<b>EASY FIND GUIDE</b> MIG Gun Selection Guide . . . . .	6-7
<b>Spray Master</b> ® MIG Gun Series (250/350/450) . . . . .	8-15
<b>VELOCITY2™ Spray Master</b> MIG Gun Series (V250/V350/V450) . . . . .	16-25
<b>Classic No.</b> MIG Gun Series (180/200/300/400/500) . . . . .	26-34
<b>VELOCITY2™ Classic No.</b> MIG Gun Series (180/200/300/400/500) . . . . .	35-43
<b>Tweco Fusion</b> ® MIG Gun Series (180/250) . . . . .	44-49
<b>PulseMaster</b> ® Air-Cooled MIG Gun Series (450) . . . . .	50-54
<b>Compact Eliminator</b> ® MIG Gun Series (250/450) . . . . .	55-59
<b>Mini-MIG</b> (160) . . . . .	60
<b>Mini-MIG VELOCITY2</b> (160) . . . . .	61
<b>Supra</b> ® XT SEHD MIG Gun (400) . . . . .	62-63
<b>Supra</b> ® XT VSEHD MIG Gun (400) . . . . .	64-65
<b>SmokeMaster</b> ® Fume Extraction MIG Gun Series (250/450) . . . . .	66-68
<b>Smoke Collector</b> Fume Removal System . . . . .	69
<b>Flux Cored SEFC</b> MIG Guns (350/450) . . . . .	70-71
<b>Tweco Spool Gun</b> Series (160/200/300) . . . . .	72-75
<b>PullMaster</b> ® MIG Gun Series (Smart & Standard 300) . . . . .	76-77
<b>Tweco Water-Cooled</b> MIG Gun Series . . . . .	78-90
<b>Fusion Pro</b> ™ Water-Cooled MIG Gun (450) . . . . .	80-82
<b>PulseMaster</b> ™ Water-Cooled MIG Gun Series (400/500) . . . . .	83-85
<b>Tweco TC900 &amp; TCV900</b> Water Coolers . . . . .	86
<b>Standard</b> Water-Cooled MIG Gun (600) . . . . .	87-88
<b>Tweco MIG Gun</b> Direct Plug & Control Wire Jumpers . . . . .	89-90

## MIG Welding Consumables

<b>Tweco VELOCITY2</b> Welding Consumables . . . . .	91-104
<b>EASY FIND GUIDE</b> Contact Tip Selection Guide . . . . .	105
<b>Contact Tips</b> . . . . .	106-108
<b>EASY FIND GUIDE</b> Nozzle Selection Guide . . . . .	109
<b>Nozzles &amp; Nozzle Insulators</b> . . . . .	110-117
<b>Gas Diffusers</b> . . . . .	118-119

<b>EASY FIND GUIDE</b> Conductor Tube Selection Guide . . . . .	120
<b>Conductor Tubes</b> . . . . .	121-126
<b>Universal Conduit Liners</b> . . . . .	127-128
<b>Conduit Liners</b> . . . . .	129-130

## Manual Welding Products & Accessories

<b>Electrode Holders</b> . . . . .	131-134
<b>EASY FIND GUIDE</b> Electrode Holder Selection Guide . . . . .	132
<b>Ground Clamps</b> . . . . .	135-140
<b>EASY FIND GUIDE</b> Ground Clamp Selection Guide . . . . .	136
<b>Switchable Magnetic Products</b> . . . . .	141-142
<b>EASY FIND GUIDE</b> Cable Lug Selection Guide . . . . .	143
<b>Cable Lugs &amp; Cable Connectors</b> . . . . .	144-145
<b>Splicers, Terminals &amp; Accessories</b> . . . . .	146

## WeldSkill® WM MIG Guns, Consumables & Accessories

<b>WeldSkill</b> WM MIG Gun Series . . . . .	147-152
<b>WeldSkill</b> Consumables . . . . .	153-157
<b>WeldSkill</b> Manual Welding Products & Accessories . . . . .	158-159
<b>Warranty Information</b> . . . . .	160-162
<b>Customer Care</b> Contact Information . . . . .	163

# EASY FIND GUIDE - MIG Gun Selection Guide

MIG GUNS

Wire Diameter	Amperage Range												Recommended	Alternate					
	30	100	150	200	250	300	350	400	450	500	550	600			650				
Solid Wire - Mild Steel and Stainless Steel	.023" - .030" (0.6 - 0.8 mm)	CO <sub>2</sub>		75-25														Fusion® 180, Mini-MIG 160, VELOCITY2™ Mini-MIG 160	VELOCITY2 Classic® No.1, Classic No.1
	.035" (0.9 mm)	CO <sub>2</sub>		75-25														Fusion 180, VELOCITY2 Spray Master® SMV250, Spray Master 250	VELOCITY2 Classic No.2, Classic No.2, Smoke Master® 250, Compact Eliminator® 250
	.045" (1.2 mm)	CO <sub>2</sub>		Higher Argon Mixture														VELOCITY2 Spray Master SMV350, Spray Master 350, VELOCITY2 Classic No.4, Classic No.4	VELOCITY2 Supra XT 400, Supra® XT 400, Smoke Master 450
	.052" (1.3 mm)			Higher Argon Mixture														VELOCITY2 Spray Master SMV450, Spray Master 450, VELOCITY2 Classic No.4, Classic No.4	VELOCITY2 Supra XT 400, Supra XT 400, Smoke Master 450
	1/16" (1.6 mm)			Higher Argon Mixture														VELOCITY2 Spray Master SMV450, Spray Master 450, VELOCITY2 Classic No.5, Classic No.5	PulseMaster™ 500 Water-Cooled, Standard Water-Cooled 600

Wire Diameter	Amperage Range												Recommended	Alternate					
	30	100	150	200	250	300	350	400	450	500	550	600			650				
Flux Cored Wire	.030" (0.8 mm)	Self-shielded												Fusion® 180, Mini-MIG 160, VELOCITY2™ Mini-MIG 160	VELOCITY2 Classic® No.1, Classic No.1				
	.035" (0.9 mm)	Self-shielded		CO <sub>2</sub> or 75-25														Fusion 180, VELOCITY2 Spray Master® SMV250, Spray Master 250	VELOCITY2 Classic No.2, Classic No.2, Smoke Master® 250, Compact Eliminator® 250
	.045" (1.2 mm)	Self-shielded		CO <sub>2</sub> or 75-25														VELOCITY2 Spray Master SMV350, Spray Master 350, VELOCITY2 Classic No.4, Classic No.4	VELOCITY2 Supra XT 400, Supra® XT 400, Smoke Master 450
	.052" (1.3 mm)			CO <sub>2</sub> or 75-25														VELOCITY2 Spray Master SMV450, Spray Master 450, VELOCITY2 Classic No.4, Classic No.4	VELOCITY2 Supra XT 400, Supra XT 400, Smoke Master 450
	1/16" - 5/64" (1.6 - 2.0 mm)	Self-shielded		CO <sub>2</sub> or 75-25														VELOCITY2 Spray Master SMV450, Spray Master 450, VELOCITY2 Classic No.5, Classic No.5	PulseMaster™ 500 Water-Cooled, Standard Water-Cooled 600
	3/32" (2.4 mm)	Self-shielded		CO <sub>2</sub> or 75-25															

\*Flux Cored SEFC Series MIG Guns are to be used only with Self-Shielded wire

Wire Diameter	Amperage Range												Recommended	Alternate			
	30	100	150	200	250	300	350	400	450	500	550	600			650		
Solid Wire - Aluminum	.030" (0.8 mm)	Argon														Spool Gun 160 & 200, Fusion® 180	VELOCITY2 Classic® No.1, Classic No.1
	.035" (0.9 mm)	Argon														Spool Gun 200, VELOCITY2 Spray Master, Spray Master 250	VELOCITY2 Classic® No.2, Classic No.2
	3/64" (1.2 mm)	Argon														VELOCITY2 Spray Master SMV350, Spray Master 350, VELOCITY2 Classic No.3, Classic No.3	VELOCITY2 Spray Master SMV450, VELOCITY2 Classic No.4, Classic No.4
	1/16" (1.6 mm)	Argon															
	3/32" (2.4 mm)	Argon														VELOCITY2 Spray Master SMV450, Spray Master 450	PulseMaster™ 500 Water-Cooled

When welding with aluminum wire, standard MIG gun length of 12 ft should not be exceeded and conduit liners/contact tips made specifically for aluminum wires should be used.

# EASY FIND GUIDE - MIG Gun Selection Guide

Tweco® MIG Gun	Amperage Range	Available Lengths ft (m)	Handle Design	Cablehoz® Connection	Rear End Connector Options	Air-Cooled/ Water-Cooled	Special Features	Catalog Page #
<b>Spray Master® Series</b>	250, 350, 450	10, 12, 15, 20, 25 ft (3, 3.7, 4.6, 6.1, 7.6 m)	Small & Ergonomic	Crimped	Tweco, Miller®, Lincoln®, Euro-Kwik	Air	Heavy Duty Front End Consumables	8-15
<b>VELOCITY2™ Spray Master® Series</b>	250, 350, 450	10, 12, 15, 20, 25 ft (3, 3.7, 4.6, 6.1, 7.6 m)	Small & Ergonomic	Crimped	Tweco, Miller, Lincoln, Euro-Kwik	Air	Heavy Duty Front End Consumables	16-25
<b>Classic® No. Series</b>	160, 180, 200, 300, 400, 500	10, 12, 15, 20, 25 ft (3, 3.7, 4.6, 6.1, 7.6 m)	Oval/Paddle Contour	Mechanical	Tweco, Miller, Lincoln, Euro-Kwik	Air	Wide Range of Front End Consumables	26-34
<b>VELOCITY2™ Classic® No. Series</b>	160, 180, 200, 300, 400, 500	10, 12, 15, 20, 25 ft (3, 3.7, 4.6, 6.1, 7.6 m)	Oval/Paddle Contour	Mechanical	Tweco, Miller, Lincoln, Euro-Kwik	Air	Wide Range of Front End Consumables	35-43
<b>Fusion® Series</b>	180	10, 12 ft (3, 3.7 m)	Small & Ergonomic	Crimped	Tweco, Miller, Lincoln, Euro-Kwik	Air	Longer life VELOCITY2 consumables	44-49
<b>PulseMaster® Air-Cooled Series</b>	450	12, 15 ft (3.7, 4.6 m)	Small & Ergonomic	Crimped	Tweco, Miller, Lincoln, Euro-Kwik	Air	Smart Option or Standard	50-54
<b>Compact Eliminator®</b>	250, 450	10, 12, 15, 20, 25 ft (3, 3.7, 4.6, 6.1, 7.6 m)	Small & Ergonomic	Crimped	Tweco, Miller, Euro-Kwik	Air	Ball & Socket design conductor tube & cam style locking contact tips	55-59
<b>Mini-MIG</b>	160	10, 12, 15 ft (3, 3.7, 4.6 m)	Straight	Mechanical	Tweco, Miller, Lincoln, Euro-Kwik	Air	Wide Selection of Front End Consumables Available	60
<b>VELOCITY2™ Mini-MIG</b>	160	10, 12, 15 ft (3, 3.7, 4.6 m)	Straight	Mechanical	Tweco, Miller, Lincoln, Euro-Kwik	Air	Wide Selection of Front End Consumables Available	61
<b>Supra® XT</b>	400	15 ft (4.6 m)	Straight	Mechanical	Tweco, Miller, Lincoln	Air	Top Trigger Capability	62-63
<b>VELOCITY2™ Supra® XT</b>	400	15, 25 ft (4.6, 7.6 m)	Straight	Mechanical	Tweco, Miller, Lincoln	Air	Top Trigger Capability	64-65
<b>SmokeMaster® Series</b>	250, 450	15 ft (4.6 m)	Ergonomic	Crimped	Tweco, Miller, Lincoln	Air	Fume Extraction Cam-Style Contact Tips	66-68
<b>Flux Cored SEFC Series</b>	350, 450	10, 15 ft (3, 4.6 m)	Straight	Crimped	Tweco, Miller, Lincoln	Air	Galvanized Steel Inner Core Tube Cablehoz Design	70-71
<b>Tweco Spool Gun Series</b>	160, 200	12, 25 ft (3.7, 7.6 m)	Pistol Grip	Mechanical	Dinse Lug	Air	Accepts Standard 4" Spools Rotatable Wire Spool Housing	72-75
<b>PullMaster® Series</b>	300	33, 50 ft (10, 15.2 m)	Pistol Grip	Crimped	Tweco	Air	Smart Option or Standard	76-77
<b>Fusion Pro Water-Cooled</b>	450	10, 15 ft 3, 4.6 m	Ergonomic	Crimped	Tweco, Miller, Lincoln, Euro-Kwik	Water	Heavy-Duty front End Consumables	80-82
<b>PulseMaster® Water-Cooled Series</b>	400, 500	12, 25 ft (3.7, 7.6 m)	Ergonomic	Crimped	Tweco	Water	Smart Option or Standard	83-85
<b>Standard Water-Cooled</b>	600	10, 12, 15 ft (3, 3.7, 4.6 m)	Ergonomic	Crimped	Tweco	Water	Inert Gas Style Fitting	87-88

For Special MIG gun configurations, including special consumables, please contact Tech Service and Support.

## Spray Master®

### MIG Gun Series

#### FEATURES

- **Extended Trigger** length (with optional mechanical locking trigger) keeps hands farther away from the arc to reduce radiated heat
- **Compact, Ergonomic Handle Design** is balanced to pivot at the center of the handle for ease of use, thereby reducing operator fatigue
- **Wide Welding Applications** both Spray Transfer Mode & Pulse Welding
- **Increased Productivity** with the use of patented, extended life Eliminator front end consumables, helps the shop floor lower usage cost
- **Split Handle Case** provides access for ease of repairs in the field
- **Durable, Metal-Jacketed, Three-Layer Conductor Tube** rotates easily for different welding positions and lowers heat in the front end
- **Heavy Duty, Thick-Walled Contact Tip and Diffuser** increases tip life, decreases downtime with fewer tip changes and improves performance in high heat applications
- **Front and Rear Steel Spring Strain Relief** provides support to the Cablehoz® coming out of the rear of the handle and minimizes wire feed issues
- **Crimped Front Cablehoz Connection** for improved electrical conductivity
- **Field Repairable** mechanical Cablehoz connections
- **Interchangeable Front End Consumables** between Tweco® Classic No. and Tweco Spray Master series



# Spray Master

## MIG Gun Series



	Spray Master 250 Amp	Spray Master 350 Amp	Spray Master 450 Amp	Spray Master V250 Amp	Spray Master V350 Amp	Spray Master V450 Amp
<b>Applications</b>	Light - Medium Duty Fabrication	Medium - Heavy Duty Fabrication	Heavy Duty Fabrication	Light - Medium Duty Fabrication	Medium - Heavy Duty Fabrication	Heavy Duty Fabrication
<b>Standard Options</b>	Dual Schedule	■	■		■	■
	Locking Trigger			■		■
	Rear Connector	■	■	■	■	■
	VELOCITY2 Consumables				■	■
	Eliminator Consumables	■	■	■		
	Long Reach Conductor Tube			■		■
	Knucklehead™ Flexible Conductor Tube		■	■		■
<b>Output Current</b>	250 Amps	350 Amps	450 Amps	250 Amps	350 Amps	450 Amps
<b>Duty Cycle - Mixed Gases</b>	80%	80%	80%	80%	80%	80%
<b>Wire Diameter</b>	Up to .045" (1.2 mm)	Up to 1/16" (1.6 mm)	Up to 1/16" (1.6 mm)	Up to .045" (1.2 mm)	Up to 1/16" (1.6 mm)	Up to 1/16" (1.6 mm)
<b>Process</b>	MIG	■	■	■	■	■
	Aluminum	■	■	■	■	■
	Flux Cored Gas Shielded	■	■	■	■	■
	Flux Cored Self Shielded	■	■	■	■	■

MIG GUNS

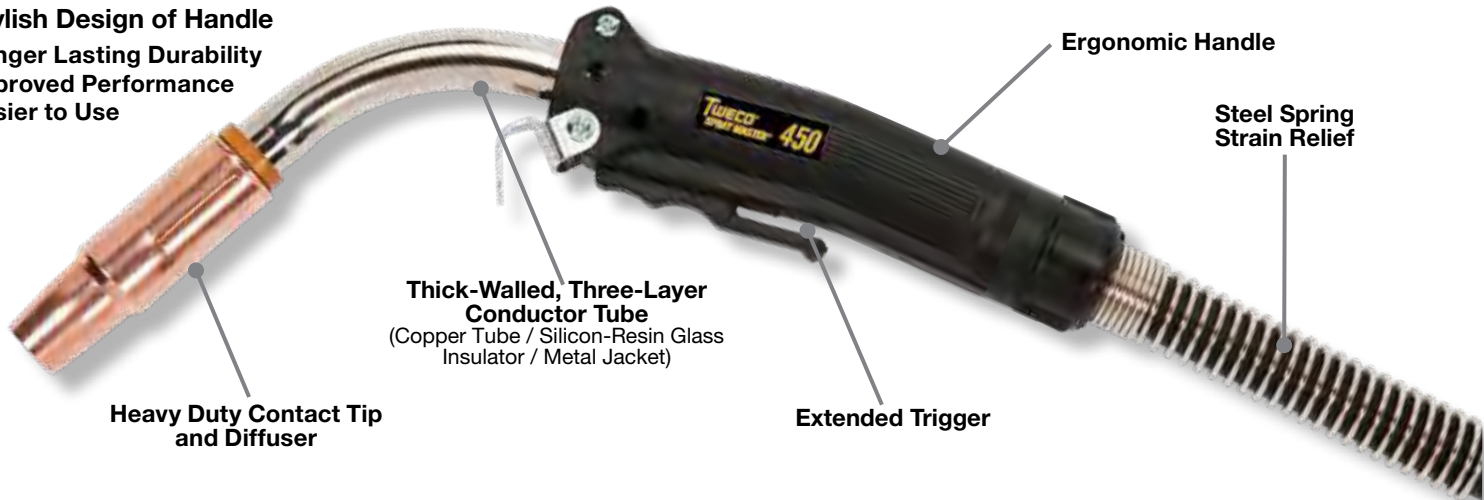
For Special MIG gun configurations, including special consumables, please contact Tech Service and Support.



# Spray Master® MIG Gun & Welding Consumables

Stylish Design of Handle  
 Longer Lasting Durability  
 Improved Performance  
 Easier to Use

MIG GUNS



**DUAL SCHEDULE**  
 Optional Dual Schedule On/Off control with your gloved thumb (350 and 450 Amp only) Identified with "DSRS" Part No. suffix  
 "DSRS" = Dual Schedule Rocker Switch

**LOCKING TRIGGER**  
 Optional mechanical locking trigger - Identified with "LC" Part No. suffix  
 "LC" = Locking Control / Locking Trigger

**TWIST-IT AND FORGET IT**  
 locks in place, no threads to worry about and increases surface contact between contact tip and diffuser

## Enhanced Design of Front End Consumables

- **Eliminator® Contact Tips** increase productivity
- **Heavy Duty Contact Tip and Diffuser** for better electrical conductivity
- **Enhanced Gas Diffuser Design** designed for specific MIG gun series to improve gas coverage
- **Slip-On or Thread-On Nozzle Styles**

- with a choice of diameter bore sizes
- **Conduit Liners** made from either zinc-plated music wire with and without nylon coated wall or Teflon tubing – all having its benefits when running the various welding wire material
  - **Contact Tips** manufactured from extruded copper alloy 122 in either threaded and/or twist lock Eliminator style

**DOUBLE TIP LIFE**  
 by twisting tip to expose a new wear point

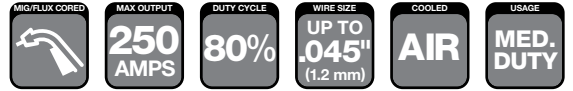
**THICK-WALLED DIFFUSER DESIGN**  
 acts as "heat sink" and conducts heat away from the arc source

**LARGER CONDUCTIVE SURFACE**  
 increases electrical conductivity

**12 HOLES** in the diffuser provides a more uniform gas flow over the welding wire and the weld pool for improved gas coverage



Tweco® offers a wide range of front end consumables for your MIG gun. With over 40 years of experience delivering dependable and durable MIG welding consumables, trust Tweco to fit all of your welding application needs.



# Spray Master® 250 Amp MIG Gun



**80% Duty Cycle - Mixed Gases**  
Suitable for Light/Medium Duty Fabrication.

**WELDING PROCESSES:**  
MIG (GMAW), Flux Cored (FCAW),  
Aluminum (GMAW)

**Standard Options Include:**

- Rear Connector and Knucklehead™ Flexible Conductor Tube
- Standard Conductor Tube – Part No. MS63-60 (Stock No. 1630-1189) on all guns up to 15 ft (4.6 m)
- Part No. MS63-45 (Stock No. 1630-1188) on all guns over 15 ft (4.6 m)
- Conduit Liner – 42 Series

MIG GUNS

## Tweco® Style Rear Connector

Adapter kits are available to fit Tweco rear connection to most wire feeders

Wire Size	Length	Part No.	Stock No.
Up To .045" (1.2 mm)	12 ft (3.6 m)	MS212-3545	1023-1101
	15 ft (4.6 m)	MS215-3545	1023-1102
	20 ft (6.1 m)	MS220-3545	1023-1103
	25 ft (7.6 m)	MS225-3545	1023-1108

## Tweco® Style (8-pin) Rear Connector

8-pin Control Wire Connector - ESAB REBEL

Wire Size	Length	Part No.	Stock No.
Up To .045" (1.2 mm)	12 ft (3.6 m)	MS212E-3545	1023-1141
	15 ft (4.6 m)	MS215E-3545	1023-1140

## Miller® Style Rear Connector

Wire Size	Length	Part No.	Stock No.
Up To .045" (1.2 mm)	10 ft (3 m)	MS210M-3545	1023-1110
	12 ft (3.6 m)	MS212M-3545	1023-1111
	15 ft (4.6 m)	MS215M-3545	1023-1112
	15 ft (4.6 m)	MS215M-3545EL	1023-1121
	20 ft (6.1 m)	MS220M-3545	1023-1113
	25 ft (7.6 m)	MS225M-3545	1023-1118

Suffix "EL" = Eliminator Front End Consumables

## Lincoln® Style Rear Connector

Fits Lincoln LN7, 8, 9, SP200

Wire Size	Length	Part No.	Stock No.
Up To .045" (1.2 mm)	12 ft (3.6 m)	MS212L-3545	1023-1136

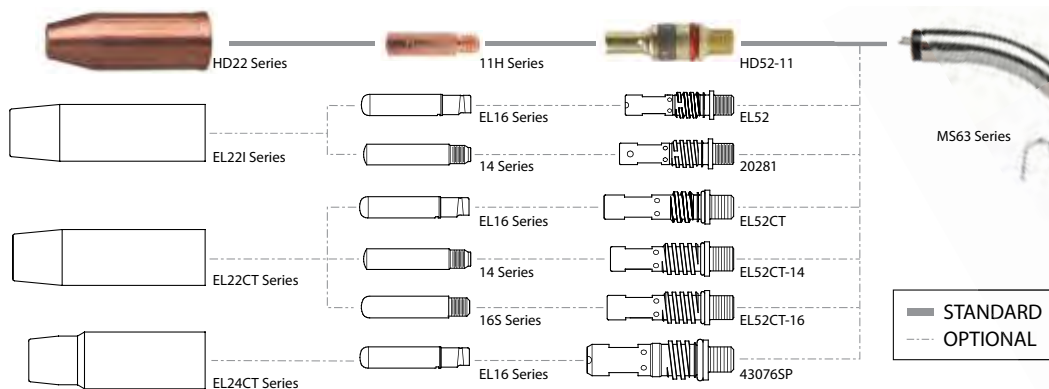
Some Lincoln wire feeders are assembled with their K1500-2 gun receiving bushing that will accept Tweco Style MIG Guns direct from the factory. Control wire Part No. MS354-DSLJ (Stock No. 2060-2137) must be ordered separately.

## Euro-Kwik Style Rear Connector

Wire Size	Length	Part No.	Stock No.
Up To .045" (1.2 mm)	12 ft (3.6 m)	MS212X-3545	1023-1126
	15 ft (4.6 m)	MS215X-3545	1023-1127
	25 ft (7.6 m)	MS225X-3545	1023-1133

## Flexible Knucklehead™

Amp/Model	Bend Angle	Stand Cons.	Part No.	Stock No.
250	60°	■	MS62SFLX3-60	1620-1341
	80°	■	MS62SFLX4-80	1620-1342



Rated Output			Wire Size	Cooled	Application Usage
Amps	Duty Cycle	Gas			
250 Amps	80%	Mixed	Up To .045" (1.2 mm)	Air	Light/Medium Duty Fabrication

**EASY FIND GUIDE**  
See Page 14 & 15 for Replacement Parts & Optional Accessories

Miller is a registered trademark of Illinois Tool Works, Inc. Lincoln is a registered trademark of Lincoln Electric Co. The aforementioned registered trademarks are in no way affiliated with Tweco. Tweco is registered trademark of ESAB.

# Spray Master® 350 Amp MIG Gun

	<b>MAX OUTPUT</b> <b>350</b> AMPS	<b>DUTY CYCLE</b> <b>80%</b>	<b>WIRE SIZE</b> <b>UP TO 1/16"</b> (1.6 mm)	<b>COOLED</b> <b>AIR</b>	<b>USAGE</b> <b>MED. DUTY</b>
--	---	---------------------------------	--	-----------------------------	----------------------------------



**80% Duty Cycle - Mixed Gases**  
Suitable for Medium/Heavy Duty Fabrication.

**WELDING PROCESSES:**  
**MIG (GMAW), Flux Cored (FCAW), Aluminum (GMAW)**

**Standard Options Include:**

- Dual Schedule On/Off Control, Rear Connector and Knucklehead™ Flexible Conductor Tube
- Standard Conductor Tube – Part No. MS63-60 (Stock No. 1630-1189) on all guns up to 15 ft (4.6 m)
- Part No. MS63-45 (Stock No. 1630-1188) on all guns over 15 ft (4.6 m)
- Conduit Liner – 44 Series

## Tweco® Style Rear Connector

Adapter kits are available to fit Tweco rear connection to most wire feeders

Wire Size	Length	Part No.	Stock No.
Up To 1/16" (1.6 mm)	10 ft (3 m)	MS310-116	1036-1610
	12 ft (3.6 m)	MS312-116	1036-1613
	15 ft (4.6 m)	MS315-116	1036-1615
	15 ft (4.6 m)	MS315-116K4	1036-1715
	15 ft (4.6 m)	MS315-116DSRS	1036-1721
	15 ft (4.6 m)	MS315-116EL	1036-1725

## Lincoln® Style Rear Connector

Fits Lincoln LN7, 8, 9, SP200

Wire Size	Length	Part No.	Stock No.
Up To 1/16" (1.6 mm)	12 ft (3.6 m)	MS312L-116	1036-1646
	15 ft (4.6 m)	MS315L-116	1036-1647
	15 ft (4.6 m)	MS315L-116K4	1036-1717
	15 ft (4.6 m)	MS315L-116EL	1036-1727

Some Lincoln wire feeders are assembled with their K1500-2 gun receiving bushing that will accept Tweco Style MIG Guns direct from the factory. Control wire Part No. MS354-DSLJ (Stock No. 2060-2137) must be ordered separately.

## Miller® Style Rear Connector

Wire Size	Length	Part No.	Stock No.
Up To 1/16" (1.6 mm)	10 ft (3 m)	MS310M-116	1036-1635
	12 ft (3.6 m)	MS312M-116	1036-1638
	15 ft (4.6 m)	MS315M-116	1036-1640
	15 ft (4.6 m)	MS315M-116K4	1036-1716
	15 ft (4.6 m)	MS315M-116EL	1036-1726
	25 ft (7.6 m)	MS325M-116	1036-1642

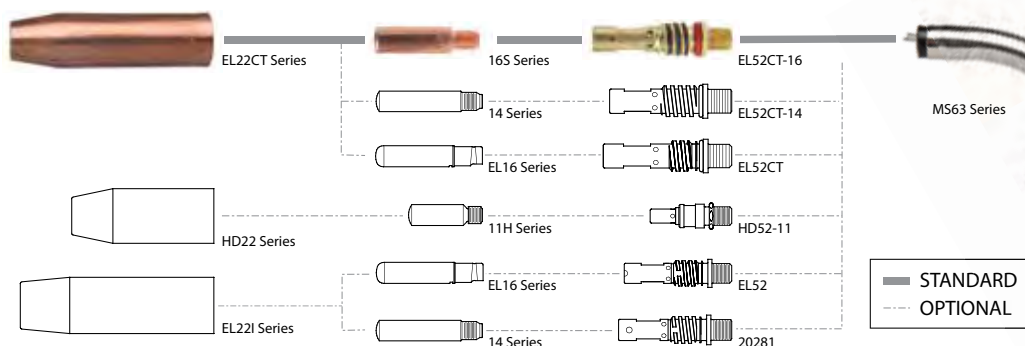
## Euro-Kwik Style Rear Connector

Wire Size	Length	Part No.	Stock No.
Up To 1/16" (1.6 mm)	15 ft (4.6 m)	MS315X-116	1036-1623

Suffix "K4" = Kucklehead Conductor Tube – Part No. MS63SFLX4-80 (Stock No. 1630-1198);  
"DSRS" = Dual Schedule Rocker Switch;  
Suffix "EL" = Eliminator Front End Consumables

## Flexible Knucklehead™

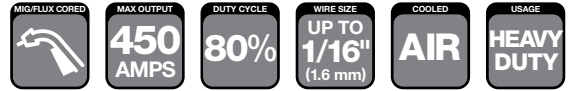
Amp/Model	Bend Angle	Stand Cons.	Part No.	Stock No.
350	60°	▪	MS63SFLX3-60	1630-1197
	80°	▪	MS63SFLX4-80	1630-1198



Rated Output			Wire Size	Cooled	Application Usage
Amps	Duty Cycle	Gas			
350 Amps	80%	Mixed	Up To 1/16" (1.6 mm)	Air	Medium/Heavy Duty Fabrication

**EASY FIND**  
**EASY FIND GUIDE**  
See Page 14 & 15 for Replacement Parts & Optional Accessories

Miller is a registered trademark of Illinois Tool Works, Inc. Lincoln is a registered trademark of Lincoln Electric Co. The aforementioned registered trademarks are in no way affiliated with Tweco. Tweco is registered trademark of ESAB.



# Spray Master® 450 Amp MIG Gun



**80% Duty Cycle - Mixed Gases**  
Suitable for Heavy Duty Fabrication.

**WELDING PROCESSES:**  
MIG (GMAW), Flux Cored (FCAW),  
Aluminum (GMAW)

**Standard Options Include:**

- Dual Schedule On/Off Control, Locking Trigger, Rear Connector and Knucklehead™ Flexible Conductor Tube
- Standard Conductor Tube – Part No. MS64H-60 (Stock No. 1640-1319) on all guns up to 15 ft (4.6 m)
- Part No. MS64H-45 (Stock No. 1630-1318) on all guns over 15 ft (4.6 m)
- Conduit Liner – 44 Series

MIG GUNS

## Tweco® Style Rear Connector

Adapter kits are available to fit Tweco rear connection to most wire feeders

Wire Size	Length	Part No.	Stock No.
Up To 1/16" (1.6 mm)	10 ft (3 m)	MS410-116	1040-1050
	12 ft (3.6 m)	MS412-116	1040-1051
	15 ft (4.6 m)	MS415-116	1040-1052
	15 ft (4.6 m)	MS415-116K4	1040-1530
	15 ft (4.6 m)	MS415-116LM	1040-1053
	15 ft (4.6 m)	MS415-116EL	1040-1541
	20 ft (6.1 m)	MS420-116	1040-1059
	25 ft (7.6 m)	MS425-116	1040-1058

## Lincoln® Style Rear Connector

Fits Lincoln LN7, 8, 9, SP200

Wire Size	Length	Part No.	Stock No.
Up To 1/16" (1.6 mm)	10 ft (3 m)	MS410L-116	1040-1070
	15 ft (4.6 m)	MS415L-116	1040-1072
	15 ft (4.6 m)	MS415L-116K4	1040-1533
	15 ft (4.6 m)	MS415L-116DSRS	1040-1538
	15 ft (4.6 m)	MS415L-116LC	1040-1074
	15 ft (4.6 m)	MS415L-116LM	1040-1073
	25 ft (7.6 m)	MS425L-116	1040-1071

Some Lincoln wire feeders are assembled with their K1500-2 gun receiving bushing that will accept Tweco Style MIG Guns direct from the factory. Control wire Part No. MS354-DSLJ (Stock No. 2060-2137) must be ordered separately.

## Miller® Style Rear Connector

Wire Size	Length	Part No.	Stock No.
Up To 1/16" (1.6 mm)	10 ft (3 m)	MS410M-116	1040-1060
	12 ft (3.6 m)	MS412M-116	1040-1061
	15 ft (4.6 m)	MS415M-116	1040-1062
	15 ft (4.6 m)	MS415M-116K4	1040-1531
	15 ft (4.6 m)	MS415M-116DSRS	1040-1536
	15 ft (4.6 m)	MS415M-116LC	1040-1092
	15 ft (4.6 m)	MS415M-116LM	1040-1063
	20 ft (6.1 m)	MS420M-116	1040-1064
	25 ft (7.6 m)	MS425M-116	1040-1068

## Euro-Kwik Style Rear Connector

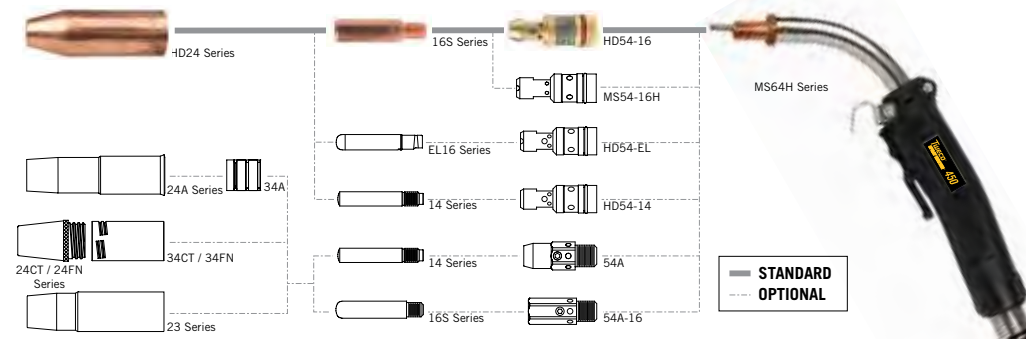
Wire Size	Length	Part No.	Stock No.
Up To 1/16" (1.6 mm)	10 ft (3 m)	MS410X-116	1040-1075
	12 ft (3.6 m)	MS412X-116	1040-1076
	15 ft (4.6 m)	MS415X-116	1040-1077

Suffix "K4" = Knucklehead Conductor Tube – Part No. MS64SFLX4-80 (Stock No. 1640-1308);  
"DSRS" = Dual Schedule Rocker Switch; "LC" = Locking Trigger;  
"LM" = Long Reach Conductor Tube – Part No. MS64H-60LM (Stock No. 1640-1317);  
Suffix "EL" = Eliminator Front End Consumables

## Flexible Knucklehead™

Amp/Model	Bend Angle	Stand Cons.	EL Cons.	Long Reach	Part No.	Stock No.
450	60°	■			MS64SFLX3-60	1640-1307
	80°	■			MS64SFLX4-80	1640-1308
	60°	■		■	MS64SFLX3-60LR	1640-1309
	80°	■		■	MS64SFLX4-80LR	1640-1310
	60°		■		MS64SFLX3-60EL	1640-1370
	80°		■		MS64SFLX4-80EL	1640-1371

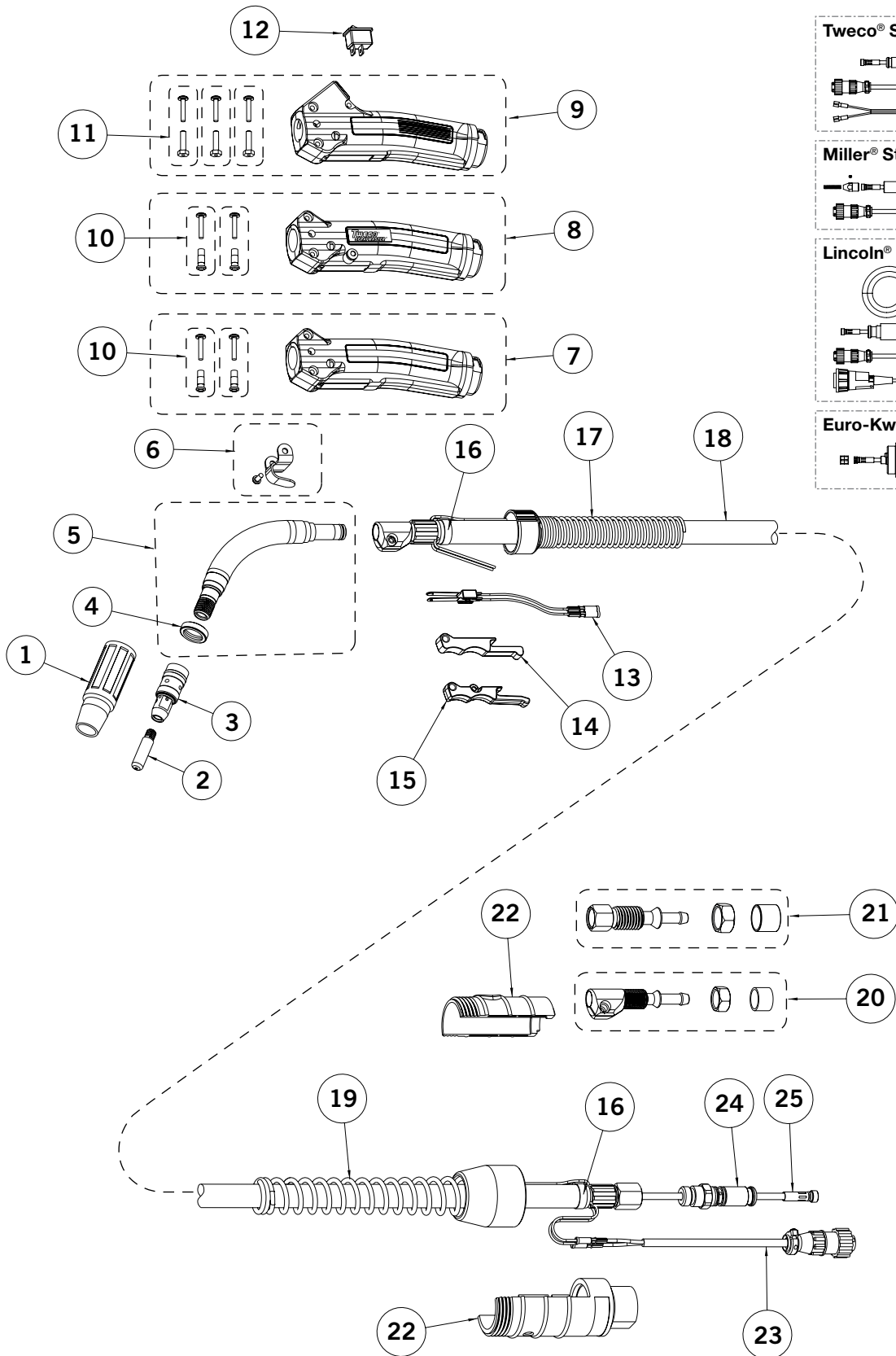
Rated Output			Wire Size	Cooled	Application Usage
Amps	Duty Cycle	Gas			
450 Amps	80%	Mixed	Up To 1/16" (1.6 mm)	Air	Heavy Duty Fabrication



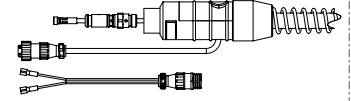
**EASY FIND GUIDE**  
See Page 14 & 15 for Replacement Parts & Optional Accessories

# Spray Master® MIG Gun Replacement Parts

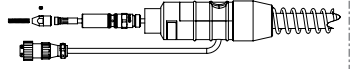
MIG GUNS



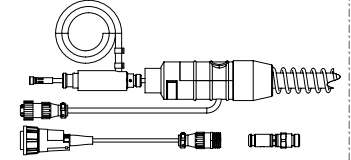
## Tweco® Style Rear Connector



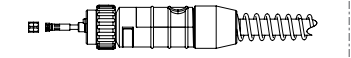
## Miller® Style Rear Connector



## Lincoln® Style Rear Connector



## Euro-Kwik Style Rear Connector



# Spray Master® MIG Gun Replacement Parts

**MIG GUNS**

#	Description	Spray Master 250 Amp		Spray Master 350 Amp		Spray Master 450 Amp	
		Part No.	Stock No.	Part No.	Stock No.	Part No.	Stock No.
1	Nozzle	HD22 Series		EL22CT Series		HD24 Series	
2	Contact Tip	11H Series		16S Series		16S Series	
3	Diffuser	HD52-11		EL52CT-16		HD54-16	
4	Nozzle Insulator	63J-3	1630-1121	63J-3	1630-1121	66J-3	1660-1836
5	Conductor Tube	MS63 Series		MS63 Series		MS63 Series	
6	Gun Hanger	152	2020-2152	152	2020-2152	152	2020-2152
7	Handle (Standard)	MS84	2060-2130	MS84	2060-2130	MS84	2060-2130
8	Handle (Locking Trigger)	MS84LC	2060-2127	MS84LC	2060-2127	MS84LC	2060-2127
9	Handle (Dual Schedule)	MS84DSRS	2060-2128	MS84DSRS	2060-2128	MS84DSRS	2060-2128
10	Binder Posts & Screws (Standard & Locking)	ELC124FM	2060-2646	ELC124FM	2060-2646	ELC124FM	2060-2646
11	Binder Posts & Screws (Dual Schedule)	122FMS	2020-2123	122FMS	2020-2123	122FMS	2020-2123
12	Rocker Switch (Dual Schedule)	MS94RSW	2060-2694	MS94RSW	2060-2694	MS94RSW	2060-2694
13	Trigger Blade Assembly	ELC94-BL	2060-2671	ELC94-BL	2060-2671	ELC94-BL	2060-2671
14	Trigger (Standard)	ELC94	2060-2647	ELC94	2060-2647	ELC94	2060-2647
15	Trigger (Locking)	MS94LC	2060-2693	MS94LC	2060-2693	MS94LC	2060-2693
16	Cable Clamp	136	2060-2690	136	2060-2690	136	2060-2690
17	Front Strain Relief Spring & Cap	MS144	2060-2131	MS144	2060-2131	MS144	2060-2131
18	10 ft (3 m) Cablehoz® Assembly (Direct Plug)	MS210	1720-2115	MS310	1730-2035	—	—
	12 ft (3.6 m) Cablehoz Assembly (Direct Plug)	MS212	1720-2116	MS312	1730-2036	MS412	1740-2116
	15 ft (4.6 m) Cablehoz Assembly (Direct Plug)	MS215	1720-2117	MS315	1730-2037	MS415	1740-2117
	25 ft (7.6 m) Cablehoz Assembly (Direct Plug)	—	—	MS325	1730-2038	MS425	1740-2118
	10 ft (3 m) Cablehoz Assembly (Euro)	—	—	—	—	MS410X	1740-2121
	12 ft (3.6 m) Cablehoz Assembly (Euro)	—	—	—	—	MS412X	1740-2122
	15 ft (4.6 m) Cablehoz Assembly (Euro)	—	—	—	—	MS415X	1740-2123
	25 ft (7.6 m) Cablehoz Assembly (Euro)	—	—	—	—	MS425X	1740-2124
19	Rear Strain Relief Spring & Cap	235RSSR	2060-2035	235RSSR	2060-2035	235RSSR	2060-2035
20	Front Cable Connector Repair Kit (Direct Plug & Euro)	MS102-RK	2060-2132	MS104-RK	2060-2133	MS104-RK	2060-2133
21	Rear Cable Connector Repair Kit (Direct Plug)	MS172-RK	2060-2134	350-170HK	2035-2169	350-170HK	2035-2169
	Rear Cable Connector Repair Kit (Euro)	172X-M	2020-2181	174X-M	2040-2181	174X-M	2040-2181
22	Rear Case (Direct Plug)	C6RC	2060-2041	C6RC	2060-2041	C6RC	2060-2041
	Rear Case (Euro)	X6RC	2060-2006	X6RC	2060-2006	X6RC	2060-2006
23	Miller® Control Wire	MS354-DSM	2060-2140	MS354-DSM	2060-2140	MS354-DSM	2060-2140
24	Connector Plug	Refer to Pages 89-90		Refer to Pages 89-90		Refer to Pages 89-90	
25	Conduit Assembly	Refer to Pages 127-130		Refer to Pages 127-130		Refer to Pages 127-130	
NS	Protective Cable Wrap, 50 ft (15.2 m) per box	TCR50	9900-1150	TCR50	9900-1150	TCR50	9900-1150



# VELOCITY2 SPRAY MASTER MIG GUN SERIES

## VELOCITY2 SPRAY MASTER® MIG GUN SERIES

### FEATURES

- **VELOCITY2 CONSUMABLES**  
with new ground-breaking innovation  
inspired by welders for welders
- **SOLID COPPER CONDUCTOR PATH** with  
fewer connections for optimized electrical  
surface contact
- **FEWER CONSUMABLE PARTS**  
mean less complexity and lower cost  
of ownership
- **GAS PORTED VELOCITY2 CONTACT  
TIPS** stay cooler and last longer
- **EXTENDED LENGTH TRIGGER** allows  
welders to adjust their grip for access,  
comfort and to avoid radiated heat
- **EASY TO USE VELOCITY2 TIPS** eliminates  
threads and requires no tools
- **TIPS CAN BE ROTATED** to prolong life  
requiring fewer changes
- **EXCELLENT WIRE FEEDABILITY**  
with centered liner
- **SUPERIOR WELDING PERFORMANCE**  
from a smoother, more stable arc
- **COMPACT, ERGONOMIC HANDLE  
DESIGN** is balanced to pivot at the center of  
the handle for ease of use, thereby reducing  
operator fatigue
- **FRONT AND REAR STEEL SPRING  
STRAIN RELIEF** provides support to the  
Cablehoz® coming out of the rear of the  
handle and minimizes wire feed issues
- **SPLIT HANDLE CASE** provides access for  
ease of repairs in the field
- **DURABLE, METAL-JACKETED, FOUR-  
LAYER CONDUCTOR TUBE** rotates easily  
for different welding positions and lowers  
heat in the front end
- **CRIMPED FRONT CABLEHOZ  
CONNECTION** for improved  
electrical conductivity
- **DESIGNED FOR SPRAY AND  
PULSE TRANSFER MODES**, maintains the  
copper needed for high duty cycle welding



**VELOCITY2 SPRAY MASTER® MIG GUN SERIES**



## VELOCITY2 SPRAY MASTER® MIG GUN SERIES

**80% Duty Cycle—Mixed Gases**  
Suitable for Heavy Duty Fabrication.



### THE BEST JUST GETS BETTER, ALL WITHOUT CHANGING OUR TIME-TESTED PROVEN COMPONENTS.

The Spray Master MIG Gun receives VELOCITY2 Medium and Heavy Duty consumables to create a new line of MIG guns, the VELOCITY2 Spray Master series. VELOCITY2 Spray Master series maintains the features that made the original Spray Master legendary:

- **COMPACT ERGONOMIC HANDLE DESIGN** is preferred by many for comfort and maneuverability while reducing operator fatigue.
- **EXTENDED LENGTH TRIGGER** allows welders to adjust and reposition their grip for access, comfort and to avoid radiated heat. Adjusting your grip helps avoid repetitive motion, thus reducing fatigue.
- **FULLY ROTATABLE CONDUCTOR TUBE** allows welders further options to reconfigure the MIG Gun form factor to solve access issues, improve maneuverability, as well as reducing fatigue and adjusting for comfort.

- **THICK-WALLED, FOUR-LAYER CONDUCTOR TUBE** is designed for heavy duty cycle applications. The outer layer is made from a high temperature silicone tube decreasing the effect of radiant heat to the MIG gun.
- **MAINTAINS THE ORIGINAL TWECO CABLEHOZ** in 250, 350, and 450 Amp versions that provide the required electrical and thermal conductivity along with cable flexibility that is best in class.

VELOCITY2 Spray Master series is outfitted with VELOCITY2 a revolutionary new approach in MIG consumables that will change the game in terms of welder productivity. VELOCITY2 was designed by welders for welders. For more detailed information on VELOCITY2 Medium and Heavy Duty consumables, visit [Tweco.com](http://Tweco.com)

# SPEED MADE EASY.

**Small Ergonomic Handle**  
Reduces Operator Fatigue

Found on all 250 & 350  
amp VELOCITY2 Spray  
Master Mig Guns  
Supports Cablehoz®

**Cablehoz®**  
Properly Sized for 80% Duty Cycle  
in 250, 350, and 450 Amp versions

You can upgrade any standard Spray Master MIG guns  
by replacing the conductor tube to the next generation VELOCITY2 platform.

## NEXT GENERATION TWECO® VELOCITY2 MIG WELDING CONSUMABLES

*Patented*



**Nozzle Assembly**  
Heavy Duty Copper Nozzle with over  
molded brass insert that is keyed/  
crimped in place making this the  
most robust nozzle on the market



**Contact Tip**  
with Gas Ports



**Conduit Liner**  
Perfectly Centered inside Tip

**Conductor Tube**  
Fully Insulated

- **YOU SPOKE, WE LISTENED**—Inspired by Welders
- **COST SAVINGS WITH FEWER TIPS**—VELOCITY2 Lasts Longer
- **EASY TO USE**—No More Threads, No Tools
- **SMOOTHER ARC**—Improves Stability and Welding Performance
- **NO DIFFUSER**—Less Complexity, Lower Inventory Costs

# SPEED MADE EASY.

All of the features of VELOCITY2 result in more convenience and higher productivity for the welder.

VELOCITY2 Conductor Tubes fit Tweco® Spray Master® V250, V350 & V450 MIG Guns.

**CLICK IT AND GO—**  
EASY TO ADJUST SLIP NOZZLE.



**Adjustable Slip Nozzle**



**Recessed**



**Flush**



**Protruding**

One of the VELOCITY2 consumable offerings is the Adjustable Slip Nozzle that provides positive indexing to all positions whether you require recessed, flush or protruding tips.



Conduit Liner Set Screw

Conductor Tube Clamp Screw

## Velocity Nozzle Identification

S=Small  
M=Medium  
H=Heavy  
ET=Extended Taper

Blank=Fixed Threaded  
S=Adjustable Slip

**V N S 5 0 F S**

Velocity Nozzle

Orifice Opening Size:  
37=3/8" 62=5/8"  
50=1/2" 75=3/4"

Blank=Standard Recess  
F=Flush  
2PC=Two Piece  
R=Recess 1/4" (6.35 mm)  
FAS=Spot Weld  
FC=Flux Core

## Velocity Contact Tip Identification

S=Small  
M=Medium  
H=Heavy  
ET=Extended Taper

A=Aluminum  
Blank=Other

**V T S A 3 0**

Velocity Tip

Wire Size: 364=3/64"  
23=0.023" 116=1/16"  
30=0.030" 564=5/64"  
35=0.035" 332=3/32"  
40=0.040" 764=7/64"  
45=0.045" 18=1/8"

\*Reference your MIG gun Operator's Manual for details.

# SPRAY MASTER® V250 AMP MIG GUN

MIG-FLUX CORED	MAX OUTPUT <b>250 AMPS</b>	DUTY CYCLE <b>80%</b>	WIRE SIZE <b>UP TO .045"</b> (1.2 mm)	COOLED <b>AIR</b>	USAGE <b>MED. DUTY</b>
----------------	-------------------------------	--------------------------	---	----------------------	---------------------------



**80% Duty Cycle—Mixed Gases**  
Suitable for Light/Medium Duty Fabrication.

### WELDING PROCESSES:

**MIG (GMAW), Flux Cored (FCAW), Aluminum (GMAW)**

### Standard Options Include:

- Rear Connector and Knucklehead™ Flexible Conductor Tube
- Standard Conductor Tube—SMVCTLS60 (Stock No. 1240-1377) on all guns up to 15ft (4.6 m)
- SMVCTLS45 (Stock No. 1240-1376) on all guns over 15ft (4.6 m)
- Conduit Liner—42 Series

### Tweco® Style Rear Connector

Adapter kits are available to fit Tweco rear connection to most wire feeders

WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To .045" (1.2 mm)	10 ft (3 m)	SMV210-3545	1023-1290
	12 ft (3.6 m)	SMV212-3545	1023-1276
	15 ft (4.6 m)	SMV215-3545	1023-1277
	20 ft (6.1 m)	SMV220-3545	1023-1278
	25 ft (7.6 m)	SMV225-3545	1023-1279

### Miller® Style Rear Connector

WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To .045" (1.2 mm)	10 ft (3 m)	SMV210M-3545	1023-1280
	12 ft (3.6 m)	SMV212M-3545	1023-1281
	15 ft (4.6 m)	SMV215M-3545	1023-1282
	20 ft (6.1 m)	SMV220M-3545	1023-1283
	25 ft (7.6 m)	SMV225M-3545	1023-1289

### Lincoln® Style Rear Connector

Fits Lincoln LN7, 8, 9, SP200

WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To .045" (1.2 mm)	10 ft (3 m)	SMV210L-3545	1023-1292
	12 ft (3.6 m)	SMV212L-3545	1023-1285
	15 ft (4.6 m)	SMV215L-3545	1023-1293
	20 ft (6.1 m)	SMV220L-3545	1023-1294
	25 ft (7.6 m)	SMV225L-3545	1023-1295

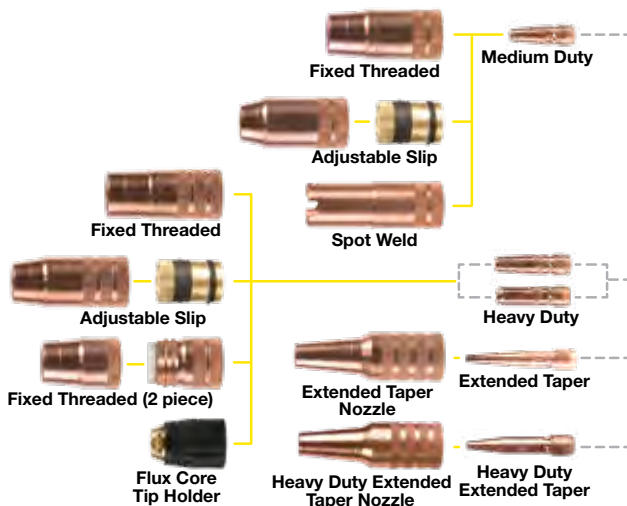
Some Lincoln wire feeders are assembled with their K1500-2 gun receiving bushing that will accept Tweco Style MIG Guns direct from the factory. Control wire Part No. MS354-DSLJ (Stock No. 2060-2137) must be ordered separately.

### Euro-Kwik Style Rear Connector

WIRE SIZE	LENGTH	PART NO.	STOCK N
Up To .045" (1.2 mm)	10 ft (3 m)	SMV210X-3545	1023-1286
	12 ft (3.6 m)	SMV212X-3545	1023-1287
	15 ft (4.6 m)	SMV215X-3545	1023-1288
	20 ft (6.1 m)	SMV220X-3545	1023-1291
	25 ft (7.6 m)	SMV225X-3545	1023-1284

Knucklehead Conductor Tube Part No. VCTL64SFLX480 (Stock No. 1640-1337)  
Part No. VCTL64SFLX360 (Stock No. 1640-1336)

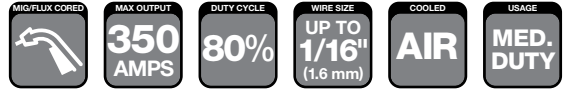
Long Reach Conductor Tube Part No. SMVCTLS60LM (Stock No. 1640-1403)  
Part No. SMVCTLS45LM (Stock No. 1640-1402)



RATED OUTPUT			WIRE SIZE	COOLED	APPLICATION USAGE
Amps	Duty Cycle	Gas			
250 Amps	80%	Mixed	Up To .045" (1.2 mm)	Air	Light/Medium Duty Fabrication

**EASY FIND**  
**EASY FIND GUIDE**  
See Page 24 & 25 for Replacement Parts & Optional Accessories

# SPRAY MASTER® V350 AMP MIG GUN



**80% Duty Cycle—Mixed Gases**  
Suitable for Medium/Heavy Duty Fabrication.

## WELDING PROCESSES:

**MIG (GMAW), Flux Cored (FCAW), Aluminum (GMAW)**

## Standard Options Include:

- Dual Schedule On/Off Control, Rear Connector and Knucklehead™ Flexible Conductor Tube
- Standard Conductor Tube—SMVCTLS60 (Stock No. 1240-1377) on all guns up to 15ft (4.6 m)
- SMVCTLS45 (Stock No. 1240-1376) on all guns over 15ft (4.6 m)
- Conduit Liner—44 Series

## Tweco® Style Rear Connector

Adapter kits are available to fit Tweco rear connection to most wire feeders

WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To 1/16" (1.6 mm)	10 ft (3 m)	SMV310-116	1036-1750
	12 ft (3.6 m)	SMV312-116	1036-1752
	15 ft (4.6 m)	SMV315-116	1036-1756
	15 ft (4.6 m)	SMV315-116DSRS	1036-1783
	15 ft (4.6 m)	SMV315-116K4	1036-1759
	20 ft (6.1 m)	SMV320-116	1036-1789
	25 ft (7.6 m)	SMV325-116	1036-1787

## Lincoln® Style Rear Connector

Fits Lincoln LN7, 8, 9, SP200

WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To 1/16" (1.6 mm)	10 ft (3 m)	SMV310L-116	1036-1785
	12 ft (3.6 m)	SMV312L-116	1036-1753
	15 ft (4.6 m)	SMV315L-116	1036-1762
	15 ft (4.6 m)	SMV315L-116DSRS	1036-1788
	15 ft (4.6 m)	SMV315L-116K4	1036-1764
	20 ft (6.1 m)	SMV320L-116	1036-1781
	25 ft (7.6 m)	SMV325L-116	1036-1786

Some Lincoln wire feeders are assembled with their K1500-2 gun receiving bushing that will accept Tweco Style MIG Guns direct from the factory. Control wire Part No. MS354-DSLJ (Stock No. 2060-2137) must be ordered separately.

## Miller® Style Rear Connector

WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To 1/16" (1.6 mm)	10 ft (3 m)	SMV310M-116	1036-1751
	12 ft (3.6 m)	SMV312M-116	1036-1754
	15 ft (4.6 m)	SMV315M-116	1036-1765
	15 ft (4.6 m)	SMV315M-116K4	1036-1768
	15 ft (4.6 m)	SMV315M-332K4	1036-1791
	15 ft (4.6 m)	SMV315M-116CT180	1036-1777
	20 ft (6.1 m)	SMV320M-116	1036-1780
	25 ft (7.6 m)	SMV325M-116CT180	1036-1778
	25 ft (7.6 m)	SMV325M-116	1036-1775

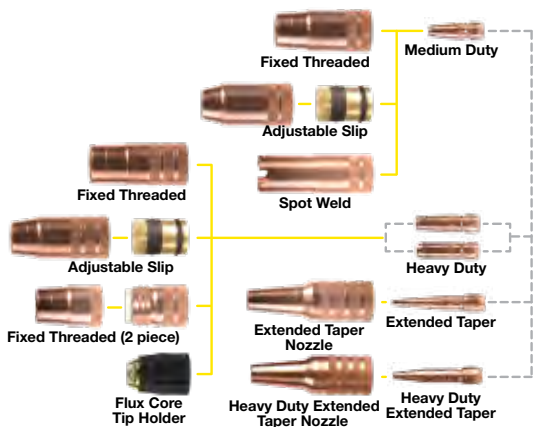
## Euro-Kwik Style Rear Connector

WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To 1/16" (1.6 mm)	10 ft (3 m)	SMV310X-116	1036-1784
	12 ft (3.6 m)	SMV312X-116	1036-1779
	15 ft (4.6 m)	SMV315X-116	1036-1770
	20 ft (6.1 m)	SMV320X-116	1036-1782
	25 ft (7.6 m)	SMV325X-116	1036-1790

"DSRS" = Dual Schedule Rocker Switch; "K4" = Knucklehead Conductor Tube

Knucklehead Conductor Tube Part No. VCTL64SFLX480 (Stock No. 1640-1337)  
Part No. VCTL64SFLX360 (Stock No. 1640-1336)

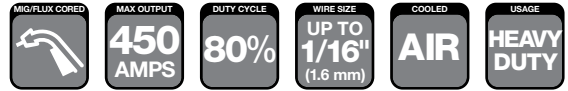
Long Reach Conductor Tube Part No. SMVCTLS60LM (Stock No. 1640-1403)  
Part No. SMVCTLS45LM (Stock No. 1640-1402)



RATED OUTPUT			WIRE SIZE	COOLED	APPLICATION USAGE
Amps	Duty Cycle	Gas			
350 Amps	80%	Mixed	Up To 1/16" (1.6 mm)	Air	Medium/Heavy Duty Fabrication



# SPRAY MASTER® V450 AMP MIG GUN



**80% Duty Cycle—Mixed Gases**  
Suitable for Heavy Duty Fabrication.

## WELDING PROCESSES:

**MIG (GMAW), Flux Cored (FCAW), Aluminum (GMAW)**

## Standard Options Include:

- Dual Schedule On/Off Control, Locking Trigger, Rear Connector and Knucklehead™ Flexible Conductor Tube
- Standard Conductor Tube—SMVCTLS60 (Stock No. 1240-1377) on all guns up to 15ft (4.6 m)
- SMVCTLS45 (Stock No. 1240-1376) on all guns over 15ft (4.6 m)
- Conduit Liner—44 Series

## Tweco® Style Rear Connector

Adapter kits are available to fit Tweco rear connection to most wire feeders

WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To 1/16" (1.6 mm)	10 ft (3 m)	SMV410-116	1040-1825
	12 ft (3.6 m)	SMV412-116	1040-1829
	15 ft (4.6 m)	SMV415-116	1040-1833
	15 ft (4.6 m)	SMV415-116LM	1040-1838
	15 ft (4.6 m)	SMV425-116LM	1040-1870
	20 ft (6.1 m)	SMV420-116	1040-1854
	25 ft (7.6 m)	SMV425-116	1040-1859

## Miller® Style Rear Connector

WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To 1/16" (1.6 mm)	10 ft (3 m)	SMV410M-116	1040-1827
	12 ft (3.6 m)	SMV412M-116	1040-1830
	15 ft (4.6 m)	SMV415M-116	1040-1844
	15 ft (4.6 m)	SMV415M-116DSRS	1040-1846
	15 ft (4.6 m)	SMV415M-116LC	1040-1848
	15 ft (4.6 m)	SMV415M-116LM	1040-1849
	15 ft (4.6 m)	SMV415M-116K4	1040-1874
	20 ft (6.1 m)	SMV420M-116	1040-1855
	25 ft (7.6 m)	SMV425M-116	1040-1861
	25 ft (7.6 m)	SMV425M-116LM	1040-1872

## Lincoln® Style Rear Connector

Fits Lincoln LN7, 8, 9, SP200

WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To 1/16" (1.6 mm)	10 ft (3 m)	SMV410L-116	1040-1826
	12 ft (3.6 m)	SMV412L-116	1040-1866
	15 ft (4.6 m)	SMV415L-116	1040-1839
	15 ft (4.6 m)	SMV415L-116DSRS	1040-1840
	15 ft (4.6 m)	SMV415L-116LC	1040-1842
	15 ft (4.6 m)	SMV415L-116LM	1040-1843
	15 ft (4.6 m)	SMV415L-116K4	1040-1875
	20 ft (6.1 m)	SM420L-116	1040-1869
	25 ft (7.6 m)	SMV425L-116	1040-1860
	25 ft (7.6 m)	SMV425L-116LM	1040-1871

Some Lincoln wire feeders are assembled with their K1500-2 gun receiving bushing that will accept Tweco Style MIG Guns direct from the factory. Control wire Part No. MS354-DSLJ (Stock No. 2060-2137) must be ordered separately.

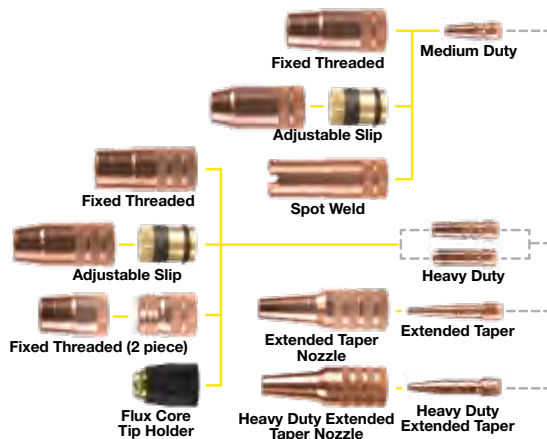
## Euro-Kwik Style Rear Connector

WIRE SIZE	LENGTH	PART NO.	STOCK N
Up To 1/16" (1.6 mm)	10 ft (3 m)	SMV410X-116	1040-1828
	12 ft (3.6 m)	SMV412X-116	1040-1832
	15 ft (4.6 m)	SMV415X-116	1040-1850
	20 ft (6.1 m)	SMV420X-116	1040-1867
	25 ft (7.6 m)	SMV425X-116	1040-1868
	25 ft (7.6 m)	SMV425X-116LM	1040-1873

"DSRS" = Dual Schedule Rocker Switch; "LC" = Locking Trigger;  
"K4" = Knucklehead Conductor Tube; "LM" = Long reach Conductor Tube

Knucklehead Conductor Tube Part No. VCTL64SFLX480 (Stock No. 1640-1337)  
Part No. VCTL64SFLX360 (Stock No. 1640-1336)

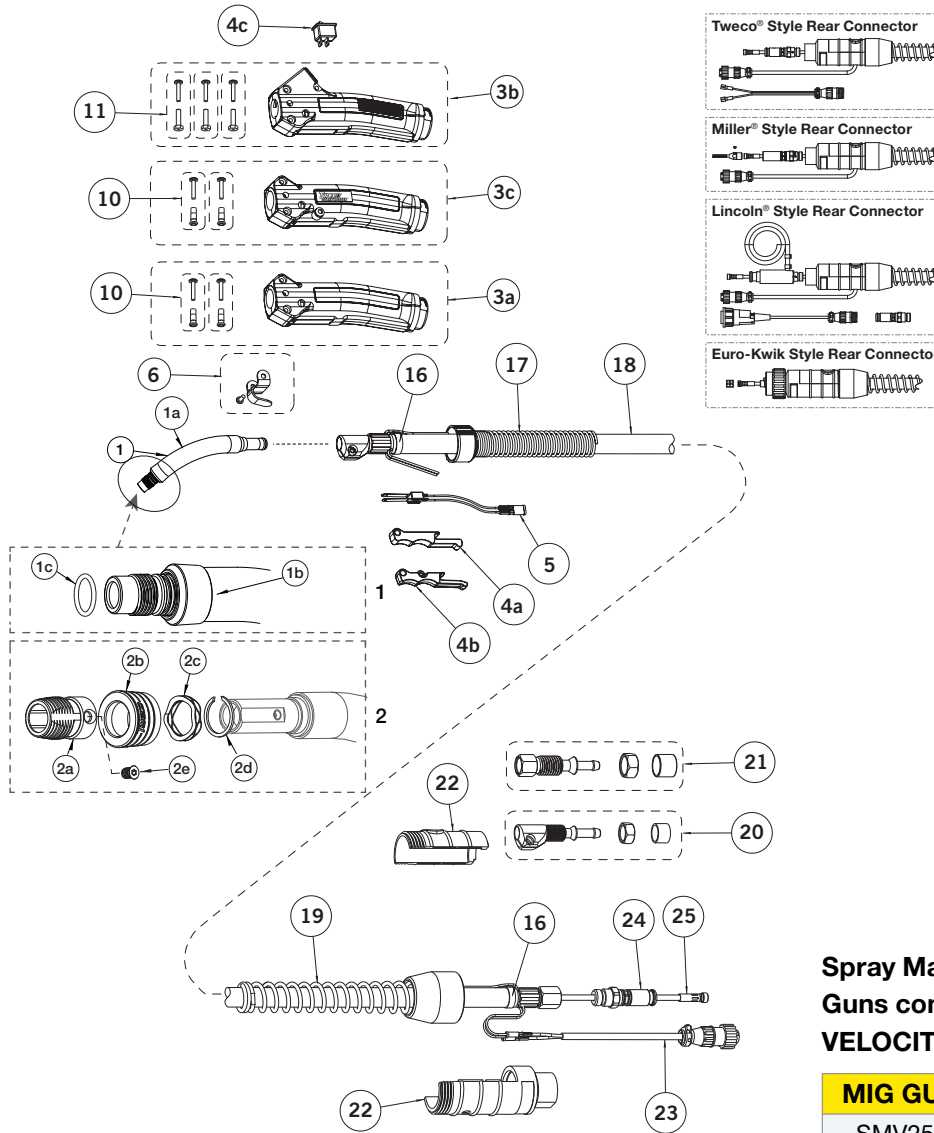
Long Reach Conductor Tube Part No. SMVCTLS60LM (Stock No. 1640-1403)  
Part No. SMVCTLS45LM (Stock No. 1640-1402)



RATED OUTPUT			WIRE SIZE	COOLED	APPLICATION USAGE
Amps	Duty Cycle	Gas			
450 Amps	80%	Mixed	Up To 1/16" (1.6 mm)	Air	Heavy Duty Fabrication



# SPRAY MASTER® V-SERIES MIG GUN REPLACEMENT PARTS



Included with Optional Conductor tube  
Assembly #5 (must be ordered separately)

**Spray Master V-Series MIG Guns come standard with these VELOCITY2 Consumables.**

MIG GUN	CONTACT TIP	NOZZLE
SMV250	VTM45	VNM62
SMV350	VTM116	VNM62
SMV450	VTH116	VNH62



# SPRAY MASTER® V-SERIES MIG GUN REPLACEMENT PARTS

#	DESCRIPTION	SPRAY MASTER V250 AMP		SPRAY MASTER V350 AMP		SPRAY MASTER V450 AMP	
		PART NO.	STOCK NO.	PART NO.	STOCK NO.	PART NO.	STOCK NO.
1	Conductor Tube-60°	SMVCTLS60	1240-1377	SMVCTLS60	1240-1377	SMVCTLS60	1240-1377
	Conductor Tube-45°	SMVCTLS45	1240-1376	SMVCTLS45	1240-1376	SMVCTLS45	1240-1376
	Conductor Tube-60° LM	SMVCTLS60LM	1640-1403	SMVCTLS60LM	1640-1403	SMVCTLS60LM	1640-1403
	Conductor Tube-45° LM	SMVCTL45LM	1640-1402	SMVCTL45LM	1640-1402	SMVCTL45LM	1640-1402
1a	Silicone Tubing (Sold/Foot)	VCTLJBLK	1640-1409	VCTLJBLK	1640-1409	VCTLJBLK	1640-1409
1b	Insulator, VELOCITY2 Conductor Tube Assy.	VCTLSI	1640-1408	VCTLSI	1640-1408	VCTLSI	1640-1408
1c	O-Ring (Pkg. Of 10 each)	VCTLS015	1640-1410	VCTLS015	1640-1410	VCTLS015	1640-1410
2	Conductor Tube-60° (Stainless Steel Sleeve)	SMVCT60SS	1240-1378	SMVCT60SS	1240-1378	SMVCT60SS	1240-1378
	Conductor Tube-45° (Stainless Steel Sleeve)	SMVCT45SS	1240-1379	SMVCT45SS	1240-1379	SMVCT45SS	1240-1379
	Conductor Tube-60° LM (Stainless Steel Sleeve)	SMVCT60LMSS	1640-1404	SMVCT60LMSS	1640-1404	SMVCT60LMSS	1640-1404
	Conductor Tube-45° LM (Stainless Steel Sleeve)	SMVCT45LMSS	1640-1405	SMVCT45LMSS	1640-1405	SMVCT45LMSS	1640-1405
	Conductor Tube-180° (Stainless Steel Sleeve)	SMVCT180	1240-1375	SMVCT180	1240-1375	SMVCT180	1240-1375
2a	Threaded Stainless Sleeve	VCTLSL	1640-1397	VCTLSL	1640-1397	VCTLSL	1640-1397
2b	Nozzle Collar	VCTLSLK	1640-1398	VCTLSLK	1640-1398	VCTLSLK	1640-1398
2c	Wave Spring	VCTLSPR	1640-1399	VCTLSPR	1640-1399	VCTLSPR	1640-1399
2d	Wave Spring Retainer	PMA64RS	1640-1396	PMA64RS	1640-1396	PMA64RS	1640-1396
2e	Sleeve Screw	VCT41CS	2040-2048	VCT41CS	2040-2048	VCT41CS	2040-2048
3	Handle-Standard Spray Master	SMV82	2060-2082	SMV83	2060-2083	SMV84	2060-2084
	Handle-Dual Schedule (Rocker Switch)	—	—	SMV83DS	2060-2077	SMV84DS	2060-2078
	Handle-Locking Trigger	SMV82LC	2060-2079	SMV83LC	2060-2080	SMV84LC	2060-2081
4a	Trigger-Standard & Dual Schedule	ELC94	2060-2647	ELC94	2060-2647	ELC94	2060-2647
	Trigger-Locking	MS94LC	2060-2693	MS94LC	2060-2693	MS94-LC	2060-2693
4b	Dual Schedule Rocker Switch	—	—	MS94RSW	2060-2694	MS94-RSW	2060-2694
5	Trigger Blade Assembly	ELC94-BL	2060-2671	ELC94BL	2060-2671	ELC94-BL	2060-2671
6	Gun Hanger	152	2020-2152	152	2020-2152	152	2020-2152
10	Binder Posts & Screws (Standard & Locking)	ELC124FM	2060-2646	ELC124FM	2060-2646	ELC124FM	2060-2646
11	Binder Posts & Screws (Dual Schedule)	122FMS	2020-2123	122FMS	2020-2123	122FMS	2020-2123
16	Cable Clamp	136	2060-2690	136	2060-2690	136	2060-2690
17	Front Strain Relief Spring & Cap	MS144	2060-2131	MS144	2020-2123	MS144	2060-2131
18	10 ft (3 m) Cablehoz® Assembly (Direct Plug)	MS210	1720-2115	MS310	1730-2035	—	—
	12 ft (3.6 m) Cablehoz Assembly (Direct Plug)	MS212	1720-2116	MS312	1730-2037	MS412	1740-2116
	15 ft (4.6 m) Cablehoz Assembly (Direct Plug)	MS215	1720-2117	MS315	1730-2037	MS415	1740-2117
	25 ft (7.6 m) Cablehoz Assembly (Direct Plug)	—	—	MS325	1730-2038	MS425	1740-2118
	10 ft (3 m) Cablehoz Assembly (Euro)	—	—	—	—	MS410X	1740-2121
	12 ft (3.6 m) Cablehoz Assembly (Euro)	—	—	—	—	MS412X	1740-2122
	15 ft (4.6 m) Cablehoz Assembly (Euro)	—	—	—	—	MS415X	1740-2123
	25 ft (7.6 m) Cablehoz Assembly (Euro)	—	—	—	—	MS425X	1740-2124
19	Rear Strain Relief Spring & Cap	235RSSR	2060-2035	235RSSR	2060-2035	235RSSR	2060-2035
20	Front Cable Connector Repair Kit (Direct Plug & Euro)	MS102-RK	2060-2132	MS104-RK	2060-2133	—	—
21	Rear Cable Connector Repair Kit (Direct Plug)	MS172-RK	2060-2134	MS174-RK	2060-2135		
	Rear Cable Connector Repair Kit (Euro)	172X-M	2020-2181	174X-M	2040-2181		
22	Rear Case (Direct Plug)	C6RC	2060-2041	C6RC	2060-2041	C6RC	2060-2041
	Rear Case (Euro)	X6RC	2060-2006	X6RC	2060-2006	X6RC	2060-2006
23	Miller® Control Wire	MS354-DSM	2060-2140	MS354-DSM	2060-2140	MS354-DSM	2060-2140
24	Connector Plug	Refer to Pages 89-90		Refer to Pages 89-90		Refer to Pages 89-90	
25	Conduit Assembly	Refer to Pages 127-130		Refer to Pages 127-130		Refer to Pages 127-130	
NS	Protective Cable Wrap, 50 ft (15.2 m) per box	TCR50	9900-1150	TCR50	9900-1150	TCR50	9900-1150

Miller is a registered trademark of Illinois Tool Works, Inc. Lincoln is a registered trademark of Lincoln Electric Co. The aforementioned registered trademarks are in no way affiliated with Tweco. Tweco, Spray Master and Cablehoz are registered trademarks of ESAB.

## Classic® No. MIG Gun Series

### FEATURES

- **The Industry Standard** for over 40 years
- **Oval-Shaped Handle** reduces grip required to manipulate MIG gun and eases operator fatigue
- **High-Impact Crush-Resistant Handle** uses special plastic composition for long-lasting durability and dependability
- **Heavy Duty Handle** balanced to pivot at center for ease of use in different welding positions
- **Metal Jacketed Three-Layer Conductor Tube Construction** (copper tube/silicon-resin glass insulator/metal jacket) for improved electrical conductivity
- **Trigger Contains Silver Plated Contacts** with self-cleaning action every time it is engaged or disengaged
- **Heavy Duty Design** for dependable industrial applications
- **Field Repairable Cablehoz®** requires no additional connectors
- **Gun Hanger** located at bottom for convenience of resting the gun when not in use
- **Split Handle Case** provides access for easy repairs
- **Improved Performance** with longer life consumables
- **Wide Selection** of front end consumables available
- **Front and Rear Steel Spring Strain Relief** provides support to the Cablehoz coming out of the rear of the handle and minimizes wire feed issues
- **Heavy Duty Contact Tips** in high heat applications offered
- **Interchangeable Front End Consumables** between Tweco® Classic No. and Tweco Spray Master® series

# Classic No. MIG Gun Series



		Classic No. 1	Classic No. 2	Classic No. 3	Classic No. 4	Classic No. 5
<b>Applications</b>		Light Duty Fabrication	Medium Duty Fabrication	Med/Heavy Duty Fabrication	Med/Heavy Duty Fabrication	Heavy Duty Fabrication
<b>Standard Options</b>	Dual Schedule				■	
	Rear Connector	■	■	■	■	■
	Knucklehead™ Flexible Conductor Tube		■		■	
<b>Output Current</b>		180 Amps	200 Amps	300 Amps	400 Amps	500 Amps
<b>Duty Cycle - CO<sub>2</sub></b>		60%	60%	60%	60%	60%
<b>Wire Diameter</b>		Up to .045" (1.2 mm)	Up to .045" (1.2 mm)	Up to 1/16" (1.6 mm)	Up to 5/64" (2.0 mm)	Up to 3/32" (2.4 mm)
<b>Process</b>	MIG	■	■	■	■	■
	Aluminum	■	■	■	■	
	Flux Cored Gas Shielded				■	■
	Flux Cored Self Shielded					■

For Special MIG gun configurations, including special consumables, please contact Tech Service and Support.



# Classic® No. 1 180 Amp MIG Gun

MIG	MAX OUTPUT <b>180</b> AMPS	DUTY CYCLE <b>60%</b>	WIRE SIZE <b>UP TO .045"</b> (1.2 mm)	COOLED <b>AIR</b>	USAGE <b>LIGHT DUTY</b>
-----	----------------------------------	--------------------------	---	----------------------	----------------------------



**60% Duty Cycle - CO<sub>2</sub> Carbon Dioxide**  
Suitable for Light Duty Fabrication.

**WELDING PROCESSES:**  
MIG (GMAW), Aluminum (GMAW)

**Standard Options Include:**

- Rear Connector
- Standard Conductor Tube – Part No. 61-60 (Stock No. 1610-1102) on all guns up to 15 ft (4.6 m)
- Part No. 61-45 (Stock No. 1610-1101) on all guns over 15 ft (4.6 m)
- Conduit Liner – 42 Series

## Tweco® Style Rear Connector

Adapter kits are available to fit Tweco rear connection to most wire feeders

Wire Size	Length	Part No.	Stock No.
Up To .035" (0.9 mm)	10 ft (3 m)	<b>110-3035</b>	1010-1111
	12 ft (3.6 m)	<b>112-3035</b>	1010-1112
	15 ft (4.6 m)	<b>115-3035</b>	1010-1113
	20 ft (6.1 m)	<b>120-3035</b>	1010-1114
Up To .045" (1.2 mm)	10 ft (3 m)	<b>110-4045</b>	1010-1121
	12 ft (3.6 m)	<b>112-4045</b>	1010-1122
	15 ft (4.6 m)	<b>115-4045</b>	1010-1123
	20 ft (6.1 m)	<b>120-4045</b>	1010-1124

## Lincoln® Style Rear Connector

Fits Lincoln LN7, 8, 9, SP200

Wire Size	Length	Part No.	Stock No.
Up To .035" (0.9 mm)	15 ft (4.6 m)	<b>L115-3035</b>	1010-1145

Some Lincoln wire feeders are assembled with their K1500-2 gun receiving bushing that will accept Tweco Style MIG Guns direct from the factory. Control wire Part No. MS354-DSLJ (Stock No. 2060-2137) must be ordered separately.

## Euro-Kwik Style Rear Connector

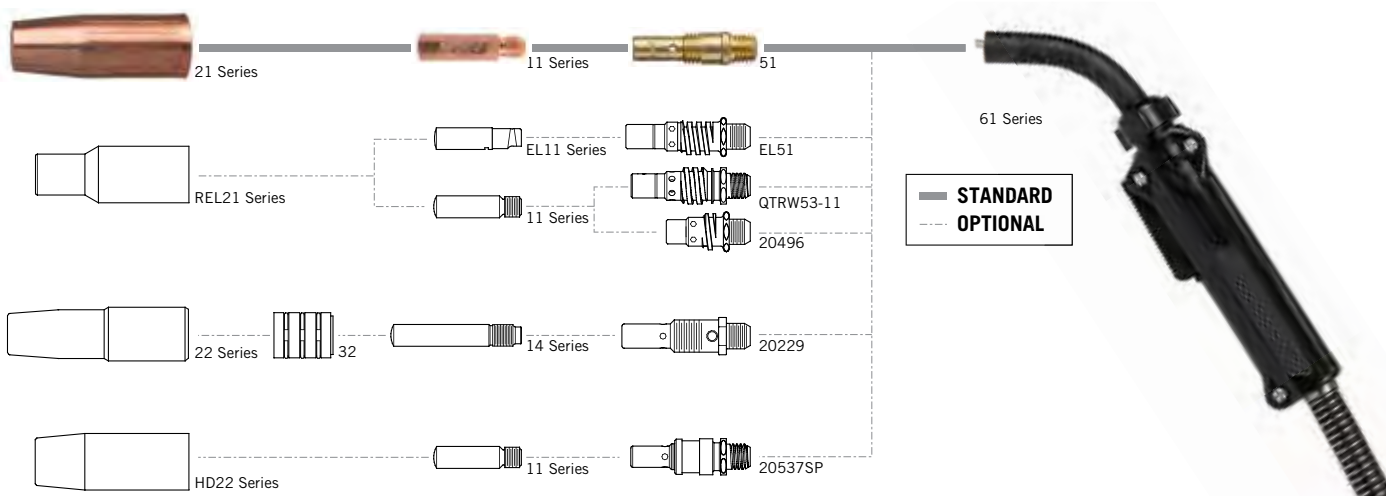
Wire Size	Length	Part No.	Stock No.
Up To .045" (1.2 mm)	10 ft (3 m)	<b>X110-4045</b>	1010-1621
	12 ft (3.6 m)	<b>X112-4045</b>	1010-1622

## Miller® Style Rear Connector

Wire Size	Length	Part No.	Stock No.
Up To .035" (0.9 mm)	10 ft (3 m)	<b>M110-3035</b>	1010-1131
	12 ft (3.6 m)	<b>M112-3035</b>	1010-1133
	15 ft (4.6 m)	<b>M115-3035</b>	1010-1135

## Flexible Knucklehead™

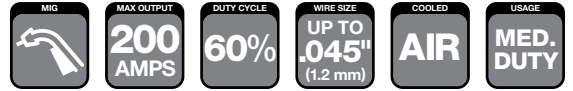
Amp/Model	Bend Angle	Stand Cons.	Part No.	Stock No.
No.1	80°	▪	<b>61SFLX4-80</b>	1610-1105



Rated Output			Wire Size	Cooled	Application Usage
Amps	Duty Cycle	Gas			
180 Amps	60%	CO <sub>2</sub> Carbon Dioxide	Up To .045" (1.2 mm)	Air	Light Duty Fabrication

**EASY FIND EASY FIND GUIDE**  
See Page 33 & 34 for Replacement Parts & Optional Accessories

Miller is a registered trademark of Illinois Tool Works, Inc. Lincoln is a registered trademark of Lincoln Electric Co. The aforementioned registered trademarks are in no way affiliated with Tweco. Tweco is registered trademark of ESAB.



# Classic® No.2 200 Amp MIG Gun



**60% Duty Cycle - CO<sub>2</sub> Carbon Dioxide**  
Suitable for Medium Duty Fabrication.

**WELDING PROCESSES:**  
MIG (GMAW), Aluminum (GMAW)

**Standard Options Include:**

- Rear Connector and Knucklehead™ Flexible Conductor Tube
- Standard Conductor Tube – Part No. 62J-60 (Stock No.1620-1301) on all guns up to 15ft (4.6 m)
- Part No. 62J-45 (Stock No. 1620-1300) on all guns over 15ft (4.6 m)
- Conduit Liner – 42 Series

MIG GUNS

## Tweco® Style Rear Connector

Adapter kits are available to fit Tweco rear connection to most wire feeders

Wire Size	Length	Part No.	Stock No.
Up To .035" (0.9 mm)	10 ft (3 m)	210-3035	1020-1111
	12 ft (3.6 m)	212-3035	1020-1112
	15 ft (4.6 m)	215-3035	1020-1113
	20 ft (6.1 m)	220-3035	1020-1114
	25 ft (7.6 m)	225-3035	1020-1115
Up To .045" (1.2 mm)	10 ft (3 m)	210-4045	1020-1121
	12 ft (3.6 m)	212FN-4045	1020-1322
	15 ft (4.6 m)	215-4045	1020-1123
	15 ft (4.6 m)	215-4045K4**	1020-1660
	20 ft (6.1 m)	225-4045	1020-1125

## Lincoln® Style Rear Connector

Fits Lincoln LN7, 8, 9, SP200

Wire Size	Length	Part No.	Stock No.
Up To .035" (0.9 mm)	10 ft (3 m)	L210-3035	1020-1140
	12 ft (3.6 m)	L212-3035	1020-1142
	15 ft (4.6 m)	L215-3035	1020-1144

Some Lincoln wire feeders are assembled with their K1500-2 gun receiving bushing that will accept Tweco Style MIG Guns direct from the factory. Control wire Part No. MS354-DSLJ (Stock No. 2060-2137) must be ordered separately.

## Euro-Kwik Style Rear Connector

Wire Size	Length	Part No.	Stock No.
Up To .035" (0.9 mm)	10 ft (3 m)	X210-3035	1020-1612
	12 ft (3.6 m)	X212-4045	1020-1622
Up To .045" (1.2 mm)	15 ft (4.6 m)	X215-4045	1020-1623

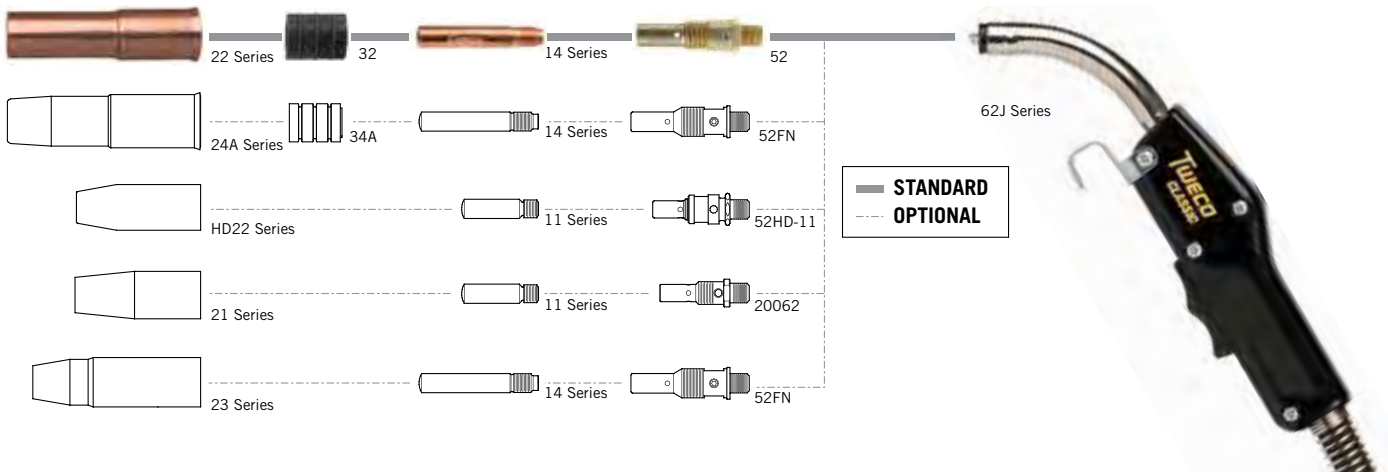
## Miller® Style Rear Connector

Wire Size	Length	Part No.	Stock No.
Up To .035" (0.9 mm)	10 ft (3 m)	M210-3035	1020-1130
	12 ft (3.6 m)	M212-3035	1020-1132
	15 ft (4.6 m)	M215-3035	1020-1134
Up To .045" (1.2 mm)	10 ft (3 m)	M210-4045	1020-1131
	12 ft (3.6 m)	M212-4045	1020-1133
	15 ft (4.6 m)	M215-4045	1020-1135
	15 ft (4.6 m)	M215-4045K4**	1020-1661

\*\* Suffix "K4" = Knucklehead Conductor Tube – Part No. 62SFLX4-80 (Stock No. 1620-1106)

## Flexible Knucklehead™

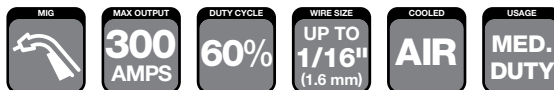
Amp/Model	Bend Angle	Stand Cons.	Part No.	Stock No.
No.2	60°	■	62SFLX3-60	1620-1105
	80°	■	62SFLX4-80	1620-1106



Rated Output			Wire Size	Cooled	Application Usage
Amps	Duty Cycle	Gas			
200 Amps	60%	CO <sub>2</sub> Carbon Dioxide	Up To .045" (1.2 mm)	Air	Medium Duty Fabrication

**EASY FIND**  
**EASY FIND GUIDE**  
See Page 33 & 34 for Replacement Parts & Optional Accessories

Miller is a registered trademark of Illinois Tool Works, Inc. Lincoln is a registered trademark of Lincoln Electric Co. The aforementioned registered trademarks are in no way affiliated with Tweco. Tweco is registered trademark of ESAB.



# Classic® No. 3 300 Amp MIG Gun



**60% Duty Cycle - CO<sub>2</sub> Carbon Dioxide**  
 Suitable for Medium/Heavy Duty Fabrication.

**WELDING PROCESSES:**  
 MIG (GMAW), Aluminum (GMAW)

**Standard Options Include:**

- Rear Connector
- Standard Conductor Tube – Part No. 63J-60 (Stock No. 1630-1111) on all guns up to 15 ft (4.6 m)
- Part No. 63J-45 (Stock No. 1630-1110) on all guns over 15 ft (4.6 m)
- Conduit Liner – 44 Series

## Tweco® Style Rear Connector

Adapter kits are available to fit Tweco rear connection to most wire feeders

Wire Size	Length	Part No.	Stock No.
Up To .045" (1.2 mm)	10 ft (3 m)	310-3545	1030-1101
	12 ft (3.6 m)	312-3545	1030-1102
	15 ft (4.6 m)	315-3545	1030-1103
	20 ft (6.1 m)	320-3545	1030-1104
Up To 1/16" (1.6 mm)	25 ft (7.6 m)	325-3545	1030-1105
	15 ft (4.6 m)	315-116	1030-1113
	25 ft (7.6 m)	325-116	1030-1115

Wire Size	Length	Part No.	Stock No.
Up To .045" (1.2 mm)	10 ft (3 m)	L310-3545	1030-1140
	12 ft (3.6 m)	L312-3545	1030-1143
	15 ft (4.6 m)	L315-3545	1030-1146

Some Lincoln wire feeders are assembled with their K1500-2 gun receiving bushing that will accept Tweco Style MIG Guns direct from the factory. Control wire Part No. MS354-DSLJ (Stock No. 2060-2137) must be ordered separately.

## Euro-Kwik Style Rear Connector

Wire Size	Length	Part No.	Stock No.
Up To .045" (1.2 mm)	10 ft (3 m)	X310-3545	1030-1601
	12 ft (3.6 m)	X312-3545	1030-1602

## Miller® Style Rear Connector

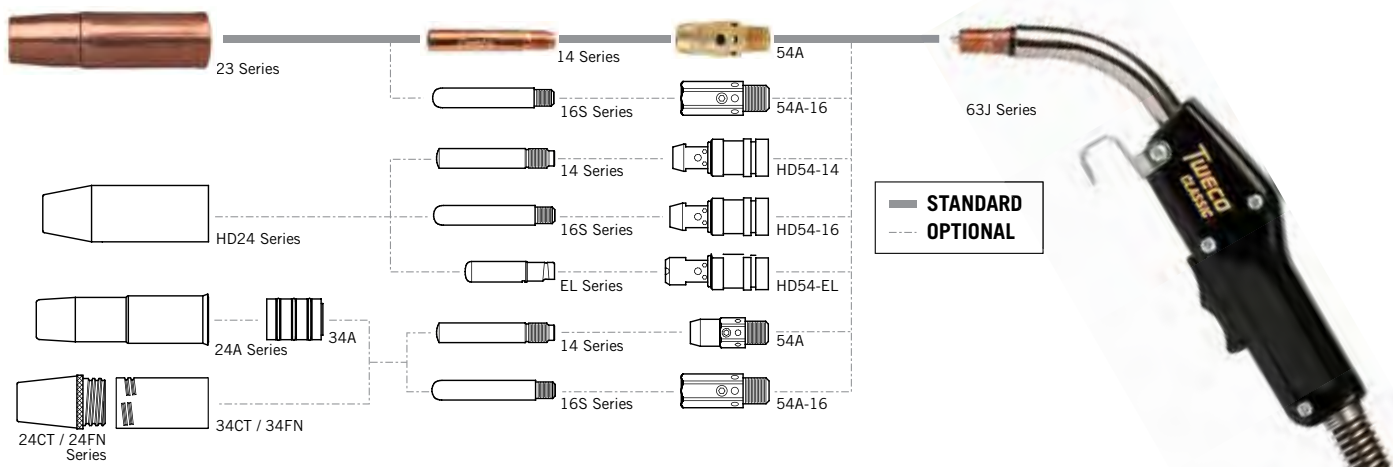
Wire Size	Length	Part No.	Stock No.
Up To .045" (1.2 mm)	10 ft (3 m)	M310-3545	1030-1130
	12 ft (3.6 m)	M312-3545	1030-1133
	15 ft (4.6 m)	M315-3545	1030-1136
Up To 1/16" (1.6 mm)	15 ft (4.6 m)	M315-116	1030-1137

## Flexible Knucklehead™

Amp/ Model	Bend Angle	Stand Cons.	Part No.	Stock No.
No.3	60°	▪	64SFLX3-60	1640-1112

## Lincoln® Style Rear Connector

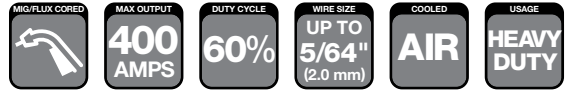
Fits Lincoln LN7, 8, 9, SP200



Rated Output			Wire Size	Cooled	Application Usage
Amps	Duty Cycle	Gas			
300 Amps	60%	CO <sub>2</sub> Carbon Dioxide	Up To 1/16" (1.6 mm)	Air	Medium Fabrication

**EASY FIND EASY FIND GUIDE**  
 See Page 33 & 34 for Replacement Parts & Optional Accessories

Miller is a registered trademark of Illinois Tool Works, Inc. Lincoln is a registered trademark of Lincoln Electric Co. The aforementioned registered trademarks are in no way affiliated with Tweco. Tweco is registered trademark of ESAB.



# Classic® No. 4 400 Amp MIG Gun



**60% Duty Cycle - CO<sub>2</sub> Carbon Dioxide**  
Suitable for Heavy Duty Fabrication.

**WELDING PROCESSES:**  
MIG (GMAW), Flux Cored (FCAW),  
Aluminum (GMAW)

**Standard Options Include:**

- Dual Schedule On/Off Control, Rear Connector and Knucklehead™ Flexible Conductor Tube
- Standard Conductor Tube – Part No. 64J-60 (Stock No. 1640-1106) on all guns up to 15 ft (4.6 m)
- Part No. 64J-45 (Stock No. 1640-1105) on all guns over 15 ft (4.6 m)
- Conduit Liner – 44 Series

MIG GUNS

## Tweco® Style Rear Connector

Adapter kits are available to fit Tweco rear connection to most wire feeders

Wire Size	Length	Part No.	Stock No.
Up to .045" (1.2 mm)	10 ft (3 m)	410-3545	1040-1101
	12 ft (3.6 m)	412-3545	1040-1102
	15 ft (4.6 m)	415-3545	1040-1103
	15 ft (4.6 m)	DS415-3545	1040-1503
	20 ft (6.1 m)	420-3545	1040-1104
	25 ft (7.6 m)	425-3545	1040-1105
Up to 1/16" (1.6mm)	10 ft (3 m)	410-116	1040-1111
	12 ft (3.6 m)	412-116	1040-1112
	15 ft (4.6 m)	415-116	1040-1113
	20 ft (6.1 m)	420-116	1040-1114
	25 ft (7.6 m)	425-116	1040-1115
	15 ft (4.6 m)	DS420-116	1040-1514
5/64" (2.0 mm)	15 ft (4.6 m)	415-564	1040-1123

## Lincoln® Style Rear Connector

Fits Lincoln LN7, 8, 9, SP200

Wire Size	Length	Part No.	Stock No.
Up to .045" (1.2 mm)	10 ft (3 m)	L410-3545	1040-1140
	12 ft (3.6 m)	L412-3545	1040-1143
	15 ft (4.6 m)	L415-3545	1040-1146
	15 ft (4.6 m)	L415-3545K4	1040-1689
Up To 1/16" (1.6 mm)	10 ft (3 m)	L410-116	1040-1141
	12 ft (3.6 m)	L412-116	1040-1144
	15 ft (4.6 m)	L415-116	1040-1147

Some Lincoln wire feeders are assembled with their K1500-2 gun receiving bushing that will accept Tweco Style MIG Guns direct from the factory. Control wire Part No. MS354-DSLJ (Stock No. 2060-2137) must be ordered separately.

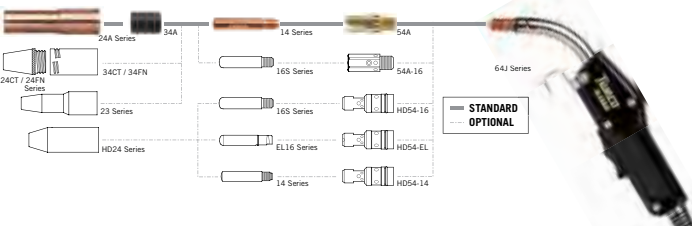
## Miller® Style Rear Connector

Wire Size	Length	Part No.	Stock No.
Up To .045" (1.2mm)	10 ft (3 m)	M410-3545	1040-1130
	12 ft (3.6 m)	M412-3545	1040-1133
	15 ft (4.6 m)	M415-3545	1040-1136
	15 ft (4.6 m)	M415-3545K4	1040-1688
	20 ft (6.1 m)	M420-3545	1040-1126
Up To 1/16" (1.6mm)	25 ft (7.6 m)	M425-3545	1040-1129
	10 ft (3 m)	M410-116	1040-1131
	12 ft (3.6 m)	M412-116	1040-1134
	15 ft (4.6 m)	M415-116	1040-1137
	20 ft (6.1 m)	M420-116	1040-1127
5/64" (2.0 mm)	25 ft (7.6 m)	M425-116	1040-1128
	15 ft (4.6 m)	M415-564	1040-1138

## Euro-Kwik Style Rear Connector

Wire Size	Length	Part No.	Stock No.
Up To .045" (1.2 mm)	12 ft (3.6 m)	X412-3545	1040-1602
	15 ft (4.6 m)	X415-3545	1040-1603
	25 ft (7.6 m)	X425-3545	1040-1605
Up To 1/16" (1.6 mm)	15 ft (4.6 m)	X415-116	1040-1613

Suffix "K4" = Knucklehead Conductor Tube – Part No. 64SFLX4-80 (Stock No. 1640-1113);  
Prefix "DS" = Dual Schedule



## Flexible Knucklehead™

Amp/Model	Bend Angle	Stand Cons.	Long Reach	Part No.	Stock No.
No.4	60°	■		64SFLX3-60	1640-1113
	60°	■	■	64SFLX3-60LR	1640-1121
	80°	■	■	64SFLX4-80LR	1640-1122

Rated Output			Wire Size	Cooled	Application Usage
Amps	Duty Cycle	Gas			
400 Amps	60%	CO <sub>2</sub> Carbon Dioxide	Up To 5/64" (2.0 mm)	Air	Heavy Duty Fabrication



Miller is a registered trademark of Illinois Tool Works, Inc. Lincoln is a registered trademark of Lincoln Electric Co. The aforementioned registered trademarks are in no way affiliated with Tweco. Tweco is registered trademark of ESAB.

# Classic® No. 5 500 Amp MIG Gun

	<b>MAX OUTPUT</b> 500 AMPS	<b>DUTY CYCLE</b> 60%	<b>WIRE SIZE</b> UP TO 3/32" (2.4 mm)	<b>COOLED</b> AIR	<b>USAGE</b> HEAVY DUTY
--	-------------------------------	--------------------------	--	----------------------	----------------------------



**60% Duty Cycle - CO<sub>2</sub> Carbon Dioxide**

Suitable for Heavy Duty Fabrication.

**WELDING PROCESSES:**  
MIG (GMAW), Flux Cored (FCAW), Aluminum (GMAW)

**Standard Options Include:**

- Dual Schedule On/Off Control, Locking Trigger & Rear Connector
- Standard Conductor Tube – Part No. 65J-60 (Stock No.1650-1111) on all guns up to 15ft (4.6 m)
- Part No. 65J-45 (Stock No. 1650-1110) on all guns over 15ft (4.6 m)
- Conduit Liner – 45 Series

## Tweco® Style Rear Connector

Adapter kits are available to fit Tweco rear connection to most wire feeders

Wire Size	Length	Part No.	Stock No.
Up To 1/16" (1.6 mm)	15 ft (4.6 m)	515-116	1050-1113
	25 ft (7.6 m)	525-116	1050-1115
Up To 3/32" (2.4 mm)	10 ft (3 m)	510-332	1050-1131
	15 ft (4.6 m)	515-332	1050-1133

## Lincoln® Style Rear Connector

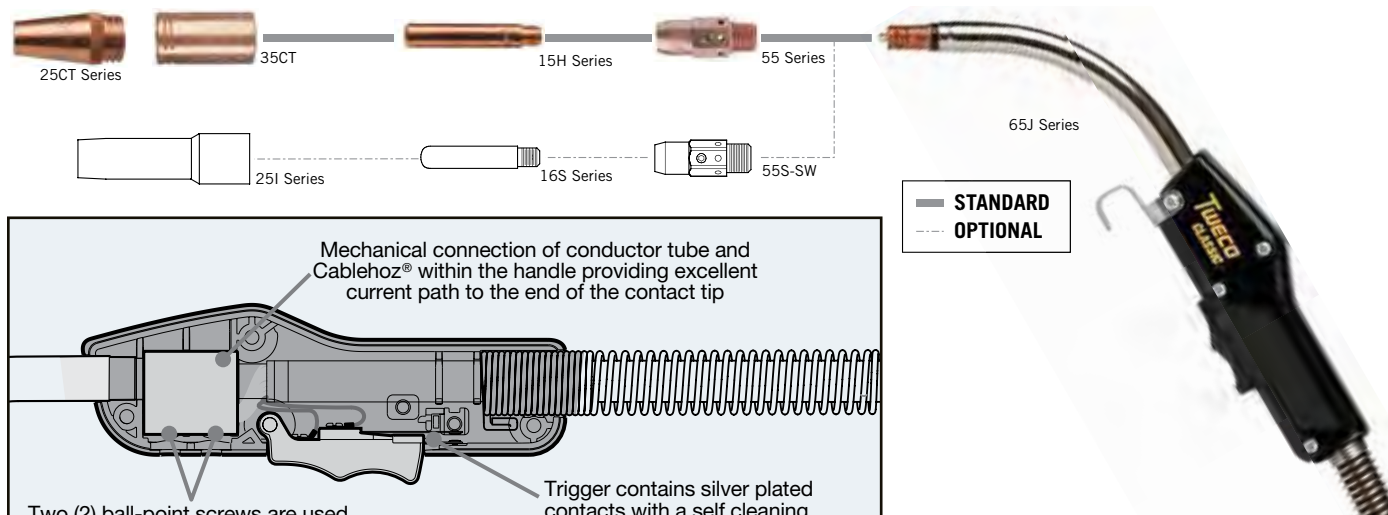
Fits Lincoln LN7, 8, 9, SP200

Wire Size	Length	Part No.	Stock No.
Up To 3/32" (2.4 mm)	15 ft (4.6 m)	L515-332	1050-1642

Some Lincoln wire feeders are assembled with their K1500-2 gun receiving bushing that will accept Tweco Style MIG Guns direct from the factory. Control wire Part No. MS354-DSLJ (Stock No. 2060-2137) Must be ordered separately.

## Miller® Style Rear Connector

Wire Size	Length	Part No.	Stock No.
Up To 1/16" (1.6 mm)	15 ft (4.6 m)	M515-116	1050-1173
Up To 3/32" (2.4 mm)	15 ft (4.6 m)	M515-332	1050-1175



Mechanical connection of conductor tube and Cablehoz® within the handle providing excellent current path to the end of the contact tip

Two (2) ball-point screws are used to secure the Cablehoz® and conductor tube in place

Trigger contains silver plated contacts with a self cleaning action every time the trigger is engaged & disengaged

Rated Output			Wire Size	Cooled	Application Usage
Amps	Duty Cycle	Gas			
500 Amps	60%	CO <sub>2</sub> Carbon Dioxide	Up To 3/32" (2.4 mm)	Air	Heavy Duty Fabrication

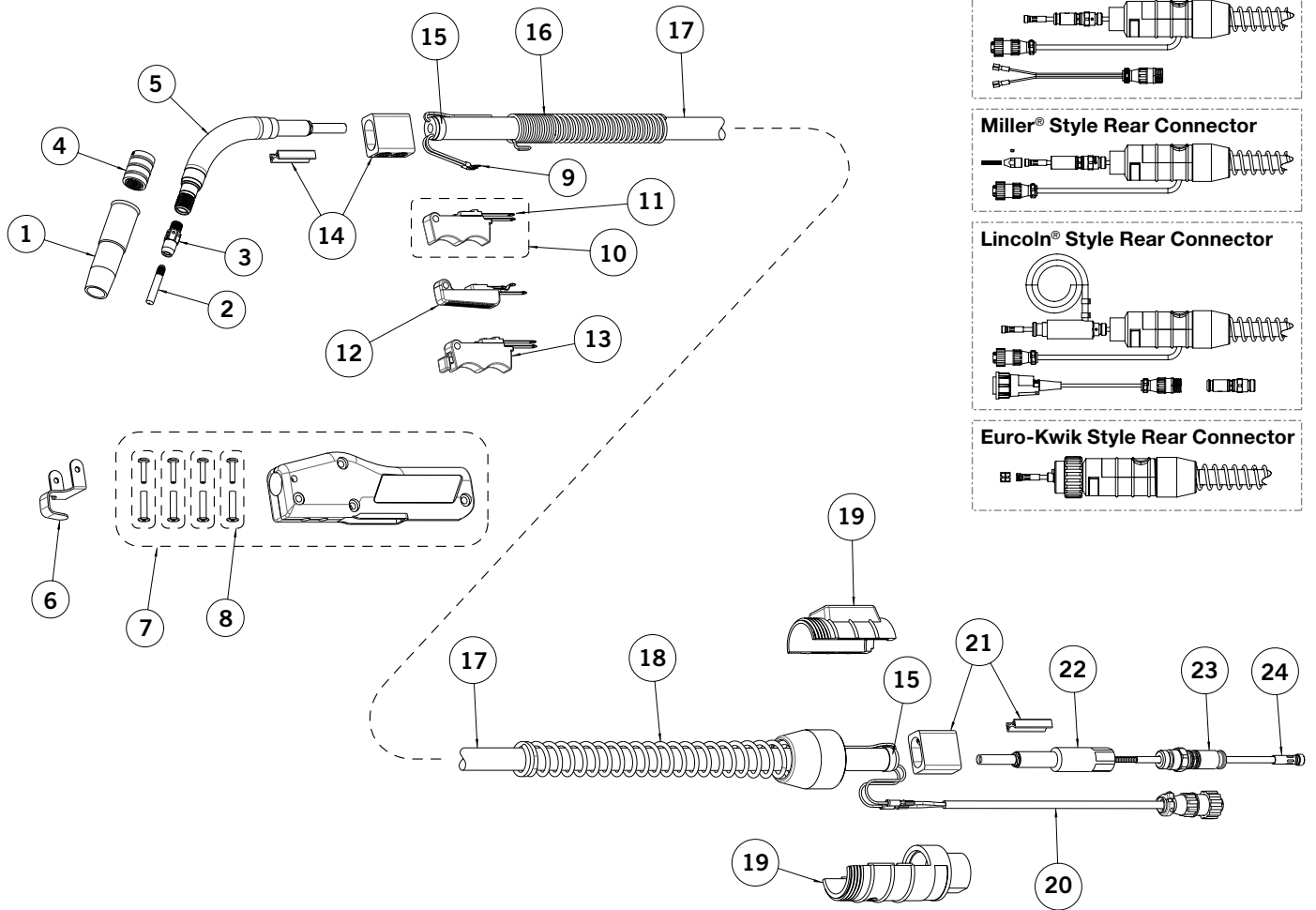
**EASY FIND EASY FIND GUIDE**  
See Page 33 & 34 for Replacement Parts & Optional Accessories

Miller is a registered trademark of Illinois Tool Works, Inc. Lincoln is a registered trademark of Lincoln Electric Co. The aforementioned registered trademarks are in no way affiliated with Tweco. Tweco is registered trademark of ESAB.



# Classic® No. Series Replacement Parts

MIG GUNS



# Classic® No. Series Replacement Parts

MIG GUNS

#	Description	Classic No. 1	Classic No. 2	Classic No. 3	Classic No. 4	Classic No. 5
		Part No./ Stock No.	Part No./ Stock No.	Part No./ Stock No.	Part No./ Stock No.	Part No./ Stock No.
1	Nozzle	<b>21 Series</b>	<b>22 Series</b>	<b>23 Series</b>	<b>24A Series</b>	<b>25CT Series w/ 35CT Base</b>
2	Contact Tip	<b>11 Series</b>	<b>14 Series</b>	<b>14 Series</b>	<b>14 Series</b>	<b>15H Series</b>
3	Diffuser	<b>51</b>	<b>52</b>	<b>54A</b>	<b>54A</b>	<b>55 Series</b>
4	Nozzle Insulator	--	<b>32</b>	--	<b>34A</b>	--
5	Conductor Tube	<b>61 Series</b>	<b>62J Series</b>	<b>63J Series</b>	<b>64J Series</b>	<b>65J Series</b>
6	Gun Hanger	<b>152</b> 2020-2152	<b>152</b> 2020-2152	<b>152</b> 2020-2152	<b>154B</b> 2040-2156	<b>154B</b> 2040-2156
7	Handle (Standard)	<b>81</b> 2010-2081	<b>83RC</b> 2030-2084	<b>83RC</b> 2030-2084	<b>84RC</b> 2040-2087	<b>85RC</b> 2050-2088
	Handle (Dual Schedule)	--	--	--	<b>84RC-DS</b> 2040-2088	--
8	Binder Posts & Screws	<b>122FM</b> 2020-2122	<b>122FM</b> 2020-2122	<b>122FM</b> 2020-2122	<b>124FM</b> 2040-2124	<b>124FM</b> 2040-2124
9	Trigger Control Wire Terminal (Standard - 2 ea.)	<b>244DS</b> 2040-2245	<b>244</b> 2040-2224	<b>244</b> 2040-2224	<b>244</b> 2040-2224	<b>244</b> 2040-2224
	Trigger Control Wire Terminal (Dual Schedule - 4 ea.)	--	--	--	<b>244LK</b> 2040-2246	--
10	Trigger Assembly (Standard)	<b>91</b> 2010-2091	<b>92RR</b> 2020-2093	<b>92RR</b> 2020-2093	<b>94RR</b> 2040-2098	<b>94RR</b> 2040-2098
11	Trigger Blades	<b>91C</b> 2010-2093	<b>94RC</b> 2040-2100	<b>94RC</b> 2040-2100	<b>94RC</b> 2040-2100	<b>94RC</b> 2040-2100
12	Trigger Assembly (Dual Schedule)	--	--	--	<b>94RDS</b> 2040-2101	<b>94RDS</b> 2040-2101
13	Trigger Assembly (Locking)	--	--	--	<b>94R-L</b> 2040-2102	<b>94R-L</b> 2040-2102
14	Front Cable Connector	<b>101R</b> 2010-2103	<b>102</b> 2020-2102	<b>102</b> 2020-2102	<b>104</b> 2040-2104	<b>104</b> 2040-2104
15	Cable Clamp	<b>136</b> 2060-2690	<b>136</b> 2060-2690	<b>136</b> 2060-2690	<b>136</b> 2060-2690	<b>136</b> 2060-2690
16	Front Strain Relief Spring	<b>141-6-SPR</b> 2010-2143	<b>142-6-SPR</b> 2020-2144	<b>142-6-SPR</b> 2020-2144	<b>144-6-SPR</b> 2040-2146	<b>145-6-SPR</b> 2050-2147
17	Cablehoz®	<b>200</b> 1720-2100	<b>200</b> 1720-2100	<b>300</b> 1730-2100	<b>400</b> 1740-2100	<b>500</b> 1750-2100
18	Rear Strain Relief Spring	<b>235RSSR</b> 2060-2035	<b>235RSSR</b> 2060-2035	<b>235RSSR</b> 2060-2035	<b>235RSSR</b> 2060-2035	<b>235RSSR</b> 2060-2035
19	Rear Case (Direct Plug)	<b>R6RC</b> 2060-2040	<b>R6RC</b> 2060-2040	<b>R6RC</b> 2060-2040	<b>R6RC</b> 2060-2040	<b>R6RC</b> 2060-2040
	Rear Case (Euro)	<b>X6RC</b> 2060-2006	<b>X6RC</b> 2060-2006	<b>X6RC</b> 2060-2006	<b>X6RC</b> 2060-2006	<b>X6RC</b> 2060-2006
20	Control Wire (Standard)	<b>MS354-DSM</b> 2060-2140	<b>MS354-DSM</b> 2060-2140	<b>MS354-DSM</b> 2060-2140	<b>MS354-DSM</b> 2060-2140	<b>MS354-DSM</b> 2060-2140
	Control Wire (Dual Schedule)	<b>194DS</b> 2040-2195	<b>194DS</b> 2040-2195	<b>194DS</b> 2040-2195	<b>194DS</b> 2040-2195	<b>194DS</b> 2040-2195
21	Rear Cable Connector (Direct Plug)	<b>104</b> 2040-2104	<b>104</b> 2040-2104	<b>104</b> 2040-2104	<b>104</b> 2040-2104	<b>104</b> 2040-2104
	Rear Cable Connector (Euro)	<b>172X-M</b> 2020-2181	<b>172X-M</b> 2020-2181	<b>174X-M</b> 2040-2181	<b>174X-M</b> 2040-2181	--
22	Adapter (Direct Plug)	<b>M170-2H</b> 2020-2165	<b>M170-2H</b> 2020-2165	<b>M170-4H</b> 2020-2166	<b>M170-4H</b> 2020-2166	<b>M170-5H</b> 2020-2167
NS	Repair/Conversion Kits	--	<b>83R-CK</b> 2030-2085	<b>83R-CK</b> 2030-2085	<b>84R-CK</b> 2040-2089	<b>85R-CK</b> 2050-2089
23	Connector Plug	<b>Refer to Pages 89-90</b>				
24	Conduit Assembly	<b>Refer to Pages 127-130</b>				
NS	Protective Cable Wrap, 50 ft (15.2 m) per box	<b>TCR50</b> 9900-1150				



# VELOCITY2 CLASSIC NO. MIG GUN SERIES

## VELOCITY2 CLASSIC® NO. MIG GUN SERIES

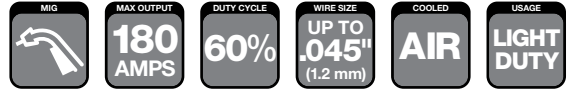
### FEATURES

- **THE INDUSTRY STANDARD** for over 40 years
- **INCORPORATING VELOCITY2 CONSUMABLES** with new ground breaking innovation inspired by welders for welders
- **SOLID COPPER CONDUCTOR PATH** with fewer connections for optimized electrical surface contact
- **FEWER CONSUMABLES PARTS** means less complexity and lower cost of ownership
- **GAS PORTED VELOCITY2 CONTACT TIPS** stay cooler and last longer
- **EASY TO USE VELOCITY2 TIPS** eliminates threads and requires no tools
- **TIPS CAN BE ROTATED** to prolong life requiring fewer changes
- **EXCELLENT WIRE FEED** ability with centered liner with the conduit liner fitting inside the tip
- **SUPERIOR WELDING PERFORMANCE** from a smoother, more stable arc
- **LARGE COPPER TO COPPER** surface contact for superior thermal and electrical efficiency
- **PROVEN CONTACT TIP LIFE IMPROVEMENTS** with Short Arc Solid Wire 2 to 3 times life, Spray Transfer 4 to 5 times life and Gas Shielded Flux Core 8 to 10 times life

		VELOCITY2 Classic No. 1	VELOCITY2 Classic No. 2	VELOCITY2 Classic No. 3	VELOCITY2 Classic No. 4	VELOCITY2 Classic No. 5
<b>Applications</b>		Light Duty Fabrication	Medium Duty Fabrication	Med/Heavy Duty Fabrication	Med/Heavy Duty Fabrication	Heavy Duty Fabrication
<b>Standard Options</b>	<b>Dual Schedule</b>				■	
	<b>Rear Connector</b>	■	■	■	■	■
	<b>Knucklehead™ Flexible Conductor Tube</b>		■		■	
<b>Output Current</b>		180 Amps	200 Amps	300 Amps	400 Amps	500 Amps
<b>Duty Cycle–CO<sub>2</sub></b>		60%	60%	60%	60%	60%
<b>Wire Diameter</b>		Up to .045" (1.2 mm)	Up to . 045" (1.2 mm)	Up to 1/16" (1.6 mm)	Up to 5/64" (2.0 mm)	Up to 3/32" (2.4 mm)
<b>Process</b>	<b>MIG</b>	■	■	■	■	■
	<b>Aluminum</b>	■	■	■	■	
	<b>Flux Cored Gas Shielded</b>				■	■
	<b>Flux Cored Self Shielded</b>					■

*For Special MIG gun configurations, including special consumables, please contact Tech Service and Support.*





# VELOCITY2 CLASSIC® NO. 1

## 180 AMP MIG GUN



**60% Duty Cycle—CO<sub>2</sub> Carbon Dioxide**  
Suitable for Light Duty Fabrication.

**WELDING PROCESSES:**  
MIG (GMAW), Aluminum (GMAW)

**Standard Options Include:**

- Rear Connector
- Standard Conductor Tube -  
Part No. 61-60 (Stock No. 1610-1102)  
Part No. VA61-60 (Stock No. 1010-1105)  
Light Duty VELOCITY2 Adapter (Must be ordered separately)
- Conduit Liner—42 Series

MIG GUNS

### Tweco® Style Rear Connector

Adapter kits are available to fit Tweco rear connection to most wire feeders

WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To .035" (0.9 mm)	12 ft (3.6 m)	V112-3035	1010-1115
	15 ft (4.6 m)	V115-3035	1010-1116
	20 ft (6.1 m)	V120-3035	1010-1117
Up To .045" (1.2 mm)	12 ft (3.6 m)	V112-4045	1010-1118
	15 ft (4.6 m)	V115-4045	1010-1119
	20 ft (6.1 m)	V120-4045	1010-1120

### Lincoln® Style Rear Connector

Fits Lincoln LN7, 8, 9, SP200

WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To .035" (0.9 mm)	15 ft (4.6 m)	VL115-3035	1010-1138

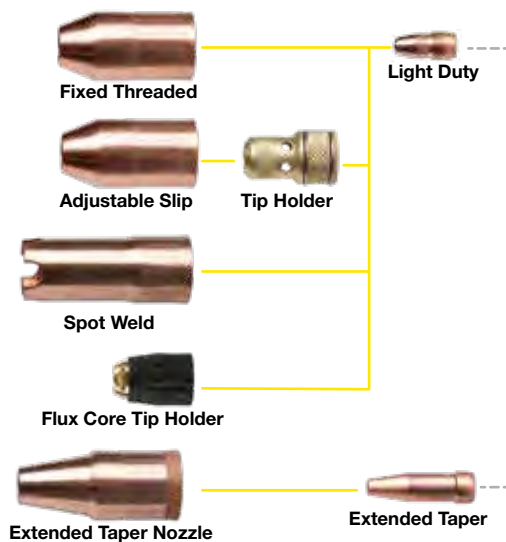
Some Lincoln wire feeders are assembled with their K1500-2 gun receiving bushing that will accept Tweco Style MIG Guns direct from the factory. Control wire Part No. MS354-DSLJ (Stock No. 2060-2137) must be ordered separately.

### Euro-Kwik Style Rear Connector

WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To .045" (1.2 mm)	10 ft (3 m)	VX110-4045	1010-1147
	12 ft (3.6 m)	VX112-4045	1010-1148
	15 ft (4.6 m)	VX115-4045	1010-1149

### Miller® Style Rear Connector

WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To .035" (0.9 mm)	10 ft (3 m)	VM110-3035	1010-1125
	12 ft (3.6 m)	VM112-3035	1010-1126
	15 ft (4.6 m)	VM115-3035	1010-1127



RATED OUTPUT			WIRE SIZE	COOLED	APPLICATION USAGE
Amps	Duty Cycle	Gas			
180 Amps	60%	CO <sub>2</sub> Carbon Dioxide	Up To .045" (1.2 mm)	Air	Light Duty Fabrication



Miller is a registered trademark of Illinois Tool Works, Inc. Lincoln is a registered trademark of Lincoln Electric Co. The aforementioned registered trademarks are in no way affiliated with Tweco. Tweco is registered trademark of ESAB.

# VELOCITY2 CLASSIC® NO. 2

## 200 AMP MIG GUN

MIG	MAX OUTPUT <b>200</b> AMPS	DUTY CYCLE <b>60%</b>	WIRE SIZE UP TO <b>.045"</b> (1.2 mm)	COOLED <b>AIR</b>	USAGE <b>MED. DUTY</b>
-----	----------------------------------	--------------------------	--	----------------------	---------------------------



### 60% Duty Cycle—CO<sub>2</sub> Carbon Dioxide

Suitable for Medium Duty Fabrication.

### WELDING PROCESSES:

MIG (GMAW), Aluminum (GMAW)

### Standard Options Include:

- Rear Connector and Knucklehead™ Flexible Conductor Tube
- Standard Conductor Tube—VCTLS6260 (Stock No. 1620-1375) on all guns up to 15 ft (4.6 m)
- VCTLS6245 (Stock No. 1620-1376) on all guns over 15 ft (4.6 m)
- Conduit Liner—42 Series

### Tweco® Style Rear Connector

Adapter kits are available to fit Tweco rear connection to most wire feeders

WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To .035" (0.9 mm)	10 ft (3 m)	V210-3035	1020-1105
	12 ft (3.6 m)	V212-3035	1020-1106
	15 ft (4.6 m)	V215-3035	1020-1107
	20 ft (6.1 m)	V220-3035	1020-1108
	25 ft (7.6 m)	V225-3035	1020-1109
Up To .045" (1.2 mm)	10 ft (3 m)	V210-4045	1020-1117
	15 ft (4.6 m)	V215-4045	1020-1118
	25 ft (7.6 m)	V225-4045	1020-1119

### Lincoln® Style Rear Connector

Fits Lincoln LN7, 8, 9, SP200

WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To .035" (0.9 mm)	10 ft (3 m)	VL210-3035	1020-1147
	12 ft (3.6 m)	VL212-3035	1020-1148
	15 ft (4.6 m)	VL215-3035	1020-1149

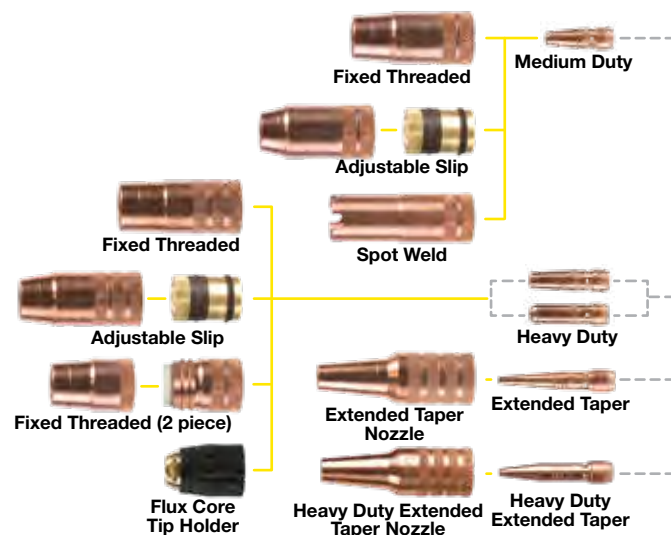
Some Lincoln wire feeders are assembled with their K1500-2 gun receiving bushing that will accept Tweco Style MIG Guns direct from the factory. Control wire Part No. MS354-DSLJ (Stock No. 2060-2137) must be ordered separately.

### Euro-Kwik Style Rear Connector

WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To .035" (0.9 mm)	12 ft (3.6 m)	VX212-3035	1020-1305
	10 ft (3 m)	VX210-4045	1020-1306
Up To .045" (1.2 mm)	12 ft (3.6 m)	VX212-4045	1020-1307
	15 ft (4.6 m)	VX215-4045	1020-1308

### Miller® Style Rear Connector

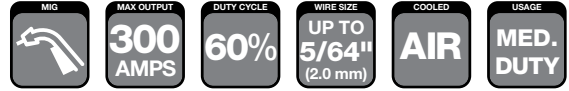
WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To .035" (0.9 mm)	10 ft (3 m)	VM210-3035	1020-1128
	12 ft (3.6 m)	VM212-3035	1020-1129
	15 ft (4.6 m)	VM215-3035	1020-1136
Up To .045" (1.2 mm)	10 ft (3 m)	VM210-4045	1020-1137
	12 ft (3.6 m)	VM212-4045	1020-1138
	15 ft (4.6 m)	VM215-4045	1020-1139



RATED OUTPUT			WIRE SIZE	COOLED	APPLICATION USAGE
Amps	Duty Cycle	Gas			
200 Amps	60%	CO <sub>2</sub> Carbon Dioxide	Up To .045" (1.2 mm)	Air	Medium Duty Fabrication

**EASY FIND**  
**EASY FIND GUIDE**  
See Page 42 & 43 for Replacement Parts & Optional Accessories

Miller is a registered trademark of Illinois Tool Works, Inc. Lincoln is a registered trademark of Lincoln Electric Co. The aforementioned registered trademarks are in no way affiliated with Tweco. Tweco is registered trademark of ESAB.



# VELOCITY2 CLASSIC® NO. 3

## 300 AMP MIG GUN



**60% Duty Cycle—CO<sub>2</sub> Carbon Dioxide**  
Suitable for Medium/Heavy Duty Fabrication.

**WELDING PROCESSES:**  
MIG (GMAW), Aluminum (GMAW)

**Standard Options Include:**

- Rear Connector
- Standard Conductor Tube—VCTLS6360 (Stock No. 1630-1229) on all guns up to 15 ft (4.6 m)
- VCTLS6345 (Stock No. 1630-1230) on all guns over 15 ft (4.6 m)
- Conduit Liner—44 Series

MIG GUNS

**Tweco® Style Rear Connector**

Adapter kits are available to fit Tweco rear connection to most wire feeders

WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To .045" (1.2 mm)	10 ft (3 m)	V310-3545	1030-1003
	12 ft (3.6 m)	V312-3545	1030-1004
	15 ft (4.6 m)	V315-3545	1030-1005
	20 ft (6.1 m)	V320-3545	1030-1006
	25 ft (7.6 m)	V325-3545	1030-1007
Up To 1/16" (1.6 mm)	12 ft (3.6 m)	V312-116	1030-1008
	15 ft (4.6 m)	V315-116	1030-1009
	25 ft (7.6 m)	V325-116	1030-1010

**Lincoln® Style Rear Connector**

Fits Lincoln LN7, 8, 9, SP200

WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To .045" (1.2 mm)	10 ft (3 m)	VL310-3545	1030-1017
	12 ft (3.6 m)	VL312-3545	1030-1018
	15 ft (4.6 m)	VL315-3545	1030-1019

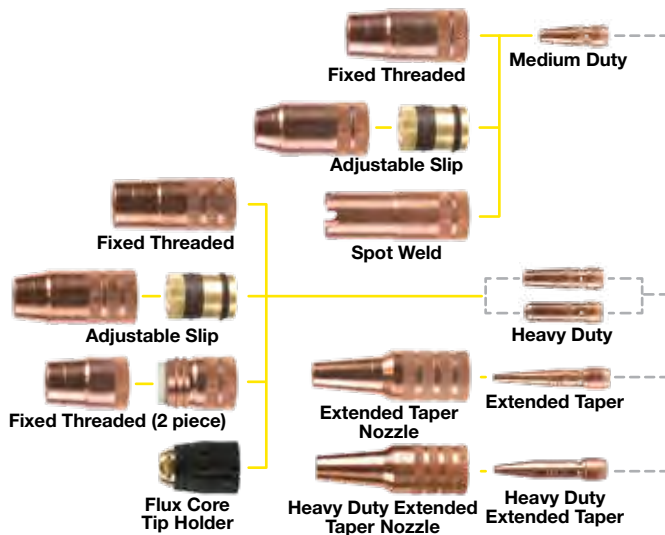
Some Lincoln wire feeders are assembled with their K1500-2 gun receiving bushing that will accept Tweco Style MIG Guns direct from the factory. Control wire Part No. MS354-DSLJ (Stock No. 2060-2137) must be ordered separately.

**Euro-Kwik Style Rear Connector**

WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To .045" (1.2 mm)	10 ft (3 m)	VX310-3545	1030-1020
	12 ft (3.6 m)	VX312-3545	1030-1021
	15 ft (4.6 m)	VX315-3545	1030-1022
Up To 5/64" (2.0 mm)	15 ft (4.6 m)	VX315-564	1030-1023

**Miller® Style Rear Connector**

WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To .045" (1.2 mm)	10 ft (3 m)	VM310-3545	1030-1013
	12 ft (3.6 m)	VM312-3545	1030-1014
	15 ft (4.6 m)	VM315-3545	1030-1015
Up To 1/16" (1.6 mm)	15 ft (4.6 m)	VM315-116	1030-1016



RATED OUTPUT			WIRE SIZE	COOLED	APPLICATION USAGE
Amps	Duty Cycle	Gas			
300 Amps	60%	CO <sub>2</sub> Carbon Dioxide	Up To 1/16" (1.6 mm)	Air	Medium Fabrication



Miller is a registered trademark of Illinois Tool Works, Inc. Lincoln is a registered trademark of Lincoln Electric Co. The aforementioned registered trademarks are in no way affiliated with Tweco. Tweco is registered trademark of ESAB.

# VELOCITY2 CLASSIC® NO. 4

## 400 AMP MIG GUN

MIG-FLUX CORED

MAX OUTPUT  
**400**  
AMPS

DUTY CYCLE  
**60%**

WIRE SIZE  
**UP TO**  
**5/64"**  
(2.0 mm)

COOLED  
**AIR**

USAGE  
**HEAVY DUTY**

**WELDING PROCESSES:**  
MIG (GMAW), Flux Cored (FCAW),  
Aluminum (GMAW)

**Standard Options Include:**

- Dual Schedule On/Off Control, Rear Connector and Knucklehead™ Flexible Conductor Tube
- Standard Conductor Tube—VCTLS6460 (Stock No. 1640-1400) on all guns up to 15 ft (4.6 m)
- VCTLS6445 (Stock No. 1640-1401) on all guns over 15 ft (4.6 m)
- Conduit Liner—44 Series



**60% Duty Cycle—CO<sub>2</sub> Carbon Dioxide**  
Suitable for Heavy Duty Fabrication.

**Tweco® Style Rear Connector**

Adapter kits are available to fit Tweco rear connection to most wire feeders

WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To .045" (1.2 mm)	10 ft (3 m)	V410-3545	1040-1901
	12 ft (3.6 m)	V412-3545	1040-1902
	15 ft (4.6 m)	V415-3545	1040-1903
	15 ft (4.6 m)	VDS415-3545	1040-1904
	15 ft (4.6 m)	V415-3545K4**	1040-1905
	20 ft (6.1 m)	V420-3545	1040-1906
Up To 1/16" (1.6 mm)	25 ft (7.6 m)	V425-3545	1040-1907
	10 ft (3 m)	V410-116	1040-1908
	12 ft (3.6 m)	V412-116	1040-1909
	15 ft (4.6 m)	V415-116	1040-1900
5/64" (2.0 mm)	20 ft (6.1 m)	VDS420-116	1040-1911
	15 ft (4.6 m)	V415-564	1040-1912

**Lincoln® Style Rear Connector**

Fits Lincoln LN7, 8, 9, SP200

WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To .045" (1.2mm)	10 ft (3 m)	VL410-3545	1040-1927
	12 ft (3.6 m)	VL412-3545	1040-1928
	15 ft (4.6 m)	VL415-3545	1040-1929
	15 ft (4.6 m)	VL415-3545K4**	1040-1930
Up To 1/16" (1.6 mm)	12 ft (3.6 m)	VL412-116	1040-1931
	15 ft (4.6 m)	VL415-116	1040-1932

Some Lincoln wire feeders are assembled with their K1500-2 gun receiving bushing that will accept Tweco Style MIG Guns direct from the factory. Control wire Part No. MS354-DSLJ (Stock No. 2060-2137) must be ordered separately.

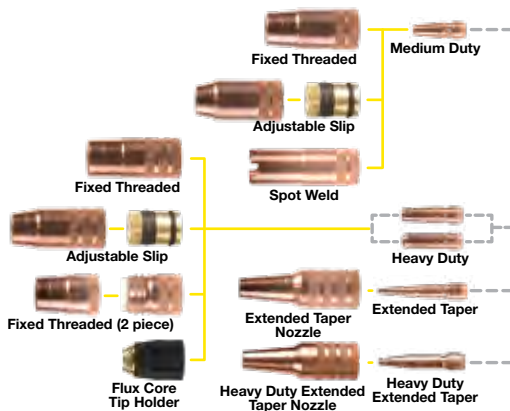
**Miller® Style Rear Connector**

WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To .045" (1.2 mm)	10 ft (3 m)	VM410-3545	1040-1914
	12 ft (3.6 m)	VM412-3545	1040-1915
	15 ft (4.6 m)	VM415-3545	1040-1916
	15 ft (4.6 m)	VM415-3545K4**	1040-1917
	20 ft (6.1 m)	VM420-3545	1040-1918
Up To 1/16" (1.6 mm)	25 ft (7.6 m)	VM425-3545	1040-1919
	10 ft (3 m)	VM410-116	1040-1920
	12 ft (3.6 m)	VM412-116	1040-1921
	15 ft (4.6 m)	VM415-116	1040-1922
	20 ft (6.1 m)	VM420-116	1040-1923
5/64" (2.0 mm)	25 ft (7.6 m)	VM425-116	1040-1924
	15 ft (4.6 m)	VM415-564	1040-1925

**Euro-Kwik Style Rear Connector**

WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To .045" (1.2 mm)	10 ft (3 m)	VX410-3545	1040-1934
	12 ft (3.6 m)	VX412-3545	1040-1935
	15 ft (4.6 m)	VX415-3545	1040-1936
	25 ft (7.6 m)	VX425-3545	1040-1937
Up To 1/16" (1.6 mm)	12 ft (3.6 m)	VX412-116	1040-1938
	15 ft (4.6 m)	VX415-116	1040-1939
5/64" (2.0 mm)	15 ft (4.6 m)	VX415-564	1040-1940

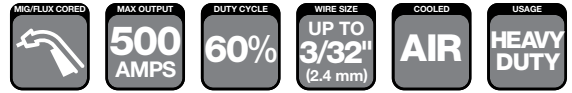
Suffix "K4" = Knucklehead Conductor Tube—Part No. V64SFLXC480 (Stock No. 1640-1124)  
Prefix "DS" = Dual Schedule



RATED OUTPUT			WIRE SIZE	COOLED	APPLICATION USAGE
Amps	Duty Cycle	Gas			
400 Amps	60%	CO <sub>2</sub> Carbon Dioxide	Up To 5/64" (2.0mm)	Air	Heavy Duty Fabrication

**EASY FIND**  
**EASY FIND GUIDE**  
See Page 42 & 43 for Replacement Parts & Optional Accessories





# VELOCITY2 CLASSIC® NO. 5

## 500 AMP MIG GUN



**60% Duty Cycle—CO<sub>2</sub> Carbon Dioxide**  
Suitable for Heavy Duty Fabrication.

### WELDING PROCESSES:

MIG (GMAW), Flux Cored (FCAW), Aluminum (GMAW)

### Standard Options Include:

- Dual Schedule On/Off Control, Locking Trigger & Rear Connector
- Standard Conductor Tube—VCTLS6660 (Stock No. 1660-1251) on all guns up to 15ft (4.6 m)
- VCTLS6645 (Stock No. 1660-1252) on all guns over 15ft (4.6 m)
- Conduit Liner—45 Series

### Tweco® Style Rear Connector

Adapter kits are available to fit Tweco rear connection to most wire feeders

WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To .045" (1.2 mm)	12 ft (3.6 m)	V512-3545	1050-1084
	15 ft (4.6 m)	V515-3545	1050-1085
Up To 1/16" (1.6 mm)	15 ft (4.6 m)	V515-116	1050-1086
	25 ft (7.6 m)	V525-116	1050-1087
Up To 3/32" (2.4 mm)	10 ft (3 m)	V510-332	1050-1088
	15 ft (4.6 m)	V515-332	1050-1089

### Lincoln® Style Rear Connector

Fits Lincoln LN7, 8, 9, SP200

WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To 3/32" (2.4 mm)	15 ft (4.6 m)	VL515-332	1050-1094

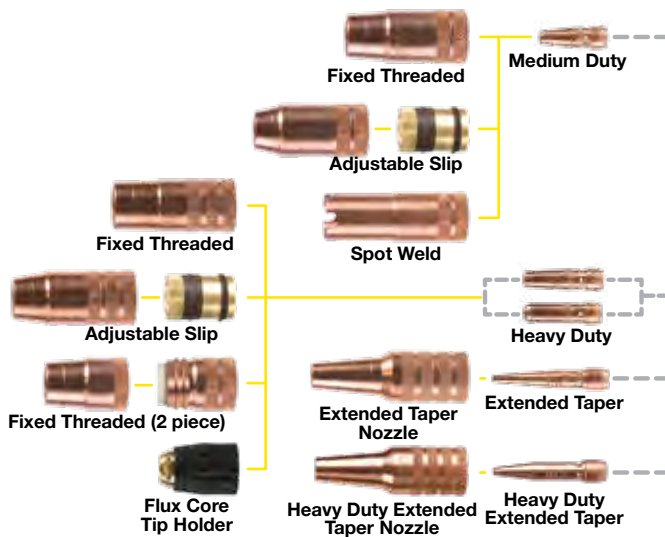
Some Lincoln wire feeders are assembled with their K1500-2 gun receiving bushing that will accept Tweco Style MIG Guns direct from the factory. Control wire Part No. MS354-DSLJ (Stock No. 2060-2137) Must be ordered separately.

### Miller® Style Rear Connector

WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To 1/16" (1.6 mm)	15 ft (4.6 m)	VM515-116	1050-1091
Up To 3/32" (2.4 mm)	15 ft (4.6 m)	VM515-332	1050-1092

### Euro-Kwik Style Rear Connector

WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To 1/16" (1.6 mm)	15 ft (4.6 m)	VX515-116	1050-1096

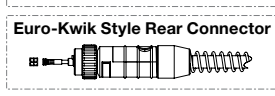
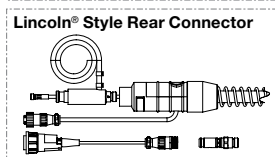
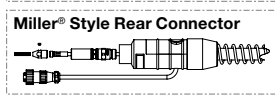
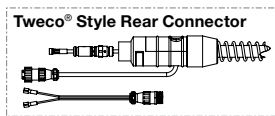
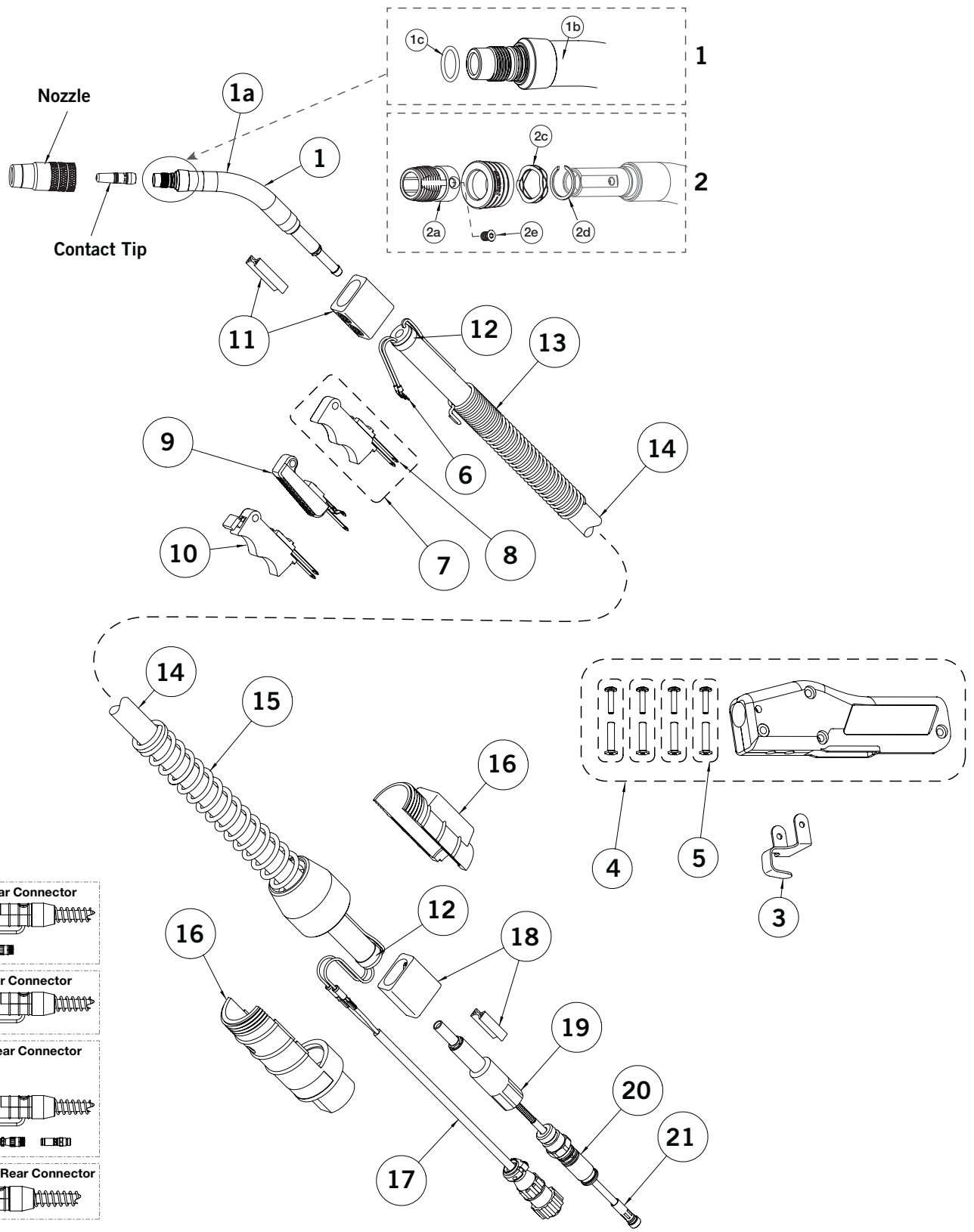


RATED OUTPUT			WIRE SIZE	COOLED	APPLICATION USAGE
Amps	Duty Cycle	Gas			
500 Amps	60%	CO <sub>2</sub> Carbon Dioxide	Up To 3/32" (2.4 mm)	Air	Heavy Duty Fabrication



MIG GUNS

# VELOCITY2 CLASSIC® NO. SERIES REPLACEMENT PARTS



Miller is a registered trademark of Illinois Tool Works, Inc. Lincoln is a registered trademark of Lincoln Electric Co. The aforementioned registered trademarks are in no way affiliated with Tweco. Tweco is registered trademark of ESAB.

# VELOCITY2 CLASSIC® NO. SERIES REPLACEMENT PARTS

#	DESCRIPTION	VELOCITY2 CLASSIC NO. 1	VELOCITY2 CLASSIC NO. 2	VELOCITY2 CLASSIC NO. 3	VELOCITY2 CLASSIC NO. 4	VELOCITY2 CLASSIC NO. 5
		PART NO./ STOCK NO.	PART NO./ STOCK NO.	PART NO./ STOCK NO.	PART NO./ STOCK NO.	PART NO./ STOCK NO.
	Contact Tip	VTS Series	VTM Series	VTM Series	VTH Series	VTH Series
	Nozzle	VNS Series	VNM Series	VNM Series	VNH Series	VNH Series
1	60° VELOCITY2 Conductor Tube Assy.	61-60 1610-1102 VA61-60 1010-1105	VTCLS6260 1620-1375	VTCLS6360 1630-1229	VTCLS6460 1640-1400	VTCLS6660 1660-1251
	45° VELOCITY2 Conductor Tube Assy.	—	VTCLS6245 1620-1376	VTCLS6345 1630-1230	VTCLS6445 1640-1401	VTCLS6645 1660-1252
	80° VELOCITY2 Conductor Tube Assy.	—	VCTL6280 1620-1373	VCTL6380 1630-1227	VCTL6480 1640-1393	VCTL6680 1660-1241
	180° VELOCITY2 Conductor Tube Assy.	—	VCTL62180 1620-1374	VCTL63180 1630-1228	VCTL64180 1640-1394	VCTL66180 1660-1244
1a	Silicone Tubing (Sold/Foot)	VCTLJBLK 1640-1409				
1b	Insulator, VELOCITY2 Conductor Tube Assy.	VCTLSI 1640-1408				
1c	O-Ring (Pkg. Of 10 each)	VCTLS015 1640-1410				
2	60° VELOCITY2 Stainless Steel Conductor Tube Assy.	—	VCTL6260SS 1630-1231	VCTL6360SS 1630-1231	VCTL6460SS 1640-1401	VCTL6660SS 1660-1253
	45° VELOCITY2 Stainless Steel Conductor Tube Assy.	—	VCTL6245SS 1620-1378	VCTL6345SS 1630-1232	VCTL6445SS 1640-1407	VCTL6645SS 1660-1254
	KNUCKLEHEAD Conductor Tube Assy.	—	—	—	V64SFLXC360 1640-1123	—
2a	Threaded Stainless Sleeve	VCTL6SL 1640-1395				
2b	Nozzle Collar	VCTLSLK 1640-1398				
2c	Wave Spring	VCTLSPR 1640-1399				
2d	Wave Spring Retainer	PMA64RS 1640-1396				
2e	Sleeve Screw	VCT41CS 2040-2048				
3	Gun Hanger	152 2020-2152	152 2020-2152	152 2020-2152	154B 2040-2156	154B 2040-2156
4	Handle (Standard)	81 2010-2081	83RC 2030-2084	83RC 2030-2084	84RC 2040-2087	85RC 2050-2088
	Handle (Dual Schedule)	—	—	—	84RC-DS 2040-2088	—
5	Binder Posts & Screws	122FM 2020-2122	122FM 2020-2122	122FM 2020-2122	124FM 2040-2124	124FM 2040-2124
6	Trigger Control Wire Terminal (Standard—2 ea.)	244DS 2040-2245	244 2040-2244	244 2040-2244	244 2040-2244	244 2040-2244
	Trigger Control Wire Terminal (Dual Schedule—4 ea.)	—	—	—	244LK 2040-2246	—
7	Trigger Assembly (Standard)	91 2010-2091	92RR 2020-2093	92RR 2020-2093	94RR 2040-2098	94RR 2040-2098
8	Trigger Blades	91C 2010-2093	94RC 2040-2100	94RC 2040-2100	94RC 2040-2100	94RC 2040-2100
9	Trigger Assembly (Dual Schedule)	—	—	—	94RDS 2040-2101	94RDS 2040-2101
10	Trigger Assembly (Locking)	—	—	—	94R-L 2040-2102	94R-L 2040-2102
11	Front Cable Connector	101R 2010-2103	102 2020-2102	102 2020-2102	104 2040-2104	104 2040-2104
12	Cable Clamp	136 2060-2690	136 2060-2690	136 2060-2690	136 2060-2690	136 2060-2690
13	Front Strain Relief Spring	141-6-SPR 2010-2143	142-6-SPR 2020-2144	142-6-SPR 2020-2144	144-6-SPR 2040-2146	145-6-SPR 2050-2147
14	Cablehoz® (Sold by the Foot)	200 1720-2100	200 1720-2100	300 1730-2100	400 1740-2100	500 1750-2100
15	Rear Strain Relief Spring	235RSSR 2060-2035	235RSSR 2060-2035	235RSSR 2060-2035	235RSSR 2060-2035	235RSSR 2060-2035
16	Rear Case (Direct Plug)	R6RC 2060-2040	R6RC 2060-2040	R6RC 2060-2040	R6RC 2060-2040	R6RC 2060-2040
	Rear Case (Euro)	X6RC 2060-2006	X6RC 2060-2006	X6RC 2060-2006	X6RC 2060-2006	X6RC 2060-2006
17	Control Wire (Standard)	MS354-DSM 2060-2140	MS354-DSM 2060-2140	MS354-DSM 2060-2140	MS354-DSM 2060-2140	MS354-DSM 2060-2140
	Control Wire (Dual Schedule)	194DS 2040-2195	194DS 2040-2195	194DS 2040-2195	194DS 2040-2195	194DS 2040-2195
18	Rear Cable Connector (Direct Plug)	104 2040-2104	104 2040-2104	104 2040-2104	104 2040-2104	104 2040-2104
	Rear Cable Connector (Euro)	172X-M 2020-2181	172X-M 2020-2181	174X-M 2040-2181	174X-M 2040-2181	—
19	Adapter (Direct Plug)	M170-2H 2020-2165	M170-2H 2020-2165	M170-4H 2020-2166	M170-4H 2020-2166	M170-5H 2020-2167
NS	Repair/Conversion Kits	—	83R-CK 2030-2085	83R-CK 2030-2085	84R-CK 2040-2089	85R-CK 2050-2089
20	Connector Plug	Refer to Pages 89-90				
21	Conduit Assembly	Refer to Pages 127-130				
NS	Protective Cable Wrap, 50 ft (15.2 m) per box	TCR50 9900-1150				

\*VA61-60 (Stock No. 1010-1105) is an adapter that threads into the standard Classic No. 1 series conductor tube to allow the VELOCITY2 consumable to be used

Miller is a registered trademark of Illinois Tool Works, Inc. Lincoln is a registered trademark of Lincoln Electric Co. The aforementioned registered trademarks are in no way affiliated with Tweco. Tweco is registered trademark of ESAB.

# Tweco Fusion

## MIG Gun Series

## TWECO FUSION® MIG GUN SERIES

### FEATURES

- **EASY TO MANEUVER** in various welding positions to reduce operator fatigue
- **RUGGED DESIGN** with steel spring strain relief—built tough to last
- **ERGONOMIC HANDLE DESIGN** with diamond pattern for better grip and greater operator appeal
- **IMPACT-RESISTANT HANDLE AND COMPONENTS** for long-lasting durability
- **MICROSWITCH TRIGGER** designed for dependability
- **OPTIMIZED ELECTRICAL SURFACE CONTACT** with improved arc stability
- **VELOCITY2 CONSUMABLES** for longer life and improved performance
- **EASY TO CHANGE VELOCITY2 TIPS**—no threads, no tools needed
- **FEWER CONSUMABLES PARTS** to replace resulting in lower cost of ownership
- **CONTACT TIPS** can be rotated to optimize life requiring fewer changes thus reducing cost of usage
- **SOLID COPPER CONDUCTOR PATH** with fewer connections
- **SMOOTH, STABLE ARC** for a superior welding performance
- **OPTIMIZED WIRE FEEDABILITY** with centered liner
- **BEST IN CLASS PERFORMANCE**

### 250 FEATURES

- **Heavy Duty Chrome Plated Conductor Tube** for improved electrical conductivity
- **Gun Hook** on bottom for easy access

		Tweco Fusion 180	Tweco Fusion 250
<b>Applications</b>		Light Duty Fabrication	Medium/Heavy Duty Fabrication
<b>Standard Options</b>	Rear Connector	■	■
<b>Output Current</b>		180 Amps	250 Amps
<b>Duty Cycle - CO<sub>2</sub></b>		40%	80%
<b>Wire Diameter</b>		Up to .035" (0.9 mm)	Up to .045" (1.2 mm)
<b>Process</b>	MIG	■	■
	Aluminum	■	■

MIG GUNS



# TWECO FUSION® 180 AMP MIG GUN

MIG	MAX OUTPUT <b>180</b> AMPS	DUTY CYCLE <b>40%</b>	WIRE SIZE <b>UP TO .035"</b> (0.9 mm)	COOLED <b>AIR</b>	USAGE <b>LIGHT DUTY</b>
-----	----------------------------------	--------------------------	---	----------------------	----------------------------



**40% Duty Cycle—CO<sub>2</sub> Carbon Dioxide**  
Suitable for Light Duty Fabrication.

**WELDING PROCESSES:**  
MIG (GMAW), Aluminum (GMAW)

- Standard Options Include:**
- High Performance VELOCITY2 Consumables and Rear Connector
  - Conduit Liner—WS42 Series

### Tweco® Style (4 Pin) Rear Connector

Adapter kits are available to fit Tweco rear connection to most wire feeders

WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To .035" (0.9 mm)	12 ft (3.6 m)	F180T-12-3035	1017-1331

### Tweco® Style (8 Pin) Rear Connector ESAB® Rebel™

WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To .035" (0.9 mm)	10 ft (3 m)	F180TA-10-3035	1017-1338
	12 ft (3.6 m)	F180TA-12-3035	1017-1332

### Miller® Style Rear Connector

WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To .035" (0.9 mm)	12 ft (3.6 m)	F180M-12-3035	1017-1330

### Lincoln® Style Rear Connector

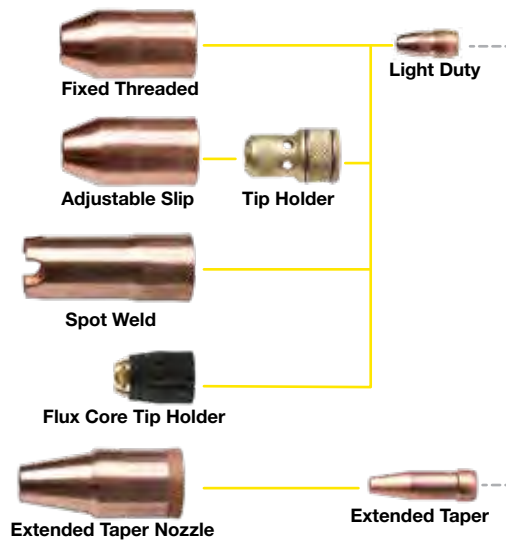
WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To .035" (0.9 mm)	12 ft (3.6 m)	F180L-12-3035	1017-1329

### Euro-Kwik Style Rear Connector

WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To .035" (0.9 mm)	10 ft (3 m)	F180X-10-3035	1017-1335

Conduit Liner—WS42 Series

Note: Gun length is measured from the front case to the rear case +/-3".



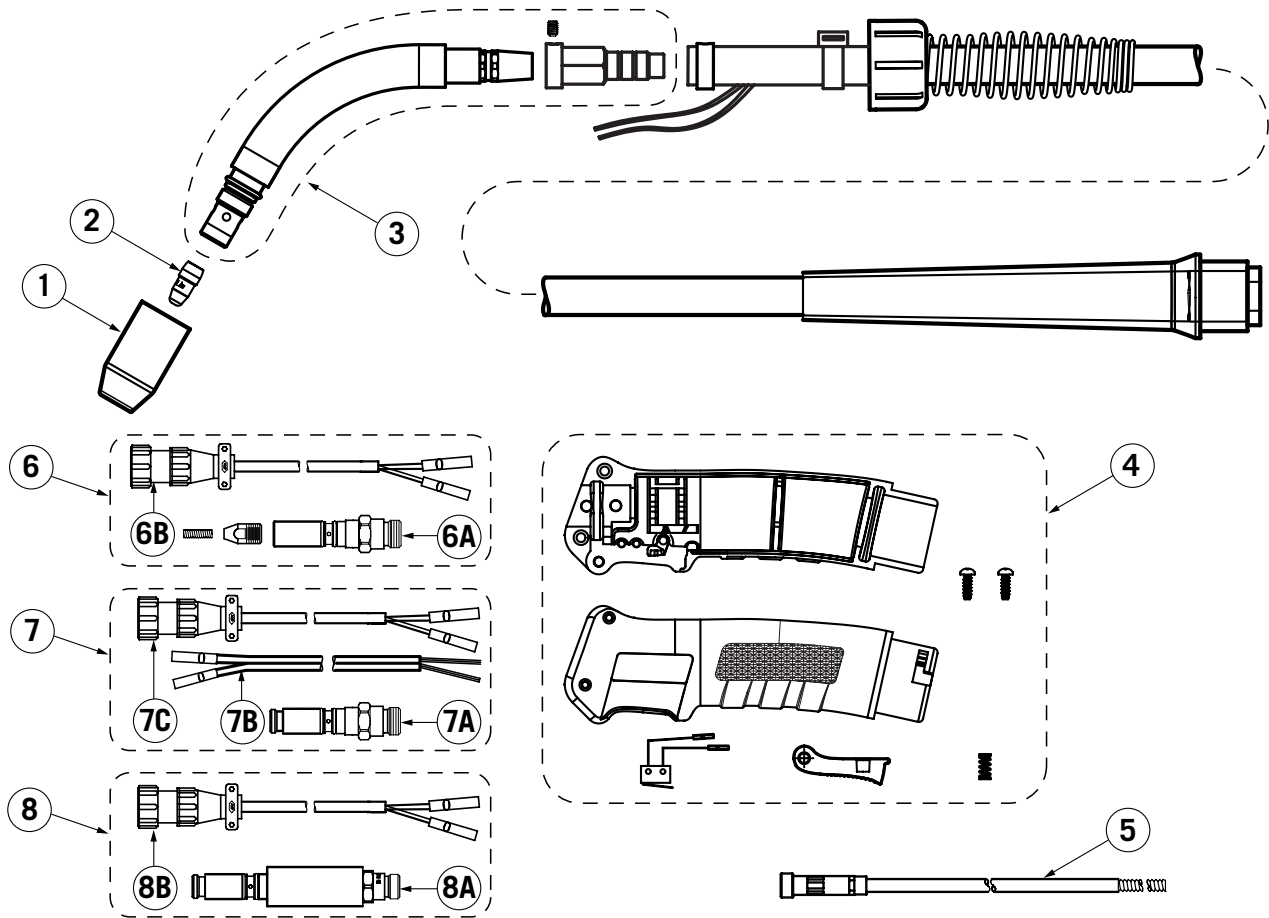
RATED OUTPUT			WIRE SIZE	COOLED	APPLICATION USAGE
Amps	Duty Cycle	Gas			
180 Amps	40%	CO <sub>2</sub> Carbon Dioxide	Up To .035" (0.9 mm)	Air	Light Duty Fabrication

**EASY FIND**  
**EASY FIND GUIDE**  
See Page 47 for Replacement Parts & Optional Accessories

Miller is a registered trademark of Illinois Tool Works, Inc. Lincoln is a registered trademark of Lincoln Electric Co. The aforementioned registered trademarks are in no way affiliated with Tweco. Tweco is registered trademark of ESAB.

# TWECO FUSION® 180 AMP MIG GUN REPLACEMENT PARTS

MIG GUNS



#	DESCRIPTION	PART NO.	STOCK NO.
1	VELOCITY2 Nozzle	Refer to Page 103	
2	VELOCITY2 Contact Tip	Refer to Page 103	
3	Conductor Tube Assembly	FVCTS-220-60	1620-1108
4	Handle / Trigger Repair Kit	F80	2020-2025
5	Conduit Assembly	WS42-3035-15	1420-1140
6A	Miller® Rear Connector	350-174MH	2035-2111
6B	Miller® & Lincoln® Control Wire & Plug	WM354-M	2030-2075
7A	Tweco® Rear Connector	350-174H	2035-2110
7B	Tweco® Control Wire & Plug	35K-350-1	2000-2352
7C	Thermal Arc® Control Wire	WS-354-TA-LC	2060-2141
8A	Lincoln® Rear Connector	350-174HXL	2035-2116
8B	Miller® & Lincoln® Control Wire & Plug	WM354-M	2030-2075

Miller is a registered trademark of Illinois Tool Works, Inc. Lincoln is a registered trademark of Lincoln Electric Co. The aforementioned registered trademarks are in no way affiliated with Tweco. Tweco is registered trademark of ESAB.

# TWECO FUSION® 250 AMP MIG GUN

MIG	MAX OUTPUT <b>250 AMPS</b>	DUTY CYCLE <b>80%</b>	WIRE SIZE <b>UP TO .045"</b> (1.2 mm)	COOLED <b>AIR</b>	USAGE <b>LIGHT DUTY</b>
-----	-------------------------------	--------------------------	---	----------------------	----------------------------



**80% Duty Cycle - CO2 Carbon Dioxide**  
Suitable for Heavy Duty Fabrication.

**WELDING PROCESSES:**  
**MIG (GMAW), Aluminum (GMAW)**

**Standard Options Include:**

- High Performance Velocity™ Consumables and Rear Connector
- Conduit Liner – 42 Series
- Heavy Duty Chrome Plated Conductor Tube for improved electrical conductivity
- Gun Hook on bottom for easy access

**Tweco® Style (4 Pin) Rear Connector**

Adapter kits are available to fit Tweco rear connection to most wire feeders

WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To .045" (1.2 mm)	10 ft (3 m)	<b>FV210-3545</b>	1023-1059
	12 ft (3.6 m)	<b>FV212-3545</b>	1023-1060
	15 ft (4.6 m)	<b>FV215-3545</b>	1023-1260
	20 ft (6.1 m)	<b>FV220-3545</b>	1023-1062
	25 ft (7.6 m)	<b>FV225-3545</b>	1023-1063

Up To .035" (0.9 mm)	10 ft (3 m)	<b>FV210-3545</b>	1023-1059
	10 ft (3 m)	<b>FV210M-3545</b>	1023-1067
	12 ft (3.6 m)	<b>FV212M-3545</b>	1023-1068
	15 ft (4.6 m)	<b>FV215M-3545</b>	1023-1259
	20 ft (6.1 m)	<b>FV220M-3545</b>	1023-1070
	25 ft (7.6 m)	<b>FV225M-3545</b>	1023-1071

**Tweco® Style (8 Pin) Rear Connector**

WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To .045" (1.2 mm)	15 ft (4.6 m)	<b>FV215TA-3545</b>	1023-1261

**Lincoln® Style Rear Connector**

WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To .045" (1.2 mm)	12 ft (3.6 m)	<b>FV212L-3545</b>	1023-1084
	15 ft (4.6 m)	<b>FV215L-3545</b>	1023-1258

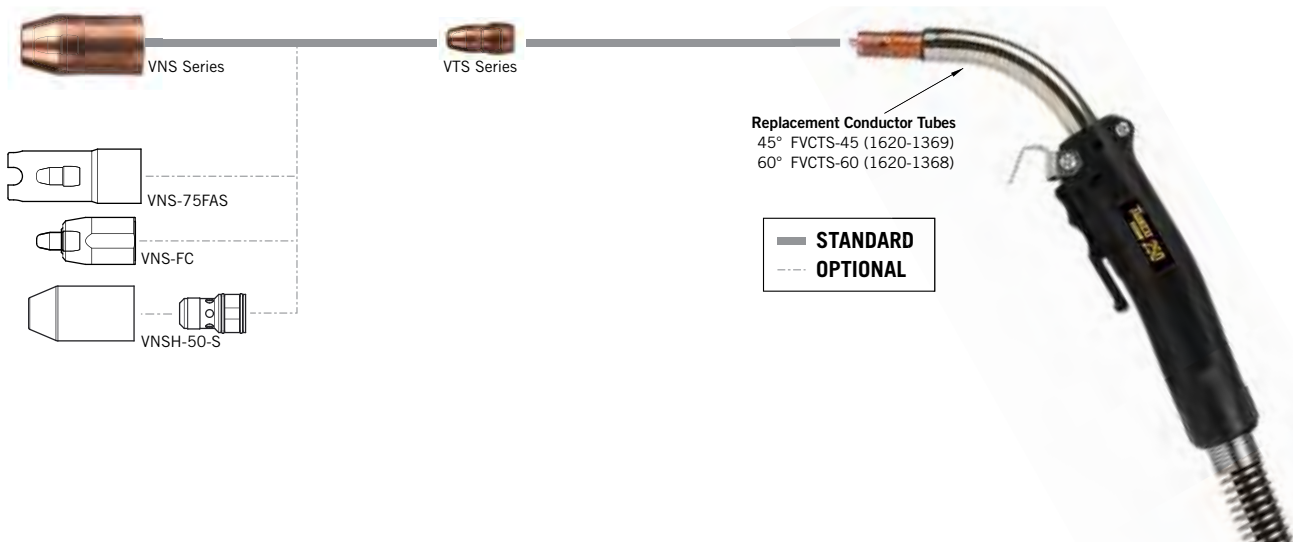
**Miller® Style Rear Connector**

WIRE SIZE	LENGTH	PART NO.	STOCK NO.

**Euro-Kwik Style Rear Connector**

WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To .035" (0.9 mm)	10 ft (3 m)	<b>FV210X-3545</b>	1023-1089
	12 ft (3.6 m)	<b>FV212X-3545</b>	1023-1090
	15 ft (4.6 m)	<b>FV215X-3545</b>	1023-1263
	25 ft (7.6 m)	<b>FV225X-3545</b>	1023-1092

Note: Gun length is measured from the front case to the rear case +/-3".



RATED OUTPUT			WIRE SIZE	COOLED	APPLICATION USAGE
Amps	Duty Cycle	Gas			
250 Amps	80%	CO <sub>2</sub> Carbon Dioxide	Up To .045" (1.2mm)	Air	Heavy Duty Fabrication

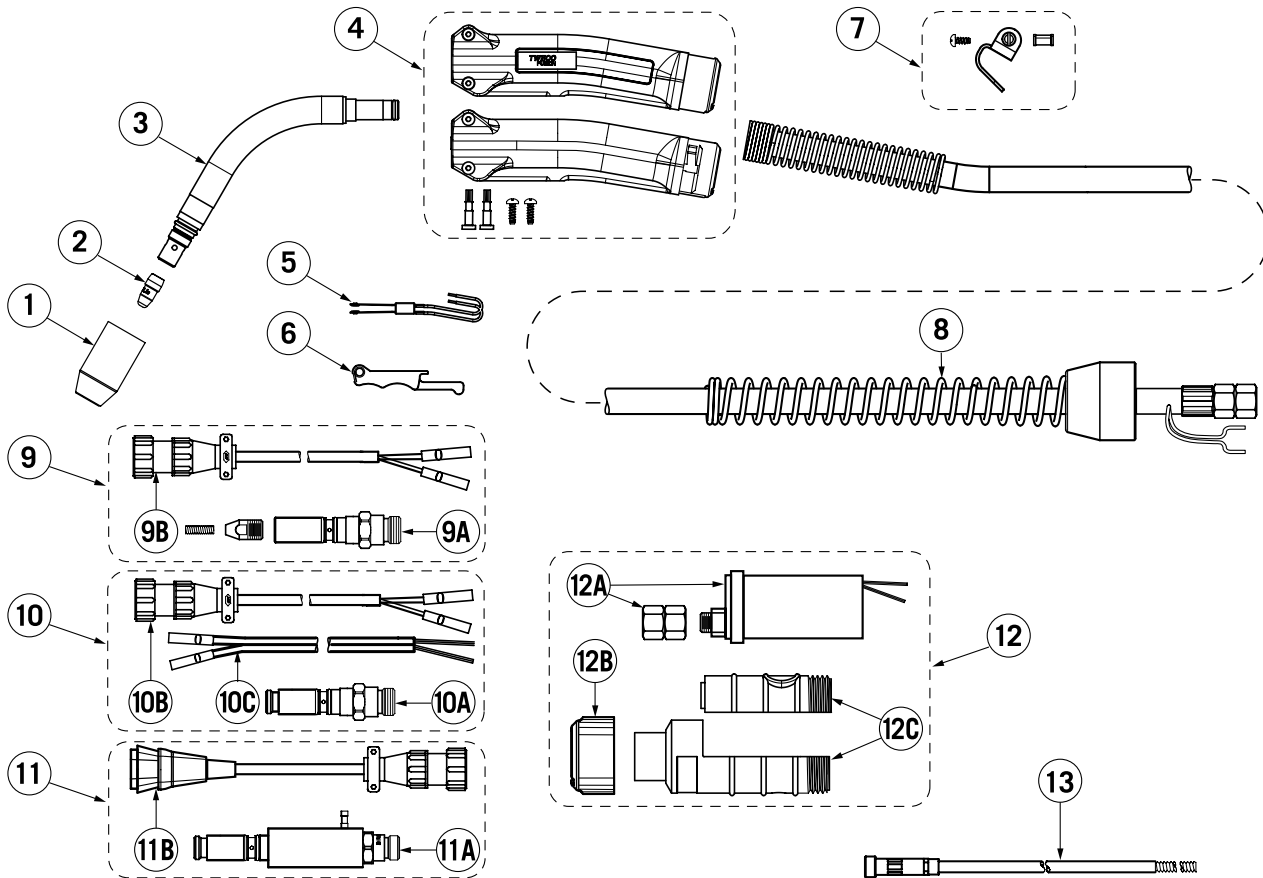
**EASY FIND**  
**EASY FIND GUIDE**  
See Page 49 for Replacement Parts & Optional Accessories

Miller is a registered trademark of Illinois Tool Works, Inc. Lincoln is a registered trademark of Lincoln Electric Co. The aforementioned registered trademarks are in no way affiliated with Tweco. Tweco is registered trademark of ESAB.



# TWECO FUSION® 250 AMP MIG GUN REPLACEMENT PARTS

MIG GUNS



#	DESCRIPTION	PART NO.	STOCK NO.
1	VELOCITY2 Nozzle	Refer to Page 103	
2	VELOCITY2 Contact Tip	Refer to Page 103	
3	Conductor Tube Assembly	FVCTS-220-60	1620-1108
4	Handle / Trigger Repair Kit	F80	2020-2025
5	Conduit Assembly	WS42-3035-15	1420-1140
6A	Miller® Rear Connector	350-174MH	2035-2111
6B	Miller® & Lincoln® Control Wire & Plug	WM354-M	2030-2075
7A	Tweco® Rear Connector	350-174H	2035-2110
7B	Tweco® Control Wire & Plug	35K-350-1	2000-2352
7C	Thermal Arc® Control Wire	WS-354-TA-LC	2060-2141
8A	Lincoln® Rear Connector	350-174HXL	2035-2116
8B	Miller® & Lincoln® Control Wire & Plug	WM354-M	2030-2075

Miller is a registered trademark of Illinois Tool Works, Inc. Lincoln is a registered trademark of Lincoln Electric Co. The aforementioned registered trademarks are in no way affiliated with Tweco. Tweco is registered trademark of ESAB.

## PulseMaster™ MIG Gun Series

### FEATURES

- **“Smart” Capability** with digital display and one-touch, on-the-fly controls to adjust primary parameters such as welding current, material thickness, wire feed speed or arc length trim
- **Heavy Duty Cablehoz® and Conductor Tube** for better current capacity and lower heat in the front end
- **Ergonomic Impact-Resistant Handle** to reduce operator fatigue
- **Heavy Duty Design** for industrial application environments and long-lasting durability
- **Blade-Style Trigger Design** performs over 2 million cycles without failure
- **Multiple-Position Conductor Tube** for quick tool-free change and rotation
- **Increased Interface** between contact tip & gas diffuser improves electrical conductivity
- **High-Performance Cable** designed for pulse welding demands with smooth feed performance to reduce “bird nesting” and provide excellent flexibility
- **Twin-Pulse Mode** for the perfect weld bead
- **Heavy Duty Contact Tip and Diffuser** to act as “heat sink” in high heat applications
- **Improved Performance** with longer-life consumables

# PulseMaster







## MIG Gun Series

		PulseMaster 450 Amp
<b>Applications</b>		Heavy Duty Fabrication
<b>Standard Options</b>	Smart Capability	■
	Standard without "Smart" Capability	■
	Rear Connector	■
<b>Output Current</b>		450 Amps
<b>Duty Cycle - Mixed Gases</b>		60%
<b>Wire Diameter</b>		Up to .045" (1.2 mm)
<b>Process</b>	MIG	■
	Aluminum	■

For Special MIG gun configurations, including special consumables, please contact Tech Service and Support.



# PulseMaster™ 450 Amp MIG Gun

 MIG	 MAX OUTPUT <b>450</b> AMPS	 DUTY CYCLE <b>60%</b>	 WIRE SIZE <b>UP TO .045"</b> (1.2 mm)	 COOLED <b>AIR</b>	 USAGE <b>HEAVY DUTY</b>
---	---	--	--	--	--



Tweco® PulseMaster Smart MIG® Gun with digital display

Tweco PulseMaster Standard MIG Gun

**60% Duty Cycle - Mixed Gases**

Suitable for Heavy Duty Fabrication.

**WELDING PROCESSES:**  
MIG (GMAW), Aluminum (GMAW)

**Standard Options Include:**

- Rear Connector
- Standard without “Smart” Capability but available with “Smart” Capability
- Standard Conductor Tube – Part No. PMA64EL-45 (Stock No. 1642-1130)
- Conduit Liner – 44 Series

**Smart Gun** *PulseMaster Smart MIG Guns are used only with Tweco® PowerMaster SP machines and are available with “Smart” Capability.*

**Tweco® Style Rear Connector**

Wire Size	Length	Part No.	Stock No.
Up To .045" (1.2 mm)	12 ft (3.6 m)	<b>PMAS412-3545</b>	1041-1510
	15 ft (4.6 m)	<b>PMAS415-3545</b>	1041-1511

**Euro-Kwik Style Rear Connector**

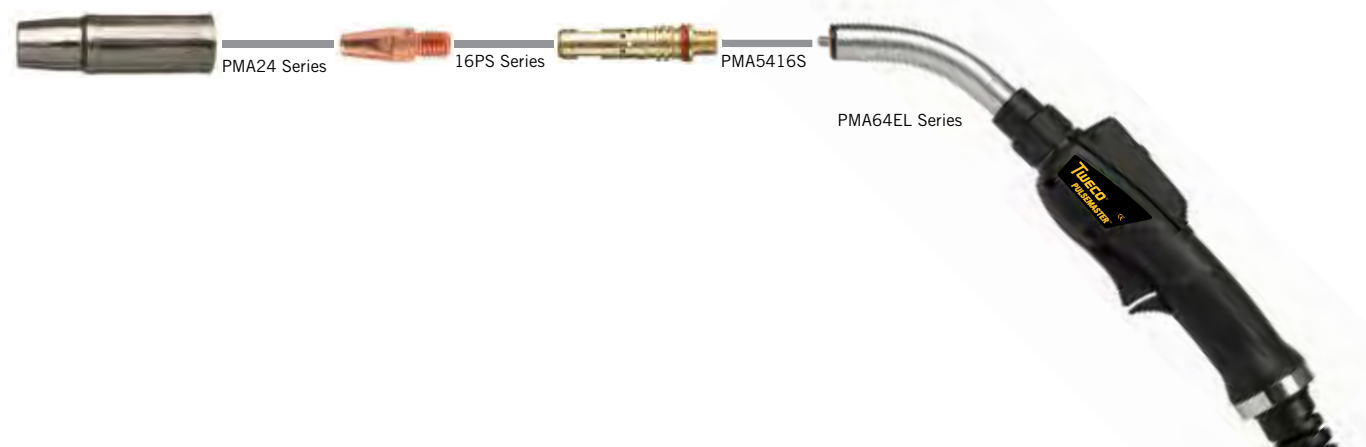
Wire Size	Length	Part No.	Stock No.
Up To .045" (1.2 mm)	12 ft (3.6 m)	<b>PMAS412X-3545</b>	1041-1515
	15 ft (4.6 m)	<b>PMAS415X-3545</b>	1041-1516

**Standard Gun** *PulseMaster MIG Guns are Standard without “Smart” Capability.*

**Tweco® Style Rear Connector**

*Adapter kits are available to fit Tweco rear connection to most wire feeders*

Wire Size	Length	Part No.	Stock No.
Up To .045" (1.2 mm)	12 ft (3.6 m)	<b>PMA412-3545</b>	1041-1500



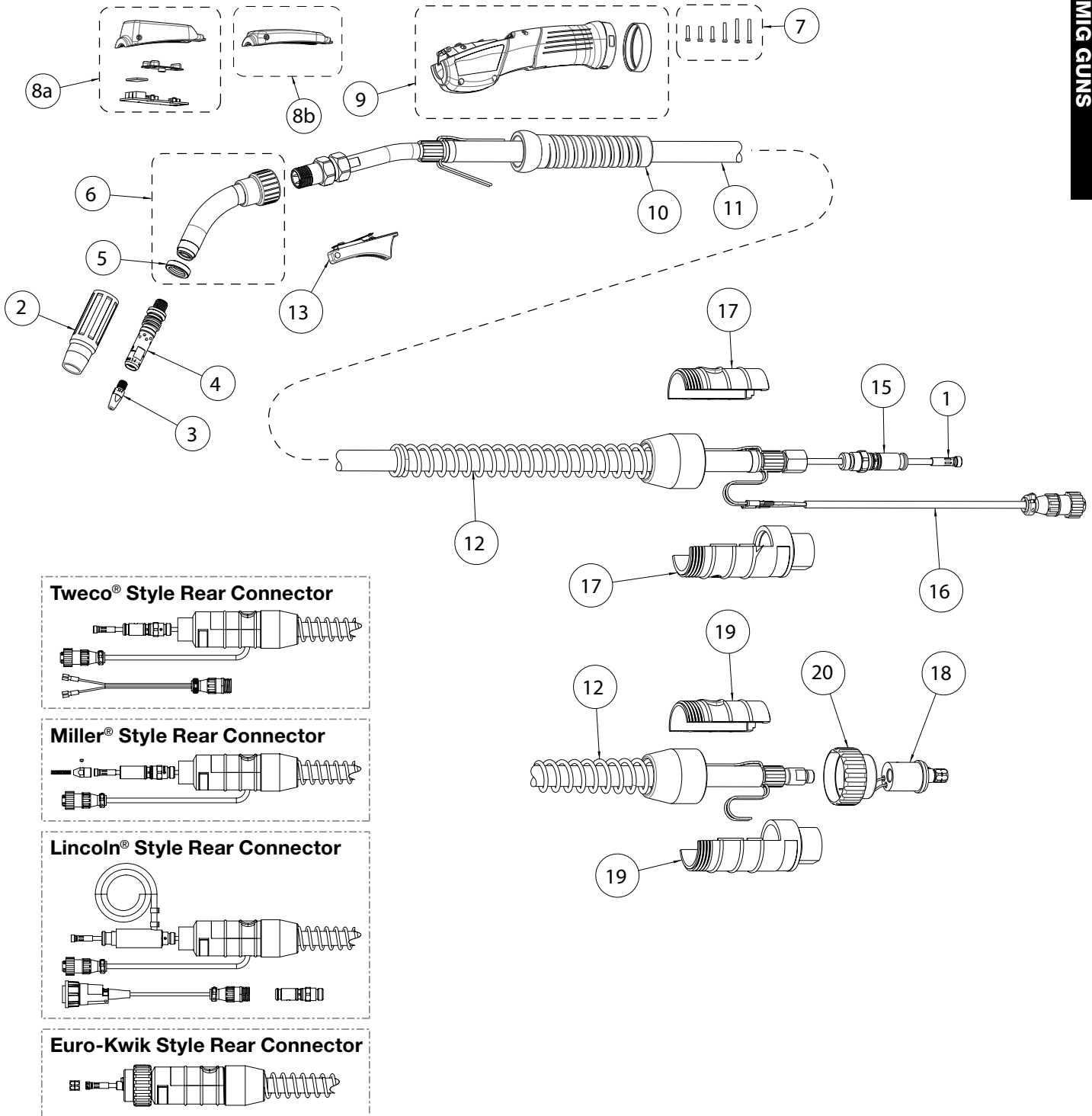
Rated Output			Wire Size	Cooled	Application Usage
Amps	Duty Cycle	Gas			
450 Amps	60%	Mixed	Up To .045" (1.2 mm)	Air	Heavy Duty Fabrication

**EASY FIND EASY FIND GUIDE**  
See Page 53 & 54 for Replacement Parts & Optional Accessories

Miller is a registered trademark of Illinois Tool Works, Inc. Lincoln is a registered trademark of Lincoln Electric Co. The aforementioned registered trademarks are in no way affiliated with Tweco. Tweco is registered trademark of ESAB.

# PulseMaster™ Series Replacement Parts

MIG GUNS



# PulseMaster™ Series Replacement Parts

MIG GUNS

#	Description	Part No.	Stock No.
1	Conduit Assembly	Refer to Pages 127-130	
2	Nozzle	PMA24 Series	
3	Contact Tip	16PS Series	
4	Gas Diffuser used w/ 16PS Series Contact Tips	PMA54-16S	1543-1106
5	Nozzle Insulator	66J-3	1660-1836
6	Conductor Tube	PMA64EL Series	
7	Handle Screws w/ T9 Star Head (12 mm, 16 mm, & 20 mm LG)	PMHSK	2060-2705
8a	Handle Housing w/ Smart Control Assembly	PM84-PCB-HK	2060-2706
8b	Handle Housing (Blank)	PM84-H	2060-2707
9	Large Handle Assembly w/ Retaining Ring	PM84	2060-2708
	Small Handle Assembly w/ Retaining Ring	PM83	2060-2715
10	Front Cable Support	--	--
11	Cablehoz® Assembly	--	--
12	Rear Cable Support	235RSSR	2060-2035
13	Trigger	PM94	2060-2712
15	Connector Plug	Refer to Pages 89-90	
16	Control Wire Plug	MS354-DSM	2060-2140
17	Rear Case	--	--
18	Euro-Kwik Rear Connector	174EX-1	2040-2276
19	Rear Case & Strain Relief (Euro)	X6RC	2060-2006
20	Connector Nut (Euro)	174X-2	2040-2177
NS	Protective Cable Wrap, 50 ft (15 m) per box	TCR50	9900-1150



## Compact Eliminator<sup>®</sup> MIG Gun Series

### FEATURES

- **Operator appeal** with ergonomic handle to reduce operator fatigue and extended trigger length to reduce radiated heat to welder's gloved hand
- **Field repairable** split-half handle case provides access for ease of repair with field repairable mechanical cable connections available
- **Improved performance patented contact tip** with no threads cam style interface between contact tip & gas diffuser for increased surface contact
- **Ball & socket conductor tube design** with articulating conductor tube and three layer conductor tube construction (Copper Tube/Silicon Resin Fiberglass Insulator/Metal Jacket)
- **Wide welding applications** spray transfer & pulse welding modes straight CO<sub>2</sub> or mixed gases



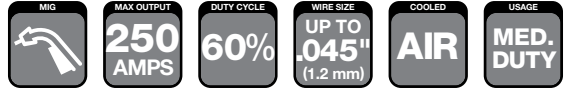
**Eliminator<sup>®</sup>**  
MIG Gun Series

		Compact Eliminator® 250	Compact Eliminator 450
<b>Applications</b>		Light/Medium Duty Fabrication	Heavy Duty Fabrication
<b>Standard Options</b>	Rear Connector	■	■
	Dual Schedule		■
	Knucklehead Flexible Conductor Tube	■	■
<b>Output Current</b>		250 Amps	450 Amps
<b>Duty Cycle - CO<sub>2</sub></b>		60%	60%
<b>Wire Diameter</b>		Up to .045" (1.2 mm)	Up to 1/16" (1.6 mm)
<b>Process</b>	MIG	■	■
	Aluminum	■	■
	Flux-Cored Gas Shielded	■	■
	Flux-Cored Self Shielded	■	■

For Special MIG gun configurations, including special consumables, please contact Tech Service and Support.







# Compact Eliminator® 250 Amp MIG Gun



**60% Duty Cycle - CO<sub>2</sub> Carbon Dioxide**  
Suitable for Light/Medium Duty Fabrication.

**WELDING PROCESSES:**

**MIG (GMAW), Aluminum (GMAW), Flux-Cored Gas Shielded, Flux-Cored Self Shielded**

**Standard Options Include:**

- Rear Connector
- Standard Conductor Tube – Part No. EL63J-45 (Stock No. 1630-1136)
- Conduit Liner – 44 Series

MIG GUNS

## Tweco® Style Rear Connector

Adapter kits are available to fit Tweco rear connection to most wire feeders

Wire Size	Length	Part No.	Stock No.
Up To .045" (1.2 mm)	12 ft (3.6 m)	<b>ELC212-4045</b>	1028-1108
	15 ft (4.6 m)	<b>ELC215-4045</b>	1028-1112

## Miller® Style Rear Connector

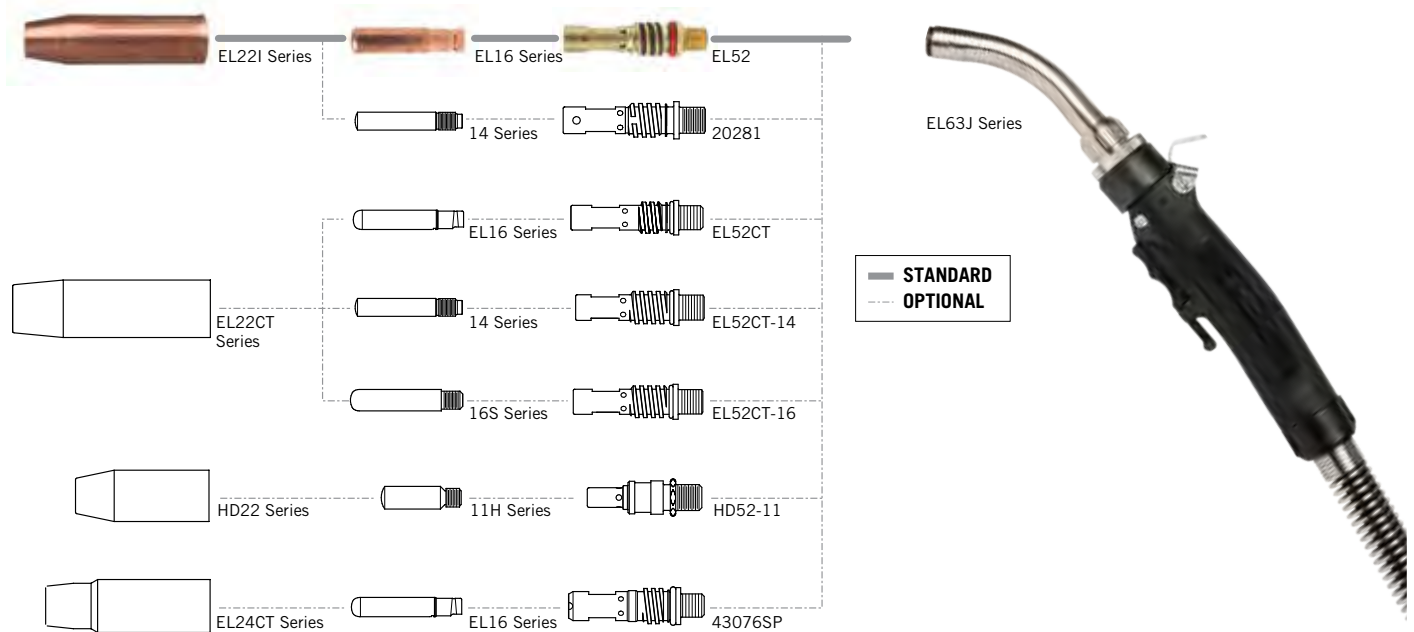
Wire Size	Length	Part No.	Stock No.
Up To .045" (1.2 mm)	12 ft (3.6 m)	<b>ELC212M-4045</b>	1028-1158
	15 ft (4.6 m)	<b>ELC215M-4045</b>	1028-1162
	25 ft (7.6 m)	<b>ELC225M-4045</b>	1028-1170

## Lincoln® Style Rear Connector

Wire Size	Length	Part No.	Stock No.
Up To .035" (1.0 mm)	15 ft (4.6 m)	<b>ELC215L-3035</b>	1028-1186

## Flexible Knucklehead™

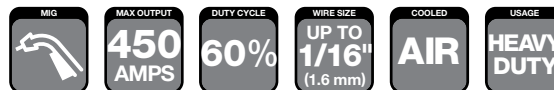
Amp/Model	Bend Angle	EL Cons	Part No.	Stock no.
250	60°	■	<b>EL62SFLX3-60</b>	1620-1115
	80°	■	<b>EL62SFLX4-80</b>	1620-1116



Rated Output			Wire Size	Cooled	Application Usage
Amps	Duty Cycle	Gas			
250 Amps	60%	CO <sub>2</sub> Carbon Dioxide	Up To .045" (1.2 mm)	Air	Light/Medium Duty Fabrication

**EASY FIND GUIDE**  
See Page 59 for Replacement Parts & Optional Accessories

Miller is a registered trademark of Illinois Tool Works, Inc. Lincoln is a registered trademark of Lincoln Electric Co. The aforementioned registered trademarks are in no way affiliated with Tweco. Tweco is registered trademark of ESAB.



# Compact Eliminator® 450 Amp MIG Gun



**60% Duty Cycle - CO<sub>2</sub> Carbon Dioxide**

Suitable for Heavy Duty Fabrication.

**WELDING PROCESSES:**

MIG (GMAW), Aluminum (GMAW), Flux-Cored Gas Shielded, Flux-Cored Self Shielded

**Standard Options Include:**

- Rear Connector
- Standard Conductor Tube – Part No. EL64J-60 (Stock No. 1640-1137) on all guns up to 15 ft (4.6 m)
- Part No. EL64J-45 (Stock No. 1640-1136) on all guns over 15 ft (4.6 m)
- Conduit Liner – 44 Series

## Tweco® Style Rear Connector

Adapter kits are available to fit Tweco rear connection to most wire feeders

Wire Size	Length	Part No.	Stock No.
Up To .045" (1.2mm)	15 ft (4.6 m)	ELC415-3545	1048-1210
	15 ft (4.6 m)	ELC415-116	1048-1211
Up To 1/16" (1.6mm)	20 ft (6.1 m)	ELC420-116	1048-1216
	25 ft (7.6 m)	ELC425-116	1048-1221

## Miller® Style Rear Connector

Wire Size	Length	Part No.	Stock No.
Up To .045" (1.2mm)	10 ft (3 m)	ELC410M-3545	1048-1250
	12 ft (3.6 m)	ELC412M-3545	1048-1255
	15 ft (4.6 m)	ELC415M-3545	1048-1260
Up To 1/16" (1.6mm)	15 ft (4.6 m)	ELC415M-116	1048-1261
	25 ft (7.6 m)	ELC425M-116	1048-1271

## Lincoln® Style Rear Connector

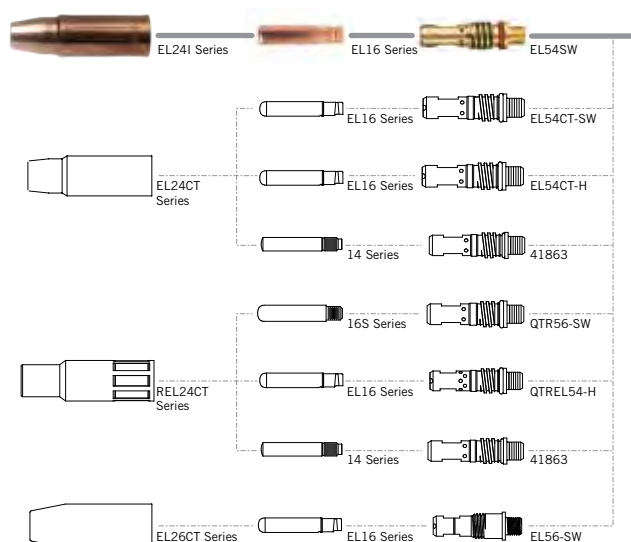
Wire Size	Length	Part No.	Stock No.
Up To .045" (1.2mm)	15 ft (4.6 m)	ELC415L-3545	1048-1285
Up To 1/16" (1.6mm)	15 ft (4.6 m)	ELC415L-116	1048-1286

## Euro-Kwik Style Rear Connector

Wire Size	Length	Part No.	Stock No.
Up To .045" (1.2mm)	12 ft (3.6 m)	XELC412-3545	1048-1230
	15 ft (4.6 m)	XELC415-3545	1048-1235

## Flexible Knucklehead™

Amp/Model	Bend Angle	EL Cons	Long Reach	Part No.	Stock no.
450	60°	▪		EL64SFLX3-60	1640-1143
	80°	▪		EL62SFLX4-80	1640-1144
	60	▪	▪	EL62SFLX4-80LR	1640-1149



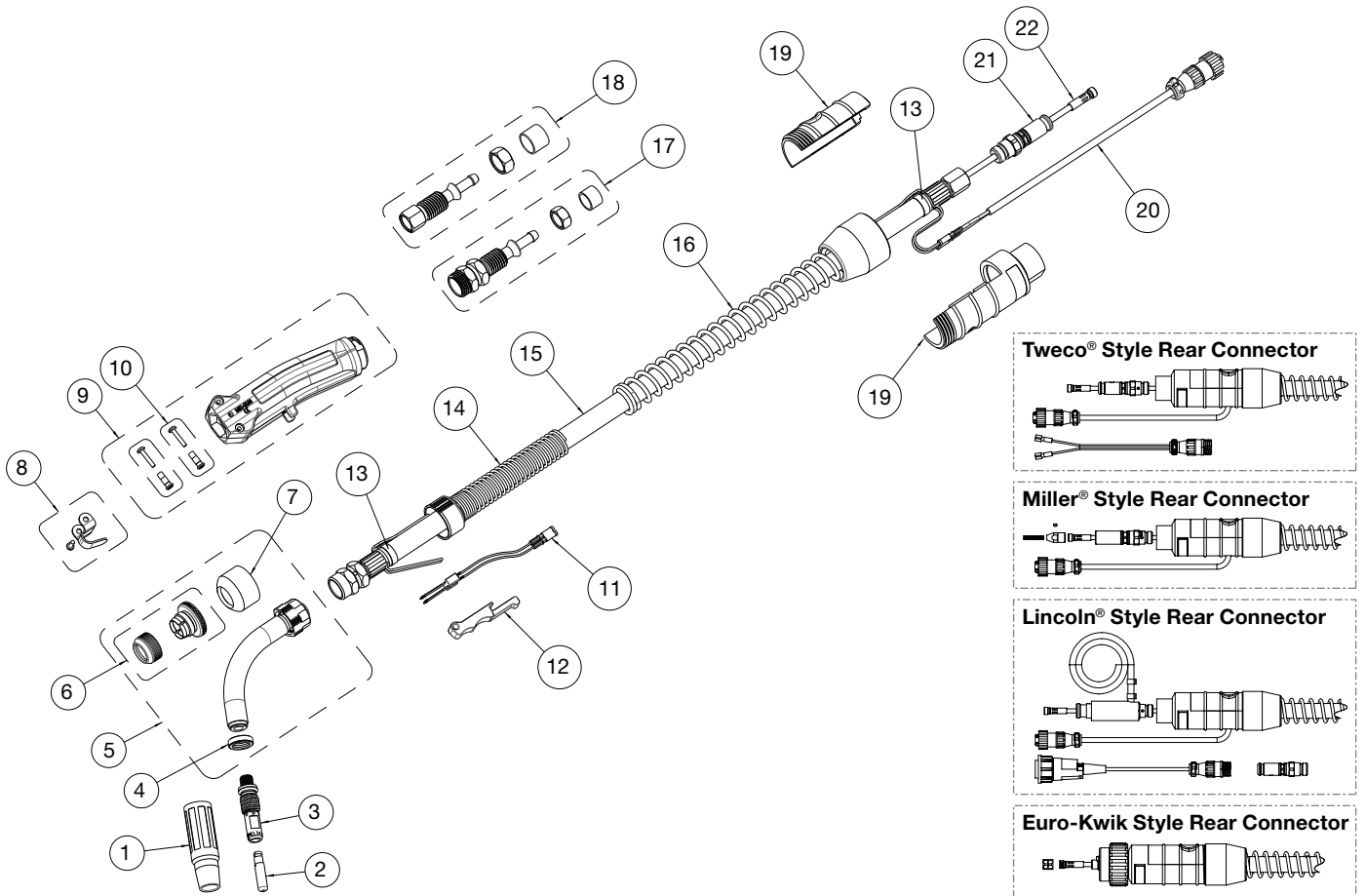
— STANDARD  
- - - OPTIONAL

Rated Output			Wire Size	Cooled	Application Usage
Amps	Duty Cycle	Gas			
450 Amps	60%	CO <sub>2</sub> Carbon Dioxide	Up To 1/16" (1.6 mm)	Air	Heavy Duty Fabrication

**EASY FIND EASY FIND GUIDE**  
See Page 59 for Replacement Parts & Optional Accessories

Miller is a registered trademark of Illinois Tool Works, Inc. Lincoln is a registered trademark of Lincoln Electric Co. The aforementioned registered trademarks are in no way affiliated with Tweco. Tweco is registered trademark of ESAB.


# Compact Eliminator® Series Replacement Parts



MIG GUNS

#	Description	Compact 250 Amp	Compact 450 Amp
		Part No. / Stock No.	Part No. / Stock No.
1	Nozzle	<b>EL22I Series</b>	<b>EL24I Series</b>
2	Contact Tip	<b>EL16 Series</b>	<b>EL16 Series</b>
3	Diffuser	<b>EL52 Series</b>	<b>EL54 Series</b>
4	Nozzle Insulator	<b>63J-3 / 1630-1121</b>	<b>63J-3 / 1630-1121</b>
5	Conductor Tube	<b>EL63J Series</b>	<b>EL64J Series</b>
6	Nut Cover Ring & Sleeve	<b>EL66-CR21 / 2060-2666</b>	<b>EL66-CR21 / 2060-2666</b>
7	Nut Insulator	<b>EL66-CR / 2060-2667</b>	<b>EL66-CR / 2060-2667</b>
8	Gun Hanger	<b>152 / 2020-2152</b>	<b>152 / 2020-2152</b>
9	Handle (Includes Items #10 & #12)	<b>ELC84-H / 2060-2643</b>	<b>ELC84-H / 2060-2643</b>
10	Binder Posts & Screws (2 Required)	<b>ELC124FM / 2060-2646</b>	<b>ELC124FM / 2060-2646</b>
11	Trigger Blade Assembly	<b>ELC94-BL / 2060-2671</b>	<b>ELC94-BL / 2060-2671</b>
12	Trigger	<b>ELC94 / 2060-2647</b>	<b>ELC94 / 2060-2647</b>
13	Cable Clamp	<b>136 / 2060-2690</b>	<b>136 / 2060-2690</b>
14	Front Strain Relief Spring & Cap	<b>MS144 / 2060-2131</b>	<b>MS144 / 2060-2131</b>
15	Cablehoz Assembly, 15 ft (5 m) (Direct Plug)	<b>ELC215R / 1720-2142</b>	<b>ELC415R / 1740-2527</b>
15	Cablehoz Assembly, 15 ft (5 m) (Euro)	--	<b>XELC415R / 1740-2532</b>
16	Rear Strain Relief Spring	<b>235RSSR / 2060-2035</b>	<b>235RSSR / 2060-2035</b>
17	Front Cable Connector Repair Kit	<b>ELC100-2RK / 2020-2182</b>	<b>ELC100-4RK / 2040-2187</b>
18	Rear Cable Connector Repair Kit (Direct Plug)	--	<b>350-170HK / 2035-2169</b>
18	Rear Cable Connector Repair Kit (Euro)	<b>172X-M / 2020-2181</b>	<b>174X-M / 2040-2181</b>
19	Rear Case (Direct Plug)	<b>C6RC / 2060-2041</b>	<b>C6RC / 2060-2041</b>
19	Rear Case (Euro)	<b>X6RC / 2060-2006</b>	<b>X6RC / 2060-2006</b>
20	Control Wire (Direct Plug Only)	<b>MS354-DSM / 2060-2140</b>	<b>MS354-DSM / 2060-2140</b>
21	Connector Plug	<b>Refer to Pages 89-90</b>	<b>Refer to Pages 89-90</b>
22	Conduit Assembly	<b>Refer to Pages 127-130</b>	<b>Refer to Pages 127-130</b>
NS	Protective Cable Wrap (50 ft/ 15 m per Box)	<b>TCR50 / 9900-1150</b>	<b>TCR50 / 9900-1150</b>

# Mini-MIG 160 Amp MIG Gun



**MAX OUTPUT**  
**160**  
**AMPS**

**DUTY CYCLE**  
**60%**

**WIRE SIZE**  
**UP TO**  
**.035"**  
(0.9 mm)

**COOLED**  
**AIR**

**USAGE**  
**LIGHT**  
**DUTY**

**WELDING PROCESSES:**  
**MIG (GMAW), Flux Cored (FCAW),**  
**Aluminum (GMAW)**

**Standard Options Include:**

- Rear Connector and Knucklehead™ Flexible Conductor Tube
- Standard Conductor Tube – Part No. 35-60-60 (Stock No. 1600-1102) on all guns
- Conduit Liner – 23 & 35 Series



**60% Duty Cycle - CO<sub>2</sub> Carbon Dioxide**  
 Suitable for Light Duty Fabrication.

## Tweco® Style Rear Connector

Adapter kits are available to fit Tweco rear connection to most wire feeders

Wire Size	Length	Part No.	Stock No.
Up To .035" (0.9 mm)	10 ft (3 m)	<b>35-10</b>	1000-1131
	12 ft (3.6 m)	<b>35-12</b>	1000-1132
	15 ft (4.6 m)	<b>35-15</b>	1000-1133

## Miller® Style Rear Connector

Wire Size	Length	Part No.	Stock No.
Up To .035" (0.9 mm)	10 ft (3 m)	<b>M23-10</b>	1000-1210
	10 ft (3 m)	<b>M35-10</b>	1000-1211
	12 ft (3.6 m)	<b>M35-12</b>	1000-1213
	15 ft (4.6 m)	<b>M35-15</b>	1000-1215

## Lincoln® Style Rear Connector

Fits Lincoln LN7, 8, 9, SP200

Wire Size	Length	Part No.	Stock No.
Up To .035" (0.9 mm)	10 ft (3 m)	<b>L35-10</b>	1000-1231
	12 ft (3.6 m)	<b>L35-12</b>	1000-1232
	15 ft (4.6 m)	<b>L35-15</b>	1000-1233
	15 ft (4.6 m)	<b>L35-15PM*</b>	1000-1236

Some Lincoln wire feeders are assembled with their K1500-2 gun receiving bushing that will accept Tweco Style MIG Guns direct from the factory. Control wire Part No. MS354-DSLJ (Stock No. 2060-2137) Must be ordered separately.  
 \*Fits Lincoln Power MIG 140/180 machines.

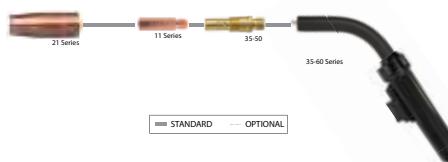
## Euro-Kwik Style Rear Connector

Wire Size	Length	Part No.	Stock No.
Up To .035" (0.9 mm)	10 ft (3 m)	<b>X23-10</b>	1000-1621
	10 ft (3 m)	<b>X35-10</b>	1000-1631
	12 ft (3.6 m)	<b>X35-12</b>	1000-1632
	15 ft (4.6 m)	<b>X35-15</b>	1000-1633

For additional information on adapter kits for other manufacturers' machines, refer to Form No. TAKL-97.

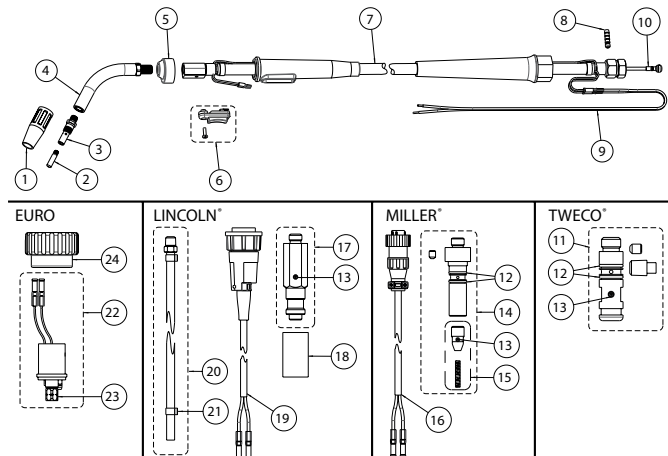
## Flexible Knucklehead™

Amp/Model	Bend Angle	EL Cons	Part No.	Stock no.
Mini	60°	■	<b>3560SFLX3-60</b>	1600-1139
	60	■	<b>3560SFLX4-80</b>	1600-1141



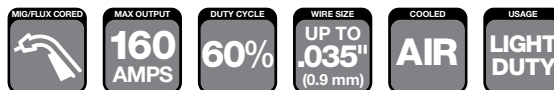
Rated Output			Wire Size	Cooled	Application Usage
Amps	Duty Cycle	Gas			
160 Amps	60%	CO <sub>2</sub> Carbon Dioxide	Up To .035" (0.9 mm)	Air	Light Duty Fabrication

## Mini-MIG Gun Replacement Parts



#	Description	Part No.	Stock No.
1	Nozzle	<b>21 Series</b>	
2	Contact Tip	<b>11 Series</b>	
3	Diffuser	<b>35-50</b>	
4	Conductor Tube	<b>35-60 Series</b>	
5	Handle Cap	<b>35-80-A1</b>	2000-2081
6	Trigger with Screw	<b>35-90</b>	2000-2090
7	Cablehoz® Assembly 10 ft (3 m) (Direct Plug)	<b>35-010A</b>	1700-2126
	Cablehoz Assembly 12 ft (3.6 m) (Direct Plug)	<b>35-012A</b>	1700-2127
	Cablehoz Assembly 15 ft (4.6 m) (Direct Plug)	<b>35-015A</b>	1700-2128
8	Gas Nipple	<b>35-170-5</b>	2000-2175
9	Control Wire	<b>35K350-1</b>	2000-2352
10	Conduit Assembly	<b>Refer to Pages 127-130</b>	
11	Tweco® Connector Plug	<b>35K-174C</b>	2000-2169
12	O-Ring (Package of 10)	<b>224S</b>	2064-2059
13	Set Screw (Package of 10)	<b>44CS</b>	2040-2046
14	Miller® Connector Plug	<b>170M</b>	2000-2810
15	Wire Guide Assembly Only	<b>174M-N</b>	2040-2184
16	Miller Control Wire	<b>WM-354M</b>	2030-2075
17	Lincoln® SP200 Connector Plug	<b>TLAK-352</b>	2641-2030
18	Lincoln Insulator	<b>LAK-352-1</b>	2642-2210
19	Lincoln Control Wire	<b>35SP-354</b>	2000-2354
20	Gas Hose Assembly with Clamp	<b>AK353</b>	2642-2300
21	Gas Hose Clamp Only	<b>AK-353-2A</b>	2642-2302
22	Euro-Kwik Body Assembly	<b>174EX-1</b>	2040-2276
23	Euro-Kwik Conduit Cap Only	<b>174EX-1C</b>	2040-2279
24	Euro-Kwik Nut	<b>174X-2</b>	2040-2177
NS	Protective Cable Wrap, 50 ft (15 m) per box	<b>TCR50</b>	9900-1150

Miller is a registered trademark of Illinois Tool Works, Inc. Lincoln is a registered trademark of Lincoln Electric Co. The aforementioned registered trademarks are in no way affiliated with Tweco. Tweco is registered trademark of ESAB.



# VELOCITY2™ Mini-MIG 160 Amp MIG Gun



**60% Duty Cycle - CO<sub>2</sub> Carbon Dioxide**  
Suitable for Light Duty Fabrication.

**WELDING PROCESSES:**  
MIG (GMAW), Flux Cored (FCAW),  
Aluminum (GMAW)

**Standard Options Include:**

- Rear Connector
- Standard Conductor Tube – Part No. VCTS35-60-60 (Stock No. 1600-1106) on all guns
- Conduit Liner – 23 & 35 Series

## Tweco® Style Rear Connector

Adapter kits are available to fit Tweco rear connection to most wire feeders

Wire Size	Length	Part No.	Stock No.
Up To .035" (0.9 mm)	10 ft (3 m)	V35-10	1000-1800
	12 ft (3.6 m)	V35-12	1000-1801
	15 ft (4.6 m)	V35-15	1000-1802

## Miller® Style Rear Connector

Wire Size	Length	Part No.	Stock No.
Up To .035" (0.9 mm)	10 ft (3 m)	VM23-10	1000-1804
	10 ft (3 m)	VM35-10	1000-1805
	10 ft (3 m)	VHB35M-10	1000-1806
	12 ft (3.6 m)	VM35-12	1000-1807
	15 ft (4.6 m)	VM35-15	1000-1808

## Lincoln® Style Rear Connector

Fits Lincoln LN7, 8, 9, SP200

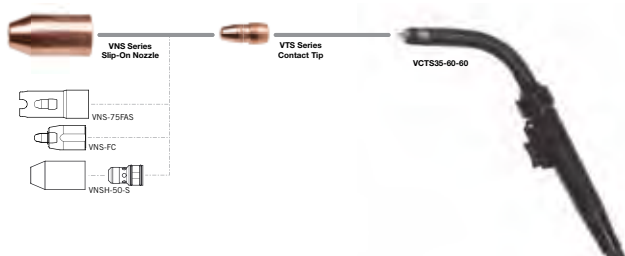
Wire Size	Length	Part No.	Stock No.
Up To .035" (0.9 mm)	10 ft (3 m)	VL35-10	1000-1810
	10 ft (3 m)	VHB35L-10	1000-1811
	12 ft (3.6 m)	VL-35-12	1000-1812
	15 ft (4.6 m)	VL35-15	1000-1813
	15 ft (4.6 m)	VL35-15PM	1000-1814

Some Lincoln wire feeders are assembled with their K1500-2 gun receiving bushing that will accept Tweco Style MIG Guns direct from the factory. Control wire Part No. MS354-DSLJ (Stock No. 2060-2137) Must be ordered separately.

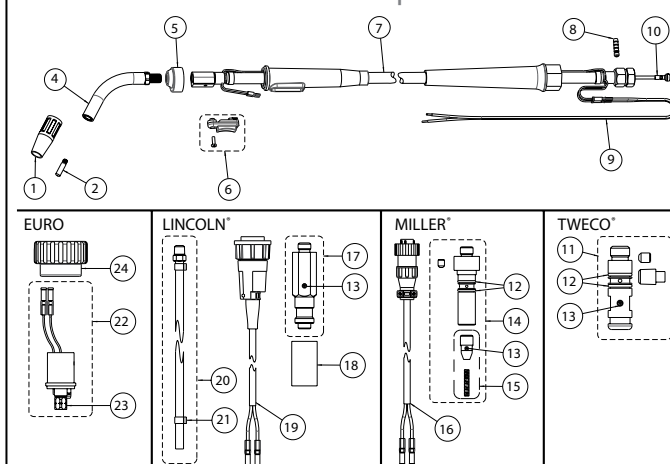
## Euro-Kwik Style Rear Connector

Wire Size	Length	Part No.	Stock No.
Up To .035" (0.9 mm)	10 ft (3 m)	VX23-10	1000-1816
	10 ft (3 m)	VX35-10	1000-1817
	12 ft (3.6 m)	VX35-12	1000-1818
	15 ft (4.6 m)	VX35-15	1000-1819

For additional information on adapter kits for other manufacturers' machines, refer to Form No. TAKL-97.

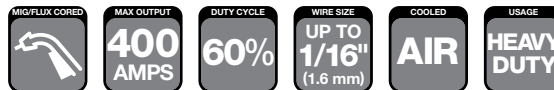


## V-Mini-MIG Gun Replacement Parts



#	Description	Part No.	Stock No.
1	Nozzle	<b>VNS Series</b>	
2	Contact Tip	<b>VTS Series</b>	
4	Conductor Tube	VCTS35-60-60	1600-1106
5	Handle Cap	35-80-A1	2000-2081
6	Trigger with Screw	35-90	2000-2090
7	Cablehoz® Assembly 10 ft (3 m) (Direct Plug)	35-010A	1700-2126
	Cablehoz Assembly 12 ft (3.6 m) (Direct Plug)	35-012A	1700-2127
	Cablehoz Assembly 15 ft (4.6 m) (Direct Plug)	35-015A	1700-2128
8	Gas Nipple	35-170-5	2000-2175
9	Control Wire	35K350-1	2000-2352
10	Conduit Assembly	<b>Refer to Pages 127-130</b>	
11	Tweco® Connector Plug	35K-174C	2000-2169
12	O-Ring (Package of 10)	224S	2064-2059
13	Set Screw (Package of 10)	44CS	2040-2046
14	Miller® Connector Plug	170M	2000-2810
15	Wire Guide Assembly Only	174M-N	2040-2184
16	Miller Control Wire	WM-354M	2030-2075
17	Lincoln® SP200 Connector Plug	TLAK-352	2641-2030
18	Lincoln Insulator	LAK-352-1	2642-2210
19	Lincoln Control Wire	35SP-354	2000-2354
20	Gas Hose Assembly with Clamp	AK353	2642-2300
21	Gas Hose Clamp Only	AK-353-2A	2642-2302
22	Euro-Kwik Body Assembly	174EX-1	2040-2276
23	Euro-Kwik Conduit Cap Only	174EX-1C	2040-2279
24	Euro-Kwik Nut	174X-2	2040-2177
NS	Protective Cable Wrap, 50 ft (15 m) per box	TCR50	9900-1150

Miller is a registered trademark of Illinois Tool Works, Inc. Lincoln is a registered trademark of Lincoln Electric Co. The aforementioned registered trademarks are in no way affiliated with Tweco. Tweco is registered trademark of ESAB.



# Supra® XT SEHD 400 Amp MIG Gun



**60% Duty Cycle - CO<sub>2</sub> Carbon Dioxide**  
Suitable for Medium to Heavy Duty Fabrication.

**WELDING PROCESSES:**  
MIG (GMAW), Flux Cored (FCAW),  
Aluminum (GMAW)

**Standard Options Include:**

- Rear Connector
- Available with Heavy Duty Front End Consumables
- Standard Conductor Tube – Part No. SE64J-60 (Stock No. 1640-1347) on all guns up to 15 ft (4.6 m)
- Conduit Liner – 44 Series

## Tweco® Style Rear Connector

Adapter kits are available to fit Tweco rear connection to most wire feeders

Wire Size	Length	Part No.	Stock No.
Up To 1/16" (1.6 mm)	15 ft (4.6 m)	SEHD400-5M16	1040-1332

## Lincoln® Style Rear Connector

Fits Lincoln LN7, 8, 9, SP200

Wire Size	Length	Part No.	Stock No.
Up To 1/16" (1.6 mm)	15 ft (4.6 m)	SEHD400L-5M16	1040-1432

Some Lincoln wire feeders are assembled with their K1500-2 gun receiving bushing that will accept Tweco Style MIG Guns direct from the factory. Control wire Part No. MS354-DSLJ (Stock No. 2060-2137) Must be ordered separately.

## Miller® Style Rear Connector

Wire Size	Length	Part No.	Stock No.
Up To 1/16" (1.6 mm)	15 ft (4.6 m)	SEHD400M-5M16	1040-1342

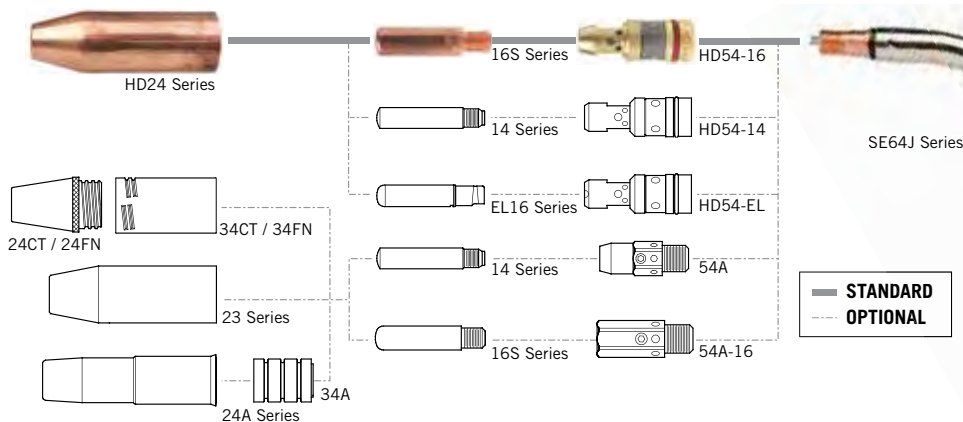
## Euro-Kwik Style Rear Connector

Wire Size	Length	Part No.	Stock No.
Up To 1/16" (1.6 mm)	15 ft (4.6 m)	SEHD400X-5M16	1040-1442

For Special MIG gun configurations, including special consumables, please contact Tech Service and Support.

### FEATURES

- **High Impact-Resistant One-Piece "Straight" Handle** allows the welder to locate the trigger at the bottom or top of handle
- **Metal "Paddle" Style Trigger Lever**
- **Three-Layer Conductor Tube Construction** (copper tube/silicon-resin glass insulator/metal jacket) threads into front block for improved electrical conductivity
- **Front & Rear Spring Strain Relief** provides support to eliminate kinking
- **Micro-Switch Trigger Design** incorporates a button style switch for start/stop wire feed
- **Spray Transfer Mode and Pulse Welding**
- **Straight CO<sub>2</sub> or Mixed Gases**



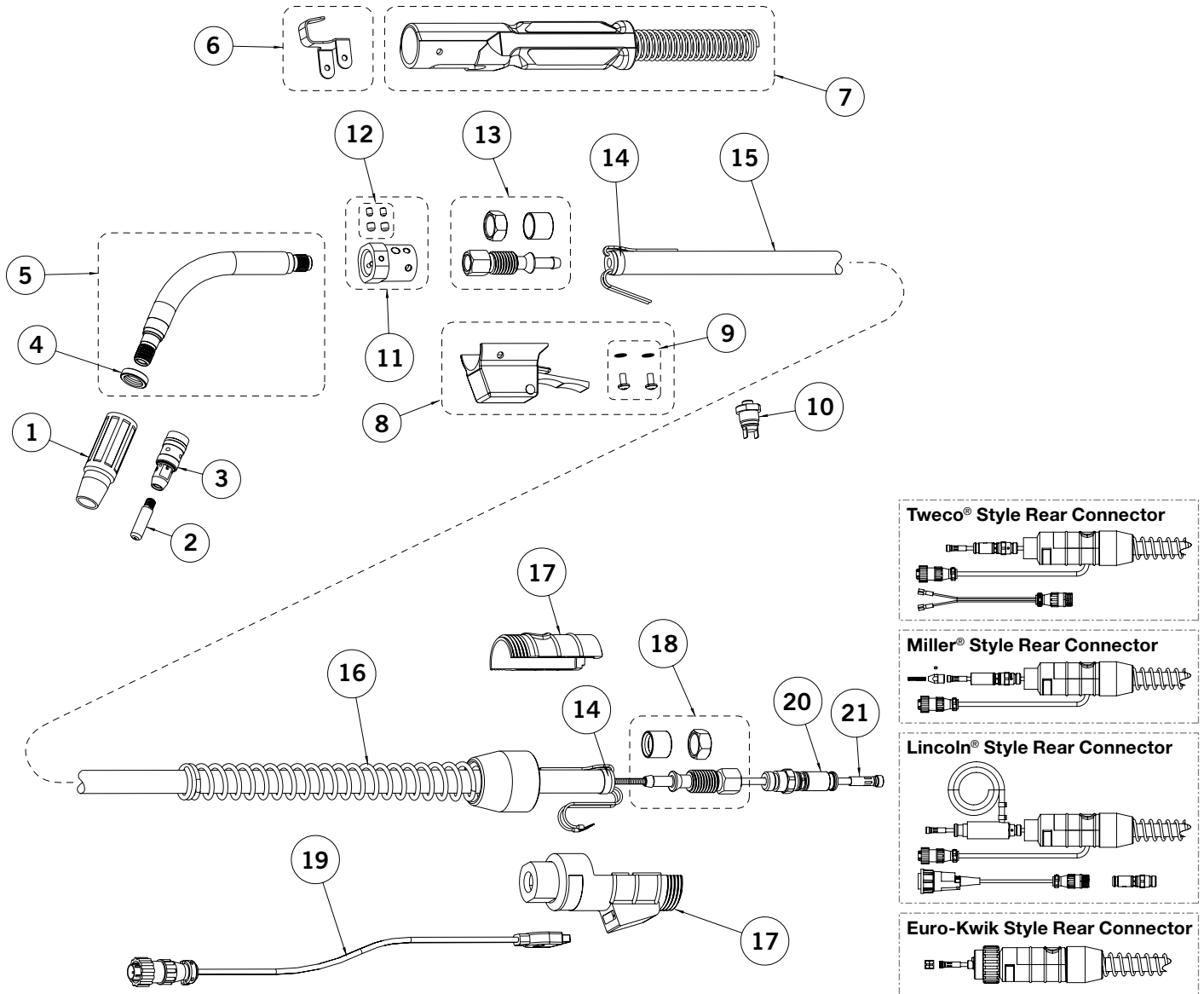
Rated Output			Wire Size	Cooled	Application Usage
Amps	Duty Cycle	Gas			
400 Amps	60%	CO <sub>2</sub> Carbon Dioxide	Up To 1/16" (1.6 mm)	Air	Heavy Duty Fabrication

**EASY FIND**  
**EASY FIND GUIDE**  
See Page 63 for Replacement Parts & Optional Accessories

Miller is a registered trademark of Illinois Tool Works, Inc. Lincoln is a registered trademark of Lincoln Electric Co. The aforementioned registered trademarks are in no way affiliated with Tweco. Tweco is registered trademark of ESAB.

# Supra® XT SEHD 400 Amp MIG Gun Replacement Parts

MIG GUNS



#	Description	Part No.	Stock No.
1	Nozzle	<b>HD24 Series</b>	
2	Contact Tip	<b>16S Series</b>	
3	Diffuser	<b>HD54-16</b>	
4	Nozzle Insulator	<b>66J-3</b>	1660-1836
5	Conductor Tube	<b>SE64J Series</b>	
6	Gun Hanger	<b>154</b>	2040-2154
7	Handle Assembly	<b>SE86-H</b>	2060-2052
8	Trigger Assembly	<b>SE96</b>	2060-2056
9	Trigger Housing Screws	<b>SE96-SW</b>	2060-2055
10	Trigger Switch	<b>SE96-B</b>	2060-2054
11	Front Pivot Block Assembly	<b>SE66</b>	2060-2051
12	Pivot Block Set Screw	<b>SE66-B</b>	2060-2050

#	Description	Part No.	Stock No.
13	Front Cable Connector	<b>SE104</b>	2060-2057
14	Cable Clamp	<b>136</b>	2060-2690
15	Cablehoz®	<b>400</b>	1740-2100
16	Rear Strain Relief Spring	<b>235RSSR</b>	2060-2035
17	Rear Case	<b>M6RC</b>	2060-2018
18	Rear Cable Connector	<b>350-170HK</b>	2035-2169
	Control Wire (Tweco®)	<b>MAK-354</b>	2642-2460
	Control Wire (Miller®)	<b>MSAK-354</b>	2642-2470
19	Control Wire (Lincoln®)	<b>LAK-354</b>	2642-2450
	Control Wire (Lincoln®)	<b>LAK-354</b>	2642-2450
20	Connector Plug	<b>Refer to Pages 89-90</b>	
21	Conduit Assembly	<b>Refer to Pages 127-130</b>	
NS	Protective Cable Wrap, 50 ft (15 m) per box	<b>TCR50</b>	9900-1150

Miller is a registered trademark of Illinois Tool Works, Inc. Lincoln is a registered trademark of Lincoln Electric Co. The aforementioned registered trademarks are in no way affiliated with Tweco. Tweco is registered trademark of ESAB.

# Supra® XT VSEHD 400 Amp MIG Gun

MIG FLUX CORED	MAX OUTPUT <b>400 AMPS</b>	DUTY CYCLE <b>60%</b>	WIRE SIZE <b>UP TO 1/16" (1.6 mm)</b>	COOLED <b>AIR</b>	USAGE <b>HEAVY DUTY</b>
----------------	-------------------------------	--------------------------	--	----------------------	----------------------------



**60% Duty Cycle - CO2 Carbon Dioxide**  
Suitable for Heavy Duty Fabrication.

**WELDING PROCESSES:**  
MIG (GMAW), Flux Cored (FCAW), Aluminum (GMAW)

**Standard Options Include:**

- Rear Connector
- Heavy-Duty VELOCITY2 Front End Consumables
- Standard Conductor Tubes - Part No. SEVCT64-60 (Stock No. 1640-1160) on all guns up to 15 ft (4.6m) Part No. SEVCT64-45 (Stock No. 1640-1161) on all guns over 15 ft (4.6m)
- "LM" Long reach conductor tube are available

### Tweco® Style Rear Connector

Adapter kits are available to fit Tweco rear connection to most wire feeders

WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To 1/16" (1.6 mm)	15 ft (4.6m)	VSEHD400-5M16	1040-1880
	25 ft (7.6m)	VSEHD400-8M16	1040-1881
	15 ft (4.6m)	VSEHD400-5M16LM*	1040-1882
	25 ft (7.6m)	VSEHD400-8M16LM*	1040-1883

\* "LM": Long reach Conductor Tube

### Lincoln® Style Rear Connector

Fits LN7, 8, 9, SP200

WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To 1/16" (1.6 mm)	15 ft (4.6m)	VSEHD400L-5M16	1040-1888
	25 ft (7.6m)	VSEHD400L-8M16	1040-1889
	15 ft (4.6m)	VSEHD400L-5M16LM*	1040-1890
	25 ft (7.6m)	VSEHD400L-8M16LM*	1040-1891

Some Lincoln wire feeders are assembled with their K1500-2 gun receiving bushing that will accept Tweco Style MIG Guns direct from the factory. Control wire Part No. MS354-DLJ (Stock No. 2060-2137) must be ordered separately.

\* "LM": Long reach Conductor Tube

### Miller® Style Rear Connector

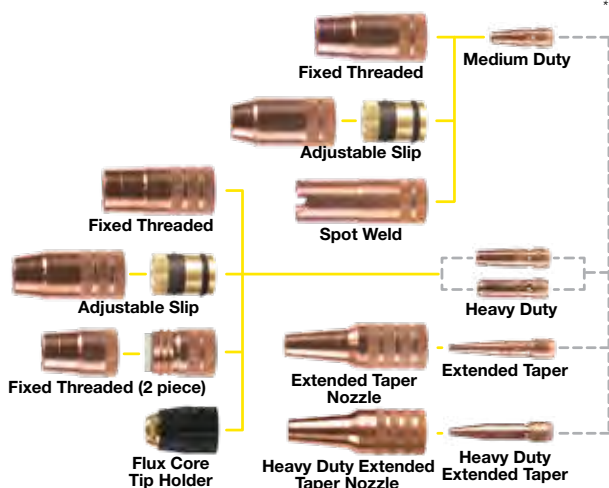
WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To 1/16" (1.6 mm)	15 ft (4.6m)	VSEHD400M-5M16	1040-1884
	25 ft (7.6m)	VSEHD400M-8M16	1040-1885
	15 ft (4.6m)	VSEHD400M-5M16LM*	1040-1886
	25 ft (7.6m)	VSEHD400M-8M16LM*	1040-1887

\* "LM": Long reach Conductor Tube

### Euro-Kwik Style Rear Connector

WIRE SIZE	LENGTH	PART NO.	STOCK NO.
Up To 1/16" (1.6 mm)	15 ft (4.6m)	VSEHD400X-5M16	1040-1892
	25 ft (7.6m)	VSEHD400X-8M16	1040-1893
	15 ft (4.6m)	VSEHD400X-5M16LM*	1040-1894
	25 ft (7.6m)	VSEHD400X-8M16LM*	1040-1895

\* "LM": Long reach Conductor Tube



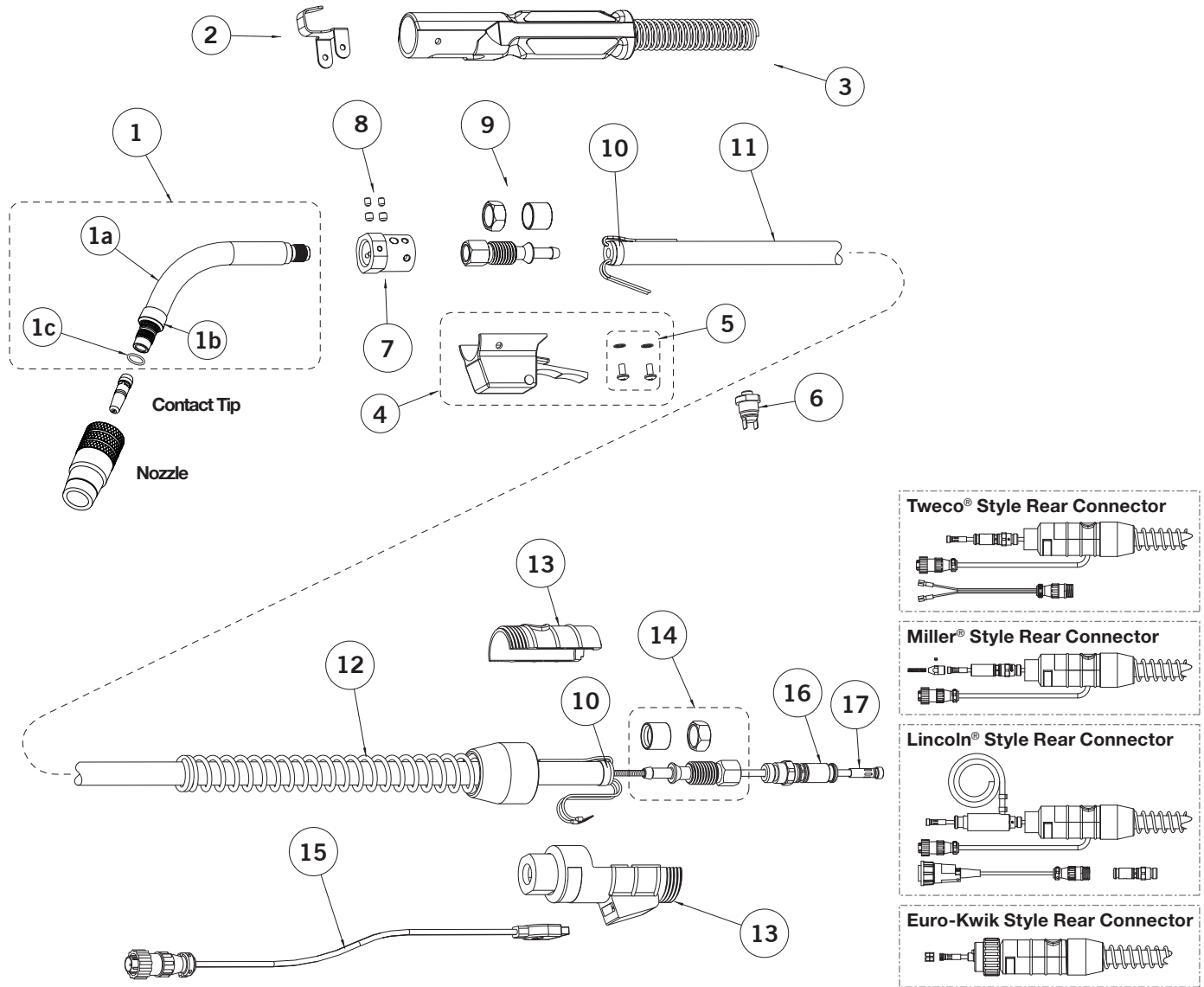
RATED OUTPUT			WIRE SIZE	COOLED	APPLICATION USAGE
Amps	Duty Cycle	Gas			
400 Amps	60%	CO <sub>2</sub> Carbon Dioxide	Up To 1/16" (1.6 mm)	Air	Heavy Duty Fabrication

**EASY FIND GUIDE**  
See Page 65 for Replacement Parts & Optional Accessories

Miller is a registered trademark of Illinois Tool Works, Inc. Lincoln is a registered trademark of Lincoln Electric Co. The aforementioned registered trademarks are in no way affiliated with Tweco. Tweco is registered trademark of ESAB.

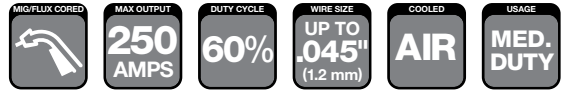


# SUPRA XT VSEHD 400 AMP MIG GUN REPLACEMENT PARTS



#	DESCRIPTION	PART NO.	STOCK NO.
1	Conductor Tube	Refer to Page 125	
1a	Silicone Tubing (Sold/Foot)	VCTLJBLK	1640-1409
1b	Insulator, Conductor Tube	VCTLSI	1640-1408
1c	O-Ring (Pkg. Of 10 each)	VCTLS015	1640-1410
2	Gun Hanger	154	2040-2154
3	Handle Assembly	SE86-H	2060-2052
4	Trigger Assembly	SE96	2060-2056
5	Trigger Housing Screws	SE96-SW	2060-2055
6	Trigger Switch	SE96-B	2060-2054
7	Front Pivot Block Assembly	SE66	2060-2051
8	Pivot Block Set Screw	SE66-B	2060-2050
9	Front Cable Connector	SE104	2060-2057

#	DESCRIPTION	PART NO.	STOCK NO.
10	Cable Clamp	136	2060-2690
11	Cablehoz®	400	1740-2100
12	Rear Strain Relief Spring	235RSSR	2060-2035
13	Rear Case	M6RC	2660-2018
14	Rear Cable Connector	350-170HK	2035-2169
15	Control Wire (Tweco®)	MAK-354	2642-2460
	Control Wire (Miller®)	MSAK-354	2642-2470
	Control Wire (Lincoln®)	LAK-354	2642-2450
16	Connector Plug	Refer to Pages 89-90	
17	Conduit Assembly	Refer to Pages 127-130	
NS	Protective Cable Wrap, 50 ft (15 m) per box	TCR50	9900-1150



# Smoke Master® 250 Amp Fume Extraction Air-Cooled MIG Gun



**60% Duty Cycle - CO<sub>2</sub> Carbon Dioxide**

Suitable for Light to Medium Duty Fabrication.

**WELDING PROCESSES:**  
**MIG (GMAW), Flux Cored (FCAW), Aluminum (GMAW)**

**Standard Options Include:**

- Rear Connector
- Standard Conductor Tube – Part No. S62-60 (Stock No. 2020-2006) on all guns up to 15 ft (4.6 m)
- Conduit Liner – 42 Series

## Tweco® Style Rear Connector

Adapter kits are available to fit Tweco rear connection to most wire feeders

Wire Size	Length	Part No.	Stock No.
Up To .045" (1.2 mm)	15 ft (4.6 m)	S215-4045	1026-1102

## Euro-Kwik Style Rear Connector

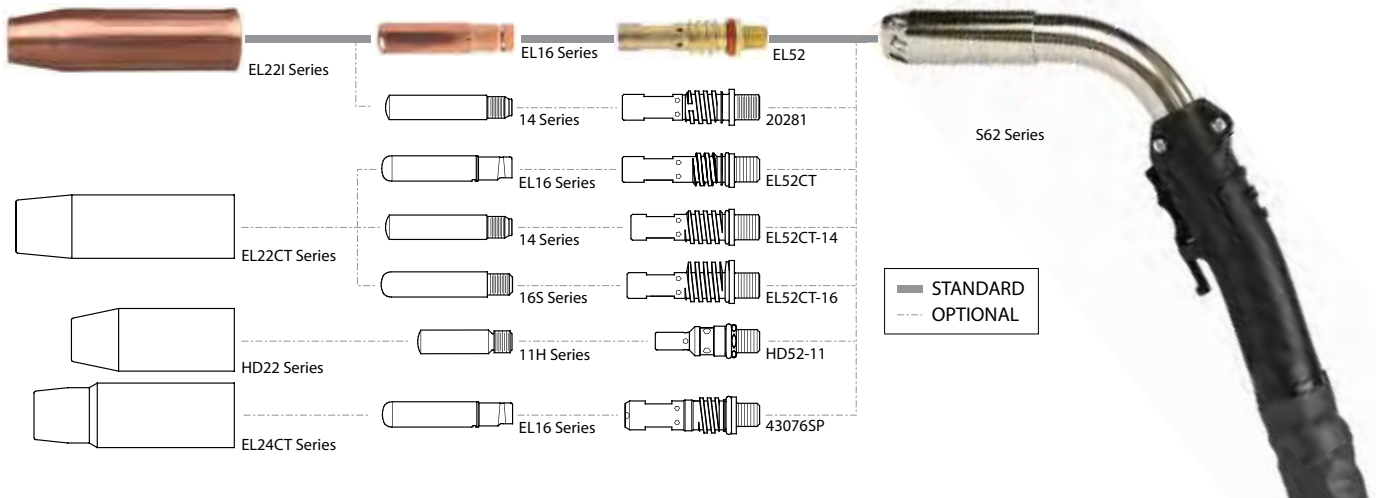
Wire Size	Length	Part No.	Stock No.
Up To .045" (1.2 mm)	15 ft (4.6 m)	XS215-4045	1026-1127

## Miller® Style Rear Connector

Wire Size	Length	Part No.	Stock No.
Up To .045" (1.2 mm)	15 ft (4.6 m)	S215M-4045	1026-1107

**FEATURES**

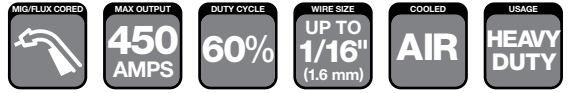
- **Handle Slide Valve** allows the operator to regulate vacuum on the MIG gun
- **Efficiently Removes 90% of Smoke** from the welding zone
- **Surrounding Air** is drawn over the front end consumables and conductor tube to keep cool
- **Tough Outer Jacket** made from leather protecting inner vacuum hose from weld spatter/abrasion
- **Low Bench Weight** for easy to handle MIG gun
- **Rugged & Durable Power Cablehoz®** with proven abrasion & heat resistance
- **Outer Metal Plated Insulated Smoke Tube**
- **1-3/8" (334.9 mm) Inside Diameter PVC Reinforced Vacuum Hose**
- **Ergonomic Handle** to reduce operator fatigue
- **Extended Trigger Length** to reduce radiated heat



Rated Output			Wire Size	Cooled	Application Usage
Amps	Duty Cycle	Gas			
250 Amps	60%	CO <sub>2</sub> Carbon Dioxide	Up To .045" (1.2 mm)	Air	Medium Duty Fabrication



Miller is a registered trademark of Illinois Tool Works, Inc. Lincoln is a registered trademark of Lincoln Electric Co. The aforementioned registered trademarks are in no way affiliated with Tweco. Tweco is registered trademark of ESAB.



# Smoke Master® 450 Amp Fume Extraction Air-Cooled MIG Gun



**60% Duty Cycle - CO<sub>2</sub> Carbon Dioxide**  
Suitable for Medium to Heavy Duty Fabrication.

**WELDING PROCESSES:**  
MIG (GMAW), Flux Cored (FCAW), Aluminum (GMAW),

**Standard Options Include:**

- Rear Connector
- Standard Conductor Tube – Part No. S64-60 (Stock No. 1046-2258) on all guns up to 15 ft (4.6 m)
- Conduit Liner – 44 Series

MIG GUNS

## Tweco® Style Rear Connector

Adapter kits are available to fit Tweco rear connection to most wire feeders

Wire Size	Length	Part No.	Stock No.
Up To 1/16" (1.6 mm)	15 ft (4.6 m)	S415-116	1046-1108

## Lincoln® Style Rear Connector

Fits Lincoln LN7, 8, 9, SP200

Wire Size	Length	Part No.	Stock No.
Up To 1/16" (1.6 mm)	15 ft (4.6 m)	S415L-116	1046-1138

Some Lincoln wire feeders are assembled with their K1500-2 gun receiving bushing that will accept Tweco Style MIG Guns direct from the factory. Control wire Part No. MS354-DSLJ (Stock No. 2060-2137) Must be ordered separately.

## Miller® Style Rear Connector

Wire Size	Length	Part No.	Stock No.
Up To 1/16" (1.6 mm)	12 ft (3.6 m)	S412M-116	1046-1125
	15 ft (4.6 m)	S415M-116	1046-1128

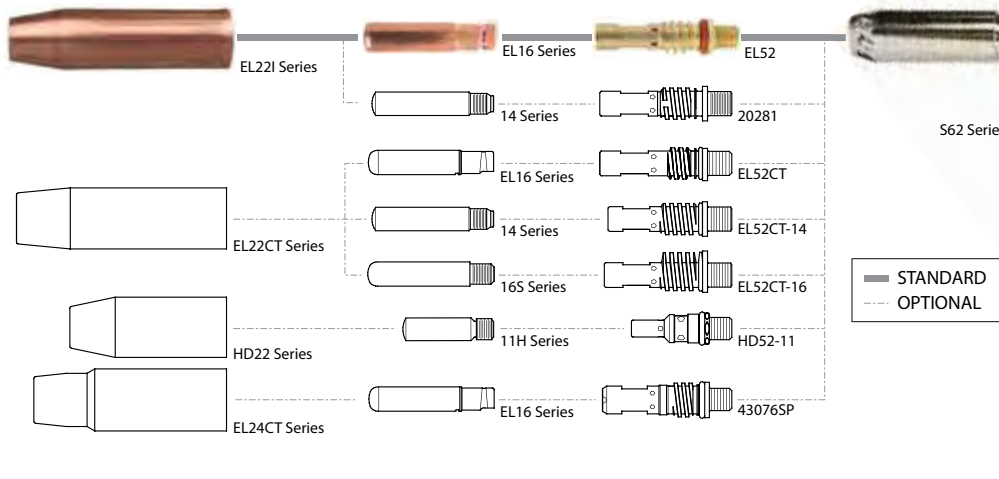
### FEATURES

- **Handle Slide Valve** allows the operator to regulate vacuum on the MIG gun
- **Efficiently Removes 90% of Smoke** from the welding zone
- **Surrounding Air** is drawn over the front end consumables and conductor tube to keep cool
- **Tough Outer Jacket** made from leather

- protecting inner vacuum hose from weld spatter/abrasion
- **Low Bench Weight** for easy to handle MIG gun
- **Rugged & Durable Power Cablehoz®** with proven abrasion & heat resistance
- **Outer Metal Plated Insulated Smoke Tube**
- **1-3/8" (334.9 mm) Inside Diameter**

### PVC Reinforced Vacuum Hose

- **Ergonomic Handle** to reduce operator fatigue
- **Extended Trigger Length** to reduce radiated heat

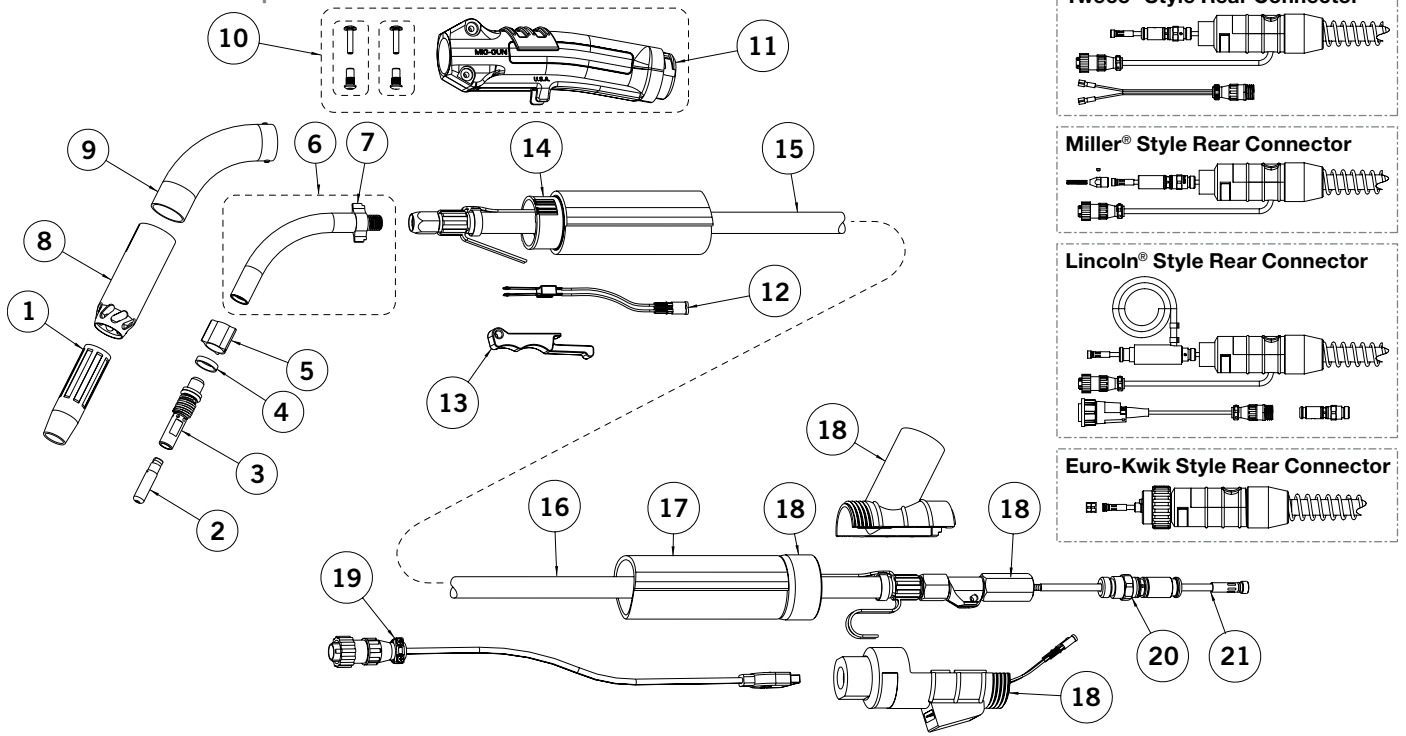


Rated Output			Wire Size	Cooled	Application Usage
Amps	Duty Cycle	Gas			
450 Amps	60%	CO <sub>2</sub> Carbon Dioxide	Up To 1/16" (1.6 mm)	Air	Heavy Duty Fabrication

**EASY FIND**  
**EASY FIND GUIDE**  
See Page 68 for Replacement Parts & Optional Accessories

Miller is a registered trademark of Illinois Tool Works, Inc. Lincoln is a registered trademark of Lincoln Electric Co. The aforementioned registered trademarks are in no way affiliated with Tweco. Tweco is registered trademark of ESAB.

# Smoke Master® Fume Extraction Air-Cooled MIG Gun Replacement Parts



#	Description	250 Amp		450 Amp	
		Part No.	Stock No.	Part No.	Stock No.
1	Nozzle	EL22I Series		EL22I Series	
2	Contact Tip	EL16 Series		EL16 Series	
3	Diffuser (Slip-On)	EL52	1560-1110	EL52	1560-1110
3	Diffuser (Coarse Thread)	EL52CT	1560-1109	EL52CT	1560-1109
4	Insulator Spacer	S62-60-2	2020-2013	S64-R	1046-2223
5	Smoke Tube Spacer	-	-	S64-1	1046-2273
6	Conductor Tube (60 Degree, Standard)	S62-60	2020-2006	S64-60	1046-2258
6	Conductor Tube (45 Degree, Standard)	S62-45	2020-2011	-	-
7	Handle Spacer	-	-	S64-2	1046-2271
8	Smoke Nozzle (Standard)	S22-62L	2020-2010	S24-62	1046-2225
8	Smoke Nozzle (High Volume)	-	-	S24-62HV	1046-2226
9	Smoke Tube (60 Degree, Standard)	S62T-60	2020-2001	S64T-60	1046-2240
9	Smoke Tube (45 Degree)	S62T-45	2020-2012	-	-
10	Handle Assembly	S82	2020-2003	S86	1046-2250
11	Handle Valve	-	-	S86-V	1046-2252
12	Trigger Blade Assembly	ELC94-BL	2060-2671	ELC94-BL	2060-2671
13	Trigger	ELC94	2060-2647	EL96	2060-2605
14	Swivel Cap Assembly	S82-C	2020-2005	S86-C	1046-2254
15	Cablehoz® Assembly, 12 ft (4 m)	-	-	S412	1046-2203
15	Cablehoz Assembly, 15 ft (5 m)	S215	2020-2009	S415	1046-2206
16	Smoke Hose, 12 ft (4 m)	S412-H	1046-2214	S412-H	1046-2214
16	Smoke Hose, 15 ft (5 m)	S415-H	1046-2217	S415-H	1046-2217
17	Leather Jacket, 12 ft (4 m)	SHP-12	1046-2267	SHP-12	1046-2267
17	Leather Jacket, 15 ft (5 m)	SHP-15	1046-2268	SHP-15	1046-2268
18	Rear Case Assembly	M6RC	2060-2018	M6RC	2060-2018
19	Control Wire (Tweco®)	MAK-354	2642-2460	MAK-354	2642-2460
19	Control Wire (Miller®)	MSAK-354	2642-2470	MSAK-354	2642-2470
19	Control Wire (Lincoln®)	LAK-354	2642-2450	LAK-354	2642-2450
20	Connector Plug	Refer to Pages 89-90		Refer to Pages 89-90	
21	Conduit Assembly	Refer to Pages 127-130		Refer to Pages 127-130	

Miller is a registered trademark of Illinois Tool Works, Inc. Lincoln is a registered trademark of Lincoln Electric Co. The aforementioned registered trademarks are in no way affiliated with Tweco. Tweco is registered trademark of ESAB.

# Tweco® Smoke Collector Fume Removal System



### FEATURES

- **Smoke Collector** is compatible with all Tweco Smoke Master MIG Guns
- **Efficiently Removes** welding fumes

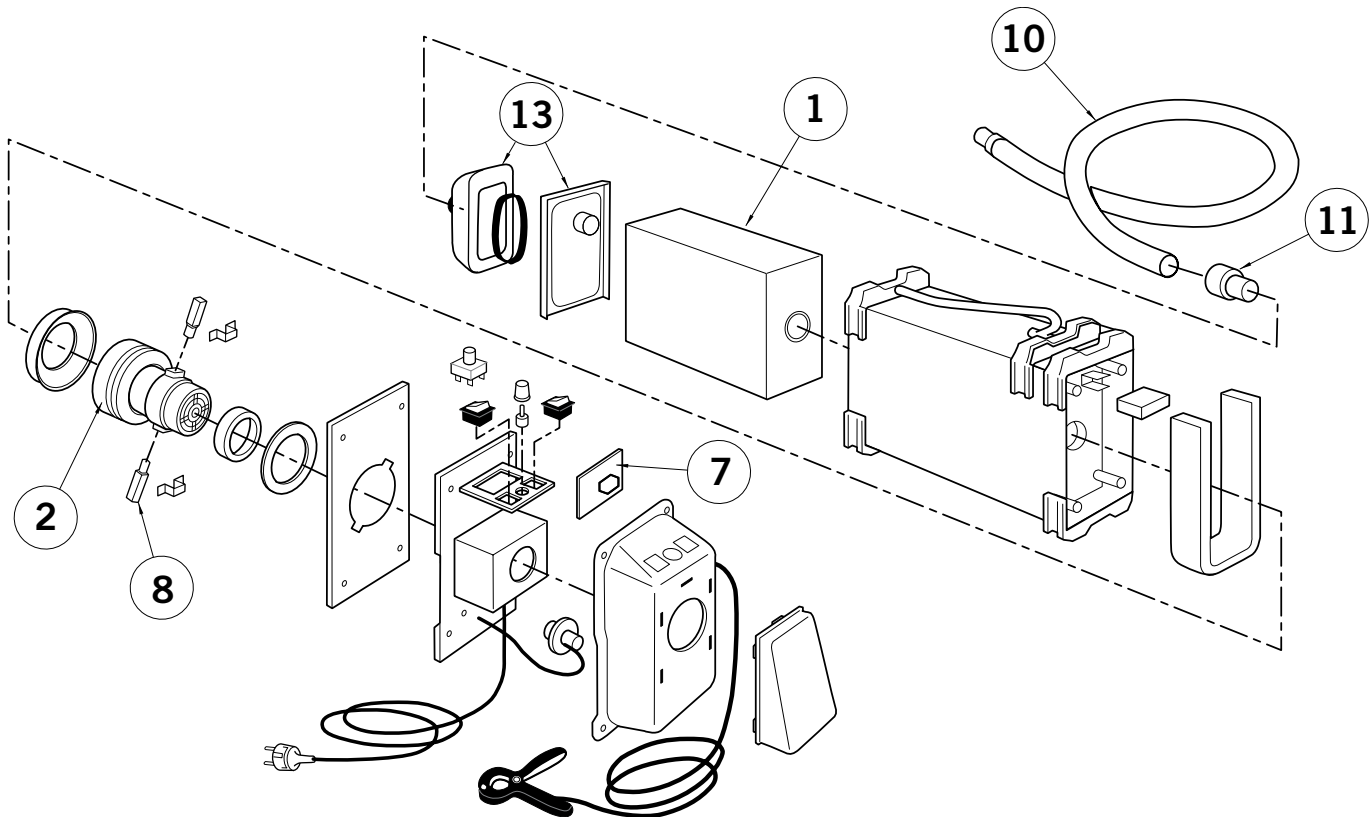
### WELDING PROCESSES: MIG (GMAW),

#### Standard Options Include:

- Automatic Start-Stop Function
- High-Efficiency Particle Filter
- Separately Air-Cooled Motor

Description	Part No.	Stock No.
120 Volt, 60 Hz	TSC-96	4500-1010

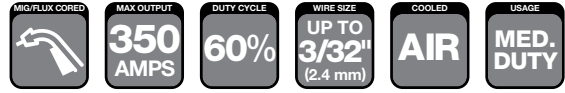
# Tweco Smoke Collector Fume Removal System Replacement Parts



#	Description	Part No.	Stock No.
1	Filter - Particle	TSC-F	4500-2060
2	Motor 120 V	TSC-M	4500-2059
7	PCB, Sensor Tong & Potentiometer	TSC580480	4500-2088
8	Brushes Carbon - 2 pieces	TSC-103	4500-2078
10	Smoke Collector Hose, 8 ft (2.44 m)	TSC-H	4500-2061
11	Hose Connector - 1.5" to 1.75" (3.81 cm to 4.45 cm)	TSC-15	4500-2063
13	Motor Cover	TSC184100	4500-2083
NS	Coarse Separator Complete	TSC284230	4500-2098

MIG GUNS

## Flux Cored SEFC 350 Amp MIG Gun



**60% Duty Cycle - CO<sub>2</sub> Carbon Dioxide**

Suitable for Medium Duty Fabrication.

**WELDING PROCESSES:**

MIG (GMAW), Flux Cored (FCAW)

**Standard Options Include:**

- Rear Connector
- Standard Conductor Tube – Part No. 64FC-60 (Stock No. 1641-1127) on all guns up to 15 ft (4.6 m)
- Conduit Liner – 44 Series

### Tweco® Style Rear Connector

Adapter kits are available to fit Tweco rear connection to most wire feeders

Wire Size	Length	Part No.	Stock No.
Up To 3/32" (2.4 mm)	10 ft (3 m)	SEFC350T-10	1031-1642
	15 ft (4.6 m)	SEFC350T-15	1031-1643

### Lincoln® Style Rear Connector

Fits Lincoln LN7, 8, 9, SP200

Wire Size	Length	Part No.	Stock No.
Up To 3/32" (2.4 mm)	10 ft (3 m)	SEFC350-10	1031-1632
	15 ft (4.6 m)	SEFC350-15	1031-1633

Some Lincoln wire feeders are assembled with their K1500-2 gun receiving bushing that will accept Tweco Style MIG Guns direct from the factory. Control wire Part No. MS354-DSLJ (Stock No. 2060-2137) Must be ordered separately.

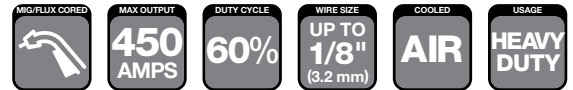
### Miller® Style Rear Connector

Wire Size	Length	Part No.	Stock No.
Up To 3/32" (2.4 mm)	10 ft (3 m)	SEFC350M-10	1031-1637
	15 ft (4.6 m)	SEFC350M-15	1031-1638

**FEATURES**

- **High Impact-Resistant One-Piece "Straight" Handle** allows the welder to locate the trigger at the bottom or top of handle
- **Micro-Switch Trigger Design** incorporates a button style switch for start/stop wire feed
- **Spare Trigger Leads in Cablehoz**
- **Durable & Dependable** for use with all gasless wires
- **Heavy Duty Design** for a wide variety of welding applications
- **Heavy Duty Front End Consumables**
- **Rugged & Durable Power Cablehoz** with proven abrasion & heat resistance
- **Metal "Paddle" Style Trigger Lever**

## Flux Cored SEFC 450 Amp MIG Gun



**60% Duty Cycle - CO<sub>2</sub> Carbon Dioxide**

Suitable for Heavy Duty Fabrication.

**WELDING PROCESSES:**

MIG (GMAW), Flux Cored (FCAW)

**Standard Options Include:**

- Rear Connector
- Standard Conductor Tube – Part No. 66FC-60 (Stock No. 1661-1127) on all guns up to 15 ft (4.6 m)
- Conduit Liner – 44FC Series

### Tweco® Style Rear Connector

Adapter kits are available to fit Tweco rear connection to most wire feeders

Wire Size	Length	Part No.	Stock No.
Up To 1/8" (3.2 mm)	15 ft (4.6 m)	SEFC450T-15	1041-1120

### Lincoln® Style Rear Connector

Fits Lincoln LN7, 8, 9, SP200

Wire Size	Length	Part No.	Stock No.
Up To 1/8" (3.2 mm)	15 ft (4.6 m)	SEFC450-15	1041-1113

Some Lincoln wire feeders are assembled with their K1500-2 gun receiving bushing that will accept Tweco Style MIG Guns direct from the factory. Control wire Part No. MS354-DSLJ (Stock No. 2060-2137) Must be ordered separately.

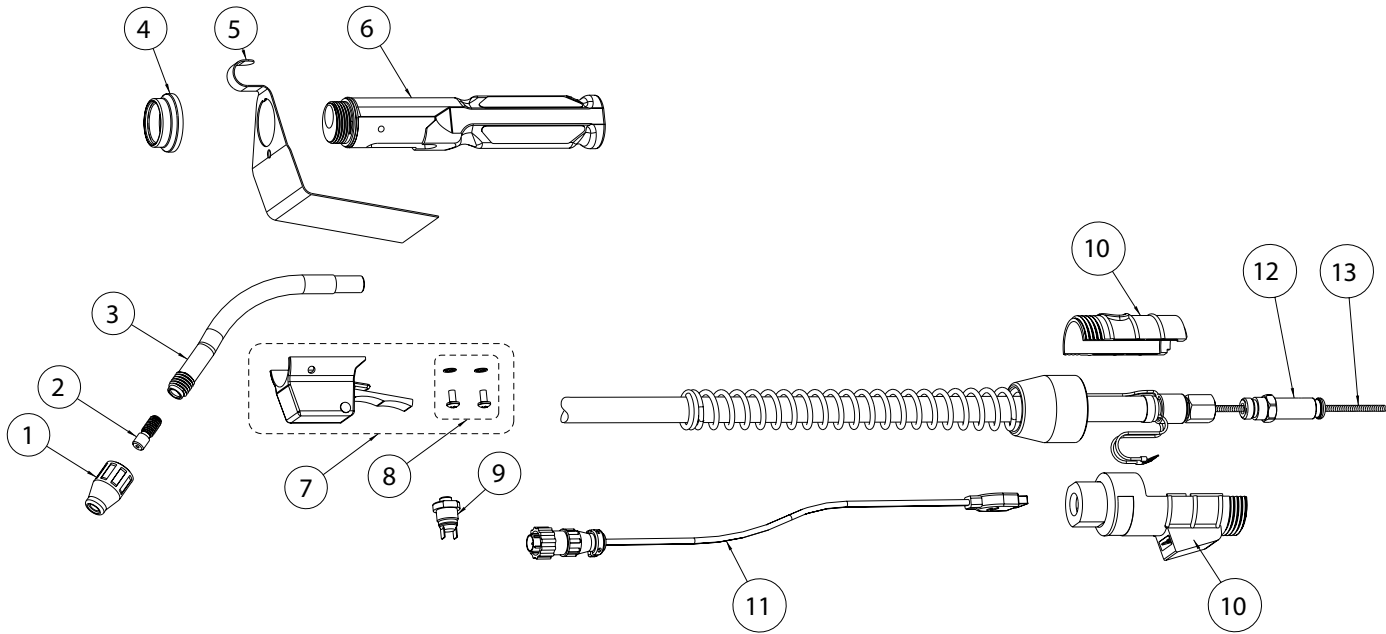
### Miller® Style Rear Connector

Wire Size	Length	Part No.	Stock No.
Up To 1/8" (3.2 mm)	15 ft (4.6 m)	SEFC450M-15	1041-1139

Rated Output			Wire Size	Cooled	Application Usage
Amps	Duty Cycle	Gas			
450 Amps	60%	CO <sub>2</sub> Carbon Dioxide	Up To 1/8" (3.2 mm)	Air	Heavy Duty Fabrication









# Flux Cored SEFC Mig Gun Replacement Parts



MIG GUNS

#	Description	350 Amp		450 Amp	
		Part No.	Stock No.	Part No.	Stock No.
1	Insulated Guide Nozzle, 3/4" (19 mm) Stickout	<b>24FC-150</b>	1241-1027	<b>26FC-150</b>	1261-1026
	Insulated Guide Nozzle, 1-1/2" (38 mm) Stickout	N/A		<b>26FC-275</b>	1261-1027
	Thread Protector	<b>24FC-P</b>	1241-1025	N/A	
2	Contact Tip, .045" (1.2 mm)	<b>14FC-045</b>	1140-1125	N/A	
	Contact Tip, .068" (1.72 mm)	<b>14FC-068</b>	1140-1126	N/A	
	Contact Tip, 5/64" (2.0 mm)	<b>14FC-564</b>	1140-1127	<b>16FC-564</b>	1160-1125
	Contact Tip, 7/64" (2.8 mm)	N/A		<b>16FC-764</b>	1160-1127
	Contact Tip, 1/8" (3.2 mm)	N/A		<b>16FC-120</b>	1160-1128
3	Conductor Tube (60 Degree, Standard)	<b>64FC-60</b>	1641-1127	<b>66FC-60</b>	1661-1127
	Conductor Tube (45 Degree)	<b>64FC-45</b>	1641-1126	<b>66FC-45</b>	1661-1126
4	Heat Shield Nut	<b>SE86FC-R2</b>	2060-2065	<b>SE86FC-R2</b>	2060-2065
5	Heat Shield	<b>156W-HS</b>	2062-2157	<b>156W-HS</b>	2062-2157
6	Handle	<b>SE86FC-H</b>	2060-2063	<b>SE86FC-H</b>	2060-2063
7	Trigger Assembly	<b>SE96</b>	2060-2056	<b>SE96</b>	2060-2056
8	Trigger Housing Screw	<b>SE96-SW</b>	2060-2055	<b>SE96-SW</b>	2060-2055
9	Trigger Switch	<b>SE96-B</b>	2060-2054	<b>SE96-B</b>	2060-2054
10	Rear Case	<b>M6RC</b>	2660-2018	<b>M6RC</b>	2060-2018
11	Control Wire (Tweco®)	<b>MAK-354</b>	2642-2460	<b>MAK-354</b>	2642-2460
	Control Wire (Miller®)	<b>MSAK-354</b>	2642-2470	<b>MSAK-354</b>	2642-2470
	Control Wire (Lincoln®)	<b>LAK-354</b>	2642-2450	<b>LAK-354</b>	2642-2450
12	Connector Plug (Tweco)	<b>FC350-174H</b>	2061-2115	<b>FC450-174H</b>	2061-2116
	Connector Plug (Miller)	<b>FC350-174MH</b>	2061-2117	<b>FC450-174MH</b>	2061-2118
	Connector Plug (Lincoln)	<b>173FCH</b>	2041-2131	<b>176FCH</b>	2041-2132
13	Conduit, 10 ft (3 m) 3/32" (2.4 mm)	<b>43FC-332-10</b>	1440-1030	N/A	
	Conduit, 15 ft (4.6 m) 3/32" (2.4 mm)	<b>43FC-332-15</b>	1440-1031	<b>44FC-332-15</b>	1440-1034
	Conduit, 15 ft (4.6 m) 1/8" (3.2 mm)	N/A		<b>44FC-18-15</b>	1440-1036
NS	Protective Cable Wrap, 50 ft (15 m) per box	<b>TCR50</b>	9900-1150	<b>TCR50</b>	9900-1150

# Tweco® Spool Gun 160 Amp

 MIG	 MAX OUTPUT <b>160 AMPS</b>	 DUTY CYCLE <b>20%</b>	 WIRE SIZE <b>UP TO .035"</b> (0.9 mm)	 COOLED <b>AIR</b>	 USAGE <b>LIGHT DUTY</b>
---	--	--	---	--	--



**WELDING PROCESSES:**  
MIG (GMAW), Aluminum (GMAW)

- Standard Options Include:**
- 8-pin Amphenol Style Connector
  - Standard Straight (180°) Conductor Tube
  - Holds standard 4" (102 mm) diameter spools
  - Optional 30° Rigid Conductor Tube or Knucklehead™ Flexible Conductor Tube

## 20% Duty Cycle - Mixed Gases

Suitable for Light Duty Fabrication.

### Tweco® Style Rear Connector

Wire Size	Length	Part No.	Stock No.
Up To .035" (0.9 mm)	12 ft (3.6 m)	<b>SG160TA-12-3035</b>	1027-1390
	12 ft (3.6 m)	<b>SG160REB-12-3035</b>	1027-1397

*Use on Tweco Fabricator 141i, 181i and 211i power supplies only*

Rated Output			Wire Size	Cooled	Application Usage
Amps	Duty Cycle	Gas			
160 Amps	20%	Mixed	Up To .035" (0.9 mm)	Air	Light Duty Fabrication









**EASY FIND GUIDE**  
See Page 73 for Replacement Parts & Optional Accessories

### FEATURES

- **Ideal for a Variety of Applications** including aluminum, stainless steel and mild steel welding
- **Long Cables** allow operator to access hard to weld areas
- **Three-Layer Conductor Tube Construction** (Copper Tube / Silicon-Resin Glass Insulator / Metal Jacket) with quick disconnect
- **Tweco 160 Amp and 200 Amp Spool Guns** are designed to work with Tweco new inverter technology on the Fabricator® series of welding systems
- **Comfortable Pistol-Grip Handle Design** with outer spool tension control for ease of operation
- **Tweco 200 Amp Spool Guns** include **3-turn Potentiometer** for fine wire feed speed control
- **Tweco 200 Amp Spool Guns** adapt to most welding machines with the use of **ESG-1 Control Box**
- **ESG-1 Control Box** provides the gas solenoid with pre/post purge control and run-in control for arc starting (See page 60 for ordering information)

# Tweco® Spool Gun 200 Amp

 MIG	 MAX OUTPUT <b>200 AMPS</b>	 DUTY CYCLE <b>60%</b>	 WIRE SIZE <b>UP TO 3/64"</b> (1.2 mm)	 COOLED <b>AIR</b>	 USAGE <b>MED. DUTY</b>
--	---	--	---	--	---



**WELDING PROCESSES:**  
MIG (GMAW), Aluminum (GMAW)

- Standard Options Include:**
- 8-pin Amphenol Style Connector
  - Standard Straight (180°) Conductor Tube
  - Holds standard 4" (102 mm) diameter spools
  - Optional 30° Rigid Conductor Tube or Knucklehead™ Flexible Conductor Tube

## 60% Duty Cycle - Mixed Gases

Suitable for Medium Duty Fabrication.

### Tweco® Style Rear Connector

Wire Size	Length	Part No.	Stock No.
Up To 3/64" (1.2 mm)	12 ft (3.6 m)	<b>SG200REB-12-3545</b>	1027-1398
	25 ft (7.6 m)	<b>SG200REB-25-3545</b>	1027-1399
	25 ft (7.6 m)	<b>SG200-25-3545</b>	1027-1392
	25 ft (7.6 m)	<b>SG200TA-25-3545*</b>	1027-1391

*\*Use on Tweco Fabricator 220i and 252i power supplies only*

Rated Output			Wire Size	Cooled	Application Usage
Amps	Duty Cycle	Gas			
200 Amps	60%	Mixed	Up To 3/64" (1.2 mm)	Air	Medium Duty Fabrication

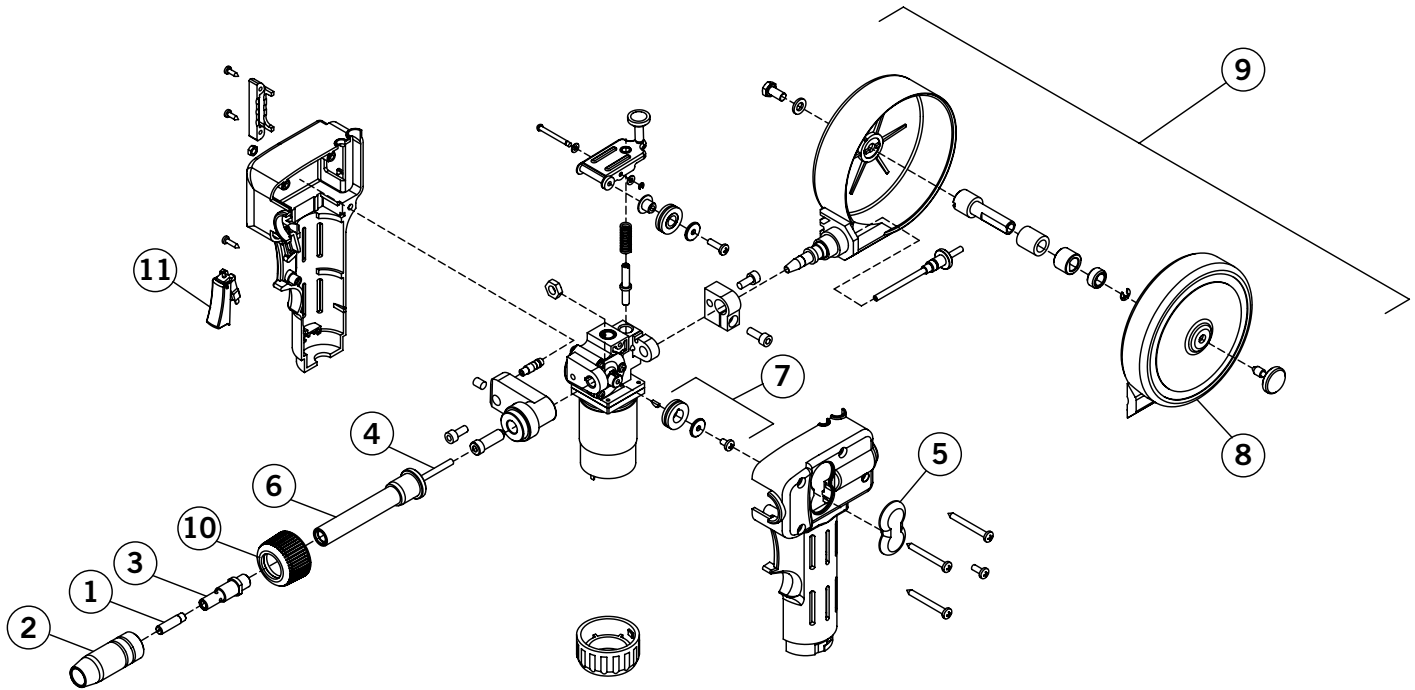


**EASY FIND GUIDE**  
See Page 73 for Replacement Parts & Optional Accessories



# Tweco® Spool Gun 160 & 200 Amp Replacement Parts

MIG GUNS



#	Description	Part No.	Stock No.
1	Contact Tip .023 (0.6 mm)	<b>11-23</b>	1110-1100
	Contact Tip .030 (10.8 mm)	<b>11-30</b>	1110-1101
	Contact Tip .035 (10.9 mm)	<b>11-35</b>	1110-1102
2	Nozzle 3/8" (9.5 mm)	<b>21T-37</b>	1210-1300
	Nozzle 3/8" (9.5 mm)	<b>21-37</b>	1210-1100
	Nozzle 1/2" (12.7 mm)	<b>21-50</b>	1210-1110
	Nozzle 5/8" (15.9 mm)	<b>21-62</b>	1210-1120
3	Gas Diffuser	<b>51</b>	1510-1101
4	Conduit	<b>SPG66065</b>	2031-2107
5	Drive Roll Cover	<b>WSPDRC</b>	2031-2227
6	Conductor Tube	<b>WSP62180</b>	2031-2225

#	Description	Part No.	Stock No.
7	.023 Drive Roll - V-Shaped	<b>WSPDRV023</b>	2031-2228
	.023 Guide Roll - V-Shaped	<b>WSPGRV023</b>	2031-2234
	.030 & .035 Drive Roll - V-Shaped	<b>WSPDRV030035</b>	2031-2257
	.030 & .035 Guide Roll - V-Shaped	<b>WSPGRV030035</b>	2031-2258
	.045 Drive Roll - V-Shaped	<b>WSPDRV047</b>	2031-2230
	.045 Guide Roll - V-Shaped	<b>WSPGRV047</b>	2031-2236
	.023 Drive Roll - U-Shaped	<b>WSPDRU023</b>	2031-2250
	.030 & .035 Guide Roll - U-Shaped	<b>WSPDRU030035</b>	2031-2252
	.045 Drive Roll - U-Shaped	<b>WSPDRU047</b>	2031-2254
	Smooth Guide Roll (for use with U-Shaped Drive Rolls, not grooved)	<b>WSPGR</b>	2031-2256
8	Spool Case Cover	<b>WSPSCC</b>	2031-2233
9	Complete Spool Case	<b>WSPSC</b>	2031-2232
10	Conductor Tube Nut	<b>WSP62N</b>	2031-2226
11	Trigger Assembly	<b>WSP92</b>	2031-2231
NS	Replacement Motor	<b>WSPMOTOR</b>	2031-2237
NS	Key Stock for Drive Roll	<b>WSPKEY</b>	2031-2239

## Control Wire Jumper Cords

Use with Tweco Spool Gun 200 Amp - Part No. SG200-25-3545 (Stock No. 1027-1392)

Manufacturer	Machine	Part No.	Stock No.
Miller	Millermatic 212	<b>WSPMILL4PJC</b>	2031-2245
Lincoln®	Power MIG® 255C	<b>WSPLIN7PJC</b>	2031-2247
Hobart®	Ironman™ 210, 250	<b>WSPMILL4PJC</b>	2031-2245
ESAB®	MigMaster® 203	<b>WSPESAB7PJC</b>	2031-2248
ESAB	MigMaster 253	<b>WSPESAB7PJC</b>	2031-2248
ESAB	MigMaster 250	<b>WSPESAB7PJC</b>	2031-2248

MIG	MAX OUTPUT <b>300</b> AMPS	DUTY CYCLE <b>60%</b>	WIRE SIZE <b>UP TO 1/16"</b> (1.6 mm)	COOLED <b>AIR</b>	USAGE <b>MED. DUTY</b>
-----	----------------------------------	--------------------------	---	----------------------	---------------------------

# Tweco® Spool Gun 300 Amp



**60% Duty Cycle - Mixed Gases**  
Suitable for Medium Duty Fabrication.

**WELDING PROCESSES:**  
MIG (GMAW), Aluminum (GMAW)

**Standard Options Include:**

- Standard Conductor Tube – Part No. PMP64EL-180 (Stock No. 1642-1140)
- Requires the use of the ESG-1 (Stock No. 1028-1295) Control Box for most welding machines

**FEATURES**

- Tweco 300 Amp Spool Guns are designed to work with Tweco new inverter technology on the ArcMaster® MST series of welding systems
- Ideal for a Variety of Applications including aluminum, stainless steel and mild steel welding

- Tweco 300 Amp Spool Guns adapt to most welding machines with the use of **ESG-1 Control Box** that provides the gas solenoid with pre/post purge control and run-in control for arc starting
- Comfortable **Pistol-Grip Handle Design** with outer spool tension control for ease of operation

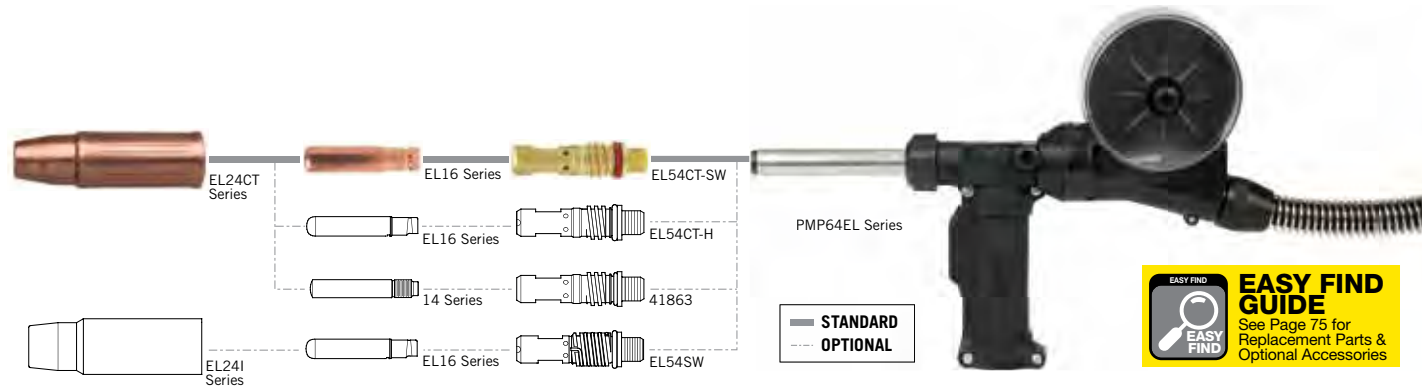
- Three-Layer Conductor Tube Construction** (Copper Tube / Silicon-Resin Glass Insulator / Metal Jacket) with quick disconnect
- Tweco® 300 Amp Spool Guns include **3-turn Potentiometer** for fine wire feed speed control

## Tweco® Style Rear Connector

RATED OUTPUT			WIRE SIZE	COOLED	APPLICATION USAGE
AMPS	DUTY CYCLE	GAS			
300 Amps	60%	Mixed	Up To 1/16" (1.6 mm)	Air	Medium Duty Fabrication

Wire Size	Length	Part No.	Stock No.
Up To 1/16" (1.6 mm)	25 ft (7.6 m)	SSG225-3545	1027-1370

When using the 300 Amp Spool Gun with Tweco® ArcMaster® MST Series machines, use Tweco SGI100 Spool Gun Interface Box, Part No. W4009115



# Tweco® ESG-1 Control Box



**Part No. ESG-1**  
(Stock No. 1028-1295)

115 Volt, Single Phase, 60 Hz  
used with Eliminator Spool Guns

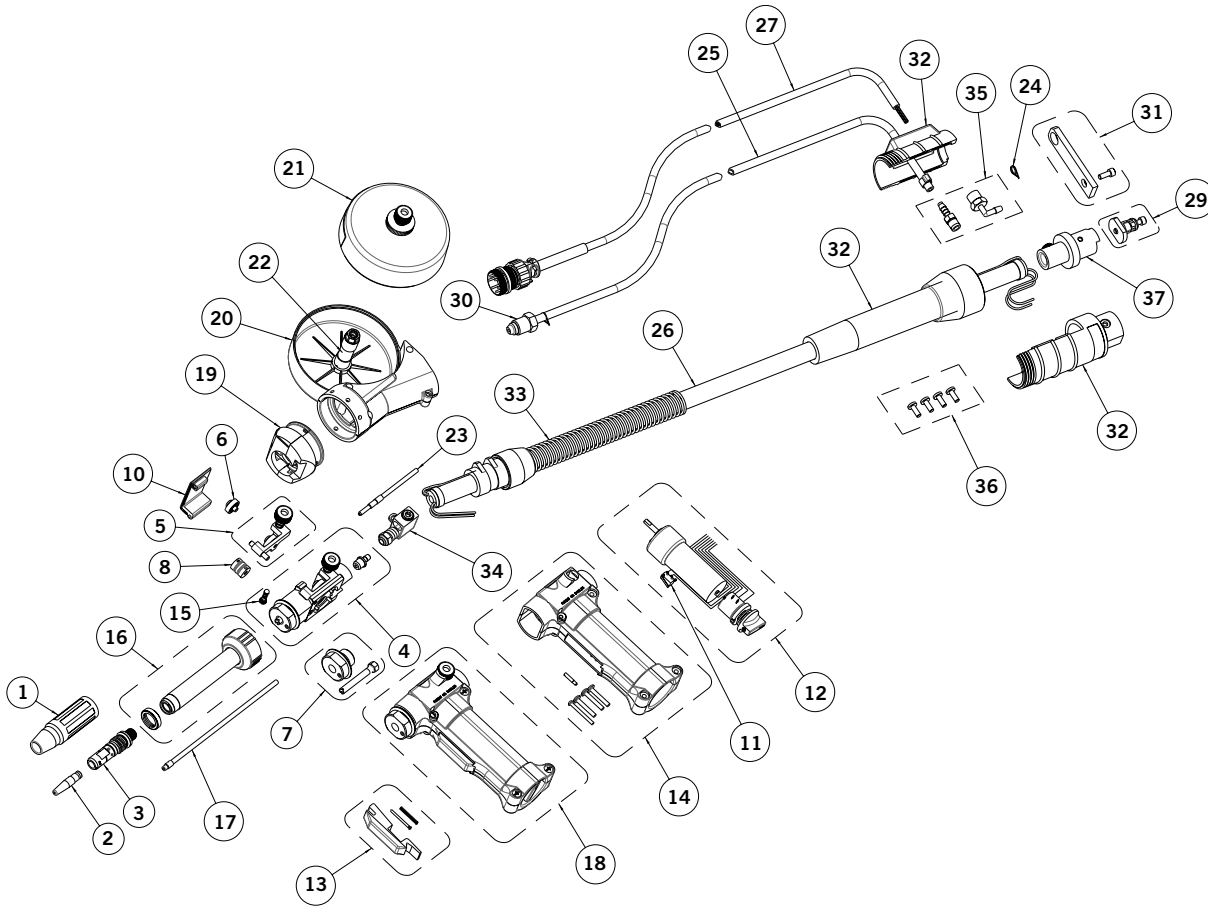
**WELDING PROCESSES:**  
MIG (GMAW), Aluminum (GMAW)

**Standard Options Include:**

- Standard Power Cord 6 ft (2 m)
- Requires Jumper Cord

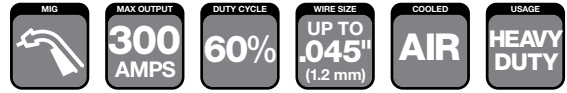
# Tweco® Spool Gun 300 Amp Replacement Parts

**MIG GUNS**



#	Description	Part No.	Stock No.
1	Nozzle	<b>EL24CT Series</b>	
2	Contact Tip	<b>EL16 Series</b>	
3	Diffuser	<b>EL54CT-SW</b>	
4	Head Block Assembly	<b>SPG103</b>	2031-2100
5	Pressure Arm Assembly	<b>SPG103-1</b>	2060-1727
6	Idler Bearing Assembly	N/A	
7	Adapter Nut & Wire Guide	<b>EPG66-N</b>	2031-2096
8	Drive Roll 0.030" (0.8 mm)	<b>EPG103-2-08</b>	2031-2091
	Drive Roll 0.035" (0.9 mm)	<b>EPG103-2-09</b>	2031-2077
	Drive Roll 0.040" (1.0 mm)	<b>EPG103-2-10</b>	2031-2023
	Drive Roll 3/64" (1.2 mm) Standard	<b>EPG103-2-12</b>	2031-2003
	Drive Roll 1/16" (1.6 mm)	<b>EPG103-2-16</b>	2031-2022
10	Handle Cover Assembly	<b>EPG86-2</b>	2031-2013
11	Trigger Switch	<b>ESG90</b>	2025-2399
12	Motor Assembly (24VAC)	<b>SSGM24</b>	2031-2101
13	Trigger Lever	<b>SPG-96TL</b>	2060-2733
14	Handle Sub-Assembly	<b>SSG86</b>	2060-2739
15	Poppet Valve Assembly	<b>PMP-PV</b>	2060-2737
16	Conductor Tube 30 Degree	<b>PMP64EL30</b>	1642-1141
	Conductor Tube 180 Degree	<b>PMP64EL180</b>	1642-1140
	Flexible Conductor Tube	<b>PMP64SFLX360</b>	1642-1142

#	Description	Part No.	Stock No.
	Jump Liner	<b>PMP44PTF116</b>	1644-1096
17	Jump Liner Teflon	<b>PMP-44FLX-116</b>	1644-1095
	Jump Liner Copper	<b>PMP-44-116</b>	1644-1097
18	Spool Gun Assembly w/o Cable & Support	<b>SSG300G</b>	2031-2117
19	Pivot Assembly	<b>ESG186</b>	2025-2397
20	Spool Canister Assembly	<b>ESG186S</b>	2025-1392
21	Spool Cover Assembly	<b>ESG186C</b>	2025-2393
22	Friction Tube Replacement (5 PC)	<b>ESG186S-3</b>	2025-2385
23	Conduit Assembly	N/A	
24	Wire Tie	<b>BG-53N04</b>	8040-1998
25	Gas Hose Assembly F/SSG Spool Gun	<b>SSG3003GH</b>	2060-2741
26	Extruded Spool Gun Cablehoz, 25 ft (8 m) Long	<b>SSG30025</b>	2060-2742
27	10 Pin Control Cable Assembly F/SSG Spool Gun	<b>SSG300CW</b>	2060-2744
28	Hex Wrench Set	N/A	
29	25 mm Dinse Connector	<b>SSG-DINS25</b>	2035-2186
30	Rear Gas Nipple	<b>EPG-RGN</b>	2031-2083
31	Straight Lug	<b>ESG-172SL</b>	2031-2110
32	Rear Case Sub-Assembly	<b>SSGT6RC</b>	2031-2111
33	Front Strain Relief Assembly	<b>SPG146R</b>	2031-2112
34	Cable Connector Assembly	<b>SPG102</b>	2031-2113
35	Hose Barb Connector	<b>ESG6RCUGN</b>	2031-2114
36	10-24 X 1/2" BH Plastic Screw	<b>SSG172PS</b>	2031-2115
37	Rear Power Connector	<b>ESG172</b>	2031-2116
NS	Protective Cable Wrap, 50 ft (15 m) per box	<b>TCR50</b>	9900-1150



# PullMaster™ 300 Amp MIG Gun



Tweco PullMaster Standard MIG Gun

Tweco PullMaster Smart MIG Gun with digital display

**60% Duty Cycle - Mixed Gases**  
Suitable for Light - Heavy Duty Fabrication.

**WELDING PROCESSES:**  
MIG (GMAW), Aluminum (GMAW)

**Standard Options Include:**

- Rear Connector
- Standard without “Smart” capability, Available with Smart Capability
- Standard Conductor Tube – Part No. PMP64EL-180 (Stock No. 1642-1140)
- Available with Optional 30° Rigid or Knucklehead™ Flexible Conductor Tube



**FEATURES**

- **“Smart” Capability** with digital display and one-touch controls to adjust primary parameters such as welding current, material thickness, wire feed speed or arc length trim
- **Comfortable Pistol-Grip Handle Design** for ease of operation
- **Three-Layer Conductor Tube Construction** (Copper Tube / Silicon-Resin Glass Insulator / Metal Jacket) with quick disconnect
- **Incorporates the Cablehoz®** used on other Tweco MIG guns
- **Improved Performance** with longer-life consumables
- **Heavy Duty Contact Tip and Diffuser** to act as “heat sink” in high heat applications

**Standard Gun** *PulseMaster MIG Guns are Standard without “Smart” Capability.*

**Smart Gun** *PullMaster Smart MIG Guns are used only with Tweco® PowerMaster SP machines and are available with “Smart” Capability.*

**Tweco® Style Rear Connector**

*Adapter kits are available to fit Tweco rear connection to most wire feeders*

**Tweco Style Rear Connector**

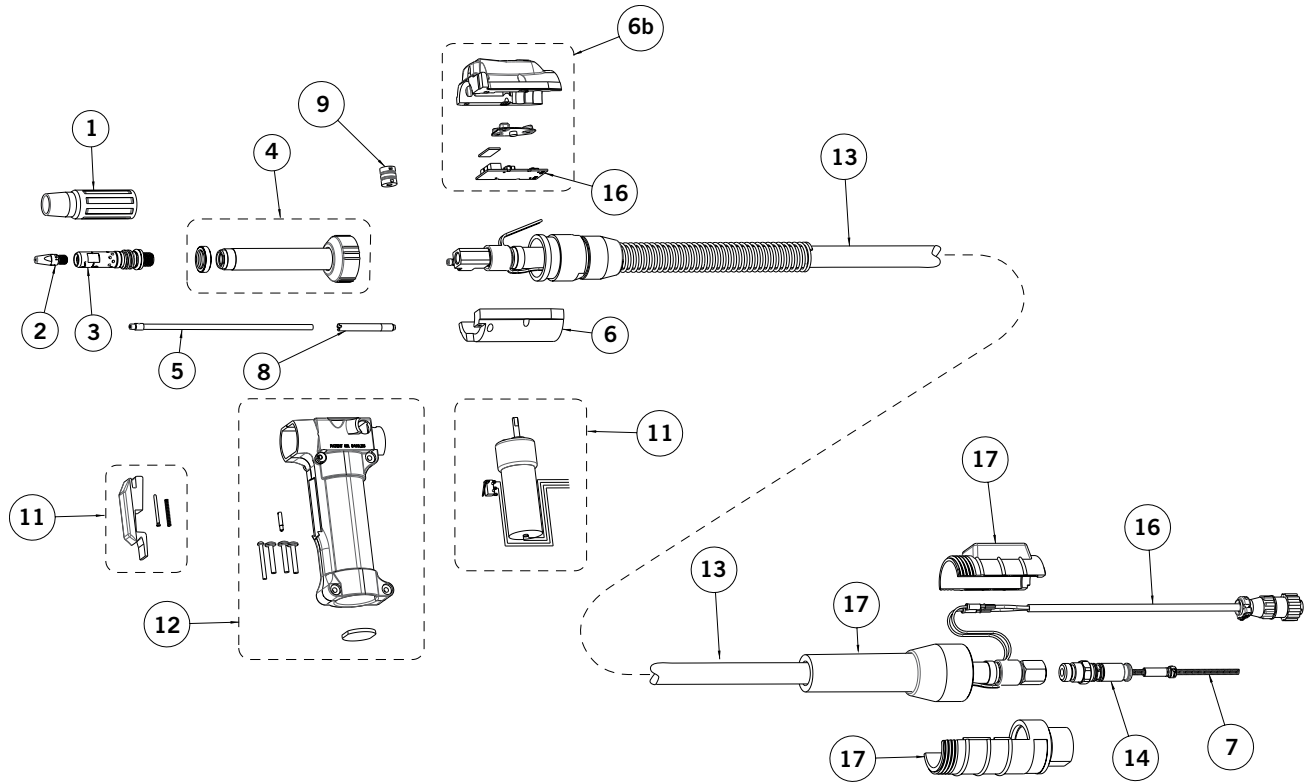
Wire Size	Length	Part No.	Stock No.
Up To .045" (1.2 mm)	33 ft (10.1 m)	PMP333-3545	1027-1401

Wire Size	Length	Part No.	Stock No.
Up To .045" (1.2 mm)	33 ft (10.1 m)	PMP333-3545	1027-1407

Rated Output			Wire Size	Cooled	Application Usage
Amps	Duty Cycle	Gas			
200 Amps	60%	Mixed	Up To .045" (1.2 mm)	Air	Medium Duty Fabrication

# PullMaster™ 300 Amp MIG Gun Replacement Parts

MIG GUNS



#	Description	Part No.	Stock No.
1	Nozzle	<b>PMA24 Series</b>	
2	Contact Tip	<b>16APS Series</b>	
3	Diffuser	<b>PMA54-16S</b>	1543-1106
4	Conductor Tube	<b>PMP64EL Series</b>	
5	Teflon Jump Liner, Flex Tube	<b>PMP-44FLX-116</b>	1644-1095
	Teflon Jump Liner, Rigid Tubes	<b>PMP-44PTF-116</b>	1644-1096
	Bronze Jump Liner for Steel Wires, Rigid Tubes	<b>PMP-44-116</b>	1644-1097
6b	Support Assembly Front (Including Smart Cover, PCB Membrane, Lens & Lower Support)	<b>PMPS186</b>	2060-2725
7	33 ft (10 m) Conduit Assembly, 3/64" - 1/16" (1.2 mm - 1.6 mm) Wire	<b>PMP 44-116-33</b>	1441-1125
	33 ft (10 m) Conduit Assembly, 3/64" - 1/16" (1.2 mm - 1.6 mm) Steel Wire	<b>PMPS 44-116-33</b>	1441-1129
	33 ft (10 m) Conduit Assembly, .035" - .045" (0.9 mm - 1.1 mm) Steel Wire	<b>PMPS 44-3545-33</b>	1441-1131
8	Front Wire Guide Assembly	<b>PMPS-106TA</b>	2060-1729

#	Description	Part No.	Stock No.
9	Drive Roll .030" (0.8 mm) Wire	<b>EPG103-2-0.8</b>	2031-2091
	Drive Roll .035" (0.9 mm) Wire	<b>EPG103-2-0.9</b>	2031-2077
	Drive Roll .040" (1.0 mm) Wire	<b>EPG103-2-1.0</b>	2031-2023
	Drive Roll 3/64" (1.2 mm) Wire	<b>EPG103-2-1.2</b>	2031-2003
	Drive Roll 1/16" (1.6 mm) Wire	<b>EPG103-2-1.6</b>	2031-2022
	Drive Roll V-Groove 1/16" (1.6 mm) Steel Wire	<b>EPG103-2-1.6V</b>	2031-2134
	Drive Roll V-Groove 3/64" (1.2 mm) Steel Wire	<b>EPG103-2-1.2V</b>	2031-2135
	Drive Roll V-Groove .035" (0.9 mm) Steel Wire	<b>EPG103-2-0.9V</b>	2031-2136
	10	Motor Assembly (24VDC)	<b>PMP-M24</b>
NS	Handle Cover Assembly	<b>EPG86-2</b>	2031-2013
11	Trigger Lever	<b>SPG-96TL</b>	2060-2733
12	Handle Assembly	<b>SPG86</b>	2060-2734
13	Cablehoz® Assembly 33 ft (10 m) Standard	<b>PMP300-33</b>	2060-2750
	Cablehoz Assembly 50 ft (15 m) Standard	<b>PMP300-50</b>	2060-2751
14	Connector Plug	<b>Refer to Pages 89-90</b>	
15	Control Wire (Standard)	<b>MS354-DSM</b>	2060-2140
16	Replacement PCB	<b>PM85-PCB</b>	2060-2738
	EPG-CR2 Jumper Wire	<b>PMP354T</b>	2031-2145
NS	Protective Cable Wrap, 50 ft (15 m) per box	<b>TCR50</b>	9900-1150
17	Rear Case Assembly	<b>PMP-T6RC</b>	2060-2731



## Features & Benefits

- **Heavy Duty Design** for industrial application environments
- **Ergonomic Handle** for operator comfort and appeal
- **Low Bench Weight** for easy to handle gun reduces operator fatigue
- **Increased Interface** between contact tip & gas diffuser improves performance and electrical conductivity
- **Provides Cooling Benefits** for the front end consumables for maximum efficiency and comfort
- **Heavy Duty Contact Tip and Diffuser** to act as “heat sink” in high heat applications
- **Improved Performance** with longer-life front end consumables
- **Operates @ 100% Duty Cycle** at high amperage applications

# Water-Cooled MIG Gun Series

		<b>Fusion Pro</b> 450 Amp	<b>PulseMaster</b> 400 Amp	<b>PulseMaster</b> 500 Amp	<b>Standard</b> 600 Amp
<b>Applications</b>		Light - Medium Duty Fabrication	Light-Medium Duty Fabrication	Heavy Duty Fabrication	Medium-Heavy Duty Fabrication
<b>Standard Options</b>	Rear Connector	■	■	■	■
	Standard without "Smart" Capability	■	■	■	
	"Smart" Capability	■	■	■	
<b>Output Current</b>		450 Amps	400 Amps	500 Amps	600 Amps
<b>Duty Cycle - Mixed Gases</b>		450 Amps	100%	100%	100%
<b>Wire Diameter</b>		Up to 1/16 (1.6mm)	Up to .045" (1.2 mm)	Up to .045" (1.2 mm)	Up to 3/32" (2.4 mm)
<b>Process</b>	MIG	■	■	■	■
	Aluminum	■	■	■	■



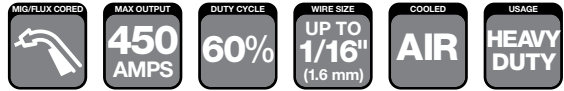
**Fusion Pro** 450 AMP  
Water-Cooled MIG Gun



**PulseMaster™** 400 & 500 Amp  
Water-Cooled Smart MIG Gun



**Standard** 600 Amp  
Water-Cooled MIG Gun



# Fusion Pro 450 AMP Water-Cooled MIG Gun



## 100% Duty Cycle - Mixed Gases

Suitable for Light-Medium Duty Fabrication.

### WELDING PROCESSES:

**MIG (GMAW), Aluminum (GMAW)**

### Standard Options Include:

- Rear Connector
- Standard Conductor Tube - TBD
- Conduit Liner - TBD

Fusion Pro 450 amp MIG gun is the latest addition to the TWECO water-cooled torch line. Front end wear parts are similar to a prior series in the family of MIG guns manufactured by TWECO under the series name Supra 450.

### FEATURES

- **“Knuckle joints and spring** support for improved flexibility
- Heat insulated torch necks for best handling
- Easy to service torches with insulated gas nozzle
- Ergonomic handle with soft-grip areas
- **Blade-Style Trigger Design** performs over 2 million cycles without failure
- **Multiple-Position Conductor Tube** for quick tool-free change, rotation and lower heat in the front end
- **Increased Interface** between contact tip & gas diffuser improves electrical conductivity
- **Heavy Duty Contact Tip and Diffuser** to act as “heat sink” in high heat applications

### Tweco® Style Rear Connector

Wire Size	Length	Part No.	Stock No.
Up To 1/16" (1.6 mm)	10 ft (3 m)	<b>FPW410116</b>	1044-1169
	15 ft (5 m)	<b>FPW415116</b>	1044-1170

### Lincoln® Style Rear Connector

Wire Size	Length	Part No.	Stock No.
Up To 1/16" (1.6 mm)	10 ft (3 m)	<b>FPW410L116</b>	1044-1173
	15 ft (5 m)	<b>FPW415L116</b>	1044-1174

### Miller® Style Rear Connector

*Adapter kits are available to fit Tweco rear connection to most wire feeders*

Wire Size	Length	Part No.	Stock No.
Up To 1/16" (1.6 mm)	10 ft (3 m)	<b>FPW410M116</b>	1044-1171
	15 ft (5 m)	<b>FPW415M116</b>	1044-1172

### Euro-Kwik Style Rear Connector

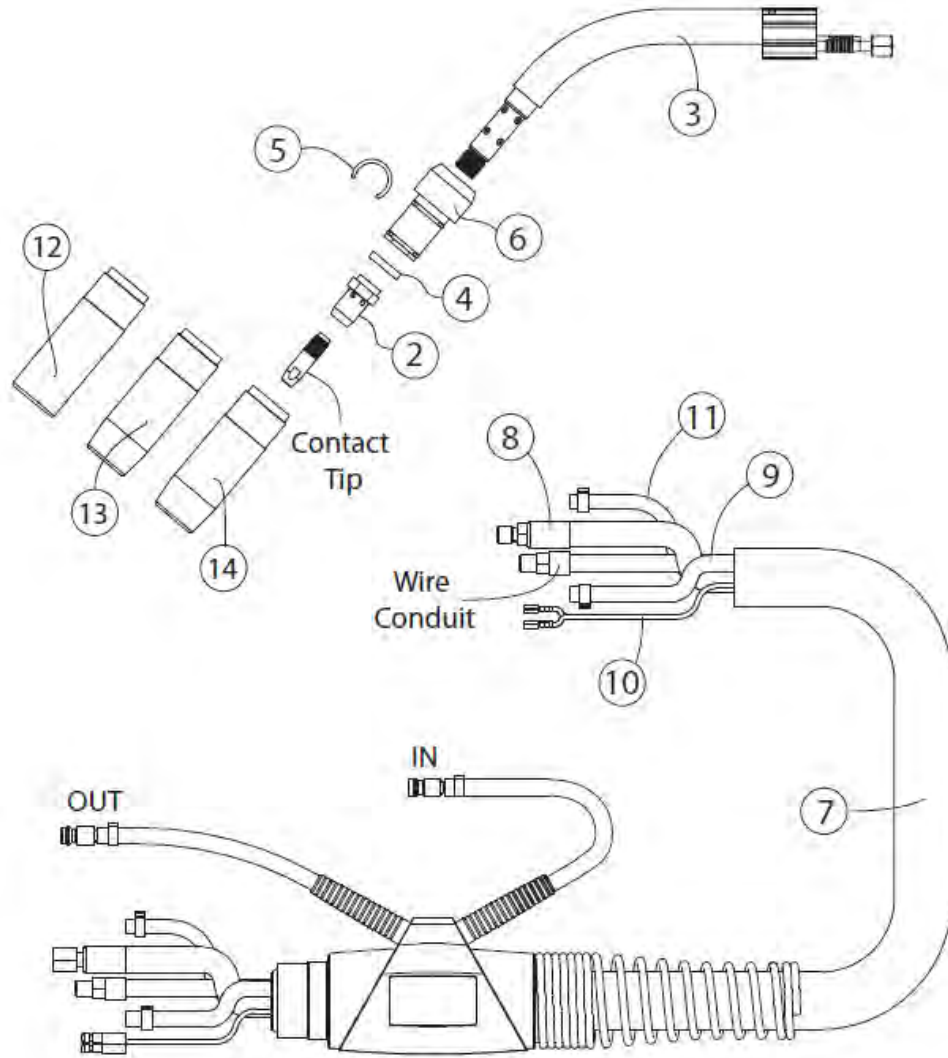
Wire Size	Length	Part No.	Stock No.
Up To 1/16" (1.6 mm)	10 ft (3 m)	<b>FPW410X116</b>	1044-1178
	15 ft (5 m)	<b>FPW415X116</b>	1044-1179

Rated Output			Wire Size	Cooled	Application Usage
Amps	Duty Cycle	Gas			
450 Amps	100%	Mixed	Up to 1/16"	Water (1.6mm)	Light-Medium Duty Fabrication

**EASY FIND GUIDE**  
See Pages 81 & 82 for Replacement Parts & Optional Accessories



# FUSION Pro Water-Cooled MIG Gun Replacement Parts



#	Description	Part No.	Stock No.
2	Gas Diffuser	FPW5416S	1540-1117
3	Conductor Tube	FPW6460	1644-1127
4	Insulator Ring	SW642	2044-1020
5	Nozzle Retaining Ring	SW64R	2044-1025
6	Nozzle Holder	SW643	2044-1019
7	Complete Cable Assembly – 10ft (3m)	FPW410	1742-2134
	Complete Cable Assembly – 15ft (5m)	FPW415	1742-2135
	Complete Cable Assembly – EURO - 10ft (3m)	FPWX410	1742-2136
	Complete Cable Assembly – EURO - 15ft (5m)	FPWX415	1742-2137
8	Water Power Cable – 10ft (3m)	FPW410PC	1742-2233
	Water Power Cable – 15ft (5m)	FPW415PC	1742-2234

#	Description	Part No.	Stock No.
9	Gas Hose – 10ft (3m)	FPW410GH	1742-2248
	Gas Hose – 15ft (5m)	FPW415GH	1742-2249
10	Control Cable - Wire Conduit – 10ft (3m)	FPW410CC	1742-2238
	Control Cable - Wire Conduit – 15ft (5m)	FPW415CC	1742-2239
11	Water Hose Assembly with Hose Clamps – 10ft (3m)	FPW410WO	1742-2228
	Water Hose Assembly with Hose Clamps – 15ft (5m)	FPW415WO	1742-2229
12	Nozzle – 0.83" (21mm)	FPW2421	1244-1030
13	Nozzle – 0.61" (15.5mm)	FPW2415	1244-1028
14	Nozzle – 0.67" (17mm)	FPW2417	1244-1029

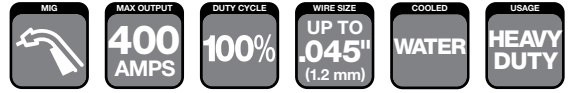
# FUSION Pro Water-Cooled MIG Gun

## Replacement Parts & Consumables

<b>FUSION PRO Contact Tips</b>		
<b>Description</b>	<b>Part No.</b>	<b>Stock No.</b>
Contact Tip – 0.035" (0.8mm)	FPW1435	1140-1217
Contact Tip – 0.040" (1.0mm)	FPW1440	1140-1218
Contact Tip – 0.045" (1.2mm)	FPW1445	1140-1219
Contact Tip – 0.052" (1.3mm)	FPW1452	1140-1220
Contact Tip – 1/16" (1.6mm)	FPW14116	1140-1222

<b>Ordering Information</b>		
<b>Description</b>	<b>Part No.</b>	<b>Stock No.</b>
Handle Kit Strain Relief & Mounting Screws	FPW84	2044-1038
Trigger Assembly	FPW94	2044-1039

<b>FUSION PRO Conduit Liners</b>		
<b>Description</b>	<b>Part No.</b>	<b>Stock No.</b>
44 Series Conduit Liner – Up To 1/16" (1.6mm) – 10ft (3m)	FPW4411610	1440-1904
44 Series Conduit Liner – Up To 1/16" (1.6mm) – 15ft (5m)	FPW4411615	1440-1905
44 Series Conduit Liner – Up To 1/16" (1.6mm) – EURO - 10ft (3m)	FPWX4411610	1440-1908
44 Series Conduit Liner – Up To 1/16" (1.6mm) – EURO -15ft (5m)	FPWX4411615	1440-1909
44 Series Conduit Liner – Up To .045" (1.2mm) – 10ft (3m)	FPW44354510	1440-1906
44 Series Conduit Liner – Up To .045" (1.2mm) – 15ft (5m)	FPW44354515	1440-1907
44 Series Conduit Liner – Up To .045" (1.2mm) – EURO -10ft (3m)	FPWX44354510	1440-1910
44 Series Conduit Liner – Up To .045 (1.2mm) – EURO-15ft (5m)	FPWX44354515	1440-1911
<b>FOR ALUMINUM WIRE (PTFE/BRONZE LINER)</b>		
44 Series Conduit Liner – Up To 1/16" (1.6mm) – 10ft (3m)	FPWA4411610	1440-1914
44 Series Conduit Liner – Up To 1/16" (1.6mm) – 15ft (5m)	FPWA4411615	1440-1915
44 Series Conduit Liner – Up To 1/16" (1.6mm) – EURO - 10ft (3m)	FPWXA4411610	1440-1919
44 Series Conduit Liner – Up To 1/16" (1.6mm) – EURO -15ft (5m)	FPWXA4411615	1440-1920
44 Series Conduit Liner – Up To .045" (1.2mm) – 10ft (3m)	FPWA44354510	1440-1916
44 Series Conduit Liner – Up To .045" (1.2mm) – 15ft (5m)	FPWA44354515	1440-1917
44 Series Conduit Liner – Up To .045" (1.2mm) – EURO -10ft (3m)	FPWXA44354510	1440-1921
44 Series Conduit Liner – Up To .045 (1.2mm) – EURO-15ft (5m)	FPWXA44354515	1440-1922



# PulseMaster™ 400 Amp Water-Cooled MIG Gun



Tweco® PulseMaster Smart MIG® Gun with digital display

Tweco PulseMaster Standard MIG Gun

**100% Duty Cycle - Mixed Gases**  
Suitable for Heavy Duty Fabrication.

**WELDING PROCESSES:**  
MIG (GMAW), Aluminum (GMAW)

- Standard Options Include:**
- Rear Connector
  - Standard without “Smart” Capability but available with “Smart” Capability
  - Standard Conductor Tube – Part No. PMP64EL-180 (Stock No. 1642-1140)
  - Conduit Liner – 44 Series

**FEATURES**

- **“Smart” Capability** with digital display and one-touch, on-the-fly controls to adjust primary parameters such as welding current, material thickness, wire feed speed or arc length trim
- **Heavy Duty Design** for industrial application environments and long-lasting durability
- **Heavy Duty Cablehoz®** designed for pulse welding demands with smooth feed performance to reduce “bird nesting” and provide excellent flexibility for better current capacity
- **Ergonomic Impact-Resistant Handle** to reduce operator fatigue
- **Blade-Style Trigger Design** performs over 2 million cycles without failure
- **Multiple-Position Conductor Tube** for quick tool-free change, rotation and lower heat in the front end
- **Increased Interface** between contact tip & gas diffuser improves electrical conductivity
- **Heavy Duty Contact Tip and Diffuser** to act as “heat sink” in high heat applications

**Smart Gun** *PulseMaster Smart MIG Guns are used only with Tweco® PowerMaster SP machines and are available with “Smart” Capability.*

**Tweco® Style Rear Connector**

Wire Size	Length	Part No.	Stock No.
Up To .045" (1.2 mm)	12 ft (3.6 m)	PMWS412-3545	1042-1510
	15 ft (4.6 m)	PMWS415-3545	1042-1511

**Euro-Kwik Style Rear Connector**

Wire Size	Length	Part No.	Stock No.
Up To .045" (1.2 mm)	12 ft (3.6 m)	PMWS412X-3545	1042-1515

**Standard Gun** *PulseMaster MIG Guns are Standard without “Smart” Capability.*

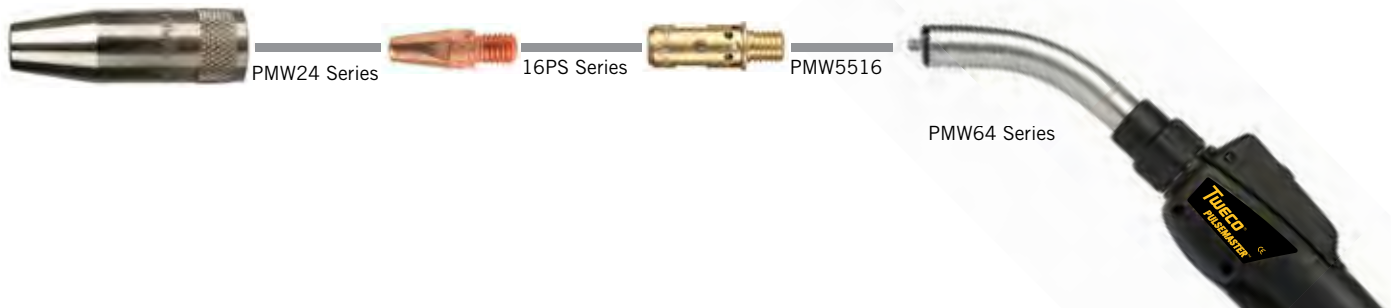
**Tweco® Style Rear Connector**

*Adapter kits are available to fit Tweco rear connection to most wire feeders*

Wire Size	Length	Part No.	Stock No.
Up To .045" (1.2 mm)	12 ft (3.6 m)	PMW412-3545	1042-1500

**Euro-Kwik Style Rear Connector**

Wire Size	Length	Part No.	Stock No.
Up To .045" (1.2 mm)	12 ft (3.6 m)	PMW412X-3545	1042-1505



Rated Output			Wire Size	Cooled	Application Usage
Amps	Duty Cycle	Gas			
400 Amps	100%	Mixed	Up To .045" (1.2 mm)	Water	Heavy Duty Fabrication

**EASY FIND EASY FIND GUIDE**  
See Page 85 for Replacement Parts & Optional Accessories

# PulseMaster™ 500 Amp Water-Cooled MIG Gun

MIG	MAX OUTPUT <b>500</b> AMPS	DUTY CYCLE <b>100%</b>	WIRE SIZE <b>UP TO .045"</b> (1.2 mm)	COOLED <b>WATER</b>	USAGE <b>HEAVY DUTY</b>
-----	----------------------------------	---------------------------	---	------------------------	----------------------------



**100% Duty Cycle - Mixed Gases**  
Suitable for Heavy Duty Fabrication.

### WELDING PROCESSES:

MIG (GMAW), Aluminum (GMAW)

### Standard Options Include:

- Rear Connector
- Standard without “Smart” Capability but available with “Smart” Capability
- Standard Conductor Tube – Part No. PMP64EL-180 (Stock No. 1642-1140)
- Conduit Liner – 44 Series

### FEATURES

- **“Smart” Capability** with digital display and one-touch, on-the-fly controls to adjust primary parameters such as welding current, material thickness, wire feed speed or arc length trim
- **Heavy Duty Design** for industrial application environments and long-lasting durability
- **Heavy Duty Cablehoz®** designed for pulse welding demands with smooth feed performance to reduce “bird nesting” and provide excellent flexibility for better current capacity
- **Improved Performance** with longer-life consumables
- **Twin-Pulse Mode** for the perfect weld bead
- **Multiple-Position Conductor Tube** for quick tool-free change, rotation and lower heat in the front end
- **Increased Interface** between contact tip & gas diffuser improves electrical conductivity

**Smart Gun** *PulseMaster Smart MIG Guns are used only with Tweco® PowerMaster SP machines and are available with “Smart” Capability.*

### Tweco® Style Rear Connector

Wire Size	Length	Part No.	Stock No.
Up To .045" (1.2 mm)	12 ft (3.6 m)	PMWS512-3545	1042-1535

### Euro-Kwik Style Rear Connector

Wire Size	Length	Part No.	Stock No.
Up To .045" (1.2 mm)	12 ft (3.6 m)	PMWS512X-3545	1042-1540

**Standard Gun** *PulseMaster MIG Guns are Standard without “Smart” Capability.*

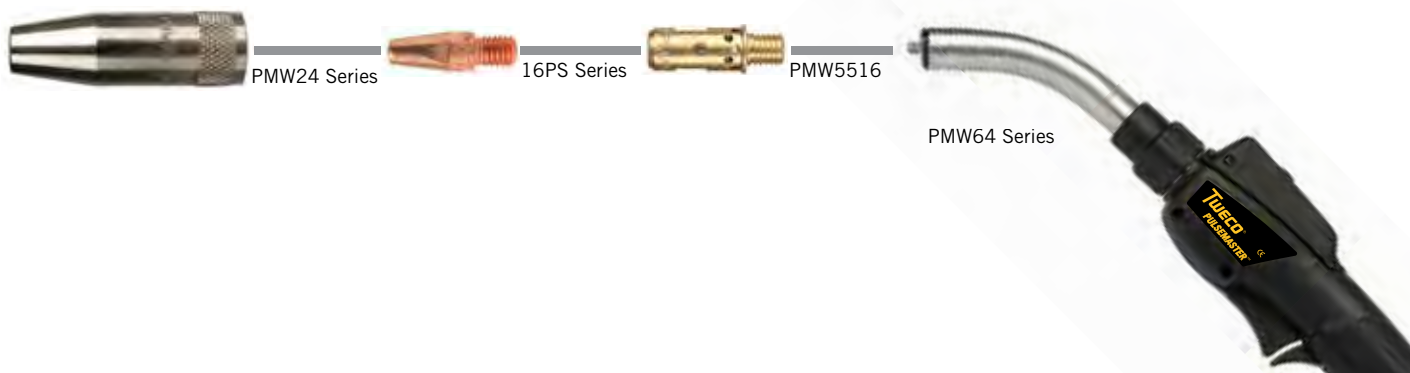
### Tweco® Style Rear Connector

*Adapter kits are available to fit Tweco rear connection to most wire feeders*

Wire Size	Length	Part No.	Stock No.
Up To .045" (1.2 mm)	15 ft (4.6 m)	PMW515-3545	1042-1526

### Euro-Kwik Style Rear Connector

Wire Size	Length	Part No.	Stock No.
Up To .045" (1.2 mm)	15 ft (4.6 m)	PMW515X-3545	1042-1531

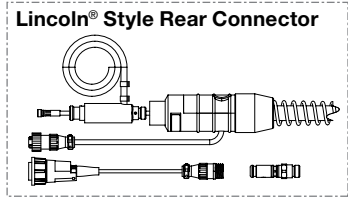
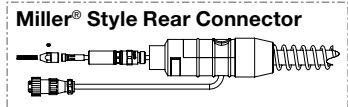
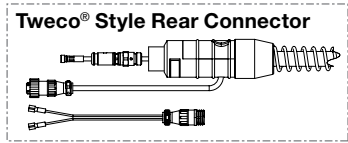
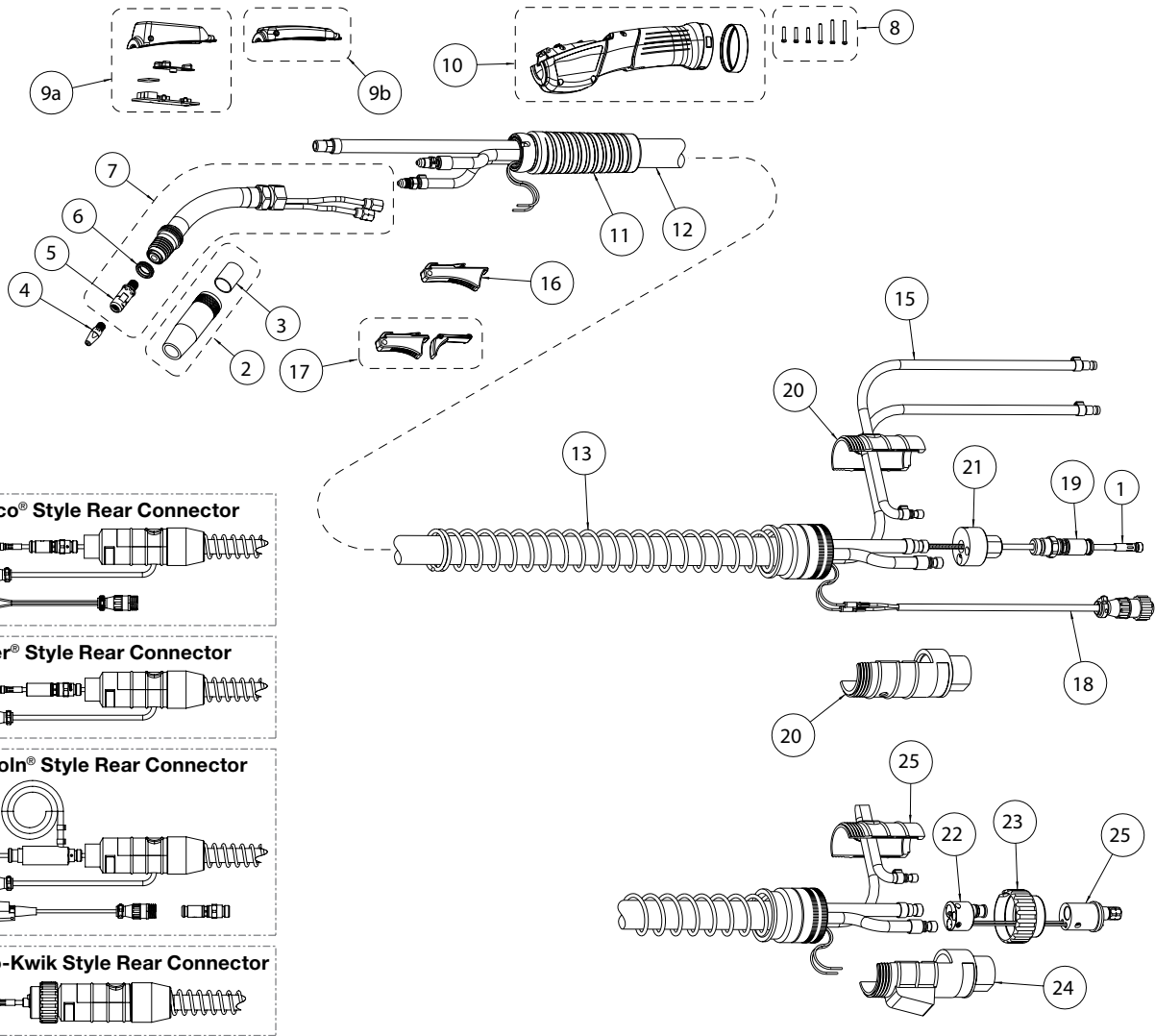


Rated Output			Wire Size	Cooled	Application Usage
Amps	Duty Cycle	Gas			
500 Amps	100%	Mixed	Up To .045" (1.2 mm)	Water	Heavy Duty Fabrication

**EASY FIND**  
**EASY FIND GUIDE**  
See Page 85 for Replacement Parts & Optional Accessories

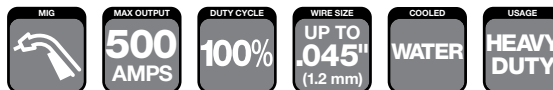
Miller is a registered trademark of Illinois Tool Works, Inc. Lincoln is a registered trademark of Lincoln Electric Co. The aforementioned registered trademarks are in no way affiliated with Tweco. Tweco is registered trademark of ESAB.

# PulseMaster™ Water-Cooled MIG Gun Replacement Parts



#	Description	Part No.	Stock No.
1	Conduit Assembly	Refer to Pages 127-130	
2	Nozzle	PMW24 Series	
3	Nozzle Insulator / Spatter Shield	WC23-1	1230-1084
4	Contact Tip	16PS Series	
5	Gas Diffuser used w/16P & 16PS Series Contact Tips	PMW5516	1550-1105
6	Pressure Ring	PMW64-3	1644-2900
7	Conductor Tube	PMW64 Series	
8	Handle Screws w/ T9 Star Head (12 mm, 16 mm, & 20 mm LG)	PMHSK	2060-2705
9a	Handle Housing w/ Smart Control Assembly	PM84-PCB-HK	2060-2706
9b	Handle Housing (Blank)	PM84-H	2060-2707
10	Large Handle Assembly w/ Retaining Ring	PM84	2060-2708
	Small Handle Assembly w/ Retaining Ring	PM83	2060-2715
11	Front Cable Support	PMW-SPS	2060-2720

#	Description	Part No.	Stock No.
12	12 ft (3.6 m) Cable and Hose Assembly	PMW512	2060-2721
13	Strain Relief Spring	QR-SPR	3045-1177
14	Strain Relief Cap	QR-RC	3045-1238
15	Water Hose Assembly	--	--
16	Trigger	PM94	2060-2712
17	Trigger & Guard Assembly	--	-
18	Control Wire Plug	MS354-DSM	2060-2140
19	Heavy Duty Connector Plug Assembly	350-174H	2035-2110
20	Rear Case	--	--
21	Rear Connector Block (Direct Plug)	WC6-170H	2064-2171
22	Rear Connector Block (Euro)	WC174X-B	2044-2182
23	Euro-Kwik Connector Nut	174X-2	2040-2177
24	Euro-Kwik Rear Case	X6RC	2060-2006
25	Euro-Kwik Connector Assembly	WC174X	2044-2181



# Tweco® TC900 & TCV900

## Water Coolers



Tweco TCV900 Water Cooler

Tweco TC900 Water Cooler

### FEATURES

- **Designed for MIG Guns & TIG Torches** up to 500 Amps
- **12,000 BTU @ 75 degree differential** between ambient and return water temperature
- **1 GPM @ 50 psi** (Gear Pump)
- **Stainless Steel Construction** eliminates coolant contamination due to electrolyte and chemical reactions
- **High Efficiency Radiator Design** pulls outside air through radiator
- **Vertical Model** has molded seamless plastic water tank; virtually eliminates leakage
- **Pump Bypass** to tank on rotary gear pump - keeps pump from overheating
- **Vane Pumps** are equipped with a bypass to eliminate excessive pump wear

### WELDING PROCESSES:

**MIG (GMAW), TIG (GTAW)**

### Standard Options Include:

- Stainless Steel Construction
- 2 Gallon Reservoir
- Vertical or Horizontal Models Available
- Available options include either Gear Pump or Vane Pump

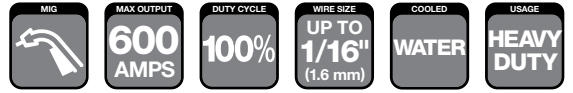
### TC900 Water Cooler

Description	Part No.	Stock No.
Cooler w/ Gear Pump 110V - 50/60 Hz	TC900-G	4010-1010
Cooler w/ Vane Pump 110V - 50/60 Hz	TC900-V	4010-1011

### TCV900 Water Cooler

Description	Part No.	Stock No.
Cooler w/ Gear Pump 110V - 50/60 Hz	TCV900-G	4010-1035
Cooler w/ Vane Pump 110V - 50/60 Hz	TCV900-V	4010-1036

Rated Output			Wire Size	Cooled	Application Usage
Amps	Gear Pump	Temperature			
500 Amps	1 GPM @ 50 psi	12,000 BTU @ 75° differential	2 Gal. (7.6 L)	Water	Heavy Duty Fabrication



# Standard 600 Amp Water-Cooled MIG Gun



**100% Duty Cycle - CO<sub>2</sub> Carbon Dioxide**  
Suitable for Medium - Heavy Duty Fabrication.

**WELDING PROCESSES:**  
**MIG (GMAW), Aluminum (GMAW)**

**Standard Options Include:**

- Rear Connector
- Standard Conductor Tube – Part No. WCS66-60 (Stock No. 1664-1106)
- Conduit Liner – 45 Series

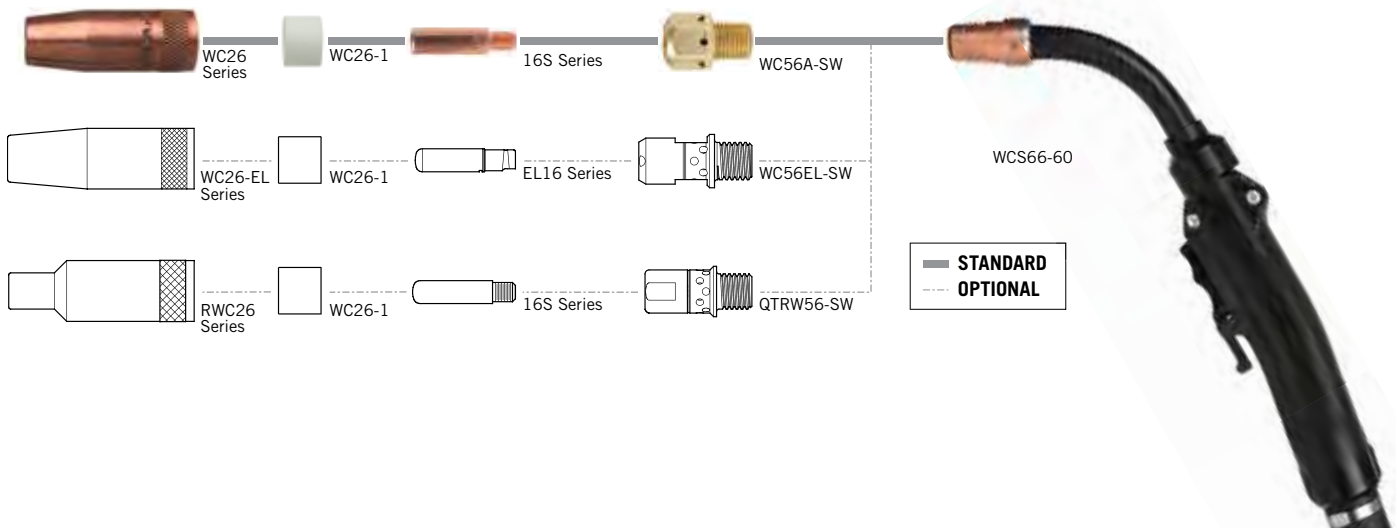
**FEATURES**

- **Ergonomic Handle** to reduce operator fatigue
- **Low Bench Weight** for easy to handle gun
- **Provides Cooling Benefits** to increase “weld” life of front end consumables
- **Cool Running** for maximum efficiency and comfort
- **High Water Flow Rates**
- **Large Water Lines** for maximum cooling
- **Threaded Water Line Connections** making hook-up easy (LH CGA)
- **Increased Duty Cycle** at high amperage applications
- **Large Diameter Wire Capacity** up to 7/64” (2.8 mm)
- **Outer Cover** protects components from weld spatter/abrasion
- **Simplified Direct Rear Plug Connections**
- **Replacement Cable Assemblies Available** – field-repairable power cable, water-lines and gas hose
- **Color Coded Water Lines** for easy identification to water-in & water-out
- **Adapts Easily** to Miller® and Lincoln® style machines

**Tweco® Style Rear Connector**

Adapter kits are available to fit Tweco rear connection to most wire feeders

Wire Size	Length	Part No.	Stock No.
Up To 1/16" (1.6 mm)	10 ft (3 m)	<b>WCS610-116</b>	1064-1114
.045" (1.2 mm)	15 ft (4.6 m)	<b>WCS615-3545</b>	1064-1106
1/16" (1.6 mm)	15 ft (4.6 m)	<b>WCS615-116</b>	1064-1116

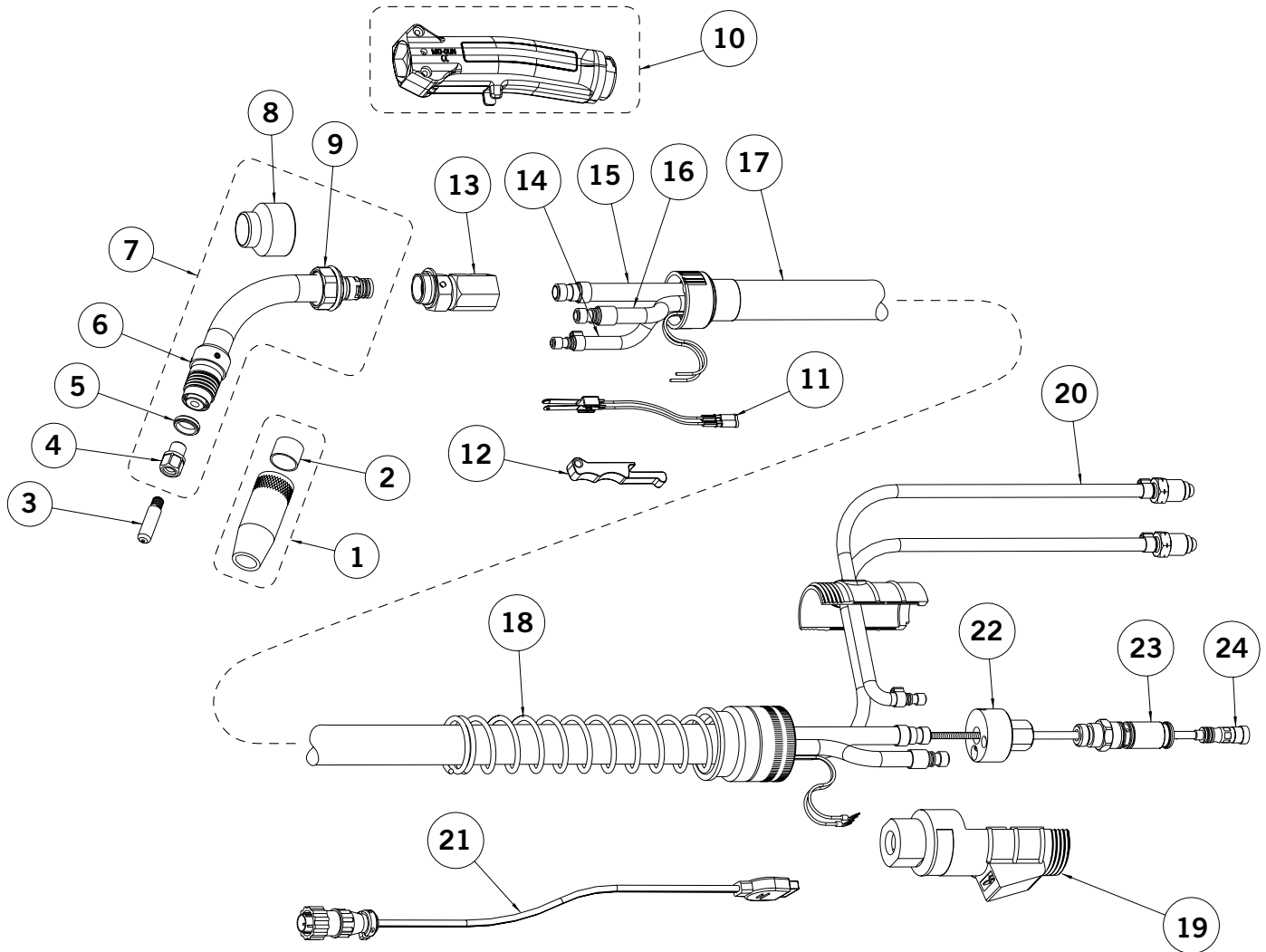


Rated Output			Wire Size	Cooled	Application Usage
Amps	Duty Cycle	Gas			
600 Amps	100%	CO <sub>2</sub> Carbon Dioxide	Up To 1/16" (1.6 mm)	Water	Heavy Duty Fabrication



**MIG GUNS**

# Standard 600 Amp Water-Cooled MIG Gun Replacement Parts



#	Description	Part No.	Stock No.
1	Nozzle	<b>WC26 Series</b>	
2	Spatter Shield	<b>WC26-1</b>	1264-1009
3	Contact Tip	<b>16S Series</b>	
4	Diffuser	<b>WC56A-SW</b>	
5	Pressure Ring Insulator	<b>WC36-R</b>	2064-1036
6	Conductor Tube Housing	<b>WCS36-H</b>	1344-1145
7	Conductor Tube	<b>WCS66-60</b>	
8	Nut Cover Insulation	--	--
9	Locking Nut	<b>WC66-N</b>	2064-2067
10	Handle Assembly	<b>W6R-H</b>	2064-2031
11	Trigger Blade Assembly	<b>EL96-B</b>	2060-2606
12	Trigger	<b>EL96</b>	2060-2605
13	Front Connector Block	<b>WC106</b>	2064-2106
14	Water Hose IN, 10 ft (3 m)	<b>WC610-WH</b>	1764-2131
	Water Hose IN, 15 ft (5 m)	<b>WC615-WH</b>	1764-2133
15	Gas Hose, 10 ft (3 m)	<b>WC610-GH</b>	1764-2121
	Gas Hose, 12 ft (4 m)	<b>WC612-GH</b>	1764-2122
	Gas Hose, 15 ft (5 m)	<b>WC615-GH</b>	1764-2123

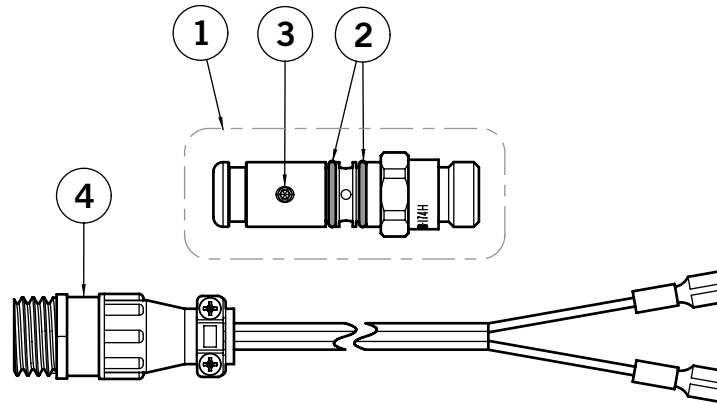
#	Description	Part No.	Stock No.
16	Power Cable, 10 ft (3 m)	<b>WC610-PC</b>	1764-2111
	Power Cable, 12 ft (4 m)	<b>WC612-PC</b>	1764-2112
	Power Cable, 15 ft (5 m)	<b>WC615-PC</b>	1764-2113
17	Complete Cable Assembly, 10 ft (3 m)	<b>WC600-10</b>	1764-2101
	Complete Cable Assembly, 15 ft (5 m)	<b>WC600-15</b>	1764-2103
18	Rear Strain Relief Spring	<b>QR-SPHD</b>	3045-1178
19	Rear Case	<b>W6RC</b>	2064-2600
20	Water Hose Out	<b>WC603-WH</b>	1764-2130
21	Control Wire (Tweco®)	<b>MAK-354</b>	2642-2460
	Control Wire (Miller®)	<b>MSAK-354</b>	2642-2470
	Control Wire (Lincoln®)	<b>LAK-354</b>	2642-2450
22	Rear Connector Block (Direct Plug)	<b>WC6-170H</b>	2064-2171
	Rear Connector Block (Euro Plug)	<b>WC174X-B</b>	2044-2182
23	Connector Plug	<b>Refer to Pages 89-90</b>	
24	Conduit Assembly	<b>Refer to Pages 127-130</b>	

Miller is a registered trademark of Illinois Tool Works, Inc. Lincoln is a registered trademark of Lincoln Electric Co. The aforementioned registered trademarks are in no way affiliated with Tweco. Tweco is registered trademark of ESAB.



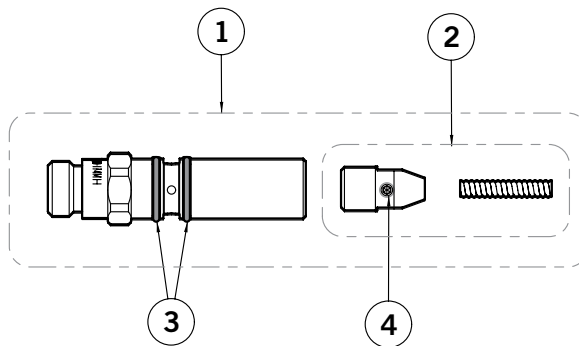
# Tweco® MIG Gun Direct Plug & Control Wire Jumpers

MIG GUNS



## Tweco® Style

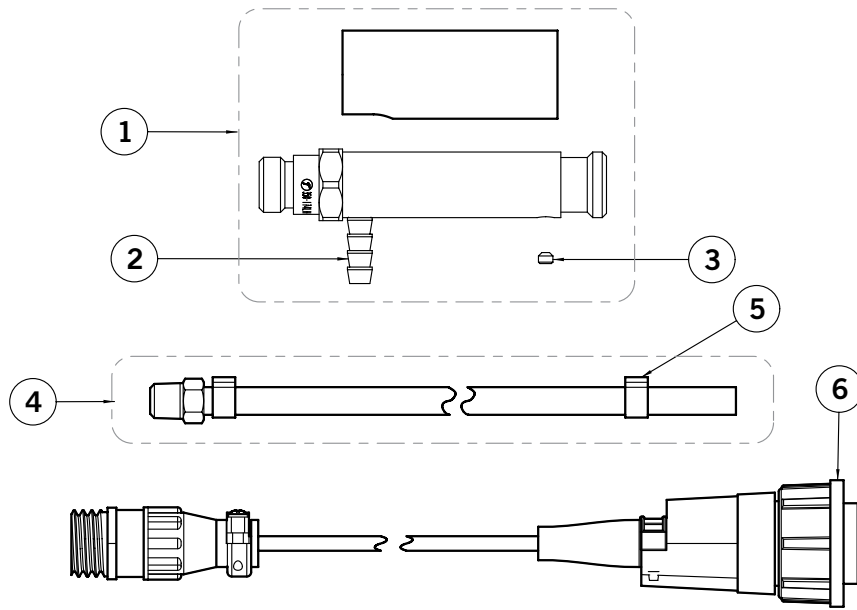
#	Description	100 - 450 Amps		500 - 600 Amps	
		Part No.	Stock No.	Part No.	Stock No.
1	Connector Plug	<b>350-174H</b>	2035-2110	<b>176SH</b>	2060-2177
	Connector Plug (Extra Long)	<b>350-174HXL</b>	2035-2116	--	--
2	O-Ring Only (Package of 10)	<b>224S</b>	2064-2059	<b>225S</b>	2050-2226
3	Set Screw Only (Package of 10)	<b>44CS</b>	2040-2046	<b>2040-2046</b>	2040-2046
4	ESAB® Thermal Arc® Control Jumper Cord	<b>MS-354-TAJ</b>	2060-2139	<b>MS-354-TAJ</b>	2060-2139
NS	ESAB® Rebel™ 4-Pin To 8 Pin Control Jumper Cord	<b>354TA-8</b>	2060-2142	--	--
NS	Additional Adapter Kits	<b>See Adapter Kit Catalog - Form No. TAKL-97</b>			



## Miller® Style

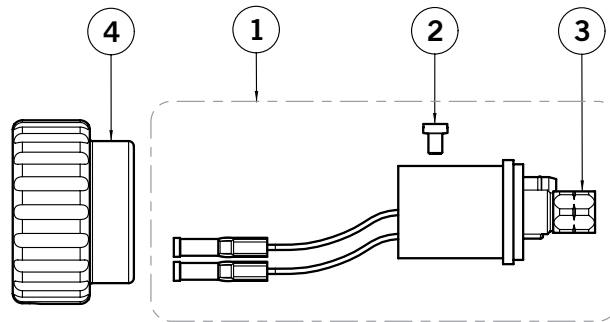
#	Description	100 - 450 Amps		500 - 600 Amps	
		Part No.	Stock No.	Part No.	Stock No.
1	Connector Plug	<b>350-174MH</b>	2035-2111	<b>EL176MH</b>	2060-2178
	Connector Plug (Extra Long)	<b>350-174MHXL</b>	2035-2114	--	--
2	Wire Guide Assembly Only	<b>174M-N</b>	2040-2184	<b>175M-N</b>	2050-2178
3	O-Ring Only (Package of 10)	<b>224S</b>	2064-2059	<b>224S</b>	2064-2059
4	Set Screw Only (Package of 10)	<b>44CS</b>	2040-2046	<b>44CS</b>	2040-2046

# Tweco® MIG Gun Direct Plug & Control Wire Jumpers



## Lincoln® Style

#	Description	100 - 450 Amps		500 - 600 Amps	
		Part No.	Stock No.	Part No.	Stock No.
1	Connector Plug	<b>350-174LH</b>	2035-2112	<b>EL176LH</b>	2060-2680
2	Gas Nipple	<b>35-170-5</b>	2000-2175	<b>35-170-5</b>	2000-2175
3	Set Screw Only (Package of 10)	<b>44CS</b>	2040-2046	<b>44CS</b>	2040-2046
4	Gas Hose With Clamp	<b>AK353</b>	2642-2300	<b>AK353</b>	2642-2300
5	Gas Hose Clamp Only	<b>AK-353-2A</b>	2642-2302	<b>AK-353-2A</b>	2642-2302
6	Lincoln Control Jumper Cord	<b>MS354DS-LJ</b>	2060-2137	<b>MS354DS-LJ</b>	2060-2137



## Euro-Kwik Style

#	Description	100 - 450 Amps		500 - 600 Amps	
		Part No.	Stock No.	Part No.	Stock No.
1	Euro-Kwik Body Assembly	<b>174EX-1</b>	2040-2276	<b>174EX-1</b>	2040-2276
	Euro-Kwik Body Assembly (Water-Cooled)	<b>WC174X</b>	2044-2181	<b>WC174X</b>	2044-2181
2	Screw Only	<b>4-MS</b>	2011-2004	<b>4-MS</b>	2011-2004
3	Euro-Kwik Conduit Cap Only	<b>174EX-1C</b>	2040-2279	<b>174EX-1C</b>	2040-2279
4	Euro-Kwik Nut	<b>174X-2</b>	2040-2177	<b>174X-2</b>	2040-2177

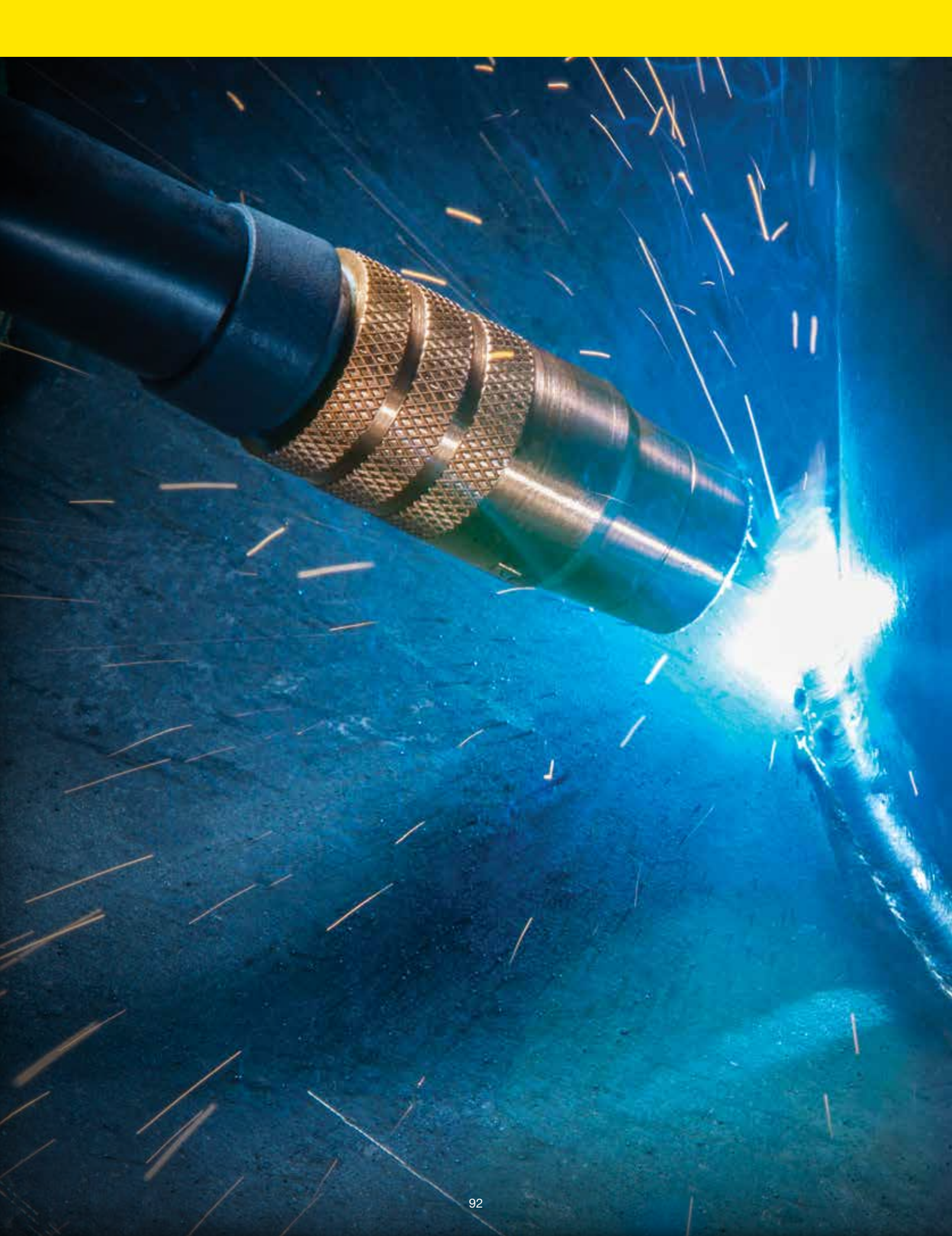


LESS DOWNTIME.  
**MORE WELD TIME.**



**TWECO**  
AN ESAB BRAND

**VELOCITY2**



# CONSUMABLES THAT **WORK OVERTIME.**

**INTRODUCING VELOCITY2™**—THE LONGEST-LASTING MIG CONSUMABLE ON THE MARKET. THESE GROUNDBREAKING TIPS AND NOZZLES GIVE YOU SUPERIOR WELDING PERFORMANCE WITH A SMOOTHER ARC AND A BETTER WELD BEAD. THE SIMPLE DESIGN MAKES CHANGEOUTS QUICK AND EASY—NO TOOLS REQUIRED. GET READY TO **MAXIMIZE PRODUCTIVITY** WHERE IT MATTERS MOST.

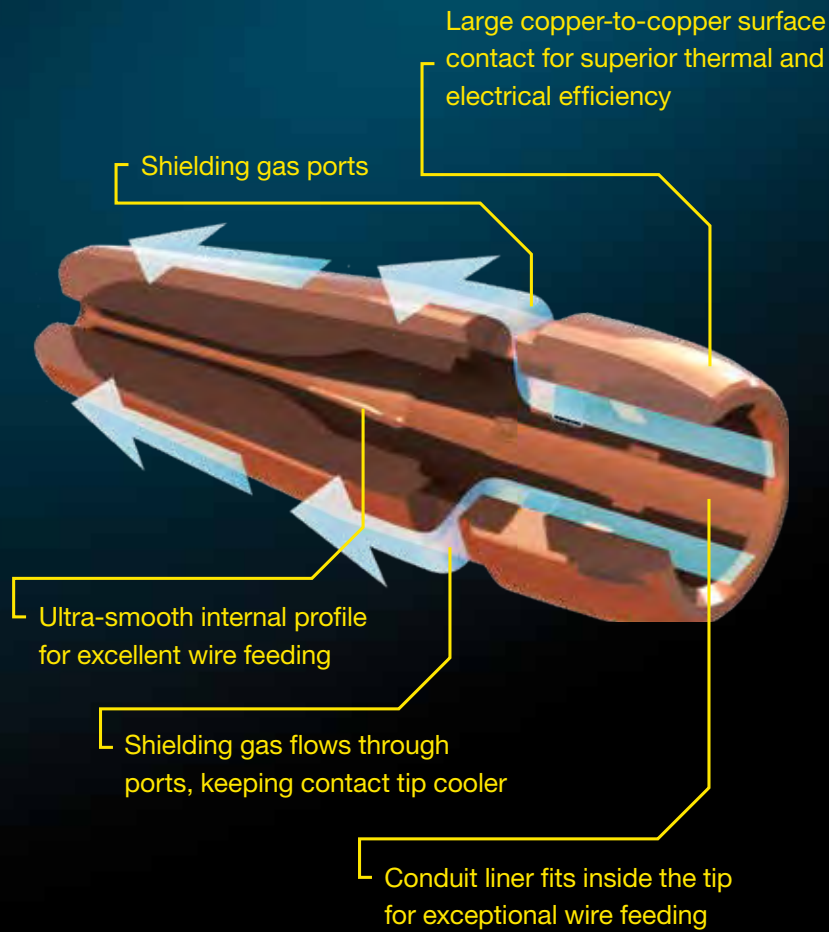
**TWECO** // **VELOCITY2™**  
AN ESAB BRAND

# SPEED.

With only two consumable parts—a nozzle and a threadless contact tip—changeouts are quick, easy, and tool-free.

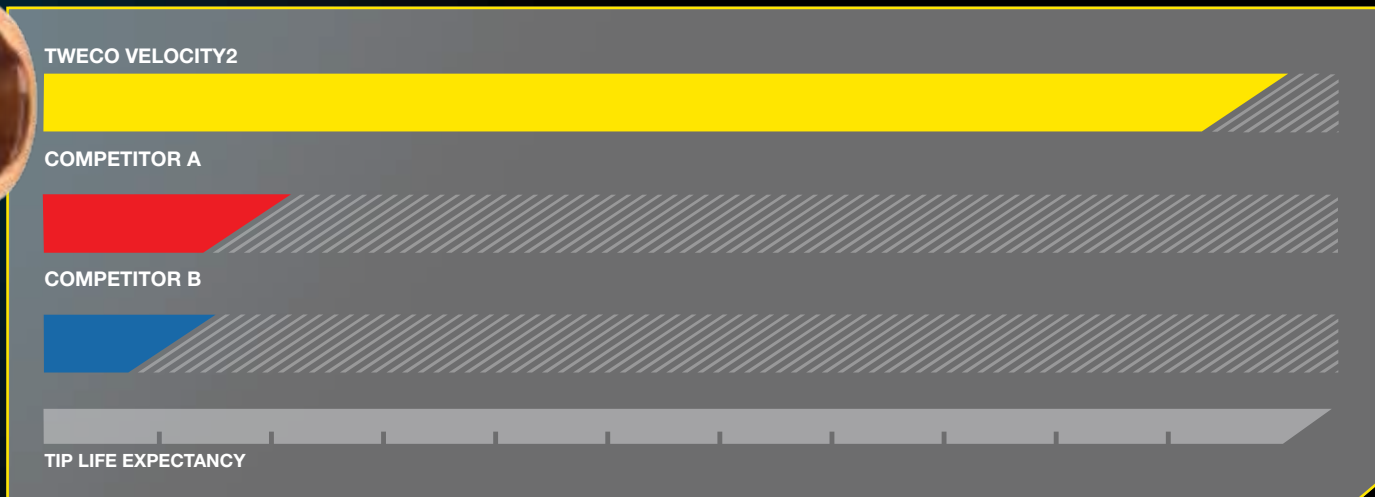


# INNOVATION.



# MORE UPTIME.

Gas ports in the solid-copper contact tip allow it to remain **40% cooler** and last **10 times longer** than competitors, making VELOCITY2 the only premium consumable that works as hard as you do.



Data from our accelerated lab and real-world field trial studies comparing VELOCITY2 contact tips versus competitors' contact tip life expectancy.

# QUALITY.

Fewer connections mean a smoother arc, less spatter, and a better weld bead.



# VERSATILITY.

## MADE FOR ANY APPLICATION.

### LIGHT-DUTY RANGE

Wire sizes: .023–5/64 in.  
(0.6–2.0 mm)

Optimized for:  
.035 in. and .045 in.  
(0.9 mm and 1.2 mm)

140–300 A  
@ 60% duty cycle

### MEDIUM-DUTY RANGE

Wire sizes: .023–1/16 in.  
(0.6–1.6 mm)

Optimized for:  
.035 in. and .045 in.  
(0.9 mm and 1.2 mm)

200–350 A  
@ 60% duty cycle

### HEAVY-DUTY RANGE

Wire sizes: .030–1/8 in.  
(0.8–3.2 mm)

Optimized for:  
.035 in. and 5/64 in.  
(0.9 mm and 2.0 mm)

300–600 A  
@ 80% duty cycle



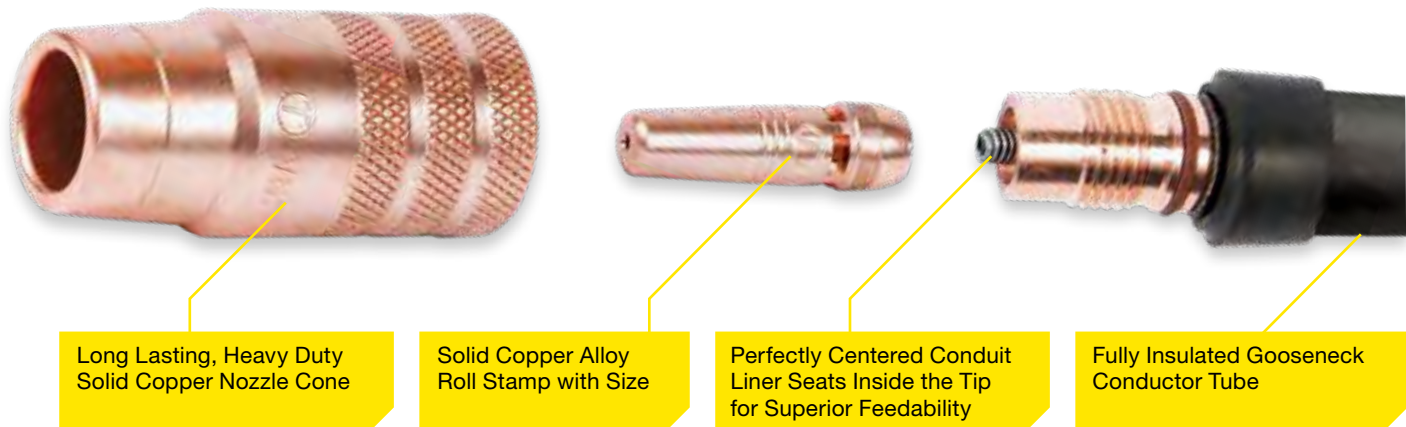
## SMOOTHER ARC IMPROVES STABILITY AND WELDING PERFORMANCE.



Welders who really need smooth arc performance told us, 'reduce the number of connections, each connection is a chance for poor conductivity' ... and we did. In addition, we took brass out of the conductor path, keeping it all copper, which is better for thermal and electrical conductivity.

The result is a more stable arc that provides more precision for the discerning welder. If your throughput is dependent upon precision and control and you are trying to maximize your deposition rate, then VELOCITY2 is the MIG welding consumable of choice.

### Solid Copper Conductor Path



Long Lasting, Heavy Duty Solid Copper Nozzle Cone

Solid Copper Alloy Roll Stamp with Size

Perfectly Centered Conduit Liner Seats Inside the Tip for Superior Feedability

Fully Insulated Gooseneck Conductor Tube

## NO DIFFUSER—LESS COMPLEXITY, LOWER INVENTORY COSTS.

Shop-owners, distributors, and welders alike all told us that they prefer less complexity. VELOCITY2 achieves this compared to its competition. Fewer parts to order, inventory, and ration in a typical welding shop environment is a bonus for everyone involved.

Welders particularly like it because it means fewer parts to keep handy while welding. In a standard fixed threaded nozzle arrangement, VELOCITY2 uses only a contact tip and nozzle as regularly exchanged consumables, while the traditional Tweco standard and most of its competitors require a diffuser as a third part.

<b>Traditional Consumable</b>	VELOCITY2 Difference—Less Complexity, Fewer Connections.
<b>Original Tweco or 'Tweco knock-offs'</b>	VELOCITY2 does not require the brass diffuser. Soft threads on diffusers results in their relatively frequent replacement,
<b>Bernard Centerfire*</b>	Although the tip is threadless, Bernard continues to require a diffuser/ tip holder. More parts to stock with the disadvantage of brass and more connections.
<b>Tregaskiss*</b>	Again, a brass diffuser is an additional part to stock over VELOCITY2.
<b>Binzel*</b>	A brass tip holder and ceramic diffuser shield require two more consumables to regularly replace compared to VELOCITY2.

\*Bernard Centerfire and Tregaskiss are registered trademarks of Illinois Tool Works, Inc. Binzel is a registered trademark of ABICOR BINZEL Group, part of Alexander Binzel Schweisstechnik GmbH & Co. KG. The aforementioned registered trademarks are in no way affiliated with Tweco. Tweco is registered trademark of ESAB.



# VELOCITY2 LIGHT DUTY MIG WELDING CONSUMABLES REFERENCE

## Light Duty Range Overview

Wire sizes .023" (0.6 mm) → 5/64" (2.0 mm)  
 Optimized for .035" (0.9 mm) & .045" (1.2 mm)  
 140–300 Amps @ 60% Duty Cycle

**FIXED THREADED** maintains a fixed, consistent flushness relationship between nozzle opening and contact tip.

### Nozzles



Fixed Threaded



Adjustable Slip



Spot Weld



Flux Core Tip Holder



Extended Taper Nozzle

### Contact Tips



Light Duty



Tip Holder



Extended Taper

**ADJUSTABLE SLIP** allows welder to adjust the flushness relationship and provides improved access for cleaning. Adjustable slip nozzle cones and tip holder sold separately. These items must be used together to have a working nozzle assembly.

**SPOT WELD** provides a solution for tack and spot welding with MIG.

**FLUX CORE TIP HOLDER** provides open sight line and the best solution for gasless flux core welding.

**EXTENDED TAPER** provides a solution for root pass and confined access MIG welding.

Wire sizes .030" (0.8 mm) → 1/16" (1.6 mm)  
 Optimized for .045" (1.2 mm)

# VELOCITY2 LIGHT DUTY CONSUMABLES REFERENCE

## VELOCITY2 NOZZLE

*Patented*



Solid Copper

## VELOCITY2 CONTACT TIP

Roll Stamp  
with Size

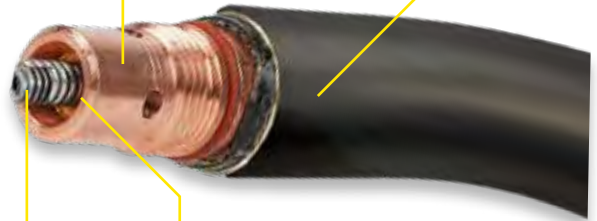


Perfectly Centered  
Liner

## CONDUCTOR TUBE

Shielding  
Gas Outlet

Insulated  
Conductor Tube



Conduit Liner Seats  
Inside the Tip

Large Copper to Copper  
Surface Contact



ADJUSTABLE SLIP NOZZLE



TIP HOLDER

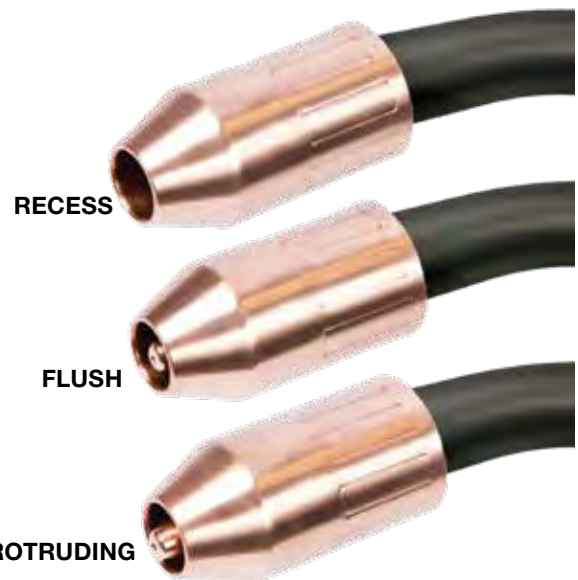


CONTACT TIP



CONDUCTOR TUBE

- **INCREASED VERSATILITY**—Able to conveniently achieve Recess, Flush, and Protruding tip flushness relationship.
- **EASY TO ADJUST**—Provides positive indexing to all positions.
- **STAYS WHERE YOU NEED IT**—Clicks into place just by sliding to the preset 1/8" index marks on the tip holder.
- **CONVENIENT**—Clean nozzle with tip secured to conductor tube.



# VELOCITY2 MEDIUM & HEAVY DUTY WELDING CONSUMABLES REFERENCE

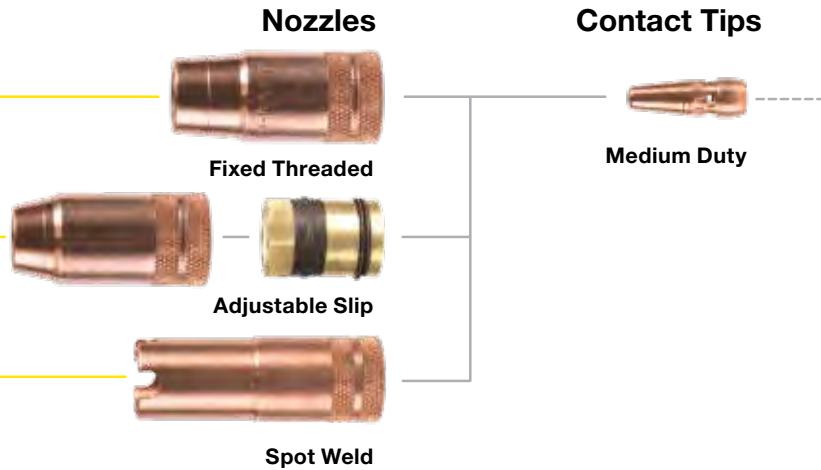
## Medium Duty Range Overview

Wire sizes .023" (0.6 mm) → 1/16" (1.6 mm)  
Optimized for .035" (0.9 mm) & .045" (1.2 mm)  
200–350 Amps @ 60% Duty Cycle

**FIXED THREADED** maintains a fixed, consistent flushness relationship between nozzle opening and contact tip.

**ADJUSTABLE SLIP** allows welder to adjust the flushness relationship and provides improved access for cleaning.

**SPOT WELD** provides a solution for tack and spot welding with MIG.



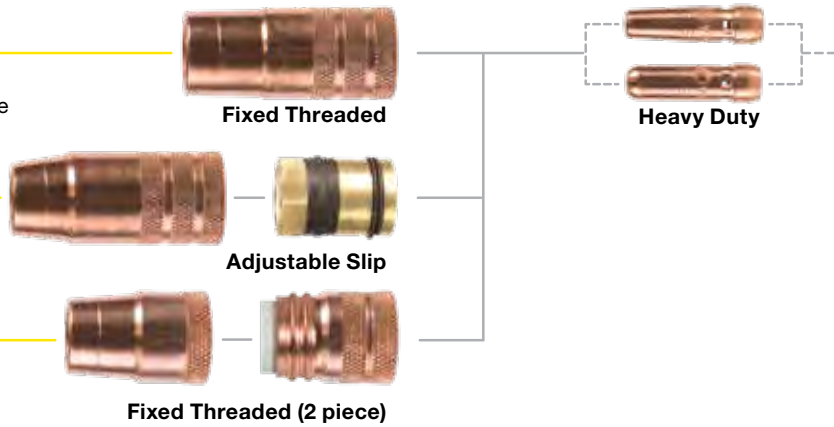
## Heavy Duty Range Overview

Wire sizes .030" (0.8 mm) à 1/8" (3.2 mm)  
Optimized for .045" (1.2 mm) & 5/64" (2.0 mm)  
300–600 Amps @ 80% Duty Cycle

**FIXED THREADED** maintains a fixed, consistent flushness relationship between nozzle opening and contact tip.

**ADJUSTABLE SLIP** allows welder to adjust the flushness relationship and provides improved access for cleaning.

**FIXED THREADED (2 piece)** maintains flushness relationship and provides for easier cleaning and maintenance.



## Flux Core Overview

**FLUX CORE TIP HOLDER** provides open sight line and the best solution for gasless flux core welding.



## Extended Taper Range Overview FOR ROOT PASS AND CONFINED ACCESS

Wire sizes .030" (0.8 mm) à 1/16" (1.6 mm)  
Optimized for .045" (1.2 mm)  
200–350 Amps @ 60% Duty Cycle



## Extended Taper Range Overview FOR ROOT PASS AND CONFINED ACCESS

Wire sizes .030" (0.8 mm) à 1/16" (1.6 mm)  
Optimized for .045" (1.2 mm)  
200–350 Amps @ 60% Duty Cycle



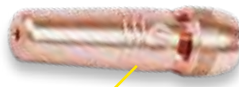
## VELOCITY2 MEDIUM & HEAVY DUTY CONSUMABLES

### VELOCITY2 NOZZLE



Long Lasting,  
Heavy Duty Solid Copper  
Nozzle Assembly

### VELOCITY2 CONTACT TIP



Solid Copper Alloy  
Roll Stamp with Size



### CONDUCTOR TUBE

Fully Insulated Gooseneck  
Conductor Tube

## EASY TO IDENTIFY VELOCITY2 CONSUMABLES. NO MORE GUESSWORK.

VELOCITY2 medium and heavy duty consumables are different from what you may be accustomed. Nozzles have a specific number of knurled bands and contact tips have rings to indicate their compatibility and correct usage.



**MEDIUM DUTY**  
has two knurled  
bands on  
the nozzles and  
two rings on  
the contact tips.



**HEAVY DUTY**  
has three knurled  
bands on the  
nozzles and  
three rings on  
the contact tips.



**EXTENDED  
TAPER**  
has four knurled  
bands on the  
nozzles and  
four rings on  
the contact tips.



## VELOCITY2 ADJUSTABLE SLIP NOZZLES—FLUSHNESS RELATIONSHIP.



ADJUSTABLE SLIP NOZZLE



RECESSED

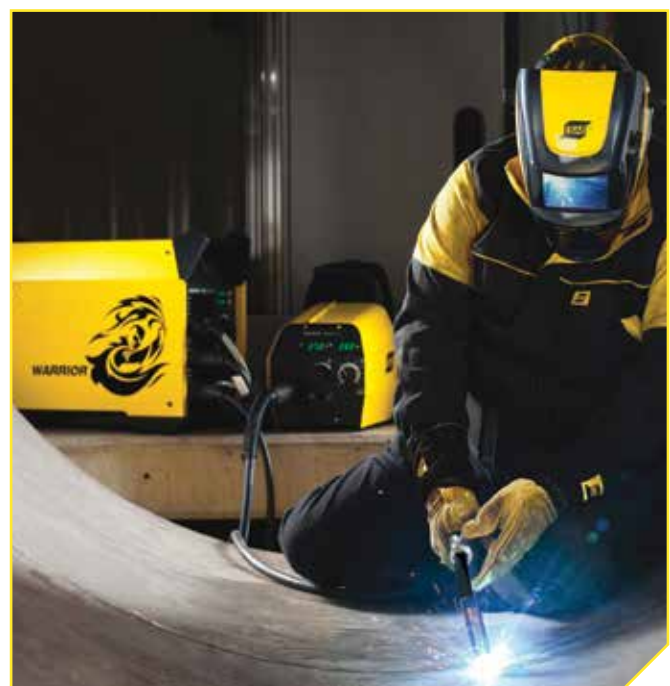


FLUSH

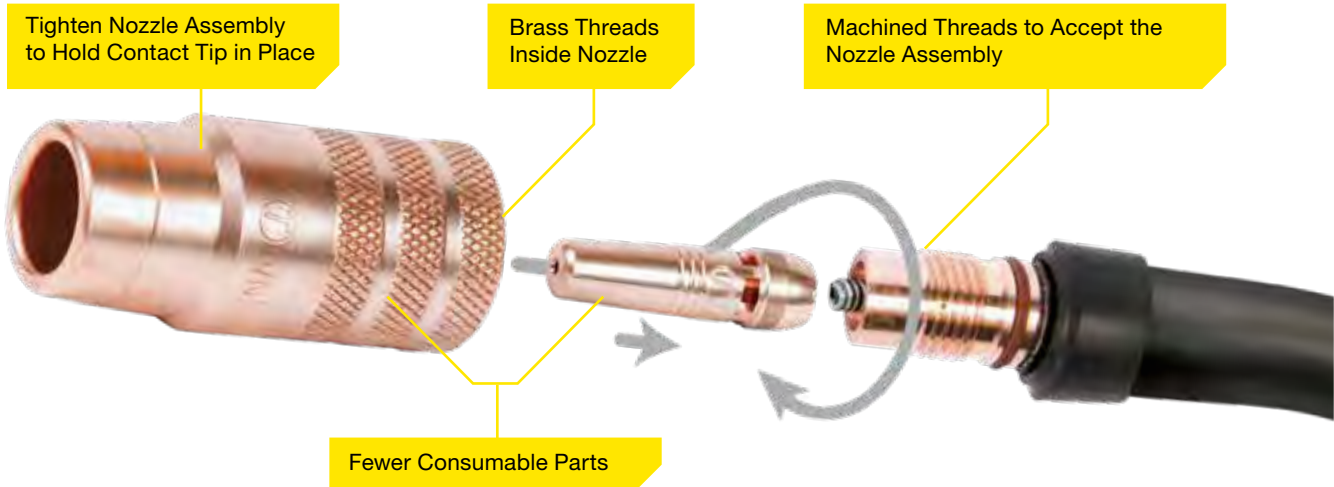


PROTRUDING

One of the VELOCITY2 consumable offerings is the Adjustable Slip Nozzle that provides positive indexing to all positions whether you require recessed, flush or protruding tips.



**EASY TO USE VELOCITY2 TIPS. NO MORE THREADS, NO TOOLS.**



We listened to welders and they said, ‘fewer tools and fewer threads’. The outcome is a design that is simpler, requires no tools, and virtually eliminates problems with threads. Typical MIG consumables have two sets of threads and many have three—**VELOCITY2 has reduced this down to one set.**

<b>Industry Standard</b>	VELOCITY2 Difference—more convenience for the welder.
<b>Threads</b>	No threads on the contact tip. And nozzle threads are properly designed to eliminate hassles with seizing and cross threading.
<b>Welpers**</b>	You will still need your welper for cutting wire, but not to remove contact tips or worse ‘burnback’ contact tips.
<b>Adjustable Pliers or Channel Lock†</b>	VELOCITY2 nozzles are designed to be hand tightened.
<b>Allen Wrench‡</b>	You will only need an allen wrench to set your liner.

\*\*Welpers are MIG Pliers aka “welding helpers.”

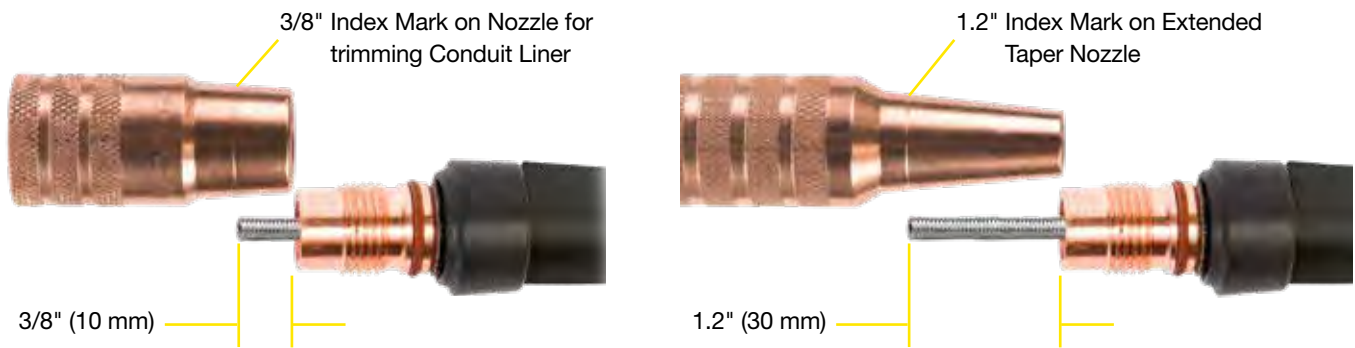
†Channellock is a registered trademark of Channellock Inc. of Meadville, PA.

‡Allen is a registered trademark of the Apex Tool Group of Sparks, MD.

The aforementioned registered trademarks are in no way affiliated with ESAB.

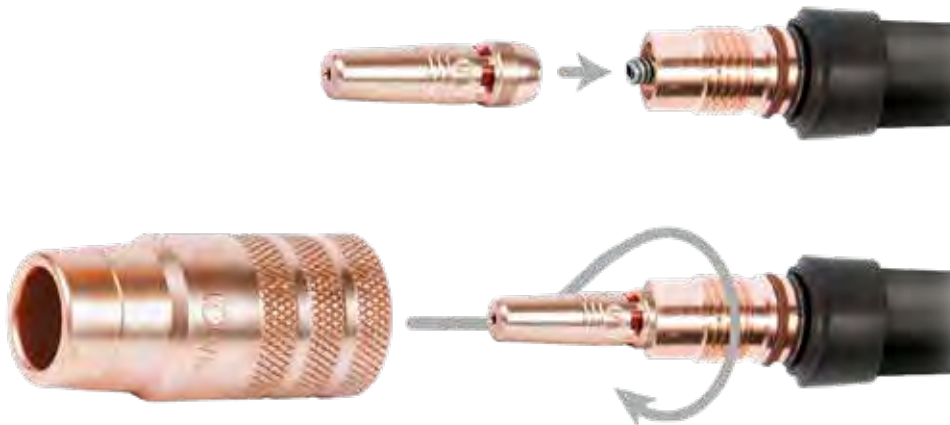
## TRIM THE CONDUIT LINER FOR OPTIMUM PERFORMANCE SETUP.

All VELOCITY2 Medium & Heavy Duty nozzles have an index mark that can be used for trimming the conduit liner to the proper length of 3/8" (10 mm) from the end of threaded stainless sleeve. The only exception is for VELOCITY2 Extended Taper which requires the conduit liner to be trimmed 1.2" (30 mm) protruding from the conductor tube.



## SECURING THE CONSUMABLES—NO TOOLS REQUIRED.

The nozzle assembly holds the contact tip in position. Slide the contact tip into the copper conductor tube seat, then engage the nozzle assembly onto the machined threads on the conductor tube and tighten by hand to secure the contact tip.



## VELOCITY2 WIRE PROCESS CHARTS

		AMP OUTPUT					
		30 – 100	100 – 200	200 – 300	300 – 400	> 400	> 500
<b>SOLID WIRE SIZE</b>	.023" 0.6 mm	Straight CO <sub>2</sub> Argon/CO <sub>2</sub> Mixed			Medium Duty VELOCITY2		
	.030" 0.8 mm		Straight CO <sub>2</sub> Argon/CO <sub>2</sub> Mixed				
	.035" 0.9 mm		Straight CO <sub>2</sub> Argon/CO <sub>2</sub> Mixed				Heavy Duty VELOCITY2
	.040" 1.0 mm	Light Duty VELOCITY2	Straight CO <sub>2</sub> Argon/CO <sub>2</sub> Mixed				
	.045" 1.2 mm			Straight CO <sub>2</sub> Argon/CO <sub>2</sub> Mixed Argon or Argon/Helium Mixed			
	.052" 1.3 mm				Straight CO <sub>2</sub> Argon/CO <sub>2</sub> Mixed Argon or Argon/Helium Mixed		
	1/16" 1.6 mm				Straight CO <sub>2</sub> Argon/CO <sub>2</sub> Mixed Argon or Argon/Helium Mixed		

		AMP OUTPUT					
		30 – 100	100 – 200	200 – 300	300 – 400	400 – 500	> 500
<b>FLUX CORE WIRE SIZE</b>	.030" 0.8 mm	Self Shielded			Medium Duty VELOCITY2		
	.035" 0.9 mm	Self Shielded CO <sub>2</sub> or Argon/CO <sub>2</sub> Mixed					
	.040" 1.0 mm	Self Shielded CO <sub>2</sub> or Argon/CO <sub>2</sub> Mixed					
	.045" 1.2 mm	Self Shielded Light Duty VELOCITY2	CO <sub>2</sub> or Argon/CO <sub>2</sub> Mixed				Heavy Duty VELOCITY2
	.052" 1.3 mm		CO <sub>2</sub> or Argon/CO <sub>2</sub> Mixed				
	1/16" 1.6 mm		Self Shielded CO <sub>2</sub> or Argon/CO <sub>2</sub> Mixed				
	5/64" 2.0 mm			Self Shielded CO <sub>2</sub> or Argon/CO <sub>2</sub> Mixed			
	3/32" 2.4 mm				Self Shielded CO <sub>2</sub> or Argon/CO <sub>2</sub> Mixed		
	7/64" 2.8 mm				Self Shielded CO <sub>2</sub> or Argon/CO <sub>2</sub> Mixed		
	1/8" 3.2 mm				Self Shielded CO <sub>2</sub> or Argon/CO <sub>2</sub> Mixed		

POWER SUPPLY COMPATIBILITY				
ESAB (8 Pin)	Tweco® Connector (4 Pin)	Miller® Connector	Lincoln® Connector	Euro-Kwik Connector
ESAB Fabricator 141i, 181i, 211i & 252i  Rebel 215	Thermal Arc Fabricator 190, 210, 251 & 281  Lincoln SP100, SP100T, SP125 Plus, SP130, SP170T & SP170 Plus  Hobart® Beta Mig 170	Millermatic® 130, 130 XP, 135, 140, 150, 155, 175, 180, 185, 200, 210, 211, 212  Hobart® Handler 130XL, 210, Trek 180, Ironman™ 210	Lincoln SP140T, SP180T, PowerMIG® 140C & 180C, Easy-Core™ 125, Pro-Core™ 125, Easy-MIG® 140, Weld-Pak 125HD, 140HD & 180HD, MIG-Pak™ 140 & 180, Easy-MIG® 180, Pro-MIG™ 140 & 180	ESAB® MigMaster® 160 & 173

## VELOCITY2—LIGHT DUTY MIG WELDING CONSUMABLES

### Light Duty Contact Tips

DESCRIPTION	PART NO.	STOCK NO.
.023" (0.6 mm) Standard	VTS23	1110-1308
.030" (0.8 mm) Standard	VTS30	1110-1309
.035" (0.9 mm) Standard	VTS35	1110-1310
.040" (1.0 mm) Standard	VTS40	1110-1311
.045" (1.2 mm) Standard	VTS45	1110-1312
3/64" (1.2 mm) Standard*	VTSA364*	1110-1313
.052" (1.3 mm) Standard	VTS52	1110-1314
1/16" (1.6 mm) Standard	VTS116	1110-1315
1/16" (1.6 mm) Standard*	VTSA116*	1110-1317
5/64" (2.0 mm) Standard	VTS564	1110-1316
.023" (0.6 mm) Extended Taper	VTSET23	1110-1330
.030" (0.8 mm) Extended Taper	VTSET30	1110-1331
.035" (0.9 mm) Extended Taper	VTSET35	1110-1332
.040" (1.0 mm) Extended Taper	VTSET40	1110-1333
.045" (1.2 mm) Extended Taper	VTSET45	1110-1334
3/64" (1.2 mm) Extended Taper	VTSETA364*	1110-1335
.052" (1.3 mm) Extended Taper	VTSET52	1110-1336
1/16" (1.6 mm) Extended Taper	VTSET116	1110-1337
1/16" (1.6 mm) Extended Taper	VTSETA116*	1110-1338

\* For Aluminum Wire

### Light Duty Nozzles

Self Insulated Nozzles. 2 per pack

DESCRIPTION	PART NO.	STOCK NO.
1/2" Fixed Threaded-Flush	VNS50F	1220-1200
1/2" Fixed Threaded-Recess	VNS50	1220-1201
5/8" Fixed Threaded-Flush	VNS62F	1220-1202
5/8" Fixed Threaded-Recess	VNS62	1220-1203
3/8" Fixed Threaded-Flush	VNS37F	1220-1204
3/8" Fixed Threaded-Recess	VNS37	1220-1206
1/2" Adj. Slip-Heavy Cone	VNSH50S	1220-1229
Adj. Slip-Tip Holder	VNSSINS	1340-1132
3/8" Extended Taper Nozzle	VNSET37F	1220-1235
3/4" Spot Nozzle Assembly	VNS75FAS	1220-1205
FC Tip Holder-Insulator	VNSFCI	1220-1208
FC Tip Holder & Insulator Assembly	VNSFC	1220-1207

### VELOCITY2 Conductor Tubes

Fully Insulated Gooseneck. 1 per pack

DESCRIPTION	PART NO.	STOCK NO.
60 Degree Conductor Tube	FVCTS60	1620-1368
45 Degree Conductor Tube	FVCTS45	1620-1369

NOTE: All Contact Tips are packaged in quantities of ten (10) per bag and all Nozzles are packaged in quantities of two (2) per bag.

# VELOCITY2 MEDIUM & HEAVY DUTY MIG WELDING CONSUMABLES

## Medium Duty Contact Tips

DESCRIPTION	PART NO.	STOCK NO.
.023" (0.6 mm)	<b>VTM23</b>	1160-1750
.030" (0.8 mm)	<b>VTM30</b>	1160-1751
.035" (0.9 mm)	<b>VTM35</b>	1160-1752
.040" (1.0 mm)	<b>VTM40</b>	1160-1753
.045" (1.2 mm)	<b>VTM45</b>	1160-1754
3/64" (1.2 mm)*	<b>VTMA364*</b>	1160-1755
.052" (1.3 mm)	<b>VTM52</b>	1160-1756
1/16" (1.6 mm)	<b>VTM116</b>	1160-1757
1/16" (1.6 mm)*	<b>VTMA116*</b>	1160-1758
5/64" (2.0 mm)	<b>VTM564</b>	1160-1759

Note: All Contact Tips are packaged in quantities of ten (10) per bag and all Nozzles are packaged in quantities of two (2) per bag.

## Heavy Duty Contact Tips

DESCRIPTION	PART NO.	STOCK NO.
.030" (0.8 mm)	<b>VTH30</b>	1160-1760
.035" (0.9 mm)	<b>VTH35</b>	1160-1761
.040" (1.0 mm)	<b>VTH40</b>	1160-1762
.045" (1.2 mm)	<b>VTH45</b>	1160-1763
3/64" (1.2 mm)*	<b>VTHA364*</b>	1160-1764
.052" (1.3 mm)	<b>VTH52</b>	1160-1765
1/16" (1.6 mm)	<b>VTH116</b>	1160-1766
1/16" (1.6 mm)*	<b>VTHA116*</b>	1160-1767
5/64" (2.0 mm)	<b>VTH564</b>	1160-1768
3/32" (2.4 mm)	<b>VTH332</b>	1160-1769
7/64" (2.8 mm)	<b>VTH764</b>	1160-1770
1/8" (3.2 mm)	<b>VTH18</b>	1160-1771

## Extended Taper Contact Tips

DESCRIPTION	PART NO.	STOCK NO.
.030" (0.8 mm)	<b>VTET30</b>	1160-1772
.035" (0.9 mm)	<b>VTET35</b>	1160-1773
.040" (1.0 mm)	<b>VTET40</b>	1160-1774
.045" (1.2 mm)	<b>VTET45</b>	1160-1775
3/64" (1.2 mm)*	<b>VTETA364*</b>	1160-1776
.052" (1.3 mm)	<b>VTET52</b>	1160-1777
1/16" (1.6 mm)	<b>VTET116</b>	1160-1778

Note: 44 Series Conduit Snoot For VTET tips  
Part No. VTET44S (Stock No. 1440-1325) individually sold 5 per bag.

## Extended HD Taper Contact Tips

DESCRIPTION	PART NO.	STOCK NO.
.035" (0.9 mm)	<b>VTHET35</b>	1160-1780
.045" (1.2 mm)	<b>VTHET45</b>	1160-1782
.052" (1.3 mm)	<b>VTHET52</b>	1160-1784
1/16" (1.6 mm)	<b>VTHET116</b>	1160-1785

Use VNH2PC & VNHXXRC series nozzles with the extended HD Taper Contact Tips

## Medium Duty Nozzles

Self Insulated Nozzles. 2 per pack

DESCRIPTION	PART NO.	STOCK NO.
1/2" (12.7 mm) Threaded Nozzle Recess	<b>VNM50</b>	1240-1857
1/2" (12.7 mm) Threaded Nozzle Flush	<b>VNM50F</b>	1240-1856
5/8" (15.9 mm) Threaded Nozzle Recess	<b>VNM62</b>	1240-1854
5/8" (15.9 mm) Threaded Nozzle Flush	<b>VNM62F</b>	1240-1855
3/4" (19.1 mm) Threaded Nozzle Recess	<b>VNM75</b>	1240-1852
3/4" (19.1 mm) Threaded Nozzle Flush	<b>VNM75F</b>	1240-1853
1/2" (12.7 mm) Slip Nozzle	<b>VNM50S</b>	1240-1859
5/8" (15.9 mm) Slip Nozzle	<b>VNM62S</b>	1240-1860
3/4" (19.1 mm) Slip Nozzle	<b>VNM75S</b>	1240-1863
Slip Nozzle Base	<b>VNS</b>	1240-1864
1/2" (12.7 mm) Slip Nozzle Cone Only	<b>VNM50SC</b>	1240-1861
5/8" (15.9 mm) Slip Nozzle Cone Only	<b>VNM62SC</b>	1240-1862
3/4" (19.1 mm) Slip Nozzle Cone Only	<b>VNM75SC</b>	1240-1865
5/8" (15.9 mm) Spot Nozzle	<b>VNM62FAS</b>	1240-1866
3/4" (19.1 mm) Spot Nozzle	<b>VNM75FAS</b>	1240-1868

## Extended Taper Nozzle

3/8" (9.5 mm) Ext. Taper Nozzle Recess	<b>VNET37</b>	1240-1874
3/8" (9.5 mm) Ext. Taper Nozzle Flush	<b>VNET37F</b>	1240-1897
1/2" (12.7 mm) Ext. Taper Nozzle Recess	<b>VNET50</b>	1240-1873
1/2" (12.7 mm) Ext. Taper Nozzle Flush	<b>VNET50F</b>	1240-1872
5/8" (15.9 mm) Ext. Taper Nozzle Recess	<b>VNET62</b>	1240-1869

## Flux Core Tip Holder

Flux Core Tip Holder	<b>VNLFC</b>	1240-1892
----------------------	--------------	-----------

Note: VELOCITY2 medium and heavy duty contact tips and nozzles are for use with Tweco Classic® No. series, Spray Master® series and Supra® XT series MIG Guns.

## Heavy Duty Nozzles

Self Insulated Nozzles. 2 per pack

DESCRIPTION	PART NO.	STOCK NO.
5/8" (15.9 mm) Threaded Nozzle Recess	<b>VNH62</b>	1240-1877
5/8" (15.9 mm) Threaded Nozzle Flush	<b>VNH62F</b>	1240-1878
5/8" (15.9 mm) Threaded Nozzle .350" (9 mm) Recess	<b>VNH62R</b>	1240-1898
3/4" (19.1 mm) Threaded Nozzle Recess	<b>VNH75</b>	1240-1875
3/4" (19.1 mm) Threaded Nozzle Flush	<b>VNH75F</b>	1240-1876
3/4" (19.1 mm) Threaded Nozzle 1/2" (12.7 mm) Recess	<b>VNH75R</b>	1240-1899
5/8" (15.9 mm) Slip Nozzle	<b>VNH62S</b>	1240-1893
3/4" (19.1 mm) Slip Nozzle	<b>VNH75S</b>	1240-1894
Slip Nozzle Base	<b>VNS</b>	1240-1864
5/8" (15.9 mm) Slip Nozzle Cone Only	<b>VNH62SC</b>	1240-1895
3/4" (19.1 mm) Slip Nozzle Cone Only	<b>VNH75SC</b>	1240-1896
1/2" (12.7mm) 2 Piece Nozzle Cone Only Recess	<b>VNH50RC</b>	1240-1867
5/8" (15.9 mm) 2 Piece Nozzle Assembly Recess	<b>VNH622PC</b>	1240-1880
5/8" (15.9 mm) 2 Piece Nozzle Cone Only Recess	<b>VNH62C</b>	1240-1884
5/8" (15.9 mm) 2 Piece Nozzle Cone Only 1/2" (12.7mm) Recess	<b>VNH62RC</b>	1240-1870
5/8" (15.9 mm) 2 Piece Nozzle Assembly Flush	<b>VNH62F2PC</b>	1240-1881
5/8" (15.9 mm) 2 Piece Nozzle Cone Only Flush	<b>VNH62FC</b>	1240-1885
3/4" (19.1 mm) 2 Piece Nozzle Assembly Recess	<b>VNH752PC</b>	1240-1882
3/4" (19.1 mm) 2 Piece Nozzle Cone Only Recess	<b>VNH75C</b>	1240-1886
3/4" (19.1 mm) 2 Piece Nozzle Cone Only 1/2" (12.7mm) Recess	<b>VNH75RC</b>	1240-1871
3/4" (19.1 mm) 2 Piece Nozzle Assembly Flush	<b>VNH75F2PC</b>	1240-1883
3/4" (19.1 mm) 2 Piece Nozzle Cone Only Flush	<b>VNH75FC</b>	1240-1887
Nozzle Retainer	<b>VNH2PC</b>	1240-1879

### VELOCITY2 Nozzle Identification

S=Small (Light Duty)  
M=Medium  
H=Heavy  
ET=Extended Taper

Blank=Fixed Threaded  
S=Adjustable Slip

**V N S 5 0 F S**

VELOCITY2 Orifice Opening Size:  
Nozzle 37=3/8" 62=5/8"  
50=1/2" 75=3/4"

Blank=Standard Recess  
F=Flush  
2PC=Two Piece  
R=Recess 1/4" (6.35 mm)  
FAS=Spot Weld  
FC=Flux Core

### VELOCITY2 Contact Tip Identification

S=Small (Light Duty)  
M=Medium  
H=Heavy  
ET=Extended Taper

A=Aluminum  
Blank=Other

**V T S A 3 0**

VELOCITY2 Tip

Wire Size: 364=3/64"  
23=0.023" 116=1/16"  
30=0.030" 564=5/64"  
35=0.035" 332=3/32"  
40=0.040" 764=7/64"  
45=0.045" 18=1/8"



## EASY FIND GUIDE – Contact Tip Selection Guide

Contact Tip Series	Output Current (Amps)	Contact Tip Size			Material	Style Option			Page
		Wire Size Min. & Max. Range (In / Mm)	Tip Inside Diameter Min. & Max. Range (In / Mm)	Outside Diameter (In / Mm)		Standard	Heavy Duty	Tapered	
11, 11H & 11T Series	100	Min.: .023" (0.6 mm) Max.: .045" (1.2 mm)	Min.: .031" (0.79 mm) Max.: .059" (1.50 mm)	0.25" (6.35 mm)	122 DHP Copper Alloy	■	■	■	106
14, 14H & 14T Series	400	Min.: .023" (0.6 mm) Max.: .5/64" (2.0 mm)	Min.: .031" (0.79 mm) Max.: .090" (2.29 mm)	0.25" (6.35 mm)	122 DHP Copper Alloy	■	■	■	106
14RZ & 14RZT Series	400	Min.: .035" (0.9 mm) Max.: .052" (1.3 mm)	Min.: .041" (1.04 mm) Max.: .058" (1.47 mm)	0.25" (6.35 mm)	CDA 1815 Alloy	■		■	107
15H & 15HFC Series	500	Min.: .035" (0.9 mm) Max.: 1/8" (3.2 mm)	Min.: .044" (1.12 mm) Max.: .144" (3.66 mm)	0.345" (8.8 mm)	122 DHP Copper Alloy	■	■		106
16S & 16ST Series	600	Min.: .035" (0.9 mm) Max.: 7/64" (2.8 mm)	Min.: .044" (1.12 mm) Max.: .120" (3.05 mm)	0.375" (9.5 mm)	122 DHP Copper Alloy	■		■	107
16RZ & 16RZT Series	600	Min.: .035" (0.9 mm) Max.: .052" (1.3 mm)	Min.: .041" (1.04 mm) Max.: .058" (1.47 mm)	0.312" (7.9 mm)	CDA 1815 Alloy	■		■	107
16PS Series	600	Min.: .030" (0.8 mm) Max.: .052" (1.3 mm)	Min.: .038" (0.97 mm) Max.: .058" (1.50 mm)	0.375" (9.5 mm)	CDA 1815 Alloy	■			108
EL16 & EL16T Series	600	Min.: .030" (0.8 mm) Max.: 3/32" (2.4 mm)	Min.: .038" (0.97 mm) Max.: .106" (2.67 mm)	0.345" (8.8 mm)	122 DHP Copper Alloy	■		■	108
EL16RZ & EL16RZT Series	600	Min.: .035" (0.9 mm) Max.: .052" (1.3 mm)	Min.: .041" (1.04 mm) Max.: .058" (1.47 mm)	0.375" (9.5 mm)	CDA 1815 Alloy	■		■	108



## Contact Tips – Standard Threaded Style

### 11, 11H & 11T Series

0.25" (6.35 mm) Outside Diameter - M6 x 1.0 Threads - 1.00" (25.4 mm) Overall Length

25 per pack



Wire Size (in / mm)	Tip I.D. (in / mm)	Standard		Heavy Duty		Tapered	
		Part No.	Stock No.	Part No.	Stock No.	Part No.	Stock No.
.023" (0.6 mm)	.031" (0.79 mm)	<b>11-23</b>	1110-1100	NA		<b>11T-23</b>	1110-1300
.030" (0.8 mm)	.038" (0.97 mm)	<b>11-30</b>	1110-1101	<b>11H-30</b>	1110-1201	<b>11T-30</b>	1110-1301
.035" (0.9 mm)	.044" (1.12 mm)	<b>11-35</b>	1110-1102	<b>11H-35</b>	1110-1202	<b>11T-35</b>	1110-1302
.040" (1.0 mm)	.048" (1.22 mm)	<b>11-40</b>	1110-1103	<b>11H-40</b>	1110-1203	<b>11T-40</b>	1110-1303
.045" (1.2 mm)	.054" (1.37 mm)	<b>11-45</b>	1110-1104	<b>11H-45</b>	1110-1204	<b>11T-45</b>	1110-1304
3/64" AL (1.2 mm)	.059" (1.50 mm)	NA		<b>11AH-364</b>	1110-1213	NA	

### 14, 14H, & 14T Series

0.25" (6.35 mm) Outside Diameter - .250-28 UNF Threads - 1.50" (38.1 mm) Overall Length

25 per pack



Wire Size (in / mm)	Tip I.D. (in / mm)	Standard		Heavy Duty		Tapered	
		Part No.	Stock No.	Part No.	Stock No.	Part No.	Stock No.
.023" (0.6 mm)	.031" (0.79 mm)	<b>14-23</b>	1140-1100	NA		<b>14T-23</b>	1140-1300
.030" (0.8 mm)	.038" (0.97 mm)	<b>14-30</b>	1140-1101	NA		<b>14T-30</b>	1140-1301
.035" (0.9 mm)	.044" (1.12 mm)	<b>14-35</b>	1140-1102	<b>14H-35</b>	1140-1202	<b>14T-35</b>	1140-1302
.040" (1.0 mm)	.048" (1.22 mm)	<b>14-40</b>	1140-1103	<b>14H-40</b>	1140-1203	<b>14T-40</b>	1140-1303
.045" (1.2 mm)	.054" (1.37 mm)	<b>14-45</b>	1140-1104	<b>14H-45</b>	1140-1204	<b>14T-45</b>	1140-1304
.052" (1.3 mm)	.064" (1.65 mm)	<b>14-52</b>	1140-1105	<b>14H-52</b>	1140-1205	<b>14T-52</b>	1140-1305
1/16" (1.6 mm)	.073" (1.85 mm)	<b>14-116</b>	1140-1106	<b>14H-116</b>	1140-1206	<b>14T-116</b>	1140-1306
5/64" (2.0 mm)	.090" (2.29 mm)	<b>14-564</b>	1140-1109	<b>14H-564</b>	1140-1209	NA	
3/64" AL (1.2 mm)	.059" (1.50 mm)	<b>14A364</b>	1140-1113	<b>14AH-364</b>	1140-1213	NA	
1/16" AL (1.6 mm)	.082" (2.08 mm)	NA		<b>14AH-116</b>	1140-1214	NA	

### 15H & 15HFC Series

0.345" (8.8 mm) Outside Diameter - .3125-24 UNF Threads, 15H & 15AH Series - 1.970" Overall Length;

15HFC - 1.590" Overall Length

25 per pack



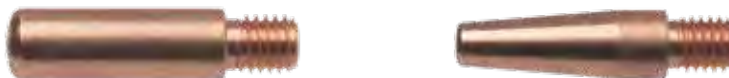
Wire Size (in / mm)	Tip I.D. (in / mm)	Standard		Heavy Duty	
		Part No.	Stock No.	Part No.	Stock No.
.035" (0.9 mm)	.044" (1.12 mm)	<b>15H-35</b>	1150-1202	NA	
.045" (1.2 mm)	.054" (1.37 mm)	<b>15H-45</b>	1150-1204	<b>15HFC-45</b>	1150-1254
.052" (1.3 mm)	.064" (1.65 mm)	<b>15H-52</b>	1150-1205	<b>15HFC-52</b>	1150-1255
1/16" (1.6 mm)	.073" (1.85 mm)	<b>15H-116</b>	1150-1206	<b>15HFC-116</b>	1150-1256
5/64" (2.0 mm)	.090" (2.29 mm)	<b>15H-564</b>	1150-1209	<b>15HFC-564</b>	1150-1259
3/32" (2.4 mm)	.106" (2.67 mm)	<b>15H-332</b>	1150-1210	<b>15HFC-332</b>	1150-1260
7/64" (2.8 mm)	.120" (3.05 mm)	<b>15H-764</b>	1150-1211	<b>15HFC-764</b>	1150-1261
1/8" (3.2 mm)	.144" (3.66 mm)	<b>15H-18</b>	1150-1212	<b>15HFC-18</b>	1150-1262
3/64" AL (1.2 mm)	.059" (1.50 mm)	<b>15AH-364</b>	1150-1213	NA	
1/16" AL (1.6 mm)	.082" (2.08 mm)	<b>15AH-116</b>	1150-1214	NA	

## Contact Tips – Standard Threaded Style

### 16S & 16ST Series

0.375" (9.5 mm) Outside Diameter - M8 x 1.25 Threads - 1.50" (38.1 mm) Overall Length

25 per pack



Wire Size (in / mm)	Tip I.D. (in / mm)	Standard		Tapered	
		Part No.	Stock No.	Part No.	Stock No.
.035" (0.9 mm)	.044" (1.12 mm)	<b>16S-35</b>	1160-1102	<b>16ST-35</b>	1160-1135
.040" (1.0 mm)	.048" (1.22 mm)	<b>16S-40</b>	1160-1103	NA	
.045" (1.2 mm)	.054" (1.37 mm)	<b>16S-45</b>	1160-1104	<b>16ST-45</b>	1160-1137
.052" (1.3 mm)	.064" (1.65 mm)	<b>16S-52</b>	1160-1105	<b>16ST-52</b>	1160-1138
1/16" (1.6 mm)	.073" (1.85 mm)	<b>16S-116</b>	1160-1106	<b>16ST-116</b>	1160-1139
5/64" (2.0 mm)	.090" (2.29 mm)	<b>16S-564</b>	1160-1109	NA	
3/32" (2.4 mm)	.106" (2.67 mm)	<b>16S-332</b>	1160-1110	NA	
7/64" (2.8 mm)	.120" (3.05 mm)	<b>16S-764</b>	1160-1111	NA	
3/64" AL (1.2 mm)	.059" (1.50 mm)	<b>16AS-364</b>	1160-1113	NA	
1/16" AL (1.6 mm)	.082" (2.08 mm)	<b>16AS-116</b>	1160-1114	NA	

## Contact Tips – Long Life Threaded

### 14RZ & 14RZT Series

.25" (6.35 mm) Outside Diameter - .250-28 UNF Threads - 1.50" (38.1 mm) Overall Length

25 per pack



Wire Size (in / mm)	Tip I.D. (in / mm)	Standard		Tapered	
		Part No.	Stock No.	Part No.	Stock No.
.035" (0.9 mm)	.041" (1.04 mm)	<b>14RZ-35</b>	1140-1430	<b>14RZT-35</b>	1140-1440
.045" (1.2 mm)	.051" (1.30 mm)	<b>14RZ-45</b>	1140-1432	<b>14RZT-45</b>	1140-1442
.052" (1.3 mm)	.058" (1.47 mm)	<b>14RZ-52</b>	1140-1433	<b>14RZT-52</b>	1140-1443

### 16RZ & 16RZT Series

0.312" (7.9 mm) Outside Diameter - M8 x 1.25 Threads - 1.50" (38.1 mm) Overall Length

25 per pack



Wire Size (in / mm)	Tip I.D. (in / mm)	Standard		Tapered	
		Part No.	Stock No.	Part No.	Stock No.
.035" (0.9 mm)	.041" (1.04 mm)	<b>16RZ-35</b>	1160-1180	<b>16RZT-35</b>	1160-1190
.045" (1.2 mm)	.051" (1.30 mm)	<b>16RZ-45</b>	1160-1182	<b>16RZT-45</b>	1160-1192
.052" (1.3 mm)	.058" (1.47 mm)	<b>16RZ-52</b>	1160-1183	<b>16RZT-52</b>	1160-1193

# Contact Tips – Long Life PulseMaster® Threaded Style

## 16PS Series

0.375" (9.5 mm) Outside Diameter - M8 x 1.25 Threads - 1.81" (30 mm) Overall Length

25 per pack



Wire Size (in / mm)	Tip I.D. (in / mm)	Standard	
		Part No.	Stock No.
.035" (0.9 mm)	.041" (1.04 mm)	<b>16PS-35</b>	1160-1535
.045" (1.2 mm)	.051" (1.30 mm)	<b>16PS-45</b>	1160-1537
.047" (1.2 mm)	.064" (1.63 mm)	<b>16APS-364</b>	1160-1538
.054" (1.3 mm)	.058" (1.50 mm)	<b>16PS-52</b>	1160-1541

Note: Gas Diffuser – Part No. PMA54-16S (Stock No. 1543-1106) or PMW55-16 (Stock No. 1550-1105) must be used with the 16PS series contact tips to maintain standard nozzle/contact tip relationship.

CONSUMABLES

# Contact Tips – Eliminator® Style

## EL16 & EL16T Series

0.345" (6.35 mm) Outside Diameter - 1.50" (38.1 mm) Overall Length

25 per pack



Wire Size (in / mm)	Tip I.D. (in / mm)	Standard		Tapered	
		Part No.	Stock No.	Part No.	Stock No.
.030" (0.8 mm)	.038" (0.97 mm)	<b>EL16-30</b>	1160-1610	<b>EL16T-30</b>	1160-1601
.035" (0.9 mm)	.044" (1.12 mm)	<b>EL16-35</b>	1160-1611	<b>EL16T-35</b>	1160-1602
.040" (1.0 mm)	.048" (1.22 mm)	<b>EL16-40</b>	1160-1612	<b>EL16T-40</b>	1160-1603
.045" (1.2 mm)	.054" (1.37 mm)	<b>EL16-45</b>	1160-1613	<b>EL16T-45</b>	1160-1604
.052" (1.3 mm)	.064" (1.65 mm)	<b>EL16-52</b>	1160-1615	<b>EL16T-52</b>	1160-1605
1/16" (1.6 mm)	.073" (1.85 mm)	<b>EL16-116</b>	1160-1616	<b>EL16T-116</b>	1160-1606
5/64" (2.0 mm)	.090" (2.29 mm)	<b>EL16-564</b>	1160-1618	NA	
3/32" (2.4 mm)	.106" (2.67 mm)	<b>EL16-332</b>	1160-1619	NA	
3/64" AL (1.2 mm)	.059" (1.50 mm)	<b>EL16A-364</b>	1160-1614	<b>EL16AT-364</b>	1160-1607

# Contact Tips – Long Life Eliminator® Style

## EL16RZ & EL16RZT Series

0.375" (9.5 mm) Outside Diameter - 1.50" (38.1 mm) Overall Length

25 per pack



Wire Size (in / mm)	Tip I.D. (in / mm)	Standard		Tapered	
		Part No.	Stock No.	Part No.	Stock No.
.035" (0.9 mm)	.041" (1.04 mm)	NA		<b>EL16RZT-35</b>	1160-1705
.045" (1.2 mm)	.051" (1.30 mm)	<b>EL16RZ-45</b>	1160-1732	<b>EL16RZT-45</b>	1160-1707
.052" (1.3 mm)	.058" (1.47 mm)	<b>EL16RZ-52</b>	1160-1733	<b>EL16RZT-52</b>	1160-1708

# EASY FIND GUIDE – Nozzle Selection Guide

Nozzle Series	Output Current (Amps)	Nozzle Style	Bore Diameter Range (In / Mm)	Nozzle Design Options					Nozzle/Tip Relationship			Page
				Standard	Short Stop	Straight	Tapered	Heavy Duty	Flush	Recessed	Protruding	
21 Series	100	Thread-On	3/8" (9.5 mm) – 5/8" (15.9 mm)	■			■		■	■		110
REL 21 Series	100	Thread-On	1/2" (12.7 mm)			■			■	■	■	110
22 Series	200	Slip-On	3/8" (9.5 mm) – 5/8" (15.9 mm)	■	■				■	■	■	110
HD22 Series	200	Slip-On	3/8" (9.5 mm) – 5/8" (15.9 mm)	■					■	■		110
23 Series	300	Thread-On	3/8" (9.5 mm) – 3/4" (19.5 mm)	■					■	■		111
23T Series	300	Thread-On	3/8" (9.5 mm)				■		■	■		111
23H Series	300	Thread-On	1/2" (12.7 mm) – 3/4" (19.5 mm)					■	■	■		111
24A Series	400	Slip-On	3/8" (9.5 mm) – 3/4" (19.5 mm)	■	■			■	■	■	■	111
24CT Series	400	Thread-On	3/8" (9.5 mm) – 3/4" (19.5 mm)	■	■		■			■		112
24FN Series	400	Thread-On	3/8" (9.5 mm) – 3/4" (19.5 mm)	■	■		■			■		112
HD24 Series	400	Slip-On	1/2" (12.7 mm) – 3/4" (19.5 mm)	■			■		■	■		112
PMA24 Series	400	Thread-On	1/2" (12.7 mm) – 3/4" (19.5 mm)			■			■	■		113
25CT Series	500	Thread-On	1/2" (12.7 mm) – 3/4" (19.5 mm)	■						■		113
25I Series	500	Thread-On	5/8" (15.9 mm) – 3/4" (19.5 mm)	■						■		113
26CT Series	600	Thread-On	5/8" (15.9 mm) – 3/4" (19.5 mm)	■						■		113
26I Series	600	Thread-On	5/8" (15.9 mm) – 3/4" (19.5 mm)	■						■		113
FAS Series	--	Thread/Slip-On	1/2" (12.7 mm) – 1-5/8" (41.3 mm)									114
EL221 Series	400	Slip-On	3/8" (9.5 mm) – 3/4" (19.5 mm)	■						■	■	114
EL22CT Series	200	Thread-On	3/8" (9.5 mm) – 3/4" (19.5 mm)	■				■	■	■	■	114
EL24I Series	400	Slip-On	3/8" (9.5 mm) – 3/4" (19.5 mm)				■	■	■	■		115
EL24CT Series	400	Thread-On	3/8" (9.5 mm) – 3/4" (19.5 mm)	■				■	■	■	■	115
REL24 Series	400	Thread-On	1/2" (12.7 mm) – 3/4" (19.5 mm)			■			■	■	■	115
SW24 Series	400	Slip-On	5/8" (15.9 mm) – 13/16" (21 mm)	■						■		116
WC26 Series	600	Thread-On	1/2" (12.7 mm) – 3/4" (19.5 mm)	■					■	■	■	116
RWC26 Series	600	Thread-On	1/2" (12.7 mm) – 5/8" (15.9 mm)	■						■		117
PMW24 Series	400	Thread-On	1/2" (12.7 mm) – 3/4" (19.5 mm)	■					■	■		117

**CONSUMABLES**

## MIG Gun Nozzle to Tip Relationship - It's More Than Just Welder's Preference

Selecting the right nozzle for a welder's preferred 'nozzle to tip relationship' on a MIG gun is generally based on the application and the welder's daily welding routine.

### Recessed Tips

are generally used for higher heat applications where longer electrical stick-out is required, or in cases where the nozzle may touch the work piece (tack, spot, and stitch).



### Flush Tips

are generally used where a shorter electrical stick-out is used sometimes resulting in shorter/tighter arc lengths. This brings the tip closer to the work piece.



### Protruding Tips

are generally used when welding open root pipe or any joint that requires the welder to get into a tight weld joint. However the down side to this is the chance of arcing the tip to the work piece, which could damage front end parts resulting in downtime needed to replace.



### Nozzles & Nozzle Insulators – Air-Cooled

#### 21 Series

3-Piece Nozzle Design - 0.750" (19.05 mm) Outside Diameter  
Self Insulated Nozzles.  
2 per pack



21 Series

Nozzle Style	Bore Diameter	Part No.	Stock No.	Nozzle Design	Nozzle/Contact Tip Relationship
Thread-On	3/8" (9.5 mm)	<b>21-37F</b>	1210-1102	<b>Standard</b>	Flush To 1/16" (1.6 mm) Tip Recess
	3/8" (9.5 mm)	<b>21-37</b>	1210-1100	<b>Standard</b>	1/8" (3.2 mm) Tip Recess
	3/8" (9.5 mm)	<b>21T-37</b>	1210-1300	<b>Tapered</b>	1/8" (3.2 mm) Tip Recess
	3/8" (9.5 mm)	<b>21T-37F</b>	1210-1302	<b>Tapered</b>	Flush To 1/16" (1.6 mm) Tip Recess
	1/2" (12.7 mm)	<b>21-50F</b>	1210-1112	<b>Standard</b>	Flush To 1/16" (1.6 mm) Tip Recess
	1/2" (12.7 mm)	<b>21-50</b>	1210-1110	<b>Standard</b>	1/8" (3.2 mm) Tip Recess
	5/8" (15.9 mm)	<b>21-62</b>	1210-1120	<b>Standard</b>	1/8" (3.2 mm) Tip Recess

#### REL 21 Series

3-Piece Nozzle Design - 0.875" (22.2 mm) Outside Diameter  
Self Insulated Nozzles.  
2 per pack



REL 21 Series

Nozzle Style	Bore Diameter	Part No.	Stock No.	Nozzle Design	Nozzle/Contact Tip Relationship
Slip-On	1/2" (12.7 mm)	<b>REL21-50F</b>	1210-1316	<b>Straight</b>	Flush To 1/16" (1.6 mm) Tip Recess
	1/2" (12.7 mm)	<b>REL21-50P</b>	1210-1321	<b>Straight</b>	5/32" (3.97 mm) Tip Protruding

#### 22 Series

Formed Nozzle - 0.750" (19.05 mm) Outside Diameter  
Use with Nozzle Insulator Part No. 32 (Stock No. 1320-1100).  
2 per pack



22 Series



32 Insulator  
(sold separately)

Nozzle Style	Bore Diameter	Part No.	Stock No.	Nozzle Design	Nozzle/Contact Tip Relationship
Slip-On	3/8" (9.5 mm)	<b>22-37SS</b>	1220-1101	<b>Standard Short Stop</b>	1/16" (1.6mm) – 1/4" (6.4mm) Recess, No Projection
	3/8" (9.5 mm)	<b>22T-37SS</b>	1220-1301	<b>Standard Short Stop</b>	1/16" (1.6mm) – 1/4" (6.4mm) Recess, No Projection
	1/2" (12.7 mm)	<b>22-50</b>	1220-1110	<b>Standard</b>	3/32" (2.4mm) Projection, 1/4" (6.4mm) Recess
	1/2" (12.7 mm)	<b>22-50SS</b>	1220-1111	<b>Standard Short Stop</b>	1/16" (1.6mm) – 1/4" (6.4mm) Recess, No Projection
	5/8" (15.9 mm)	<b>22-62</b>	1220-1120	<b>Standard</b>	3/32" (2.4mm) Projection, 1/4" (6.4mm) Recess
	5/8" (15.9 mm)	<b>22-62SS</b>	1220-1121	<b>Standard Short Stop</b>	1/16" (1.6mm) – 1/4" (6.4mm) Recess, No Projection

#### HD22 Series

3-Piece Nozzle Design - 0.875" (22.2 mm) Outside Diameter  
Self Insulated Nozzles.  
2 per pack



HD22 Series

Nozzle Style	Bore Diameter	Part No.	Stock No.	Nozzle Design	Nozzle/Contact Tip Relationship
Slip-On	3/8" (9.5 mm)	<b>HD22-37</b>	1220-1305	<b>Standard</b>	1/8" – 5/32" (3.2 mm – 3.97 mm) Tip Recess
	1/2" (12.7 mm)	<b>HD22-50</b>	1220-1306	<b>Standard</b>	1/8" – 5/32" (3.2 mm – 3.97 mm) Tip Recess
	1/2" (12.7 mm)	<b>HD22-50F</b>	1220-1311	<b>Standard</b>	Flush To 1/16" (1.6 mm) Tip Recess
	5/8" (15.9 mm)	<b>HD22-62</b>	1220-1307	<b>Standard</b>	1/8" – 5/32" (3.2 mm – 3.97 mm) Tip Recess
	5/8" (15.9 mm)	<b>HD22-62F</b>	1220-1312	<b>Standard</b>	Flush To 1/16" (1.6 mm) Tip Recess

# Nozzles & Nozzle Insulators – Air-Cooled

## 23 Series

3-Piece Nozzle Design - 0.875" (22.2 mm) Outside Diameter  
Self Insulated Nozzles.

2 per pack



23 Series

Nozzle Style	Bore Diameter	Part No.	Stock No.	Nozzle Design	Nozzle/Contact Tip Relationship
Thread-On	3/8" (9.5 mm)	<b>23-37</b>	1230-1100	<b>Standard</b>	5/32" (3.97 mm) Tip Recess
	1/2" (12.7 mm)	<b>23-50</b>	1230-1110	<b>Standard</b>	5/32" (3.97 mm) Tip Recess
	1/2" (12.7 mm)	<b>23-50F</b>	1230-1112	<b>Standard</b>	Flush To 1/16" (1.6 mm) Tip Recess
	5/8" (15.9 mm)	<b>23-62</b>	1230-1120	<b>Standard</b>	5/32" (3.97 mm) Tip Recess
	5/8" (15.9 mm)	<b>23-62F</b>	1230-1122	<b>Standard</b>	Flush To 1/16" (1.6 mm) Tip Recess
	5/8" (15.9 mm)	<b>23-75</b>	1230-1130	<b>Standard</b>	5/32" (3.97 mm) Tip Recess
	3/4" (19.5 mm)	<b>23-75F</b>	1230-1132	<b>Standard</b>	5/32" (3.97 mm) Tip Recess

## 23T Series

3-Piece Nozzle Design - 0.875" (22.2 mm) Outside Diameter  
Self Insulated Nozzles.

2 per pack



23T Series

Nozzle Style	Bore Diameter	Part No.	Stock No.	Nozzle Design	Nozzle/Contact Tip Relationship
Thread-On	3/8" (9.5 mm)	<b>23T-37</b>	1230-1300	<b>Tapered</b>	1/8" (3.2 mm) Tip Recess
	3/8" (9.5 mm)	<b>23T-37F</b>	1230-1302	<b>Tapered</b>	Flush To 1/16" (1.6 mm) Tip Recess

## 23H Series

3-Piece Nozzle Design - 0.875" (22.2 mm) Outside Diameter  
Self Insulated Nozzles.

2 per pack



23H Series

Nozzle Style	Bore Diameter	Part No.	Stock No.	Nozzle Design	Nozzle/Contact Tip Relationship
Thread-On	1/2" (12.7 mm)	<b>23H-50</b>	1230-1210	<b>Heavy Duty</b>	5/32" (3.97 mm) Tip Recess
	5/8" (15.9 mm)	<b>23H-62</b>	1230-1220	<b>Heavy Duty</b>	5/32" (3.97 mm) Tip Recess
	5/8" (15.9 mm)	-	-	<b>Heavy Duty</b>	Flush To 1/16" (1.6 mm) Tip Recess
	3/4" (19.5 mm)	<b>23H-75</b>	1230-1230	<b>Heavy Duty</b>	5/32" (3.97 mm) Tip Recess

## 24A Series

Formed Nozzle - 0.750" (19.05 mm) Outside Diameter  
Use with Nozzle Insulator Part No. 34A (Stock No. 1340-1100).

2 per pack



24A Series



34A Insulator  
(sold separately)

Nozzle Style	Bore Diameter	Part No.	Stock No.	Nozzle Design	Nozzle/Contact Tip Relationship
Slip-On	3/8" (9.5 mm)	<b>24A-37SS</b>	1240-1101	<b>Standard Short Stop</b>	1/8" (3.2 mm) Tip Recess
	3/8" (9.5 mm)	<b>24AT-37SS</b>	1240-1301	<b>Standard Short Stop</b>	1/8" (3.2 mm) Tip Recess
	1/2" (12.7 mm)	<b>24A-50</b>	1240-1110	<b>Standard</b>	Adjustable Tip Recess - Tip Protruding
	1/2" (12.7 mm)	<b>24A-50SS</b>	1240-1111	<b>Standard Short Stop</b>	1/8" (3.2 mm) Tip Recess
	5/8" (15.9 mm)	<b>24A-62</b>	1240-1120	<b>Standard</b>	Adjustable Tip Recess - Tip Protruding
	5/8" (15.9 mm)	<b>24A-62SS</b>	1240-1121	<b>Standard Short Stop</b>	1/8" (3.2 mm) Tip Recess
	5/8" (15.9 mm)	<b>24AH-62</b>	1240-1220	<b>Standard Heavy Duty</b>	Adjustable Tip Recess - Tip Protruding
	5/8" (15.9 mm)	<b>24AH-62SS</b>	1240-1221	<b>Standard Short Stop</b>	1/8" (3.2 mm) Tip Recess
	3/4" (19.5 mm)	<b>24A-75</b>	1240-1130	<b>Standard</b>	Adjustable Tip Recess - Tip Protruding
	3/4" (19.5 mm)	<b>24AH-75</b>	1240-1230	<b>Standard Heavy Duty</b>	Adjustable Tip Recess - Tip Protruding
	3/4" (19.5 mm)	<b>24AH-75SS</b>	1240-1231	<b>Standard Short Stop</b>	1/8" (3.2 mm) Tip Recess

# Consumables

## Nozzles & Nozzle Insulators

### Nozzles & Nozzle Insulators – Air-Cooled

#### 24CT Series

Coarse Thread Nozzle - 1.070" (27.2 mm) Outside Diameter at the knurled flat section  
Use with Nozzle Insulator Part No. 34CT (Stock No. 1340-1400).  
2 per pack



Nozzle Style	Bore Diameter	Part No.	Stock No.	Nozzle Design	Nozzle/Contact Tip Relationship
Thread-On	3/8" (9.5 mm)	<b>24CT-37S</b>	1240-1404	<b>Standard Short Stop</b>	5/32" (3.97 mm) Tip Recess
	1/2" (12.7 mm)	<b>24CT-50S</b>	1240-1414	<b>Standard Short Stop</b>	5/32" (3.97 mm) Tip Recess
	5/8" (15.9 mm)	<b>24CT-62R</b>	1240-1423	<b>Tapered</b>	1/16" (1.59MM) Tip Recess
	5/8" (15.9 mm)	<b>24CT-62S</b>	1240-1424	<b>Standard Short Stop</b>	5/32" (3.97 mm) Tip Recess
	5/8" (15.9 mm)	<b>24CT-62F</b>	1240-1422	<b>Tapered</b>	1/16" (1.59 mm) Tip Recess
	3/4" (19.5 mm)	<b>24CT-75R</b>	1240-1433	<b>Tapered</b>	1/16" (1.59Mm) Tip Recess
	3/4" (19.5 mm)	<b>24CT-75S</b>	1240-1434	<b>Standard Short Stop</b>	5/32" (3.97 mm) Tip Recess

#### 24FN Series

Fine Thread Nozzle - 1.070" (27.2 mm) Outside Diameter at the knurled flat section  
Use with Nozzle Insulator Part No. 34FN (Stock No. 1340-1401).  
2 per pack



Nozzle Style	Bore Diameter	Part No.	Stock No.	Nozzle Design	Nozzle/Contact Tip Relationship
Thread-On	3/8" (9.5 mm)	<b>24FN-37S</b>	1240-1704	<b>Standard Short Stop</b>	5/32" (3.97 mm) Tip Recess
	1/2" (12.7 mm)	<b>24FN-50S</b>	1240-1714	<b>Standard Short Stop</b>	5/32" (3.97MM) Tip Recess
	5/8" (15.9 mm)	<b>24FN-62S</b>	1240-1724	<b>Standard Short Stop</b>	5/32" (3.97 mm) Tip Recess
	3/4" (19.5 mm)	<b>24FN-75S</b>	1240-1734	<b>Standard Short Stop</b>	5/32" (3.97 mm) Tip Recess

#### HD24 Series

3-Piece Nozzle Design - 1.117" (28.4 mm) Outside Diameter  
Self Insulated Nozzles. Use with HD54 Series Gas Diffusers.  
2 per pack



Nozzle Style	Bore Diameter	Part No.	Stock No.	Nozzle Design	Nozzle/Contact Tip Relationship
Slip-On	1/2" (12.7 mm)	<b>HD24L-50</b>	1240-1200	<b>Tapered</b>	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess
	1/2" (12.7 mm)	<b>HD24-50</b>	1240-1240	<b>Standard</b>	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess
	1/2" (12.7 mm)	<b>HD24L-50F</b>	1240-1204	<b>Standard</b>	Flush To 1/16" (1.6Mm) Tip Recess
	5/8" (15.9 mm)	<b>HD24L-62</b>	1240-1201	<b>Tapered</b>	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess
	5/8" (15.9 mm)	<b>HD24L-62F</b>	1240-1205	<b>Tapered</b>	Flush To 1/16" (1.6 mm) Tip Recess
	5/8" (15.9 mm)	<b>HD24-62</b>	1240-1241	<b>Standard</b>	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess
	5/8" (15.9 mm)	<b>HD24-62F</b>	1240-1236	<b>Standard</b>	Flush To 1/16" (1.6 mm) Tip Recess
	3/4" (19.5 mm)	<b>HD24L-75</b>	1240-1202	<b>Tapered</b>	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess
	3/4" (19.5 mm)	<b>HD24-75</b>	1240-1242	<b>Standard</b>	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess
	3/4" (19.5 mm)	<b>HD24L-75F</b>	1240-1206	<b>Standard</b>	Flush To 1/16" (1.6Mm) Tip Recess
	3/4" (19.5 mm)	<b>HD24-75F</b>	1240-1237	<b>Standard</b>	Flush To 1/16" (1.6 mm) Tip Recess
	5/8" (15.9 mm)	<b>HD24LB-62</b>	1240-1216	<b>Standard †</b>	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess
	5/8" (15.9 mm)	<b>HD24LB-62F</b>	1240-1219	<b>Tapered †</b>	Flush To 1/16" (1.6 mm) Tip Recess
	5/8" (15.9 mm)	<b>HD26B-62</b>	1260-1285	<b>Standard †</b>	5/32" (3.97 mm) Tip Recess
	3/4" (19.5 mm)	<b>HD26B-75</b>	1260-1286	<b>Standard †</b>	5/32" (3.97 mm) Tip Recess

†Outer shell made from red brass Alloy 230



# Nozzles & Nozzle Insulators – Air-Cooled

## PMA24 Series PulseMaster® and PullMaster™ Air-Cooled Nozzles

3-Piece Nozzle Design - 1.000" (25.4 mm) Outside Diameter  
Self Insulated Nozzles. Nozzles are nickel plated.  
2 per pack



PMA24 Series

Nozzle Style	Bore Diameter	Part No.	Stock No.	Nozzle Design	Nozzle/Contact Tip Relationship
Thread-On	1/2" (12.7 mm)	<b>PMA24-50</b>	1260-1711	<b>Straight</b>	0.156" (3.9 mm) Tip Recess
	5/8" (15.9 mm)	<b>PMA24-62F</b>	1260-1712	<b>Straight</b>	Flush to 1/16" (1.6 mm)
	5/8" (15.9 mm)	<b>PMA24-62</b>	1260-1713	<b>Straight</b>	0.156" (3.9 mm) Tip Recess
	5/8" (15.9 mm)	<b>PMA24H-62</b>	1260-1720	<b>Straight</b>	0.156" (3.9 mm) Tip Recess
	3/4" (19.5 mm)	<b>PMA24-75F</b>	1260-1714	<b>Straight</b>	Flush To 1/16" (1.6 mm)
	3/4" (19.5 mm)	<b>PMA24H-75</b>	1260-1721	<b>Straight</b>	0.156" (3.9 mm) Tip Recess

## 25CT Series

Coarse Thread Nozzle - 1.080" (27.4 mm) Outside Diameter  
at the knurled flat section  
Use with Nozzle Insulator Part No. 35CT (Stock No. 1350-1400).  
2 per pack



25CT Series

35CT Insulator  
*(sold separately)*

Nozzle Style	Bore Diameter	Part No.	Stock No.	Nozzle Design	Nozzle/Contact Tip Relationship
Thread-On	1/2" (12.7 mm)	<b>25CT-50</b>	1250-1410	<b>Standard</b>	1/8" (3.2 mm) Tip Recess
	5/8" (15.9 mm)	<b>25CT-62</b>	1250-1420	<b>Standard</b>	1/8" (3.2 mm) Tip Recess
	3/4" (19.5 mm)	<b>25CT-75</b>	1250-1430	<b>Standard</b>	1/8" (3.2 mm) Tip Recess

## 25I Series

3-Piece Nozzle Design - 0.970" (24.6 mm) Outside Diameter  
Self Insulated Nozzles.  
2 per pack



25I Series

Nozzle Style	Bore Diameter	Part No.	Stock No.	Nozzle Design	Nozzle/Contact Tip Relationship
Thread-On	5/8" (15.9 mm)	<b>25I-62</b>	1250-1120	<b>Standard</b>	5/32" (3.97 mm) Tip Recess
	3/4" (19.5 mm)	<b>25I-75</b>	1250-1130	<b>Standard</b>	5/32" (3.97 mm) Tip Recess

## 26CT Series

Coarse Thread Nozzle - 1.080" (27.4 mm) Outside Diameter  
at the knurled flat section  
Use with Nozzle Insulator Part No. 36CT (Stock No. 1360-1400).  
2 per pack



26CT Series

36CT Insulator  
*(sold separately)*

Nozzle Style	Bore Diameter	Part No.	Stock No.	Nozzle Design	Nozzle/Contact Tip Relationship
Thread-On	5/8" (15.9 mm)	<b>26CT-62</b>	1260-1420	<b>Standard</b>	1/8" (3.2 mm) Tip Recess
	3/4" (19.5 mm)	<b>26CT-75</b>	1260-1430	<b>Standard</b>	1/8" (3.2 mm) Tip Recess

## 26I Series

3-Piece Nozzle Design - 0.970" (24.6 mm) Outside Diameter  
Self Insulated Nozzles.  
2 per pack



26I Series

Nozzle Style	Bore Diameter	Part No.	Stock No.	Nozzle Design	Nozzle/Contact Tip Relationship
Thread-On	5/8" (15.9 mm)	<b>26I-62</b>	1260-1120	<b>Standard</b>	1/8" (3.2 mm) Tip Recess
	3/4" (19.5 mm)	<b>26I-75</b>	1260-1130	<b>Standard</b>	1/8" (3.2 mm) Tip Recess

## Nozzles & Nozzle Insulators – Flat Arc Spot Nozzles & Nozzle Insulators

### Style Air-Cooled

#### FAS Series

Self Insulated Nozzles.

2 per pack

Nozzle Style	Bore Diameter	Part No.	Stock No.
Thread-On	1/2" (12.7 mm)	<b>21-62FAS</b>	1210-1520

#### FAS Series

Use with Nozzle Insulator Part No. 34A (Stock No. 1340-1100).

2 per pack

Nozzle Style	Bore Diameter	Part No.	Stock No.
Slip-On	3/4" (19.5 mm)	<b>24A-100FAS</b>	1240-1550



24A-100FAS



34A Insulator  
*(sold separately)*

#### FAS Series

Use with Nozzle Insulator Part No. 35CT (Stock No. 1350-1400).

2 per pack

Nozzle Style	Bore Diameter	Part No.	Stock No.
Thread-On	1-5/8" (41.3 mm)	<b>25CT-162FAS</b>	1250-1570



25CT-162FAS



35CT Insulator  
*(sold separately)*

## Nozzles – Eliminator® Style Air-Cooled

#### EL22I Series

3-Piece Nozzle Design - 0.875" (22.2 mm) Outside Diameter

Self Insulated Nozzles. Use with Part No. EL52 (Stock No. 1560-1110) Gas Diffuser.

2 per pack



EL22I Series

Nozzle Style	Bore Diameter	Part No.	Stock No.	Nozzle Design	Nozzle/Contact Tip Relationship
Slip-On	3/8" (9.5 mm)	<b>EL22I-37</b>	1260-1601	Standard	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess
	1/2" (12.7 mm)	<b>EL22I-50F</b>	1260-1612	Standard	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess
	1/2" (12.7 mm)	<b>EL22I-50P</b>	1260-1686	Standard	5/32" (3.97 mm) Tip Protruding
	5/8" (15.9 mm)	<b>EL22I-62</b>	1260-1603	Standard	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess
	3/4" (19.5 mm)	<b>EL22I-75</b>	1260-1604	Standard	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess

#### EL22CT Series

3-Piece Nozzle Design - 0.875" (22.2 mm) Outside Diameter

Self Insulated Nozzles. Use with Part No. EL52CT Series Gas Diffuser.

2 per pack



EL22CT Series

Nozzle Style	Bore Diameter	Part No.	Stock No.	Nozzle Design	Nozzle/Contact Tip Relationship
Thread-On	3/8" (9.5 mm)	<b>EL22CT-37</b>	1260-1625	Standard	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess
	3/8" (9.5 mm)	<b>EL22CT-37F</b>	1260-1635	Standard	Flush To 1/16" (1.6 mm) Tip Recess
	1/2" (12.7 mm)	<b>EL22CT-50</b>	1260-1626	Standard	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess
	1/2" (12.7 mm)	<b>EL22CT-50F</b>	1260-1636	Standard	Flush To 1/16" (1.6 mm) Tip Recess
	5/8" (15.9 mm)	<b>EL22CT-62</b>	1260-1627	Standard	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess
	5/8" (15.9 mm)	<b>EL22CT-62F</b>	1260-1637	Standard	Flush To 1/16" (1.6 mm) Tip Recess
	5/8" (15.9 mm)	<b>EL22CT-62P</b>	1260-1692	Standard	5/32" (3.97 mm) Tip Protruding
	5/8" (15.9 mm)	<b>EL22CT-62H</b>	1260-1629	Standard, Heavy Duty	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess
3/4" (19.5 mm)	<b>EL22CT-75</b>	1260-1628	Standard	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess	

# Nozzles – Eliminator® Style Air-Cooled

## EL24I Series

3-Piece Nozzle Design - 0.875" (22.2 mm) Outside Diameter  
Self Insulated Nozzles. Use with Part No. EL54 Series Gas Diffusers.  
2 per pack



EL24I Series

Nozzle Style	Bore Diameter	Part No.	Stock No.	Nozzle Design	Nozzle/Contact Tip Relationship
Slip-On	3/8" (9.5 mm)	<b>EL24I-37</b>	1260-1606	<b>Tapered</b>	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess
	1/2" (12.7 mm)	<b>EL24I-50</b>	1260-1607	<b>Tapered</b>	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess
	5/8" (15.9 mm)	<b>EL24I-62</b>	1260-1608	<b>Tapered</b>	Flush To 1/16" (1.6 mm) Tip Recess
	5/8" (15.9 mm)	<b>EL24I-62R</b>	1260-1677	<b>Tapered</b>	3/8" (9.5 mm) Tip Recess
	3/4" (19.5 mm)	<b>EL24I-75</b>	1260-1609	<b>Tapered</b>	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess
	3/4" (19.5 mm)	<b>EL24I-75H</b>	1260-1632	<b>Tapered, Heavy Duty</b>	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess

## EL24CT Series

3-Piece Nozzle Design - 0.875" (22.2 mm) Outside Diameter  
Self Insulated Nozzles. Use with Part No. EL52CT Series Gas Diffusers.  
2 per pack



EL24CT Series

Nozzle Style	Bore Diameter	Part No.	Stock No.	Nozzle Design	Nozzle/Contact Tip Relationship
Thread-On	3/8" (9.5 mm)	<b>EL24CT-37</b>	1260-1650	<b>Standard</b>	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess
	1/2" (12.7 mm)	<b>EL24CT-50</b>	1260-1651	<b>Standard</b>	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess
	1/2" (12.7 mm)	<b>EL24CT-50P</b>	1260-1701	<b>Standard</b>	5/32" (3.97 mm) Tip Protruding
	5/8" (15.9 mm)	<b>EL24CT-62</b>	1260-1652	<b>Standard</b>	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess
	5/8" (15.9 mm)	<b>EL24CT-62F</b>	1260-1667	<b>Standard</b>	Flush To 1/16" (1.6 mm) Tip Recess
	5/8" (15.9 mm)	<b>EL24CT-62R</b>	1260-1682	<b>Standard</b>	3/8" (9.5 mm) Tip Recess
	5/8" (15.9 mm)	<b>EL24CT-62H</b>	1260-1657	<b>Standard, Heavy Duty</b>	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess
	3/4" (19.5 mm)	<b>EL24CT-75</b>	1260-1653	<b>Standard</b>	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess
	3/4" (19.5 mm)	<b>EL24CT-75H</b>	1260-1658	<b>Standard, Heavy Duty</b>	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess

## REL24 Series

3-Piece Nozzle Design - 1.000" (25.4 mm) Outside Diameter  
Self Insulated Nozzles. Nickel plated nozzle. Use with Part No. QTR56-SW Gas Diffuser.  
2 per pack



REL24 Series

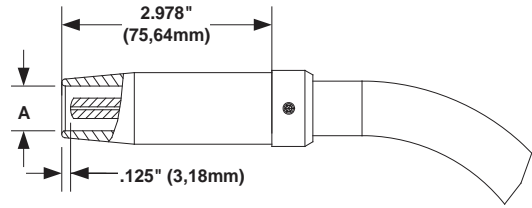
Nozzle Style	Bore Diameter	Part No.	Stock No.	Nozzle Design	Nozzle/Contact Tip Relationship
Thread-On	1/2" (12.7 mm)	<b>REL24CT-50</b>	1240-1305	<b>Straight</b>	5/32" (3.97 mm) Tip Recess
	1/2" (12.7 mm)	<b>REL24CT-50F</b>	1240-1315	<b>Straight</b>	Flush To 1/16" (1.6 mm) Tip Recess
	1/2" (12.7 mm)	<b>REL24CT-50P</b>	1240-1310	<b>Straight</b>	5/32" (3.97 mm) Tip Protruding
	5/8" (15.9 mm)	<b>REL24CT-62</b>	1240-1306	<b>Straight</b>	5/32" (3.97 mm) Tip Recess
	5/8" (15.9 mm)	<b>REL24CT-62F</b>	1240-1316	<b>Straight</b>	Flush To 1/16" (1.6 mm) Tip Recess
	5/8" (15.9 mm)	<b>REL24CT-62P</b>	1240-1311	<b>Straight</b>	5/32" (3.97 mm) Tip Recess
	3/4" (19.5 mm)	<b>REL24CT-75F</b>	1240-1317	<b>Straight</b>	Flush To 1/16" (1.6 mm) Tip Recess
	3/4" (19.5 mm)	<b>REL24CT-75P</b>	1240-1312	<b>Straight</b>	5/32" (3.97 mm) Tip Protruding

### Nozzles & Nozzle Insulators – Water-Cooled

#### WC24 Series – Standard Tip Recess

Nozzle Insulator .125" (3.18 mm)

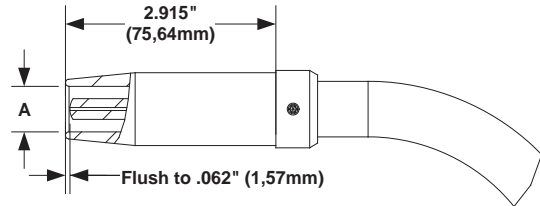
Bore Size "A"	Part No.	Stock No.
.500" (12.7mm)	<b>WC24-50</b>	1244-1110
.625" (15.9 mm)	<b>WC24-62</b>	1244-1120
.750" (19.1 mm)	<b>WC24-75</b>	1244-1130



#### WC24 Series – Flush Tip Recess

Nozzle Insulator Flush to .062" (1.57 mm)

Bore Size "A"	Part No.	Stock No.
.500" (12.7 mm)	<b>WC24-50F</b>	1244-1112
.625" (15.9 mm)	<b>WC24-62F</b>	1244-1122



CONSUMABLES

#### SW24 Series

Use with Insulator Ring Part No. SW64-3 (Stock No. 2044-1020).

2 per pack



SW24 Series



SW64-3  
(sold separately)

Nozzle Style	Bore Diameter	Part No.	Stock No.	Nozzle Design	Nozzle/Contact Tip Relationship
Slip-On	5/8" (15.9 mm)	<b>SW24-15</b>	1244-1026	<b>Standard</b>	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess
	11/16" (17 mm)	<b>SW24-17</b>	1244-1025	<b>Standard</b>	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess
	13/16" (21 mm)	<b>SW24-21</b>	1244-1027	<b>Standard</b>	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess

#### WC26 Series - Standard

3-Piece Nozzle Design - 1.062" (30 mm) Outside Diameter

Use with Spatter Shield Part No. WC26-1 (Stock No. 1264-1009).

2 per pack



WC26 Series



WC26-1  
(sold separately)

Nozzle Style	Bore Diameter	Part No.	Stock No.	Nozzle Design	Nozzle/Contact Tip Relationship
Thread-On (Standard)	5/8" (15.9 mm)	<b>WC26-62</b>	1264-1120	<b>Standard</b>	1/8" (3.2 mm) Tip Recess
	5/8" (15.9 mm)	<b>WC26-62R</b>	1264-1123	<b>Standard</b>	1/4" (6.4 mm) Tip Recess
	3/4" (19.5 mm)	<b>WC26-75</b>	1264-1130	<b>Standard</b>	1/8" (3.2 mm) Tip Recess
	3/4" (19.5 mm)	<b>WC26-75R</b>	1264-1133	<b>Standard</b>	1/4" (6.4 mm) Tip Recess
Thread-On* (Eliminator®)	1/2" (12.7 mm)	<b>WC26-50EL*</b>	1262-1031	<b>Standard</b>	1/8" (3.2 mm) Tip Recess
	5/8" (15.9 mm)	<b>WC26-62EL*</b>	1262-1032	<b>Standard</b>	1/8" (3.2 mm) Tip Recess
	5/8" (15.9 mm)	<b>WC26-62ELF*</b>	1262-1037	<b>Standard</b>	Tip Flush
	3/4" (19.5 mm)	<b>WC26-75EL*</b>	1262-1033	<b>Standard</b>	1/8" (3.2 mm) Tip Recess
	3/4" (19.5 mm)	<b>WC26-75ELF*</b>	1262-1038	<b>Standard</b>	5/32" (3.97 mm) Tip Protruding
	3/4" (19.5 mm)	<b>WC26-75ELR*</b>	1262-1042	<b>Standard</b>	Tip Flush

\*Use with Eliminator style contact tips

## Nozzles & Nozzle Insulators – Water-Cooled

### RWC26 Series

Nickel plated nozzles.  
Use with Spatter Shield Part No. WC26EL-1 (Stock No. 1262-1049).  
2 per pack



RWC26 Series

Nozzle Style	Bore Diameter	Part No.	Stock No.	Nozzle Design	Nozzle/Contact Tip Relationship
Thread-On	1/2" (12.7 mm)	<b>RWC26-50</b>	1264-1430	<b>Standard</b>	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess
	5/8" (15.9 mm)	<b>RWC26-62</b>	1264-1431	<b>Standard</b>	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess
	5/8" (15.9 mm)	<b>RWC26-75</b>	1264-1432	<b>Standard</b>	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess

### PMW24 Series PulseMaster™ Water-Cooled Nozzles

Nickel plated nozzles.  
2 per pack



PMW24 Series

Nozzle Style	Bore Diameter	Part No.	Stock No.	Nozzle Design	Nozzle/Contact Tip Relationship
Thread-On	1/2" (12.7 mm)	<b>PMW24-50F</b>	1260-1735	<b>Standard</b>	Flush To 1/2" (12.5 mm)
	5/8" (15.9 mm)	<b>PMW24-62F</b>	1260-1737	<b>Standard</b>	Flush to 5/8" (16 mm)
	5/8" (15.9 mm)	<b>PMW24-62</b>	1260-1738	<b>Standard</b>	0.156" (3.9 mm) Tip Recess
	3/4" (19.5 mm)	<b>PMW24-75F</b>	1260-1739	<b>Standard</b>	Flush To 3/4" (19 mm)
	3/4" (19.5 mm)	<b>PMW24-75</b>	1260-1740	<b>Standard</b>	0.156" (3.9 mm) Tip Recess

## Gas Diffusers - Standard Air-Cooled

### Mini-MIG Series 160 Amp

5 per pack



Part No.	Stock No.	Material	Contact Tip	Nozzle
35-50	1500-1100	Brass	11 Series	21 Series

### 51 Series 100 Amp

5 per pack



Part No.	Stock No.	Material	Contact Tip	Nozzle
51	1510-1101	Brass	11 Series	21 Series
EL51	1510-1105	Brass	EL11 Series	REL21 Series
QTRW53-11	1525-1141	Brass	11 Series	REL21 Series

### 52 Series 200 Amp

5 per pack



Part No.	Stock No.	Material	Contact Tip	Nozzle
52	1520-1101	Brass	14 Series	22 Series
52FN	1520-1102	Brass	14 Series	24A or 23 Series
MS52T-11	1520-1133	Brass	11 Series	22 Series

## Gas Diffusers – Standard Air-Cooled

### 54 Series 400 Amp

5 per pack



Part No.	Stock No.	Material	Contact Tip	Nozzle
54P	1540-1103	Copper	14 Series	24A, 24CT, & 23 Series
54A	1540-1100	Brass	14 Series	24A, 24CT, & 23 Series
54A-16	1540-1104	Brass	16S Series	24A, 24CT, & 23 Series
HD54-14	1540-1135	Brass	14 Series	HD24 Series
HD54-16	1540-1136	Brass	16S Series	HD24 Series
HD54-EL	1540-1137	Brass	EL16 Series	HD24 Series
PMA54-16S	1543-1106	Brass	16PS Series	PMA24 Series

### 55 Series 500 Amp

5 per pack



Part No.	Stock No.	Material	Contact Tip	Nozzle
55SW *	1550-1101	Copper	15H Series	25CT Series
55 †	1550-1100	Copper	15H Series	25CT Series
55H §	1550-1102	Copper	15H Series	25CT Series
55S-SW *	1550-1110	Copper	16S Series	25I Series
55S-H † §	1550-1111	Copper	16S Series	25I Series
55S-SWL ‡	1550-1120	Copper	16S Series	25I Series
PMW55-16	1550-1105	Brass	16PS Series	PMW24 Series

\* Use with 45-3545, 45-116, and 45N-3545 Conduit Liners

† Use with 45-564, and 45N-116 Conduit Liners

§ Use with 45H-332, 45H-764, and 45-18 Conduit Liners

‡ Use with 45-3545, 45-116, and 45N-3545 Conduit Liners. Tip/Nozzle relationship will be 1/8" (3.2 mm) tip recess

### 56 Series 600 Amp

5 per pack



Part No.	Stock No.	Material	Contact Tip	Nozzle
56S-SW	1560-1100	Copper	16S Series	26CT or 26I
56S-H	1560-1101	Copper	16S Series	26CT or 26I

### EL52 Series 200 Amp

5 per pack



Part No.	Stock No.	Material	Contact Tip	Nozzle
EL52	1560-1110	Brass	EL16 Series	EL22I Series
EL52CT	1560-1109	Brass	EL16 Series	EL22CT Series
EL52CT-14	1560-1106	Brass	14 Series	EL22CT Series
EL52CT-16	1560-1107	Brass	16S Series	EL22CT Series

Replacement O-ring for EL52 Series Gas Diffuser use Part No. EL52-1 (Stock No. 1560-1108)

### HD52 Series 200 Amp

5 per pack



Part No.	Stock No.	Material	Contact Tip	Nozzle
HD52-11	1520-1130	Brass	11 Series	HD22 Series

Replacement O-ring for HD52 Series Gas Diffuser use Part No. EL52-1 (Stock No. 1560-1108)

## Gas Diffusers – Eliminator® Style Air-Cooled

### EL54 Series 400 Amp

5 per pack



Part No.	Stock No.	Material	Contact Tip	Nozzle
EL54-SW *	1560-1114	Brass	EL16 Series	EL24I Series
EL54-H †	1560-1115	Brass	EL16 Series	EL24I Series
EL54CT-SW *	1560-1116	Brass	EL16 Series	EL24CT Series
EL54CT-H †	1560-1117	Brass	EL16 Series	EL24CT Series

Replacement O-ring for EL54 Series Gas Diffuser use Part No. EL54-10 (Stock No. 1560-1121)

\* Use with 45-3545, 45-116, and 45N-3545 Conduit Liners

† Use with 45-564, 45N-116, 45H-332, 45H-764, and 45-18 Conduit Liners

## Gas Diffusers - Water-Cooled

### 400 Amp

5 per pack



WC54A



QTRW54-16

Part No.	Stock No.	Material	Contact Tip	Nozzle
WC54A	1544-1141	Brass		
SW54-16S	1540-1115	Brass	16S Series	SW24 Series
SW54-EL	1540-1116	Brass	EL16 Series	SW24 Series
QTRW54	1544-1125	Brass	14H Series	RWC24 Series
QTRW54-16	1544-1126	Brass	16S Series	RWC24 Series

### 600 Amp

5 per pack



WC56A-SW



WC56EL-H

Part No.	Stock No.	Material	Contact Tip	Nozzle
WC56A-SW	1564-1145	Brass	16S Series	WC26 or RWC26 Series
WC56A	1564-1143	Brass		
WC56A-H	1564-1144	Brass		
WC56EL-SW	1560-1146	Brass	EL16 Series	WC26EL or RWC26 Series
WC56EL-H	1560-1147	Brass	EL16 Series	WC26EL or RWC26 Series
QTRW56-SW	1560-1125	Brass	16S Series	WC26 or RWC26 Series

# EASY FIND GUIDE – Conductor Tube Selection Guide

MIG Gun Series	Output Current (Amps)	Bend Angles (Degrees)	Threads		Outer Jacket Material	Page
			Back End	Front End		
Mini-MIG® Series	160	45 & 60 Degrees	■	■	Neoprene Rubber	122
Classic No. 1 Series	180	60 & 180 Degrees		■	Neoprene Rubber	122
Classic No. 2 Series	200	60, 80 & 180 Degrees	■	■	Metal or Fiber	122
Classic No. 3 Series	300	45, 60 & 180 Degrees	■	■	Metal	122
Classic No. 4 Series	400	45, 60, 80 & 180 Degrees	■	■	Metal	122
Classic No. 5 Series	500	45, 60 & 180 Degrees	■	■	Metal	122
Classic No. 6 Series	600	60 Degrees	■	■	Metal	122
Mini-MIG® V-Series	160	60 Degrees	■		Neoprene Rubber	123
VELOCITY2™ Classic No. 1 Series	180	60 Degrees	■		Neoprene Rubber	123
VELOCITY2 Classic No. 2 Series	200	45, 60, 80 & 180 Degrees	■		Metal	123
VELOCITY2 Classic No. 3 Series	300	45, 60, 80 & 180 Degrees	■		Metal	123
VELOCITY2 Classic No. 4 Series	400	45, 60, 80 & 180 Degrees	■		Metal	123
VELOCITY2 Classic No. 5 Series	500	45, 60, 80 & 180 Degrees	■		Metal	123
Spray Master® 250 Series	250	60 Degrees		■	Metal	124
Spray Master 350 Series	350	45, 60 & 180 Degrees		■	Metal	124
Spray Master 450 Series	450	45 & 60 Degrees		■	Metal	124
VELOCITY2™ Spray Master® 250 Series	250	45, 60, & 180 Degrees			Metal	124
VELOCITY2 Spray Master 350 Series	350	45, 60 & 180 Degrees			Metal	124
VELOCITY2 Spray Master 450 Series	450	45, 60, & 180 Degrees			Metal	124
Compact Eliminator® 250 Series	250	45 & 60 Degrees		■	Metal	124
Compact Eliminator 450 Series	450	45 & 60 Degrees		■	Metal or Fiber	124
Standard Eliminator 450 Series	450	45, 60 & 180 Degrees		■	Metal or Fiber	124
Supra® XT - SEHD Series	400	45 & 60 Degrees	■	■	Metal	125
Supra XT - SEL Series	400	45 Degrees	■	■	Metal	125
PulseMaster™ 350 & 450 Series	350 & 450	45 Degrees		■	Metal	125
SSG Spool Series	160 & 200	30 & 180 Degrees		■	Metal	125
PMP Push/Pull Series	300	30 & 180 Degrees		■	Metal	125
Smoke Master® 250 Series	250	45 & 60 Degrees	■	■	Powder Coat	125
Smoke Master 450 Series	450	60 Degrees	■	■	Teflon	125
Flux Cored 350 Series	350	60 Degrees		■	Thermo Flex	125
Flux Cored 450 Series	450	60 Degrees		■	Thermo Flex	125
PulseMaster 400 & 500 Series	400 & 500	45 Degrees		■	Metal	126
Standard 600 Series	600	60 Degrees		■	Neoprene Rubber	126

CONSUMABLES



# Conductor Tubes – Flexible Knucklehead™

## Engineered to Last Longer

Patent pending mechanical connections engineered to last 50 times longer than any other design on the market today. Proven in heavy duty field trials, the Knucklehead flexible conductor tube is rugged and flexible enough to be used everyday. It makes difficult welding applications easier.

- Improved weld quality
- Increased productivity
- Less welder fatigue
- Improves the ergonomics of any MIG Gun
- Lasts longer than any design on the market today
- Eliminates downtime caused by changing conductor tubes

Each connector allows for approximately 20° of bend. Two models are offered in 3 or 4 connector designs. Each three-connector design allows a maximum of 60° of bend and each four-connector design allows a maximum of 80° of bend. Extended reach Knucklehead conductor tubes are also available designated with “LR” on the end of the part number.

**Heavy Duty performance even on your 80% Duty Cycle guns**



## Bend up to a 60° Angle

- Specially engineered to bend while minimizing restrictions on wire feeding
- Get that same consistent angle and firm feel that any comparable bent rigid tube offers
- Bend to the right feel and comfort. The engineers at Tweco® have designed the Knucklehead to work with the following Tweco MIG guns: Spray Master® Series, Classic No. Series, Eliminator® Series and Standard WeldSkill® Series

## Spray Master® Series

Amp/Model	Bend Angle	Stand. Cons.*	EL Cons.‡	Long Reach†	Part No.	Stock No.
250	60°	■			MS62SFLX3-60	1620-1341
	80°	■			MS62SFLX4-80	1620-1342
350	60°	■			MS63SFLX3-60	1630-1197
	80°	■			MS63SFLX4-80	1630-1198
450	60°	■			MS64SFLX3-60	1640-1307
	80°	■			MS64SFLX4-80	1640-1308
	60°	■		■	MS64SFLX3-60LR	1640-1309
	80°	■		■	MS64SFLX4-80LR	1640-1310
	60°		■		MS64SFLX3-60EL	1640-1370
	80°		■		MS64SFLX4-80EL	1640-1371

## Classic No. Series

Amp/Model	Bend Angle	Stand. Cons.*	Long Reach†	Part No.	Stock No.
Mini	60°	■		3560SFLX3-60	1600-1139
	80°	■		3560SFLX4-80	1600-1141
No. 1	80°	■		61SFLX4-80	1610-1105
No. 2	60°	■		62SFLX3-60	1620-1105
	80°	■		62SFLX4-80	1620-1106
No.3 & No. 4	60°	■		64SFLX3-60	1640-1112
	80°	■		64SFLX4-80	1640-1113
	60°	■	■	64SFLX3-60LR	1640-1121
	80°	■	■	64SFLX4-80LR	1640-1122

## VELOCITY2™ Spray Master Series

Amp/Model	Bend Angle	Stand. Cons.*	Part No.	Stock No.
250 350 450	60°	VELOCITY2	VCTL64SFLX360	1640-1336
	80°	VELOCITY2	VCTL64SFLX480	1640-1337

## VELOCITY2™ Classic No. Series

Amp/Model	Bend Angle	Stand. Cons.*	Part No.	Stock No.
No. 4	60°	VELOCITY2	V64SFLXC360	1640-1123
	80°	VELOCITY2	V64SFLXC480	1640-1124

## Eliminator® Series

Amp/Model	Bend Angle	EL Cons.‡	Long Reach†	Part No.	Stock No.	
250	60°	■		EL62SFLX3-60	1620-1115	
	80°	■		EL62SFLX4-80	1620-1116	
450	60°	■		EL64SFLX3-60	1640-1143	
	80°	■		EL64SFLX4-80	1640-1144	
	80°	■	■		EL64SFLX4-80LR	1640-1149

## Standard WeldSkill® Series

Amp/Model	Bend Angle	Stand. Cons.*	Long Reach†	Part No.	Stock No.	
250	60°	■		62SFLX3-60	1620-1105	
	80°	■		62SFLX4-80	1620-1106	
400	60°	■		64SFLX3-60	1640-1112	
	80°	■		64SFLX4-80	1640-1113	
	60°	■	■	64SFLX3-60LR	1640-1121	
	80°	■	■		64SFLX4-80LR	1640-1122

\*Standard Style Consumables  
‡Eliminator Style Consumables  
†Long Reach Conductor Tube (2" longer)

**Outer Jacket Repair Kit**  
250A - Part No. FLXSJ-RK (Stock No. 1620-1345)  
350/450A - Part No. FLXLJ-RK (Stock No. 1640-1385)  
(Repair Kits include the neoprene outer jacket and stainless steel straps)

# Conductor Tubes – Air-Cooled

## Mini-MIG

Description	Part No.	Stock No.	Outer Jacket Material	Back End Threads	Front End Threads
60 Degree with 2-1/4" (57 mm) Radius	<b>35-60-60</b>	1600-1102	Neoprene Rubber	O.D. M12 x 1.5-6g	I.D. M9 x 1.25-6g
45 Degree with 1-3/4" (44.5 mm) Radius	<b>35-60-45</b>	1600-1101	Neoprene Rubber	O.D. M12 x 1.5-6g	I.D. M9 x 1.25-6g

## Classic No. 1

Description	Part No.	Stock No.	Outer Jacket Material	Back End Threads	Front End Threads
60 Degree with 2-1/2" (63.5 mm) Radius	<b>61-60</b>	1610-1102	Neoprene Rubber	--	I.D. M10 x 1.5-6H
45 Degree with 2-1/2" (63.5 mm) Radius	<b>61-45</b>	1610-1101	Neoprene Rubber	--	I.D. M10 x 1.5-6H

## Classic No. 2

Description	Part No.	Stock No.	Outer Jacket Material	Back End Threads	Front End Threads
60 Degree with 3" (76.2 mm) Radius	<b>62J-60</b>	1620-1301	Metal	I.D. 3/8"-24 UNF-2B	I.D. 3/8"-24 UNF-2B O.D. 9/16"-18 UNF-2A
60 Degree with 2" (50.5 mm) Radius	<b>62A-60</b>	1620-1102	Fiber	I.D. 3/8"-24 UNF-2B	I.D. 3/8"-24 UNF-2B O.D. 9/16"-18 UNF-2A

## Classic No. 3

Description	Part No.	Stock No.	Outer Jacket Material	Back End Threads	Front End Threads
60 Degree with 3" (76.2 mm) Radius	<b>63J-60</b>	1630-1111	Metal	I.D. 3/8"-24 UNF-2B	I.D. 3/8"-24 UNF-2B O.D. 9/16"-18 UNF-2A
45 Degree with 3" (76.2 mm) Radius	<b>63J-45</b>	1630-1110	Metal	I.D. 3/8"-24 UNF-2B	I.D. 3/8"-24 UNF-2B O.D. 9/16"-18 UNF-2A
180 Degree, Straight	<b>63ELJ-180</b>	1630-1118	Metal	I.D. 3/8"-24 UNF-2B	I.D. M11 x 1.5-6H

## Classic No. 4

Description	Part No.	Stock No.	Outer Jacket Material	Back End Threads	Front End Threads
60 Degree with 3" (76.2 mm) Radius	<b>64J-60</b>	1640-1106	Metal	I.D. 3/8"-24 UNF-2B	I.D. 3/8"-24 UNF-2B O.D. 9/16"-18 UNF-2A
45 Degree with 3" (76.2 mm) Radius	<b>64J-45</b>	1640-1105	Metal	I.D. 3/8"-24 UNF-2B	I.D. 3/8"-24 UNF-2B O.D. 9/16"-18 UNF-2A
60 Degree with 3" (76.2 mm) Radius	<b>64A-60</b>	1640-1102	Fiber	I.D. 3/8"-24 UNF-2B	I.D. 3/8"-24 UNF-2B O.D. 9/16"-18 UNF-2A
45 Degree with 3" (76.2 mm) Radius	<b>64A-45</b>	1640-1101	Fiber	I.D. 3/8"-24 UNF-2B	I.D. 3/8"-24 UNF-2B O.D. 9/16"-18 UNF-2A
180 Degree, Straight	<b>64A180</b>	1640-1104	Fiber	I.D. 3/8"-24 UNF-2B	I.D. 3/8"-24 UNF-2B O.D. 9/16"-18 UNF-2A
Eliminator 60 Degree with 3" (76.2 mm) Radius	<b>64ELJ-60</b>	1640-1117	Metal	I.D. 3/8"-24 UNF-2B	I.D. M12 x 1.5-6H
Eliminator 45 Degree with 3" (76.2 mm) Radius	<b>64ELJ-45</b>	1640-1116	Metal	I.D. 3/8"-24 UNF-2B	I.D. M12 x 1.5-6H
Eliminator 180 Degree, Straight	<b>64ELJ-180</b>	1640-1119	Metal	I.D. 3/8"-24 UNF-2B	I.D. M12 x 1.5-6H

## Classic No. 5

Description	Part No.	Stock No.	Outer Jacket Material	Back End Threads	Front End Threads
60 Degree with 5" (127 mm) Radius	<b>65J-60</b>	1650-1111	Metal	I.D. 7/16"-20 UNF-2B	I.D. 7/16"-20 UNF-2B O.D. 5/8"-18 UNF-2A
45 Degree with 5" (127 mm) Radius	<b>65J-45</b>	1650-1110	Metal	I.D. 7/16"-20 UNF-2B	I.D. 7/16"-20 UNF-2B O.D. 5/8"-18 UNF-2A
180 Degree, Straight	<b>65J-180</b>	1650-1113	Metal	I.D. 7/16"-20 UNF-2B	I.D. 7/16"-20 UNF-2B O.D. 5/8"-18 UNF-2A

## Classic No. 6

Description	Part No.	Stock No.	Outer Jacket Material	Back End Threads	Front End Threads
60 Degree with 5" (127 mm) Radius	<b>66J-60</b>	1660-1826	Metal	I.D. 7/16"-20 UNF-2B	I.D. M12 x 1.5 6H O.D. M17 x 2.0-6G

# Conductor Tubes – Air-Cooled

## VELOCITY2 Mini-MIG

Description	Part No.	Stock No.	Outer Jacket Material	Back End Threads
60 Degree with 2-1/4" (57 mm) Radius	VCTS35-60-60	1600-1106	Neoprene Rubber	O.D. M12 x 1.5-6g

## VELOCITY2 Classic No. 1

Description	Part No.	Stock No.	Outer Jacket Material	Back End Threads
60 Degree with 2-1/4" (57mm) Radius	VA61-60	1010-1105	Neoprene Rubber	O.D. M12 x 1.5-6g

## VELOCITY2 Classic No. 2 with machined copper threads

Description	Part No.	Stock No.	Outer Jacket Material	Back End Threads
60 Degree with 3" (76.2 mm) Radius	VCTLS62-60	1620-1375	Metal with High Temperature Silicon Rubber	I.D. 3/8"-24 UNF-2B I.D.
45 Degree with 3" (76.2 mm) Radius	VCTLS62-45	1620-1376	Metal with High Temperature Silicon Rubber	I.D. 3/8"-24 UNF-2B I.D.

## VELOCITY2 Classic No. 3 with machined copper threads

Description	Part No.	Stock No.	Outer Jacket Material	Back End Threads
60 Degree with 3" (76.2 mm) Radius	VCTLS63-60	1630-1229	Metal with High Temperature Silicon Rubber	I.D. 3/8"-24 UNF-2B I.D.
45 Degree with 3" (76.2 mm) Radius	VCTLS63-45	1630-1230	Metal with High Temperature Silicon Rubber	I.D. 3/8"-24 UNF-2B I.D.

## VELOCITY2 Classic No. 4 with machined copper threads

Description	Part No.	Stock No.	Outer Jacket Material	Back End Threads
60 Degree with 3" (76.2 mm) Radius	VCTLS64-60	1640-1400	Metal with High Temperature Silicon Rubber	I.D. 3/8"-24 UNF-2B I.D.
45 Degree with 3" (76.2 mm) Radius	VCTLS64-45	1640-1401	Metal with High Temperature Silicon Rubber	I.D. 3/8"-24 UNF-2B I.D.

## VELOCITY2 Classic No. 5 with machined copper threads

Description	Part No.	Stock No.	Outer Jacket Material	Back End Threads
60 Degree with 5" (127 mm) Radius	VCTLS66-60	1660-1251	Metal with High Temperature Silicon Rubber	I.D. 7/16"-20 UNF-2B I.D.
45 Degree with 5" (127 mm) Radius	VCTLS66-45	1660-1252	Metal with High Temperature Silicon Rubber	I.D. 7/16"-20 UNF-2B I.D.

## VELOCITY2 Classic No. 2 with machined stainless steel sleeve

Description	Part No.	Stock No.	Outer Jacket Material	Back End Threads
60 Degree with 3" (76.2 mm) Radius	VCTL62-60SS	1620-1377	Metal	I.D. 3/8"-24 UNF-2B I.D.
45 Degree with 3" (76.2 mm) Radius	VCTL62-45SS	1620-1378	Metal	I.D. 3/8"-24 UNF-2B I.D.

## VELOCITY2 Classic No. 3 with machined stainless steel sleeve

Description	Part No.	Stock No.	Outer Jacket Material	Back End Threads
60 Degree with 3" (76.2 mm) Radius	VCTL63-60SS	1630-1231	Metal	I.D. 3/8"-24 UNF-2B I.D.
45 Degree with 3" (76.2 mm) Radius	VCTL63-45	1630-1232	Metal	I.D. 3/8"-24 UNF-2B I.D.

## VELOCITY2 Classic No. 4 with machined stainless steel sleeve

Description	Part No.	Stock No.	Outer Jacket Material	Back End Threads
60 Degree with 3" (76.2 mm) Radius	VCTL64-60SS	1640-1406	Metal	I.D. 3/8"-24 UNF-2B I.D.
45 Degree with 3" (76.2 mm) Radius	VCTL64-45SS	1640-1407	Metal	I.D. 3/8"-24 UNF-2B I.D.

## VELOCITY2 Classic No. 5 with machined stainless steel sleeve

Description	Part No.	Stock No.	Outer Jacket Material	Back End Threads
60 Degree with 5" (127 mm) Radius	VCTL66-60SS	1660-1253	Metal	I.D. 7/16"-20 UNF-2B I.D.
45 Degree with 5" (127 mm) Radius	VCTL66-45SS	1660-1254	Metal	I.D. 7/16"-20 UNF-2B I.D.

# Conductor Tubes – Air-Cooled

## Spray Master® 250

Description	Part No.	Stock No.	Outer Jacket Material	Front End Threads
60 Degree with 2" (50.5 mm) Radius	<b>MS63-60S</b>	1630-1196	Metal	I.D. M11 x 1.5-6H
60 Degree with 3" (76.2 mm) Radius	<b>MS63-60</b>	1630-1189	Metal	I.D. M11 x 1.5-6H
60 Degree with 2" (50.5 mm) Radius	<b>MS62A-60</b>	1620-1340	Metal	I.D. 3/8" 24 UNF-2B

## Spray Master 350

Description	Part No.	Stock No.	Outer Jacket Material	Front End Threads
60 Degree with 3" (76.2 mm) Radius	<b>MS63-60</b>	1630-1189	Metal	I.D. M11 x 1.5-6H
45 Degree with 3" (76.2 mm) Radius	<b>MS63-45</b>	1630-1188	Metal	I.D. M11 x 1.5-6H
180 Degree, Straight	<b>MS63-180</b>	1630-1187	Metal	I.D. M11 x 1.5-6H

## Spray Master 450

Description	Part No.	Stock No.	Outer Jacket Material	Front End Threads
Heavy Duty 60 Degree with 3" (76.2 mm) Radius	<b>MS64H-60</b>	1640-1319	Metal	I.D. 3/8"-24 UNF-2B O.D. 9/16"-18UNF-2A
Heavy Duty 45 Degree with 3" (76.2 mm) Radius	<b>MS64H-45</b>	1640-1318	Metal	I.D. 3/8"-24 UNF-2B O.D. 9/16"-18UNF-2A
Long Reach 60 Degree with 3" (76.2 mm) Radius	<b>MS64H-60LM *</b>	1640-1317	Metal	I.D. 3/8"-24 UNF-2B O.D. 9/16"-18UNF-2A
Long Reach 45 Degree with 3" (76.2 mm) Radius	<b>MS64H-45LM *</b>	1640-1323	Metal	I.D. 3/8"-24 UNF-2B O.D. 9/16"-18UNF-2A
60 Degree with 3" (76.2 mm) Radius	<b>MS64-60S **</b>	1640-1342	Metal	I.D. M12 x 1.5-6H

\* Long reach conductor tube – 2" longer than standard

\*\* Comes standard on all 450 Amp Spray Master MIG guns with the suffix "EL"

## VELOCITY2 Spray Master 250, 350, 450 with machined copper threads

Description	Part No.	Stock No.	Outer Jacket Material
Heavy Duty 60 Degree with 3" (76.2 mm) Radius	<b>SMVCTLS-60</b>	1240-1377	Metal
Heavy Duty 45 Degree with 3" (76.2mm) Radius	<b>SMVCTLS-45</b>	1240-1376	Metal
Long Reach, Heavy Duty 60 Degree with 3" (76.2 mm) Radius	<b>SMVCTLS-60LM</b>	1640-1403	Metal
Long Reach, Heavy Duty 45 Degree with 3" (76.2 mm) Radius	<b>SMVCTLS-45LM</b>	1640-1402	Metal

## VELOCITY2 Spray Master 250, 350, 450 with stainless steel sleeve

Description	Part No.	Stock No.	Outer Jacket Material
Heavy Duty 60 Degree with 3" (76.2 mm) Radius	<b>SMVCT-60SS</b>	1240-1378	Metal
Heavy Duty 45 Degree with 3" (76.2 mm) Radius	<b>SMVCT-45SS</b>	1240-1379	Metal
Long Reach, Heavy Duty 60 Degree with 3" (76.2 mm) Radius	<b>SMVCT-60LMSS</b>	1640-1404	Metal
Long Reach, Heavy Duty 45 Degree with 3" (76.2 mm) Radius	<b>SMVCT-45LMSS</b>	1640-1405	Metal

## Compact Eliminator® 250

Description	Part No.	Stock No.	Outer Jacket Material	Front End Threads
Eliminator 60 Degree with 3" (76.2 mm) Radius	<b>EL63J-60</b>	1630-1137	Metal	I.D. M11 x 1.5-6H
Eliminator 45 Degree with 3" (76.2 mm) Radius	<b>EL63J-45</b>	1630-1136	Metal	I.D. M11 x 1.5-6H

## Compact Eliminator 450

Description	Part No.	Stock No.	Outer Jacket Material	Front End Threads
Eliminator 60 Degree with 3" (76.2 mm) Radius	<b>EL64J-60</b>	1640-1137	Metal	I.D. M12 x 1.5-6H
Eliminator 45 Degree with 3" (76.2 mm) Radius	<b>EL64J-45</b>	1640-1136	Metal	I.D. M12 x 1.5-6H
60 Degree with 2-1/4" (57 mm) Radius	<b>EL64-60</b>	1640-1110	Fiber	I.D. M12 x 1.5-6H

# Conductor Tubes – Air-Cooled

## Supra® XT – SEHD

Description	Part No.	Stock No.	Outer Jacket Material	Back End Threads	Front End Threads
60 Degree with 3" (76.2 mm) Radius	<b>SE64J-60</b>	1640-1347	Metal	O.D. 9/16"-18 UNF-2A	I.D. 3/8"-24 UNF-2B O.D. 9/16"-18UNF-2A
45 Degree with 3" (76.2 mm) Radius	<b>SE64J-45</b>	1640-1346	Metal	O.D. 9/16"-18 UNF-2A	I.D. 3/8"-24 UNF-2B O.D. 9/16"-18UNF-2A

## VELOCITY2 Supra® – SEHD

Description	Part No.	Stock No.	Outer Jacket Material	Back End Threads	Front End Threads
60 Degree with 3" (76.2 mm) Radius	<b>SEVCT64-60</b>	1640-1160	Metal	O.D. 9/16"-18 UNF-2A	I.D. 3/8"-24 UNF-2B O.D. 9/16"-18UNF-2A
45 Degree with 3" (76.2 mm) Radius	<b>SEVCT64-45</b>	1640-1161	Metal	O.D. 9/16"-18 UNF-2A	I.D. 3/8"-24 UNF-2B O.D. 9/16"-18UNF-2A
Long Reach, Heavy Duty 60 Degree with 3" (76.2mm) Radius	<b>SEVCT64-60LM</b>	1640-1162	Metal	O.D. 9/16-18 UNF-2A	I.D. 3/8"-24 UNF-2B
Long Reach, Heavy Duty 45 Degree with 3" (76.2mm) Radius	<b>SVECT64-45LM</b>	1640-1163	Metal	O.D. 9/16-18 UNF-2A	I.D. 3/8"-24 UNF-2B

## PulseMaster® 350 & 450

Description	Part No.	Stock No.	Outer Jacket Material	Back End Threads	Front End Threads
Eliminator 45 Degree with 3" (76.2 mm) Radius	<b>PMA64EL-45</b>	1642-1130	Metal	--	I.D. M12 x 1.5-6H

## SSG Spool

Description	Part No.	Stock No.	Outer Jacket Material	Back End Threads	Front End Threads
Eliminator 180 Degree, Straight	<b>PMP64EL-180</b>	1642-1140	Metal	--	I.D. M12 x 1.5-6H
Eliminator 30 Degree with 3" (76.2 mm) Radius	<b>PMP64EL-30</b>	1642-1141	Metal	--	I.D. M12 x 1.5-6H

## PMP Push/Pull

Description	Part No.	Stock No.	Outer Jacket Material	Back End Threads	Front End Threads
Eliminator 180 Degree, Straight	<b>PMP64EL-180</b>	1642-1140	Metal	--	I.D. M12 x 1.5-6H
Eliminator 30 Degree with 3" (76.2 mm) Radius	<b>PMP64EL-30</b>	1642-1141	Metal	--	I.D. M12 x 1.5-6H

## Smoke Master® 250

Description	Part No.	Stock No.	Outer Jacket Material	Back End Threads	Front End Threads
60 Degree with 1.5" (38 mm) Radius	<b>S62-60</b>	2020-2006	Powder Coat	O.D. M11 x 1.5-6G	I.D. M11 x 1.5-6H
45 Degree with 1.5" (38 mm) Radius	<b>S62-45</b>	2020-2011	Powder Coat	O.D. M11 x 1.5-6G	I.D. M11 x 1.5-6H

## Smoke Master 450

Description	Part No.	Stock No.	Outer Jacket Material	Back End Threads	Front End Threads
60 Degree with 3" (76.2 mm) Radius	<b>S64-60</b>	1046-2258	Teflon	I.D. M12 x 1.5-6G	I.D. M11 x 1.5-6H

## Flux Cored 350

Description	Part No.	Stock No.	Outer Jacket Material	Back End Threads	Front End Threads
60 Degree with 3.1" (79 mm) Radius	<b>64FC-60</b>	1641-1127	Thermo Flex	--	I.D. 5/16"-18 UNC-2B O.D. 1/2"-13 UNC-2A

## Flux Cored 450

Description	Part No.	Stock No.	Outer Jacket Material	Back End Threads	Front End Threads
60 Degree with 3.6" (92 mm) Radius	<b>66FC-60</b>	1661-1127	Thermo Flex	--	I.D. 3/8"-16 UNC-2B O.D. 5/8"-11 UNC-2A

### Conductor Tubes – Water-Cooled

#### Fusion Pro 450

Description	Part No.	Stock No.	Outer Jacket Material	Back End Threads	Front End Threads
60 Degree with 3" (76.2 mm) Radius	<b>FPW64-60</b>	1644-1127	High Temp Rubber	--	I.D. M11 x 1

#### PulseMaster® 400 & 500

Description	Part No.	Stock No.	Outer Jacket Material	Back End Threads	Front End Threads
45 Degree with 4" (101.6 mm) Radius	<b>PMW64-45</b>	1644-2925	Metal	--	I.D. 3/8"-16 UNC-2B

#### Standard 600

Description	Part No.	Stock No.	Outer Jacket Material	Back End Threads	Front End Threads
60 Degree with 3" (76.2 mm) Radius	<b>WCS66-60</b>	1664-1106	Neoprene	--	I.D. 7/16"-20 UNF-2B

### Conductor Tube - Rigid Extensions

For Traditional Style Guns



#### No. 3 & 4 Extensions

Description	Part No.	Stock No.
Extension 4" (102 mm) Straight 180°	<b>64A-4EX</b>	1640-1301
Extension 6" (152 mm) Straight 180°	<b>64A-6EX</b>	1640-1302
Extension 8" (203 mm) Straight 180°	<b>64A-8EX</b>	1640-1303
Extension 45°	<b>64EX-45</b>	1640-1311
Extension 60°	<b>64EX-60</b>	1640-1312

#### No. 5 Extensions

Description	Part No.	Stock No.
Extension 4" (102 mm) Straight 180°	<b>65-4EX</b>	1650-1301
Extension 6" (152 mm) Straight 180°	<b>65-6EX</b>	1650-1302
Extension 8" (203 mm) Straight 180°	<b>65-8EX</b>	1650-1303
Extension 60°	<b>65EX-60</b>	1650-1312

CONSUMABLES



## The Only Conduit Liner You Will Ever Need!

- Reduce inventory carrying costs with MIG Gun conduit liners
- Save shelf space by stocking only one Tweco® Universal Conduit Liner for each wire size
- Reduces complexity and simplifies product offering by reducing the number of SKUs
- Welding shops can improve productivity by consolidating conduit liners to one Tweco brand

### Steps to Pick the Correct Conduit Liner and Adapter.

#### Refer to the Adapter Compatibility Chart on opposite page at right:

1. What wire size are you using?
2. Pick the related Tweco liner, 15 ft (4.6 m) or 25 ft (7.6 m).
3. What MIG gun brand are you using?  
For Tweco, Lincoln® & Profax® brands, the Tweco Universal Conduit liner has the adapter already attached (*skip to step 7*).
4. For other brands, pick the related adapter.
5. Unscrew the adapter from the Tweco Universal Conduit liner.
6. Then screw-on the selected adapter, and hand tighten it.
7. Use as any standard liner. For assembly, follow instructions on the inside panel of the Tweco Universal Conduit box.

# Universal Conduit Liners

## Adapter

## Tweco® Universal Conduit Liner



Patent Pending

Replace Multiple Conduit Liner Brands



With One Tweco  
Universal Brand



### Tweco Universal Conduit Liner











(comes fitted with Tweco Adapter)

### Adapters for major MIG Gun Brands

CONSUMABLES

## Tweco Universal Conduit Liners

### Adapter Compatibility Chart

Wire Size	Tweco Universal Conduit Liner*	Length	Adapter Part No. /Stock No.									
			Tweco, Lincoln®, Profax®	Miller® Migmatic®, Hobart®	Bernard®	Miller Roughneck®	Tregaskiss®					
.030" – .035" (0.8 – 0.9 mm)	42-3035-15	15 ft (4.6 m)										
	42-3035-25	25 ft (7.6 m)										
.040" – .045" (1.0 – 1.2 mm)	42-4045-15	15 ft (4.6 m)										
	42-4045-25	25 ft (7.6 m)										
.035" – .045" (0.9 – 1.2 mm)	44-3545-15	15 ft (4.6 m)										
	44-3545-25	25 ft (7.6 m)										
1/16" (1.6 mm)	44-116-15	15 ft (4.6 m)						1440-1238 (1 each)	1440-1238 (1 each)	1440-1236 (1 each)	1440-1248 (1 each)	1440-1219 (1 each)
	44-116-25	25 ft (7.6 m)						1440-1240 (25 each)	1440-1245 (25 each)	1440-1242 (25 each)	1440-1249 (25 each)	1440-1220 (25 each)
5/64" (2.0 mm)	44-564-15	15 ft (4.6 m)										
	44-564-25	25 ft (7.6 m)										
3/32" (2.4 mm)	44-332-15	15 ft (4.6 m)	1440-1239 (1 each)	1440-1246 (1 each)	1440-1243 (1 each)	1440-1217 (1 each)	1440-1221 (1 each)					
	44-332-25	25 ft (7.6 m)										

\*Tweco Universal Conduit Liner supplied standard with Tweco adapter fitted. Tweco Conduits for Lincoln and Profax do not require adapters. Adapter 44U-ASORT comes with one adapter each of 44U-MIL-M, 44U-BER, 44U-MIL-C, and 44U-TRE



## Conduit Liners - For Use With Steel Welding Wires

### 160 Amp - Steel Wound

Wire Size	Length	Part No.	Stock No.
.023" (0.6 mm)	15 ft (4.6 m)	<b>23-40-15</b>	1400-1123
.030" - .035" (0.8 - 0.9 mm)	15 ft (4.6 m)	<b>35-40-15</b>	1400-1133
.030" - .035" (0.8 - 0.9 mm)	20 ft (6.1 m)	<b>35-40-20</b>	1400-1134
.040" - .045" (1.0 - 1.2 mm)	15 ft (4.6 m)	<b>45-40-15</b>	1400-1143

### 180-250 Amp - Steel Wound

Wire Size	Length	Part No.	Stock No.
.030" - .035" (0.8 - 0.9 mm)	15 ft (4.6 m)	<b>42-3035-15</b>	1420-1113
.030" - .035" (0.8 - 0.9 mm)	25 ft (7.6 m)	<b>42-3035-25</b>	1420-1115
.040" - .045" (1.0 - 1.2 mm)	15 ft (4.6 m)	<b>42-4045-15</b>	1420-1123
.040" - .045" (1.0 - 1.2 mm)	25 ft (7.6 m)	<b>42-4045-25</b>	1420-1125
.052" - 1/16" (1.3 - 1.6 mm)	15 ft (4.6 m)	<b>42-116-15</b>	1420-1124

### 300-450 Amp - Steel Wound

Wire Size	Length	Part No.	Stock No.
.035" - .045" (0.9 - 1.2 mm)	15 ft (4.6 m)	<b>44-3545-15</b>	1440-1103
.035" - .045" (0.9 - 1.2 mm)	25 ft (7.6 m)	<b>44-3545-25</b>	1440-1105
.052" - 1/16" (1.3 - 1.6 mm)	15 ft (4.6 m)	<b>44-116-15</b>	1440-1113
.052" - 1/16" (1.3 - 1.6 mm)	25 ft (7.6 m)	<b>44-116-25</b>	1440-1115
5/64" (2.0 mm)	15 ft (4.6 m)	<b>44-564-15</b>	1440-1123
5/64" (2.0 mm)	25 ft (7.6 m)	<b>44-564-25</b>	1440-1125
3/32" (2.4 mm)	15 ft (4.6 m)	<b>44-332-15</b>	1440-1127

### 500-650 Amp - Steel Wound

Wire Size	Length	Part No.	Stock No.
.035" - .045" (0.9 - 1.2 mm)	15 ft (4.6 m)	<b>45-3545-15</b>	1450-1103
.052" - 1/16" (1.3 - 1.6 mm)	15 ft (4.6 m)	<b>45-116-15</b>	1450-1113
.052" - 1/16" (1.3 - 1.6 mm)	25 ft (7.6 m)	<b>45-116-25</b>	1450-1115
5/64" (2.0 mm)	15 ft (4.6 m)	<b>45-564-15</b>	1450-1123
5/64" (2.0 mm)	25 ft (7.6 m)	<b>45-564-25</b>	1450-1125
3/32" (2.4 mm)	15 ft (4.6 m)	<b>45H-332-15</b>	1450-1133
7/64" (2.8 mm)	15 ft (4.6 m)	<b>45H-764-15</b>	1450-1143
1/8" (3.2 mm)	15 ft (4.6 m)	<b>45-18-15</b>	1450-1153



Tweco Universal Conduit Liner

CONSUMABLES

## Conduit Liners - For Use With Aluminum Welding Wires

### 160 Amp - Teflon

Wire Size	Length	Part No.	Stock No.
.030" - .035" (0.8 - 0.9 mm)	10 ft (3 m)	<b>35TF-40-10</b>	1400-1031

### 180-250 Amp - Teflon

Wire Size	Length	Part No.	Stock No.
.030" - 3/64" (0.8 - 1.2 mm)	15 ft (4.6 m)	<b>42N-3545-15</b>	1420-1003

### 300-450 Amp - Nylon

Wire Size	Length	Part No.	Stock No.
.030" - 3/64" (0.8 - 1.2 mm)	15 ft (4.6 m)	<b>44N-3545-15</b>	1440-1003
1/16" (1.6 mm)	15 ft (4.6 m)	<b>44N-116-15</b>	1440-1012

### 500-650 Amp - Wire Nylon Wrap

Wire Size	Length	Part No.	Stock No.
1/16" (1.6 mm)	15 ft (4.6 m)	<b>45N-116-15</b>	1450-1013

## Conduit Liners – For PulseMaster® MIG Guns Using Aluminum/Steel Welding Wires

### Steel Wrapped / Teflon

Wire Size	Length	Part No.	Stock No.
.035" - .045" (0.9 - 1.2 mm)	12 ft (4 m)	<b>44PSTF-3545-12</b>	1441-1138
.035" - .045" (0.9 - 1.2 mm)	15 ft (4.6 m)	<b>44PSTF-3545-15</b>	1441-1137
.052" - 1/16" (1.3 - 1.6 mm)	12 ft (4 m)	<b>44PSTF-116-12</b>	1441-1136
.052" - 1/16" (1.3 - 1.6 mm)	15 ft (4.6 m)	<b>44PSTF-116-15</b>	1441-1135

### Bronze Jump Liner

Wire Size	Length	Part No.	Stock No.
Max .045" (1.2 mm)	10-1/4" (260 mm)	<b>44JT-3545</b>	1644-1088
Max .062" (1.6 mm)	10-1/4" (260 mm)	<b>44JT-116</b>	1644-1086

CONSUMABLES

## Conduit Liners – For PullMaster® MIG Guns Using Aluminum/Steel Welding Wires

### Steel Wrapped / Teflon

Wire Size	Length	Part No.	Stock No.
3/64" - 1/16" (1.2 - 1.6 mm)	33 ft (10 m)	<b>PMP44-116-33</b>	1441-1125

### Bronze Jump Liner

Wire Size	Length	Part No.	Stock No.
1/16" (1.6 mm)	--	<b>PMP-44-116</b>	1644-1097

### Teflon Jump Liner for Flex Tube

Wire Size	Description	Part No.	Stock No.
1/16" (1.6 mm)	Flex Tube	<b>PMP-44FLX-116</b>	1644-1095
1/16" (1.6 mm)	Rigid Tube	<b>PMP-44PTF-116</b>	1644-1096

## Conduit Liners – For R44 & R45 Series Using Steel Welding Wires

Tapered lead in angle on the machined conduit stop allows for the transition of the welding wire into the MIG gun smoother  
Tin/Zinc plated wire

### 300-450 Amp - Steel Wound

*(Including No. 5 Euro-Kwik Series)*

Wire Size	Length	Part No.	Stock No.
.035" - .045" (0.9 - 1.2 mm)	8 ft (2.4 m)	<b>R44-3545-8</b>	1440-1225
.052" - 1/16" (1.3 - 1.6 mm)	15 ft (4.6 m)	<b>R44-116-15</b>	1440-1231

### 500-650 Amp - Steel Wound

Wire Size	Length	Part No.	Stock No.
.035" - .045" (0.9 - 1.2 mm)	4 ft (1.2 m)	<b>R45-3545-4</b>	1450-1024
.035" - .045" (0.9 - 1.2 mm)	8 ft (2.4 m)	<b>R45-3545-8</b>	1450-1025
.052" - 1/16" (1.3 - 1.6 mm)	8 ft (2.4 m)	<b>R45-116-8</b>	1450-1030
.052" - 1/16" (1.3 - 1.6 mm)	15 ft (4.6 m)	<b>R45-116-15</b>	1450-1031

## Conduit Liners – For R45 Series Using Aluminum Welding Wires

### 500-650 Amp - Wire Nylon Wrap

Wire Size	Length	Part No.	Stock No.
1/16" (1.6 mm)	15 ft (4.6 m)	<b>R45WN-116-15</b>	1450-1045

## Features & Benefits

Tweco® offers a broad range of Manual Welding Products and Accessories to meet the needs of every welder.

- Electrode Holders
- Ground Clamps
- Switchable Magnetic Products
- Cable Connectors
- Cable Lugs
- Splicers
- Terminals
- Accessories

## Electrode Holders

Tweco Electrode Holders are designed to mechanically hold a welding electrode in position. The efficient 6-position Jaw pattern allows you to get into the correct position your application requires. Ergonomic handle has operator appeal with reversible top & bottom insulators that are easy to replace. Rugged and reliable design made from heavy duty copper alloy and is fully insulated.

# Manual Welding Products & Accessories

# EASY FIND GUIDE – Electrode Holder Selection Guide

Electrode Holders	Style	Amperage Range						Recommended Model	Page	
		200	250	300	350	400	450			500
High Profile		■							TwecoTong A-532	133
		■							TwecoTong T-532	134
		■	■						TwecoTong A-316	133
		■	■						TwecoTong T-316	134
		■	■	■					TwecoTong A-732	133
		■	■	■	■				TwecoTong T-732	134
	TITE		■	■	■	■	■		Tweco-Tite 4TT	134
Low Profile		■	■	■	■			TwecoTong A-14	133	
		■	■	■	■	■		TwecoTong A-14-HD	133	
		■	■	■	■	■	■	TwecoTong A-38-HD	133	

TwecoTong®



Tweco-Tite™

MANUAL PRODUCTS

Model	Output			Application				Page
	Current (Amps)	Electrode Size in (mm)	Cable Connection	Light Duty Fab	Medium Duty Fab	Heavy Duty Fab	Extra Heavy Duty Fab	
TwecoTong A-532	200	5/32" (4.0 mm)	2/0 (67.4 mm)	■				133
TwecoTong T-532	200	5/32" (4.0 mm)	2/0 (67.4 mm)	■				134
TwecoTong A-316	250	3/16" (4.8 mm)	2/0 (67.4 mm)	■	■			133
TwecoTong T-316	250	3/16" (4.8 mm)	2/0 (67.4 mm)	■	■			134
TwecoTong A-732	300	7/32" (5.6 mm)	2/0 (67.4 mm)		■	■		133
TwecoTong T-732	300	7/32" (5.6 mm)	2/0 (67.4 mm)		■	■		134
TwecoTong A-14	350	1/4" (6.4 mm)	2/0 (67.4 mm)		■	■		133
TwecoTong A-14-HD	400	1/4" (6.4 mm)	4/0 (107 mm)			■	■	133
TwecoTong A-38-HD	500	3/8" (9.5 mm)	4/0 (107 mm)				■	133
Tweco-Tite 4TT	400	1/4" (6.4 mm)	3/0 (85 mm)	■	■	■		134

# Manual Welding Products

Electrode Holders

## Electrode Holders – TwecoTong® A-Series



### FEATURES

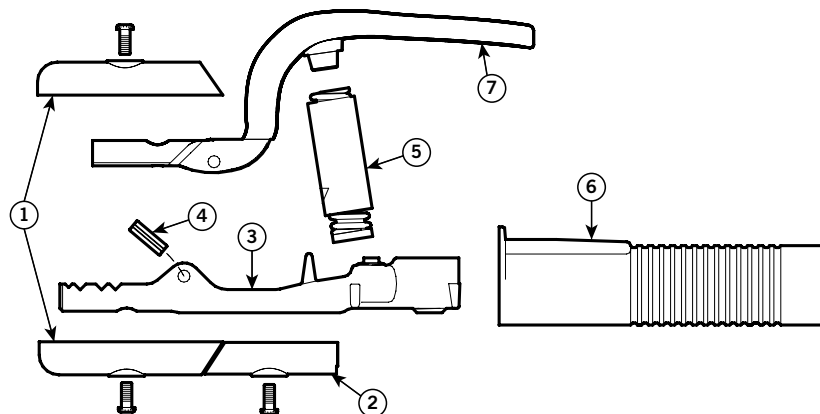
- TwecoTong Electrode Holders are designed to mechanically hold a welding electrode in position
- Reversible Top & Bottom Insulators are easy to replace
- Efficient 6-Position Jaw Patterns
- Ball Point Cable Connections
- Fully Insulated & Protected Springs
- Heavy Duty Copper Alloy

### TwecoTong A-Series Electrode Holders

Amperage	Body Alloy	Electrode	Cable	Length	Part No.	Stock No.
200	Copper Alloy	5/32" (4.0 mm)	2/0 (67.4 mm)	8-1/2" (216 mm)	<b>A-532*</b>	9110-1101
200	Copper Alloy	5/32" (4.0 mm)	2/0 (67.4 mm)	8-1/2" (216 mm)	<b>A532-MC**</b>	9110-1109
250	Copper Alloy	3/16" (4.8 mm)	2/0 (67.4 mm)	9-1/4" (235 mm)	<b>A-316*</b>	9110-1102
250	Copper Alloy	3/16" (4.8 mm)	2/0 (67.4 mm)	9-1/4" (235 mm)	<b>A316-MC**</b>	9110-1110
300	Copper Alloy	7/32" (5.6 mm)	2/0 (67.4 mm)	10" (254 mm)	<b>A-732*</b>	9110-1103
300	Copper Alloy	7/32" (5.6 mm)	2/0 (67.4 mm)	10" (254 mm)	<b>A732-MC**</b>	9110-1111
350	Copper Alloy	1/4" (6.4 mm)	4/0 (107 mm)	11" (279 mm)	<b>A-14</b>	9110-1104
400	Copper Alloy	1/4" (6.4 mm)	4/0 (107 mm)	12" (305 mm)	<b>A-14-HD</b>	9110-1105
500	Copper Alloy	3/8" (9.5 mm)	4/0 (107 mm)	13-1/4" (336 mm)	<b>A-38-HD</b>	9110-1106

\* Clamshell packaging. Sold individually or master packed in quantities of 12 each.

\*\* Sold in Master Pack Boxed Quantities of 24.



### TwecoTong A-Series Replacement Parts

#	Description	A-532 Part No Stock No.	A-316 Part No Stock No.	A-732 Part No Stock No.	A-14 Part No Stock No.	A-14-HD Part No Stock No.	A-38-HD Part No Stock No.
1	Tip Insulation	<b>A-532-1P</b> 9910-2102	<b>A-532-1P</b> 9910-2102	<b>A-732-1P</b> 9910-2302	<b>A-732-1P</b> 9910-2302	<b>A-732-1P</b> 9910-2302	<b>A-38-HD-1P</b> 9910-2602
2	Body Insulation	<b>A-532-3</b> 9910-2103	<b>A-532-3</b> 9910-2103	<b>A-532-3</b> 9910-2103	<b>A-14-3</b> 9910-2403	<b>A-14-3</b> 9910-2403	<b>A-38-HD-3</b> 9910-2603
3	Lower Body Tong w/o Insulation	<b>A-316-4R</b> 9910-2204	<b>A-316-4R</b> 9910-2204	<b>A-732-4</b> 9910-2304	<b>A-14-4</b> 9910-2404	<b>A-14-HD-4</b> 9910-2504	<b>A-38-HD-4</b> 9910-2604
4	Hinge Pin	<b>A-532-11</b> 9910-2111	<b>A-532-11</b> 9910-2111	<b>A-532-11</b> 9910-2111	<b>A-532-11</b> 9910-2111	<b>A-532-11</b> 9910-2111	<b>FGC-200-5</b> 9910-2610
5	Spring with Insulation	<b>A-532-6</b> 9910-2106	<b>A-316-6</b> 9910-2206	<b>A-316-6</b> 9910-2206	N/A	N/A	N/A
6	Molded Handle	<b>A-532-7</b> 9910-2107	<b>A-316-7</b> 9910-2207	<b>A-732-7</b> 9910-2307	<b>A-14-7</b> 9910-2407	<b>A-14-HD-7</b> 9910-2507	<b>A-38-HD-7</b> 9910-2607
NS	Handle Screws	<b>AL-300-12</b> 9910-2712	<b>AL-300-12</b> 9910-2712	<b>AL-300-12</b> 9910-2712	<b>AL-300-12</b> 9910-2712	<b>AL-300-12</b> 9910-2712	<b>AL-300-12</b> 9910-2712
NS	Cable Connection Screw	<b>A-532-24</b> 9910-2124	<b>A-532-24</b> 9910-2124	<b>A-532-24</b> 9910-2124	<b>A-14-24</b> 9910-2424	<b>A-14-24</b> 9910-2424	<b>A-14-24</b> 9910-2424

# Manual Welding Products

## Electrode Holders – TwecoTong® T-Series

Electrode Holders



T-532

T-316

T-732

### FEATURES

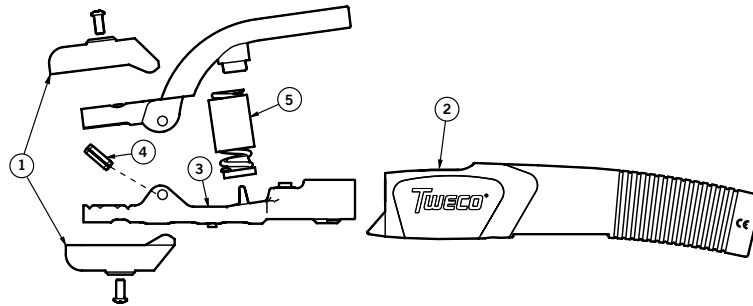
- **Ergonomic Handle** has 12-degree angle
- **Efficient 6-Position Jaw Patterns** to hold the welding electrode in position
- **Double Ball Point Cable Connections** accept up to 2/0 welding cable
- **Rugged & Reliable Design** with operator appeal
- **Designed to meet IEC 60974-11**
- **Fully Insulated & Protected Springs**

### TwecoTong T-Series Electrode Holders

Amperage	Body Alloy	Electrode	Cable	Length	Part No.	Stock No.
200	Copper Alloy	5/32" (4.0 mm)	2/0 (67.4 mm)	9-1/2" (241 mm)	<b>T532-MC*</b>	9110-1122
200	Copper Alloy	5/32" (4.0 mm)	2/0 (67.4 mm)	9-1/2" (241 mm)	<b>T532**</b>	9110-1131
250	Copper Alloy	3/16" (4.8 mm)	2/0 (67.4 mm)	9-1/2" (241 mm)	<b>T316-MC*</b>	9110-1123
250	Copper Alloy	3/16" (4.8 mm)	2/0 (67.4 mm)	9-1/2" (241 mm)	<b>T316**</b>	9110-1132
300	Copper Alloy	7/32" (5.6 mm)	2/0 (67.4 mm)	10" (254 mm)	<b>T732-MC*</b>	9110-1124
300	Copper Alloy	7/32" (5.6 mm)	2/0 (67.4 mm)	10" (254 mm)	<b>T732**</b>	9110-1133

\* Sold in Master Pack Boxed Quantities of 24.

\*\* Sold Individually



### TwecoTong T-Series Replacement Parts

#	Description	T532 Part No./Stock No.	T-316 Part No./Stock No.	T-732 Part No./Stock No.
1	Tip Insulation	<b>T-532-1</b> / 9910-2104	<b>T-532-1</b> / 9910-2104	<b>T-732-1</b> / 9910-2303
2	Molded Handle	<b>T-532-7</b> / 9910-2108	<b>T-316-7</b> / 9910-2208	<b>T-732-7</b> / 9910-2308
3	Lower Body Tong w/o Insulation	<b>A-316-4R</b> / 9910-2204	<b>A-316-4R</b> / 9910-2204	<b>A-732-4</b> / 9910-2304
4	Hinge Pin	<b>A-532-11</b> / 9910-2111	<b>A-532-11</b> / 9910-2111	<b>A-532-11</b> / 9910-2111
5	Spring with Insulation	<b>A-532-6</b> / 9910-2106	<b>A-316-6</b> / 9910-2206	<b>A-316-6</b> / 9910-2206
NS	Handle Screws	<b>AL-300-12</b> / 9910-2712	<b>AL-300-12</b> / 9910-2712	<b>AL-300-12</b> / 9910-2712
NS	Cable Connection Screw	<b>A-532-24</b> / 9910-2124	<b>A-532-24</b> / 9910-2124	<b>A-532-24</b> / 9910-2124

MANUAL PRODUCTS

## Electrode Holders – TwecoTite



4TT

### FEATURES

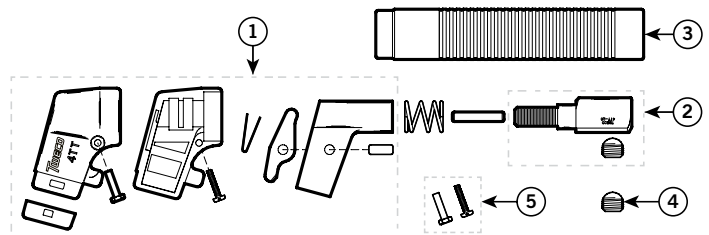
- **Tweco-Tite Electrode Holders with Fully Insulated Body** designed for effortless installation of electrodes
- **45 Degree Angled Head** holds the welding electrode in place
- **Rugged & Reliable Design** with operator appeal

### 4TT Tweco-Tite Electrode Holder

Amperage	Electrode	Cable	Part No.	Stock No.
400	1/4" (6.4 mm)	3/0 (85 mm)	<b>4TT</b>	9120-1000

### 4TT Tweco-Tite Replacement Parts

#	Description	Part No.	Stock No.
1	Head Assy - Complete (renewable)	<b>4TT-1</b>	9911-2001
2	Connector Body w/Ball-Point Screw	<b>4TT-20</b>	9911-2020
3	Handle Only	<b>4TT-30</b>	9911-2030
4	Ball-Point Screw	<b>A-532-24</b>	9910-2124
5	Binder Post & Screw - for Head Ins.	<b>122FM</b>	2020-2122



## Features & Benefits

### A Clamp for Every Need:

- Flat Jaw Copper Ground Clamp
- Steel Ground Clamp
- Copper Ground Clamp
- Switchable Magnetic Ground Clamp
- Rotary Ground Clamps

Tweco Ground Clamps are highly efficient devices for grounding weldments. Available in a variety of designs to meet the demands of your unique application. Made from high quality copper or steel for long lasting durability. They may also be used for other high amperage grounding applications.

Tweco Ground Clamps are designed with ample contact surface area providing cool, efficient operation. They can be quickly attached or moved from one rotation weldment or fixture to the other, saving on welding down time.

# Ground Clamps

# EASY FIND GUIDE – Ground Clamps Selection Guide

	Application	Amperage Range								Recommended Model	Page	
		200	300	400	500	600	700	800	1500			2000
Ground Clamps	Plate										FGC 200	138
											FGC 300	138
											FGC 500	138
											SGC 300	138
											SGC 500	138
	Pipe										GC 200	138
											GC 300	138
											GC 500	138
											SMGC 200	142
											SMGC 300	142
	Rotary										GCRG 140	139
											RG 140	139
											RG 230	139
											RG 240	139
											RG 440	139
											RG 640	139

**MANUAL PRODUCTS**

Model	Output				Process			Application				Page
	Current (Amps)	Jaw Opening	No. of Heads	Cable Connection	Plate	Pipe	Rotary	Light Duty Fab	Med. Duty Fab	Heavy Duty Fab	Extra Heavy Duty Fab	
FGC 200	200	2" (50.8 mm)	--	Ball-Point thru 1/0	■			■				138
FGC 300	300	3-1/2" (88.9 mm)	--	Ball-Point thru 3/0	■			■	■			138
FGC 500	500	3-3/4" (95.3 mm)	--	Ball-Point thru 4/0	■				■	■		138
SGC 300	300	2" (50.8 mm)	--	1/2" Stud	■			■	■			138
SGC 500	500	2" (50.8 mm)	--	1/2" Stud	■				■	■		138
GC 200	200	3" (76.2 mm)	--	Ball-Point thru 1/0		■		■				138
GC 300	300	4" (101.0 mm)	--	Ball-Point thru 3/0		■		■	■			138
GC 500	500	5-1/4" (133.0 mm)	--	Ball-Point thru 4/0		■			■	■		138
SMGC 200	200	--	--	Ball-Point thru 1/0		■		■				142
SMGC 300	300	--	--	Ball-Point thru 3/0		■		■	■			142
SMGC 600	600	--	--	Ball-Point thru 4/0		■				■		142
GCRG 140	400	--	1	1 thru 4/0			■		■	■		140
RG 140	400	--	1	1 thru 4/0			■		■	■		140
RG 230	600	--	1	2 thru 3/0			■			■		140
RG 240	800	--	1	2 thru 4/0			■			■	■	140
RG 440	1500	--	2	4 thru 4/0			■				■	140
RG 640	2000	--	3	6 thru 4/0			■				■	140

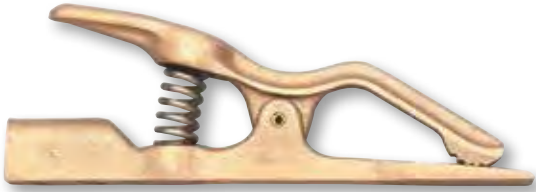


# Manual Welding Products

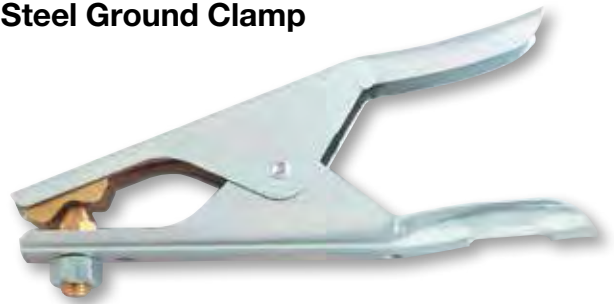
Ground Clamps

## Ground Clamps – Selection Options

### Flat Jaw Copper Ground Clamp



### Steel Ground Clamp



### Copper Ground Clamp



### Switchable Magnetic Ground Clamp



### Rotary Ground Clamps



# Ground Clamps – Steel & Copper

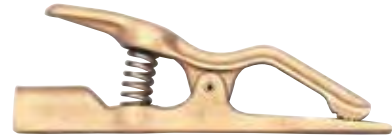
# Manual Welding Products

## Ground Clamps

Ideal for most Light to Medium Duty fabrication needs.

### Flat Jaw Copper Ground Clamps

Ideal for plate grounding.



Amperage	Jaw Opening	Cable	Length	Part No.	Stock No.
200	5/8" - Depth 2" (15.9 mm - 50.8 mm)	Ball-Point thru 1/0	5" (127 mm)	<b>FGC-200</b>	9205-1320
300	1" - Depth 3-1/2" (25.4 mm - 88.9 mm)	Ball-Point thru 3/0	7-14" (184 mm)	<b>FGC-300</b>	9205-1330
500	1-1/4" - Depth 3-3/4" (31.8 mm - 95.3 mm)	Ball-Point thru 4/0	9-1/4" (234 mm)	<b>FGC-500</b>	9205-1350

### Steel Ground Clamps

Ideal for plate grounding and lower amperage needs.



Amperage	Jaw Opening	Cable	Length	Part No.	Stock No.
300	2" - Depth 1-3/4" (50.8 mm - 44.4 mm)	1/2" Stud Connection	9" (228 mm)	<b>SGC-300</b>	9205-1230
500	2" - Depth 1-3/4" (50.8 mm - 44.4 mm)	1/2" Stud Connection	9" (228 mm)	<b>SGC-500</b>	9205-1250

### Steel Ground Clamp Replacement Parts

Description	Part No.	Stock No.
Cone Head Replacement Jaw - for SGC-300 and SGC-500	<b>SGC-500-4</b>	9920-2504

### Copper Ground Clamps

Ideal for pipe grounding.



Amperage	Jaw Opening	Cable	Length	Part No.	Stock No.
200	1" - Depth 3" (25.4 mm - 76.2 mm)	Ball-Point thru 1/0	6" (157 mm)	<b>GC-200</b>	9205-1120
300	1-1/2" - Depth 4" (38.1 mm - 101.0 mm)	Ball-Point thru 3/0	8-1/2" (216 mm)	<b>GC-300*</b>	9205-1130
300	1-1/2" - Depth 4" (38.1 mm - 101.0 mm)	Ball-Point thru 3/0	8-1/2" (216 mm)	<b>GC-300MC**</b>	9205-1131
500	2" - Depth 5-1/4" (50.8 mm - 133.0 mm)	Ball-Point thru 4/0	10" (254 mm)	<b>GC-500</b>	9205-1150

\* Clamshell packaging. Sold individually or master packed in quantities of 12 each.

\*\* Sold in Master Pack Boxed Quantities of 24.

### Copper Ground Clamp Replacement Parts

Description	Part No.	Stock No.
Insulated Spring - for GC-300	<b>GC-300-2</b>	9920-2302
Cable Support Ring - for GC-300	<b>GC-300-11</b>	9920-2311
Cable Connection Screw - for GC-300	<b>GC-300-12</b>	9920-2312

# Tweco® Roto-Ground – Heavy Duty

## Rotary Ground Devices

# Manual Welding Products

## Ground Clamps



RG-440



GCRG-140

Tweco Roto-Ground is a highly efficient device for grounding weldments while being rotated on turning rolls or positioners. The 2" shaft shoulders up to a steel nut which the user welds to his rotating work or fixture. Tweco Roto-Grounds have no brushes, springs or mercury. A simple tension adjusting bolt provides maximum efficiency.

### Roto-Ground Clamps

Ideal for high amperage grounding.

Amperage	Cable	Number of Heads	Shaft Stud	Length	Part No.	Stock No.
400	1 - 4/0	1	3/4" NC	--	<b>GCRG-140</b>	9210-1314
400	1 - 4/0	1	3/4" NC	8" (203 mm)	<b>RG-140</b>	9250-1114
600	2 - 3/0	1	1-1/8" NC	10-1/4" (260 mm)	<b>RG-230</b>	9250-1123
800	2 - 4/0	1	1-3/8" NC	10-5/8" (270 mm)	<b>RG-240</b>	9250-1124
1500	4 - 4/0	2	1-3/8" NC	10-5/8" (270 mm)	<b>RG-440</b>	9250-1144
2000	6 - 4/0	3	1-3/8" NC	10-5/8" (270 mm)	<b>RG-640</b>	9250-1164



RG-240-11



A-14-24



2-5

### Roto-Ground Accessories

Description	Part No.	Stock No.
Lubricating Cup	<b>RG-240-11</b>	9922-2129
Ball-Point Cable Connection Screw	<b>A-14-24</b>	9910-2424
Special Shaft Lubricant	<b>1Z-L</b>	9900-1123
Fibre Cover Screw	<b>2-5</b>	9940-2125

### Roto-Ground Replacement Parts

Description	RG-140 Part No. / Stock No.	RG-230 Part No. / Stock No.	RG-240 Part No. / Stock No.	RG-440 Part No. / Stock No.	RG-640 Part No. / Stock No.
Head	<b>RG-140-2-0</b> 9922-2103	--	<b>RG-240-4-0</b> 9922-2124	<b>RG-240-4-0</b> 9922-2124	<b>RG-240-4-0</b> 9922-2124
Head Shaft	<b>RG-140-2</b> 9922-2102	<b>RG-230-2</b> 9922-2112	<b>RG-240-2</b> 9922-2122	<b>RG-440-2</b> 9922-2132	<b>RG-640-2</b> 9922-2142
Work Attachment Nut	<b>RG-140-5</b> 9922-2105	<b>RG-230-5</b> 9922-2115	<b>RG-240-5</b> 9922-2125	<b>RG-240-5</b> 9922-2125	<b>RG-240-5</b> 9922-2125
Fibre Cover	--	<b>RG-240-7</b> 9922-2127	<b>RG-240-7</b> 9922-2127	<b>RG-240-7</b> 9922-2127	<b>RG-240-7</b> 9922-2127



8Z-L

### Tweco Shaft Lubricant

An electrical conductive grease to be used as a lubricant for roto-grounds and may be used when making mechanical connections with copper or aluminum cables. Effective as a lubricant on sliding or moving electrical contacts such as switches and rotating grounding devices. Apply generously to contact area from 1 oz (29.6 mL) or 8 oz (237.0 mL) plastic bottles. Reduce electrical resistance by as much as 40 to 50%

Description	Part No.	Stock No.
1 oz (29.6 mL) Plastic Squeeze Bottle	<b>1Z-L</b>	9900-1123
8 oz (237.0 mL) Plastic Squeeze Bottle	<b>8Z-L</b>	9900-1124

# Manual Welding Products

Ground Clamps

## Tweco® Roto-Work – Heavy Duty Rotary Ground Clamps



WCRG-1200



GC-600-75

Tweco Roto-Work Ground Clamps are designed primarily to work in conjunction with the Tweco Roto-Ground Device. However, they may also be used for other high amperage grounding applications. The Roto-Ground shaft screws into the tapped back of the Roto-Work Clamp. The clamp is quickly attached or moved from one rotation weldment or fixture to the other without removing the Roto-Ground from it, saving on welding down time.

Roto-Work Clamps are made from a copper alloy. They come in 600, 1200 and 2000 ampere capacity. Number WCRG-2000 has two tightening screws. Number WCRG-600 works only with No. RG-230 due to its smaller shaft size. Large tightening screws and ample contact surface area provide cool, efficient operation.

### Tweco Roto-Work Ground Clamps

Amperage	Fits Roto-Ground	Clamp Contact	Throat Height	Throat Depth	Over-All Height	Over-All Width	Tapped For	Part No.	Stock No.
600	RG-230	6-1/4 sq in	2-1/2" (63.5 mm)	2-1/2" (63.5 mm)	5-3/4" (146.0 mm)	2-1/2" (63.5 mm)	1-1/8" NC	<b>WCRG-600</b>	9255-1106
1200	RG-240/440	9 sq in	3" (76.2 mm)	3" (76.2 mm)	6-3/4" (171.0 mm)	3" (76.2 mm)	1-3/8" NC	<b>WCRG-1200</b>	9255-1112
2000	RG-440/640	12 sq in	3" (76.2 mm)	3" (76.2 mm)	6-3/4" (171.0 mm)	4" (102.0 mm)	1-3/8" NC	<b>WCRG-2000</b>	9255-1120

### Tweco Ground Clamps with Cap Screws

Amperage	Jaw Opening	Cable	Part No.	Stock No.
500	2-1/2" - Depth 1-3/8" (63.5 mm - 34.9 mm)	1/2" Cap Screw	<b>GC-600-50</b>	9210-1150
600	2-1/2" - Depth 1-3/8" (63.5 mm - 34.9 mm)	3/4" Cap Screw	<b>GC-600-75*</b>	9255-1075
600	2-1/2" - Depth 1-3/8" (63.5 mm - 34.9 mm)	Double Ball-Point	<b>GC-600-DBP</b>	9210-1201
600	2-1/2" - Depth 1-3/8" (63.5 mm - 34.9 mm)	Tweco Male Plug	<b>GC-600-TMP</b>	9210-1202

\*Clamp Only - Tapped 3/4" for RG-140 Roto-Ground Only



138

### Work Clamp Adapter

Description	Part No.	Stock No.
Work Clamp Adapter W/ 1-1/8"-7 UNC 2A OD Thread & 5/8"-11 UNC-2A ID Thread - Fits WCRG-600 Roto-Work Clamp	<b>118</b>	9922-2018
Work Clamp Adapter W/ 1-3/8"-6 UNC 2A OD Thread & 5/8"-11 UNC-2A ID Thread - Fits WCRG-1200 & WCRG-2000 Roto-Work Clamps	<b>138</b>	9922-2038

### "C" Type Clamp Parts

Description	Part No.	Stock No.
Cap Screw - 1/2" x 3/4" NC	<b>CS-6</b>	9920-2100
Fitting-No.2 Male Plug (threaded 1/2" NC)	<b>GCM-2-4</b>	9920-2102
Fitting-Double Ball-Point (threaded 1/2" NC)	<b>GCS-40</b>	9920-2103
Cover	<b>24R-MBP</b>	9940-2124

MANUAL PRODUCTS

## Switchable Magnetic Ground Clamps

It's simple to use – just turn the knob. It's easy to operate and mounts on all surfaces. Turn the knob clockwise and you instantly have a secure grip. Perfect for flat and pipe applications. Available in 200, 300, and 600 Amp sizes to meet any welding need. These Switchable Magnetic Ground Clamps are designed to save welders time and money. Clamp can be used to ground on flat, round, and irregular surfaces. Convenient tab to easily attach ground line and cut set up time. Can withstand heat up to 176°F (80°C). Magnetic switch is easy to operate: a simple twist of the knob turns the magnetic field on and off to make use and clean up quick and easy.

MANUAL PRODUCTS

# Switchable Magnetic Products



# Manual Welding Products

Switchable Magnetic Work Holding Products

## Switchable Magnetic Ground Clamps



Easy Connect  
& Easy Release  
On/Off Knob

SMGC200



Just Turn Off  
& Wipe Away  
Debris

SMGC300



Cuts Set  
Up Time

SMGC600

Amperage	Height	Width	Length	Weight	Std. Pkg.	Part No.	Stock No.
200	2.5" (63.5 mm)	1.58" (40.1 mm)	2.19" (55.6 mm)	0.38 lbs	10	<b>SMGC200</b>	9255-1060
300	2.26" (57.4 mm)	1.58" (40.1 mm)	2.7" (68.6 mm)	0.61 lbs	10	<b>SMGC300</b>	9255-1061
600	2.6" (66.0 mm)	2.83" (71.9 mm)	4.09" (103.9 mm)	2.0 lbs	5	<b>SMGC600</b>	9255-1062

# EASY FIND GUIDE – Cable Lug Selection Guide

	Style	Amperage Range					Recommended	Page	
		50	75	150	225	250			325
Cable Lugs	Crimp Lugs for Welding Cable							T-62	144
								T-120	144
								T-3040	144
								T-40HD	144
	Crimp Lugs for Power Cable							T-810	144
								T-68	144
								T-46	144
	Ball-Point Lugs without Insulated Cover							10-45	144
								10-180	144
								40-45	144
								40-180	144
	Ball-Point Lugs with Insulated Cover							10-45C	144
								10-180C	144
								40-45C	144
								40-180C	144
	Heavy Duty Lugs							140-HD-180	144
							140-HD-180C	144	
							240-HD-180	144	

## Crimp Lugs



## Ball-Point Lugs



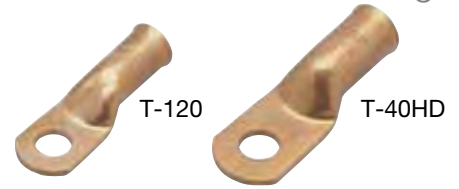
## Heavy Duty Lugs



# Manual Welding Products

## TwecoLugs® – Crimp or Solder Type Lugs (Use Tweco “Lug-Set”)

Cable Lugs



### TwecoLugs (Crimp Lugs) for Welding Cable

Cable	Amp Rating	Stud Hole	I.D. Solder Socket	Std Pkg	Part No.	Stock No.
6 thru 2	150	17/32" (13.5 mm)	.461" (11.7 mm)	50	<b>T-62-50</b>	9520-1115
6 thru 2	150	17/32" (13.5 mm)	.461" (11.7 mm)	5	<b>T-62</b>	9520-1104
1 thru 2/0	225	17/32" (13.5 mm)	.559" (14.2 mm)	50	<b>T-120-50</b>	9520-1116
1 thru 2/0	225	17/32" (13.5 mm)	.559" (14.2 mm)	5	<b>T-120</b>	9520-1105
3/0 & 4/0	250	17/32" (13.5 mm)	.660" (16.7 mm)	25	<b>T-3040-25</b>	9520-1117
3/0 & 4/0	250	17/32" (13.5 mm)	.660" (16.7 mm)	5	<b>T-3040</b>	9520-1107
4/0 Heavy Duty	325	21/32" (17.7 mm)	.776" (19.7 mm)	25	<b>T-40HD-25</b>	9520-1118
4/0 Heavy Duty	325	21/32" (17.7 mm)	.776" (19.7 mm)	5	<b>T-40HD</b>	9520-1109



### TwecoLugs (Crimp Lugs) for Power Cable

Cable	Amp Rating	Stud Hole	I.D. Solder Socket	Std Pkg	Part No.	Stock No.
6 thru 8	70	21/64" (8.3 mm)	.289" (7.3 mm)	10	<b>T-68</b>	9520-1102
4 thru 6	90	21/64" (8.3 mm)	.347" (8.8 mm)	10	<b>T-46</b>	9520-1103

### Ball-Point Lugs without Insulated Cover

Description	Cable	Amp Rating	Stud Hole	Std Pkg	Part No.	Stock No.
45° Angle	thru 1/0	150	17/32" (13.5 mm)	1	<b>10-45</b>	9515-1100
180° Offset	thru 1/0	150	17/32" (13.5 mm)	1	<b>10-180</b>	9515-1102
45° Angle	thru 4/0	325	17/32" (13.5 mm)	1	<b>40-45</b>	9515-1110
180° Offset	thru 4/0	325	17/32" (13.5 mm)	1	<b>40-180</b>	9515-1112



### Ball-Point Lugs with Insulated Cover

Description	Cable	Amp Rating	Stud Hole	Std Pkg	Part No.	Stock No.
45° Angle	thru 1/0	150	17/32" (13.5 mm)	1	<b>10-45C</b>	9515-1101
180° Offset	thru 1/0	150	17/32" (13.5 mm)	1	<b>10-180C</b>	9515-1103
45° Angle	thru 4/0	325	17/32" (13.5 mm)	1	<b>40-45C</b>	9515-1111
180° Offset	thru 4/0	325	17/32" (13.5 mm)	1	<b>40-180C</b>	9515-1113



### Heavy Duty Mechanical Ball-Point Lugs

Description	Cable	Amp Rating	Stud Hole	Length	Part No.	Stock No.
180° Offset	3/0 & 4/0	325	21/32" (16.7 mm)	4-3/8" (111 mm)	<b>140-HD-180</b>	9515-1120
With Insulated Cover - 180° Offset	3/0 & 4/0	325	21/32" (16.7 mm)	5-1/2" (140 mm)	<b>140-HD-180C</b>	9515-1121
180° Offset	3/0 & 4/0	325	21/32" (16.7 mm)	4-5/8" (131 mm)	<b>240-HD-180</b>	9515-1122





**Cable Connectors**



**MPC Connectors**

Tweco MPC connectors provide a positive cam action which optimizes interface between connector halves. The connectors are equipped with heat and oil resistant covers. The MPC connectors are furnished with zinc plated cover and ball-point cable screws. They are interchangeable with older Tweco MBP Connectors. The Whip Cable Connector is used when down sizing cable to an electrode holder. It is a No. 2 male connector with cable hole sized to fit 4, 2, 1 or 1/0 cable. The 2-1-MPC will fit any No. 2 or No. 4 female connector.

**MPC Series**

Positive-CAM Mechanical Connection - zinc plated type cable & cover screws

Description	Type Cable Connection	Cable Capacity	Standard Package	Part No.	Stock No.
Complete Connection	Single Ball-Point	4, 2, 1	Pkg. 1 ea. Male & Female	<b>1-MPC</b>	9425-1100
Male Half	Single Ball-Point	4, 2, 1	Pkg. 2 ea. Male Only	<b>1-MPC-1</b>	9425-1110
Female Half	Single Ball-Point	4, 2, 1	Pkg. 2 ea. Female Only	<b>1-MPC-2</b>	9425-1120
Complete Connection	Single Ball-Point	1/0, 2/0, 3/0	Pkg. 1 ea. Male & Female	<b>2-MPC ‡</b>	9425-1200
Complete Connection	Single Ball-Point	1/0, 2/0, 3/0	Pkg. 1 ea. Male & Female	<b>2-MPC-MC**</b>	9425-1201
Male Half	Single Ball-Point	1/0, 2/0, 3/0	Pkg. 2 ea. Male Only	<b>2-MPC-1 †</b>	9425-1210
Male Half	Single Ball-Point	1/0, 2/0, 3/0	Pkg. 2 ea. Male Only	<b>2-MPC-1-MC*</b>	9425-1211
Female Half	Single Ball-Point	1/0, 2/0, 3/0	Pkg. 2 ea. Female Only	<b>2-MPC-2 †</b>	9425-1220
Female Half	Single Ball-Point	1/0, 2/0, 3/0	Pkg. 2 ea. Female Only	<b>2-MPC-2-MC*</b>	9425-1221
Complete Connection	Double Ball-Point	3/0 or 4/0	Pkg. 1 ea. Male & Female	<b>4-MPC ‡</b>	9425-1400
Complete Connection	Double Ball-Point	3/0 or 4/0	Pkg. 1 ea. Male & Female	<b>4-MPC-MC**</b>	9425-1401
Male Half	Double Ball-Point	3/0 or 4/0	Pkg. 2 ea. Male Only	<b>4-MPC-1 †</b>	9425-1410
Male Half	Double Ball-Point	3/0 or 4/0	Pkg. 2 ea. Male Only	<b>4-MPC-1-MC*</b>	9425-1411
Female Half	Double Ball-Point	3/0 or 4/0	Pkg. 2 ea. Female Only	<b>4-MPC-2 †</b>	9425-1420
Female Half	Double Ball-Point	3/0 or 4/0	Pkg. 2 ea. Female Only	<b>4-MPC-2-MC*</b>	9425-1422
Whip Connection	Single Ball-Point	4, 2, 1, 1/0	Pkg. 2 ea.	<b>2-1-MPC</b>	9425-1140

\*Sold in Master Pack Boxed Quantities of 48.

\*\*Sold in Master Pack Quantities of 24.

† Clamshell packaging. Sold individually or master packed in quantities of 24 each.

‡ Clamshell packaging. Sold individually or master packed in quantities of 12 each.

**Replacement Tapered Machine Plugs**



Ball-Point Connection

1-M-T

Taper Length	Taper Dimensions	Cable	Part No.	Stock No.
1-1/8" (28.6 mm)	21/64" to 23/64" (8.3 mm x 9.1 mm)	4 thru 1	<b>1-M-T</b>	9505-1800
1-1/8" (28.6 mm)	21.64" to 23/64" (8.3 mm x 9.1 mm)	1/0 thru 3/0	<b>2-M-T</b>	9505-1801

**Cable Connector Replacement Parts**

MPC Series Positive-CAM - Zinc plated type cable & cover screws

Description	Part No.	Stock No.
Insulating Cover Only, All 1-MPC	<b>1R-C</b>	9940-2103
Insulating Cover Only, All 2 & 4 MPC	<b>24R-MBP</b>	9940-2124
Cable Connection Screw, Zinc Plated, All 2-MPC	<b>A-532-24</b>	9910-2124
Cable Connection Screw, Zinc Plated, All 4-MPC	<b>A-14-24</b>	9910-2424
Cover Screw, Zinc Plated, All MPC Connectors	<b>2-5</b>	9940-2125

**Panel Receptacles**

For use with MPC Connectors



Cable Fitting Type	Fits Tweco Connector	For Cable Size	Cable Attachment	Part No.	Stock No.
Ball-Point	No. 1	4, 2, 1	5/16" Ball-Point (7.9 mm)	<b>1516-BPF</b>	9580-1100
Threaded	No. 1	4, 2, 1, 1/0	5/16" Thread. Stud (7.9 mm)	<b>114-TSF</b>	9580-1101
Threaded	No. 2, 4	1/0, 2/0, 3/0	3/8" Thread. Stud (9.5 mm)	<b>238-TSF</b>	9580-1102
Ball-Point	No. 2, 4	1/0, 2/0, 3/0	9/16" Ball-Point (14.3 mm)	<b>2916-BPF</b>	9580-1103
Threaded	No. 2, 4	1/0, 2/0, 3/0	1/2" - 20 Thread. Stud (12.7 mm)	<b>212-TSF</b>	9580-1104

# Manual Welding Products

Splicers, Terminals and Accessories

## Cable Splicers



TS-3040

### Copper Cable Splicers

Cable	Amp Rating	Tube I.D.	Standard Package	Part No.	Stock No.
6 thru 2	150	.461" (11.7 mm)	50	TS-62-50	9610-1105
6 thru 2	150	.461" (11.7 mm)	5	TS-62	9610-1101
1 thru 2/0	225	.599" (15.2 mm)	5	TS-120	9610-1102
3/0 thru 4/0	250	.660" (16.8 mm)	5	TS-3040	9610-1103
4/0 Heavy Duty	325	.776" (19.7 mm)	5	TS-40HD	9610-1104

### Ball-Point Cable Splicers



BP-1030

Cable	Amp Rating	Cable Fitting Type	Standard Package	Part No.	Stock No.
4 thru 1/0		Ball-Point	1	BP-410	9605-1101
1/0 thru 3/0		Ball-Point	1	BP-1030	9605-1103
2/0 thru 4/0		Double Ball-Point	1	BP-2040	9605-1105

## Tweco® Terminals

### Tweco Terminals and TwecoLugs



2-SF-50

Tweco Screw-On Terminals Fits Terminal Size 1/2" (12.7 mm) NC

Accepts Tweco Connector Number	Part No.	Stock No.
No. 2 & No. 4 Male Half	2-SF-50	9505-1152

### Tweco Female Terminals

Stud Hole Size 17/32" (13.5 mm)



1-AF



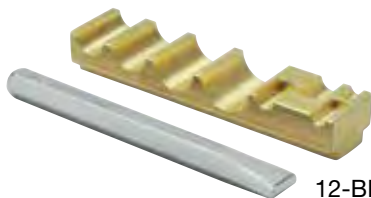
1-OF

Description	Accepts Male Ends	Standard Package	Part No.	Stock No.
45° Angle	1-MPC	1	1-AF	9510-1100
180° Offset	1-MPC	1	1-OF	9510-1101
45° Angle	2-MPC, 4-MPC	1	2-AF	9510-1110
180° Offset	2-MPC, 4-MPC	1	2-OF	9510-1111

## Accessories

### Tweco® "Lug-Set" Block & Punch

For use with TwecoLugs



12-BP

Description	Part No.	Stock No.
Block & Punch	12-BP	9900-1140

### Jacket Stripping Cable Cutting Hand Tool

For use with lugs with an insulated cover



T-908

Description	Part No.	Stock No.
Tweco Cable Cutting Hand Tool	T-908	9900-1190

## Features & Benefits

### OPERATOR APPEAL

- Oval handle shape reduces operator fatigue

### DURABLE & DEPENDABLE FOR INDUSTRIAL APPLICATIONS

- Heavy duty design
- High impact resistant handle and components
- Three layer conductor tube construction (Copper Tube / Silicon-Resin Glass Insulator / Metal Jacket)

### FIELD REPAIRABLE

- Split-half handle case provides access for ease of repair
- Easily repair Cablehoz® - no additional connectors required

### IMPROVED PERFORMANCE WITH LONGER LIFE CONSUMABLES

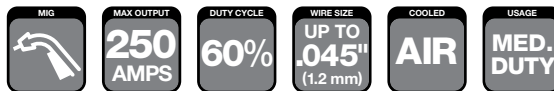
- Wide selection of front end consumables available
- Heavy duty contact tips in high heat applications offered

# WeldSkill®

## WM MIG Guns

		WeldSkill WM 250 Amp	WeldSkill WM 400 Amp	WeldSkill WM 500 Amp
<b>Applications</b>		Light-Medium Duty Fabrication	Medium Duty Fabrication	Heavy Duty Fabrication
<b>Standard Options</b>	Rear Connector	■	■	■
	Knucklehead™ Flexible Conductor Tube	■	■	
<b>Output Current</b>		250 Amps	400 Amps	500 Amps
<b>Duty Cycle - CO<sub>2</sub></b>		60%	60%	60%
<b>Wire Diameter</b>		Up to .045" (1.2 mm)	Up to 1/16" (1.6 mm)	Up to 1/16" (1.6 mm)
<b>Process</b>	MIG	■	■	■
	Aluminum	■	■	■





# WeldSkill® WM 250 Amp Air-Cooled MIG Gun



**60% Duty Cycle - CO<sub>2</sub> Carbon Dioxide**  
Suitable for Light to Medium Duty Fabrication.

**WELDING PROCESSES:**

**MIG (GMAW), Aluminum (GMAW)**

**Standard Options Include:**

- Rear Connector and Knucklehead™ Flexible Conductor Tube
- Standard Conductor Tube – Part No. WM250J-60 (Stock No. 1620-1310) on all guns up to 15 ft (4.6 m)
- **Part No. 62J-45** (Stock No. 1620-1300) on guns over 15ft. (4.6m)
- Conduit Liner – WS42 Series

**FEATURES**

- **Oval Handle Shape** reduces operator fatigue
- **Dependable Welding** for a wide variety of industrial applications
- **High Impact-Resistant Handle and Components** for long-lasting durability
- **Three-Layer Conductor Tube Construction** (Copper Tube / Silicon-Resin Glass Insulator / Metal Jacket) for improved electrical conductivity
- **Improved Performance** with longer life consumables
- **Heavy Duty Design** with operator appeal
- **Wide Selection** of front end consumables available
- **Heavy Duty Contact Tips** in high heat applications offered
- **Improved Strain Relief** provides excellent flexibility

## Tweco® Style Rear Connector

Adapter kits are available to fit Tweco rear connection to most wire feeders

Wire Size	Length	Part No.	Stock No.
Up To .045" (1.2 mm)	15 ft (4.6 m)	WM250-15-4045	1027-1007
	15 ft (4.6 m)	WM250-15-4045K4§	1027-1060

## Lincoln® Style Rear Connector

Fits Lincoln LN7, 8, 9, SP200

Wire Size	Length	Part No.	Stock No.
Up To .045" (1.2 mm)	15 ft (4.6 m)	WM250L-15-4045	1027-1082

Some Lincoln wire feeders are assembled with their K1500-2 gun receiving bushing that will accept Tweco Style MIG Guns direct from the factory. Control wire Part No. MS354-DLJ (Stock No. 2060-2137) must be ordered separately.

Part No. LAK354 (Stock No. 2642-2450) Control wire assembly furnished.

## Miller® Style Rear Connector

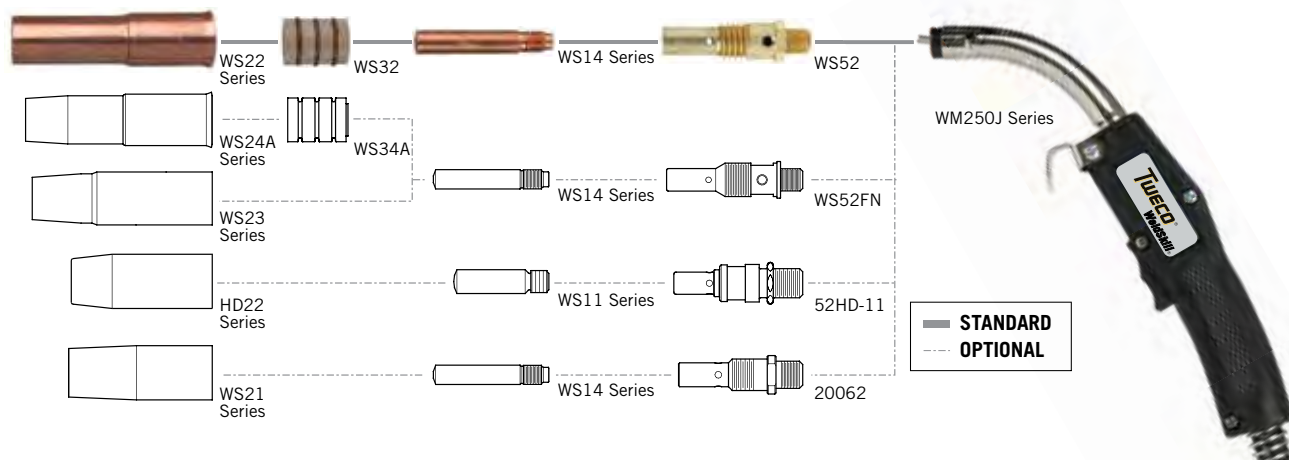
Wire Size	Length	Part No.	Stock No.
Up To .045" (1.2 mm)	10 ft (3 m)	WM250M-10-4045	1027-1030
	12 ft (3.6 m)	WM250M-12-4045	1027-1031
	15 ft (4.6 m)	WM250M-15-4045	1027-1032
	15 ft (4.6 m)	WM250M-15-4045K4§	1027-1061
	25 ft (7.6 m)	WM250M-25-4045	1027-1023

Part No. MSAK354 (Stock No. 2642-2470) Control wire assembly furnished.

## Euro-Kwik Style Rear Connector

Wire Size	Length	Part No.	Stock No.
Up To .045" (1.2 mm)	15 ft (4.6 m)	WM250X-15-4045	1027-1057

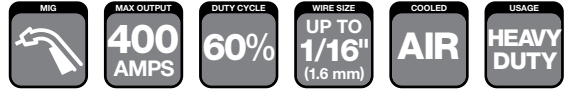
§ Suffix "K4" = Knucklehead Conductor Tube – Part No. 62SFLX480 (Stock No. 1620-1106)



Rated Output			Wire Size	Cooled	Application Usage
Amps	Duty Cycle	Gas			
250 Amps	60%	CO <sub>2</sub> Carbon Dioxide	Up To .045" (1.2 mm)	Air	Light/Medium Duty Fabrication

**EASY FIND EASY FIND GUIDE**  
See Page 152 for Replacement Parts & Optional Accessories

# WeldSkill® WM 400 Amp Air-Cooled MIG Gun



**60% Duty Cycle - CO<sub>2</sub> Carbon Dioxide**  
Suitable for Medium Duty Fabrication.

**WELDING PROCESSES:**  
**MIG (GMAW), Aluminum (GMAW)**

**Standard Options Include:**

- Rear Connector and Knucklehead™ Flexible Conductor Tube
- Standard Conductor Tube – Part No. WM400J-60 (Stock No. 1640-1305) on all guns up to 15 ft (4.6 m)
- **Part No. 62J-45** (Stock No. 1620-1300) on guns over 15ft. (4.6m)
- Conduit Liner – WS44 Series

**FEATURES**

- **Oval Handle Shape** reduces operator fatigue
- **Dependable Welding** for a wide variety of industrial applications
- **High Impact-Resistant Handle and Components** for long-lasting durability
- **Three-Layer Conductor Tube Construction** (copper tube/silicon-resin glass insulator/metal jacket) for improved electrical conductivity
- **Improved Performance** with longer life consumables
- **Heavy Duty Design** with operator appeal

- **Wide Selection** of front end consumables available
- **Heavy Duty Contact Tips** in high heat applications offered
- **Improved Strain Relief** provides excellent flexibility

## Tweco® Style Rear Connector

Adapter kits are available to fit Tweco rear connection to most wire feeders

Wire Size	Length	Part No.	Stock No.
Up To .045" (1.2 mm)	12 ft (3.6 m)	WM400-12-3545	1047-1001
	15 ft (4.6 m)	WM400-15-3545	1047-1002
Up To 1/16" (1.6 mm)	15 ft (4.6 m)	WM400-15-116	1047-1007
	15 ft (4.6 m)	WM400-15-116K4§	1040-1170
	25 ft (7.6 m)	WM400-25-116	1047-1016

## Lincoln® Style Rear Connector

Fits Lincoln LN7, 8, 9, SP200

Wire Size	Length	Part No.	Stock No.
Up To .045" (1.2 mm)	15 ft (4.6 m)	WM400L-15-3545	1047-1077
	15 ft (4.6 m)	WM400L-15-116	1047-1082
Up To 1/16" (1.6 mm)	15 ft (4.6 m)	WM400L-15-116K4§	1040-1172
	25 ft (7.6 m)	WM400L-25-116	1047-1022

Some Lincoln wire feeders are assembled with their K1500-2 gun receiving bushing that will accept Tweco Style MIG Guns direct from the factory. Control wire Part No. MS354-DSLJ (Stock No. 2060-2137) must be ordered separately.

Part No. LAK354 (Stock No. 2642-2450) Control wire assembly furnished.

## Miller® Style Rear Connector

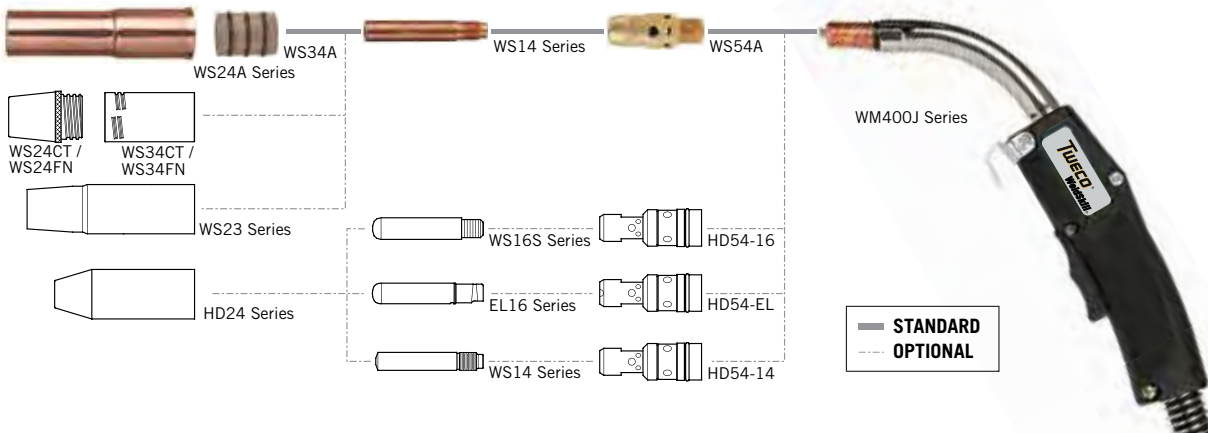
Wire Size	Length	Part No.	Stock No.
Up To .045" (1.2 mm)	15 ft (4.6 m)	WM400M-15-3545	1047-1027
Up To 1/16" (1.6 mm)	12 ft (3.6 m)	WM400M-12-116	1047-1031
	15 ft (4.6 m)	WM400M-15-116	1047-1032
	15 ft (4.6 m)	WM400M-15-116K4§	1040-1171
	25 ft (7.6 m)	WM400M-25-116	1047-1019

Part No. MSAK354 (Stock No. 2642-2470) Control wire assembly furnished.

## Euro-Kwik Style Rear Connector

Wire Size	Length	Part No.	Stock No.
Up To .045" (1.2 mm)	15 ft (4.6 m)	WM400X-15-3545	1047-1052
1/16" (1.6 mm)	15 ft (4.6 m)	WM400X-15-116	1047-1057

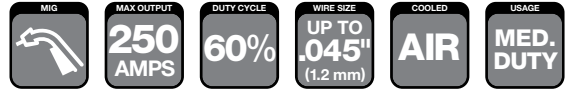
§ Suffix "K4" = Kucklehead Conductor Tube – Part No. 64SFLX480 (Stock No. 1640-1113)



Rated Output			Wire Size	Cooled	Application Usage
Amps	Duty Cycle	Gas			
400 Amps	60%	CO <sub>2</sub> Carbon Dioxide	Up To 1/16" (1.6 mm)	Air	Medium Duty Fabrication



Miller is a registered trademark of Illinois Tool Works, Inc. Lincoln is a registered trademark of Lincoln Electric Co. The aforementioned registered trademarks are in no way affiliated with Tweco. Tweco is registered trademark of ESAB.



# WeldSkill® WM 500 Amp Air-Cooled MIG Gun



**60% Duty Cycle - CO<sub>2</sub> Carbon Dioxide**  
Suitable for Light to Medium Duty Fabrication.

**WELDING PROCESSES:**  
**MIG (GMAW), Aluminum (GMAW)**

**Standard Options Include:**

- Rear Connector
- Standard Conductor Tube – Part No. WM500J-60 (Stock No. 1650-1120) on all guns up to 15 ft (4.6 m)
- Conduit Liner – WS45 Series

**FEATURES**

- **Oval Handle Shape** reduces operator fatigue
- **Dependable Welding** for a wide variety of industrial applications
- **High Impact-Resistant Handle and Components** for long-lasting durability
- **Three-Layer Conductor Tube Construction** (copper tube/silicon-resin glass insulator/metal jacket) for improved electrical conductivity
- **Improved Performance** with longer life consumables
- **Heavy Duty Design** with operator appeal
- **Wide Selection** of front end consumables available
- **Heavy Duty Contact Tips** in high heat applications offered
- **Improved Strain Relief** provides excellent flexibility

## Tweco® Style Rear Connector

Adapter kits are available to fit Tweco rear connection to most wire feeders

Wire Size	Length	Part No.	Stock No.
Up To 1/16" (1.6 mm)	15 ft (4.6 m)	<b>WM500-15-116</b>	1057-1007

## Lincoln® Style Rear Connector

Fits Lincoln LN7, 8, 9, SP200

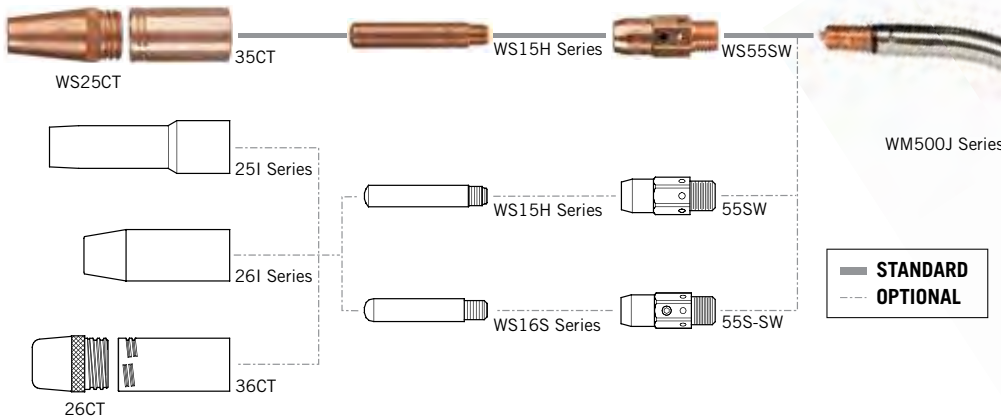
Wire Size	Length	Part No.	Stock No.
Up To 1/16" (1.6 mm)	15 ft (4.6 m)	<b>WM500L-15-116</b>	1057-1082

Some Lincoln wire feeders are assembled with their K1500-2 gun receiving bushing that will accept Tweco Style MIG Guns direct from the factory. Control wire Part No. MS354-DSLJ (Stock No. 2060-2137) must be ordered separately.

Part No. LAK354 (Stock No. 2642-2450) Control wire assembly furnished.

## Miller® Style Rear Connector

Wire Size	Length	Part No.	Stock No.
Up To 1/16" (1.6 mm)	15 ft (4.6 m)	<b>WM500M-15-116</b>	1057-1032

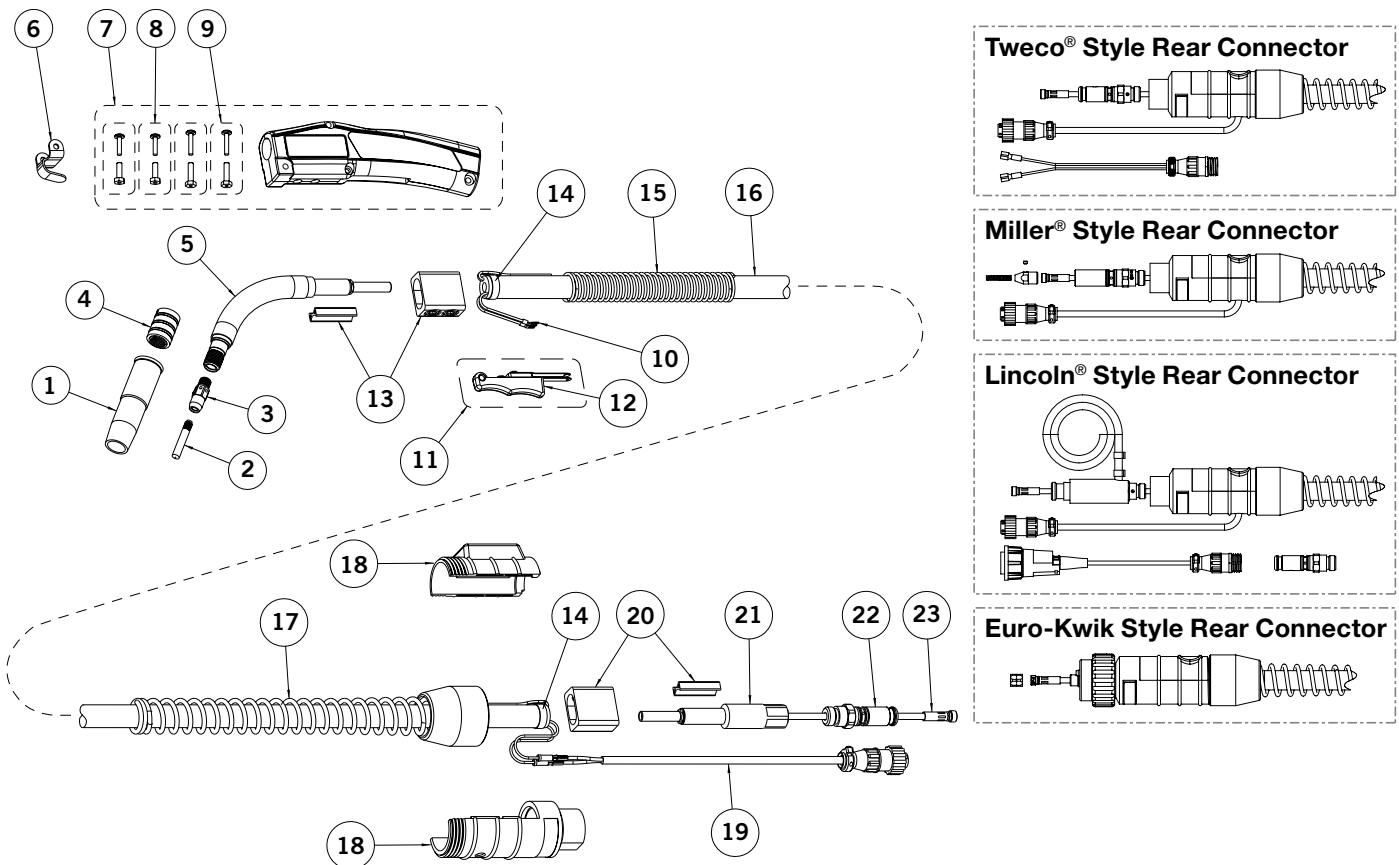


Rated Output			Wire Size	Cooled	Application Usage
Amps	Duty Cycle	Gas			
500 Amps	60%	CO <sub>2</sub> Carbon Dioxide	Up To 1/16" (1.6 mm)	Air	Heavy Duty Fabrication

**EASY FIND EASY FIND GUIDE**  
See Page 152 for Replacement Parts & Optional Accessories

Miller is a registered trademark of Illinois Tool Works, Inc. Lincoln is a registered trademark of Lincoln Electric Co. The aforementioned registered trademarks are in no way affiliated with Tweco. Tweco is registered trademark of ESAB.

# WeldSkill® WM MIG Gun Replacement Parts



#	Description	WeldSkill 250 Amp		WeldSkill 400 Amp		WeldSkill 500 Amp	
		Part No.	Stock No.	Part No.	Stock No.	Part No.	Stock No.
1	Nozzles	WS22 Series		WS24A Series		WS25CT Series	
2	Contact Tips	WS14 Series		WS14 Series		WS15H Series	
3	Gas Diffusers	WS52		WS54A		WS55SW	
4	Nozzle Insulators	WS32		WS34A		35CT	
5	Conductor Tubes	WM250J Series		WM400J Series		WM500J Series	
6	Gun Hanger	152	2020-2152	152	2020-2152	WM155	2050-2095
7	Handle Assembly	WM1-80	2042-2029	WM4-80	2042-2031	WM5-80	2042-2032
8	Binder Post & Screw - (2 ea. Required)	122FMS	2020-2123	122FMS	2020-2123	--	--
	Binder Post & Screw - (1 ea. Required)	--	--	--	--	122FMS	2020-2123
	Binder Post & Screw - (1 ea. Required)	--	--	--	--	124FMS	2040-2125
9	Binder Post & Screw - (2 ea. Required)	122FM	2020-2122	122FM	2020-2122	124FM	2040-2124
10	Trigger Control Wire Terminal (2 ea.)	244DS	2040-2245	244	2040-2244	244	2040-2244
11	Trigger Assembly	WM91	2010-2095	WM92	2020-2096	WM92	2020-2096
12	Trigger Blades	91C	2010-2093	92C	2020-2094	92C	2020-2094
13	Front Cable Connector	WM102	2020-2107	104	2040-2104	104	2040-2104
14	Cable Clamp	136	2060-2690	136	2060-2690	136	2060-2690
15	Front Strain Relief Spring	WM2SSR	2020-2134	WM4SSR	2040-2141	WM5SSR	2050-2096
16	Cablehoz®	200	1720-2100	400	1740-2100	500	1750-2100
17	Rear Strain Relief Spring	235RSSR	2060-2035	235RSSR	2060-2035	235RSSR	2060-2035
18	Rear Case (Direct Plug)	R6RC	2060-2040	R6RC	2060-2040	R6RC	2060-2040
	Rear Case (Euro Style)	X6RC	2060-2006	X6RC	2060-2006	X6RC	2060-2006
19	Control Wire (Standard)	MS354-DSM	2060-2140	MS354-DSM	2060-2140	MS354-DSM	2060-2140
	Control Wire (Dual Schedule)	194DS	2040-2195	194DS	2040-2195	194DS	2040-2195
20	Rear Cable Connector (Direct Plug)	104	2040-2104	--	--	--	--
	Rear Cable Connector (Euro Style)	172X-M	2020-2181	174X-M	2040-2181	176X-M	2060-2181
21	Adapter (Direct Plug)	M170-2H	2020-2165	M170-4H	2020-2166	M170-5H	2020-2167
22	Connector Plug	Refer to Pages 89-90		Refer to Pages 89-90		Refer to Pages 89-90	
23	Conduit Liners	Refer to Pages 157		Refer to Pages 157		Refer to Pages 157	



## Contact Tips – Standard Threaded Style

### WS11, WS11H & WS11T Series

0.25" (6.35 mm) Outside Diameter - M6 x 1.0 Threads - 1.00" (25.4 mm) Overall Length  
25 per pack



Wire Size (in / mm)	Tip I.D. (in / mm)	Standard		Heavy Duty		Tapered	
		Part No.	Stock No.	Part No.	Stock No.	Part No.	Stock No.
.023" (0.6 mm)	.031" (0.79 mm)	<b>WS11-23</b>	1110-1140			<b>WS11T-23</b>	1110-1340
.030" (0.8 mm)	.038" (0.97 mm)	<b>WS11-30</b>	1110-1141			<b>WS11T-30</b>	1110-1341
.035" (0.9 mm)	.044" (1.12 mm)	<b>WS11-35</b>	1110-1142			<b>WS11T-35</b>	1110-1342
.045" (1.2 mm)	.054" (1.37 mm)	<b>WS11-45</b>	1110-1144	<b>WS11H45</b>	1110-1244	<b>WS11T-45</b>	1110-1344

### WS14, WS14H, & WS14T Series

0.25" (6.35 mm) Outside Diameter - .250-28 UNF Threads - 1.50" (38.1 mm) Overall Length  
25 per pack



Wire Size (in / mm)	Tip I.D. (in / mm)	Standard		Heavy Duty		Tapered	
		Part No.	Stock No.	Part No.	Stock No.	Part No.	Stock No.
.030" (0.8 mm)	.038" (0.97 mm)	<b>WS14-30</b>	1140-1166			<b>WS14T-30</b>	1140-1341
.035" (0.9 mm)	.044" (1.12 mm)	<b>WS14-35</b>	1140-1167	<b>WS14H-35</b>	1140-1242	<b>WS14T35</b>	1140-1342
.040" (1.0 mm)	.048" (1.22 mm)	<b>WS14-40</b>	1140-1168	<b>WS14H-40</b>	1140-1243	--	--
.045" (1.2 mm)	.054" (1.37 mm)	<b>WS14-45</b>	1140-1169	<b>WS14H-45</b>	1140-1244	<b>WS14T-45</b>	1140-1344
.052" (1.3 mm)	.064" (1.65 mm)	<b>WS14-52</b>	1140-1170	<b>WS14H-52</b>	1140-1245	<b>WS14T-52</b>	1140-1345
1/16" (1.6 mm)	.073" (1.85 mm)	<b>WS14-116</b>	1140-1171	<b>WS14H-116</b>	1140-1246	<b>WS14T-116</b>	1140-1346
5/64" (2.0 mm)	.090" (2.29 mm)	<b>WS14-564</b>	1140-1174	<b>WS14H-564</b>	1140-1247		
3/64" AL (1.2 mm)	.059" (1.50 mm)	<b>WS14A364</b>	1140-1172	<b>WS14AH-364</b>	1140-1248		

### WS15H & WS15HFC Series

0.345" (8.8 mm) Outside Diameter - .3125-24 UNF Threads - 1.970" (50 mm) Overall Length / HFC 1.590" (40.4 mm) Overall Length  
25 per pack



Wire Size (in / mm)	Tip I.D. (in / mm)	Standard		Heavy Duty	
		Part No.	Stock No.	Part No.	Stock No.
.035" (0.9 mm)	.044" (1.12 mm)	<b>WS15H-35</b>	1150-1230		
.045" (1.2 mm)	.054" (1.37 mm)	<b>WS15H-45</b>	1150-1232		
1/16" (1.6 mm)	.073" (1.85 mm)	<b>WS15H-116</b>	1150-1234	<b>WS15HFC-116</b>	1150-1268
5/64" (2.0 mm)	.090" (2.29 mm)	<b>WS15H-564</b>	1150-1235		
3/32" (2.4 mm)	.106" (2.67 mm)	<b>WS15H-332</b>	1150-1238		
7/64" (2.8 mm)	.120" (3.05 mm)	<b>WS15H-764</b>	1150-1237		

### 16S & 16ST Series

0.375" (9.5 mm) Outside Diameter - M8 x 1.25 Threads - 1.50" (38.1 mm) Overall Length  
25 per pack



Wire Size (in / mm)	Tip I.D. (in / mm)	Standard		Tapered	
		Part No.	Stock No.	Part No.	Stock No.
.035" (0.9 mm)	.044" (1.12 mm)	<b>WS16S-35</b>	1160-1425	<b>WS16ST-35</b>	1160-1440
.045" (1.2 mm)	.054" (1.37 mm)	<b>WS16S-45</b>	1160-1426	<b>WS16ST-45</b>	1160-1441
.052" (1.3 mm)	.064" (1.65 mm)	<b>WS16S-52</b>	1160-1427	--	--
1/16" (1.6 mm)	.073" (1.85 mm)	<b>WS16S-116</b>	1160-1428	<b>WS16ST-35</b>	1160-1443
5/64" (2.0 mm)	.090" (2.29 mm)	<b>WS16S-564</b>	1160-1429	--	--

# Nozzles & Nozzle Insulators – Air-Cooled

## WS21 Series

3-Piece Nozzle Design - 0.750" (19.05 mm) Outside Diameter  
Standard Alloy Copper. Self Insulated Nozzles.  
2 per pack



WS21 Series

Nozzle Style	Bore Diameter	Part No.	Stock No.	Nozzle Design	Nozzle/Contact Tip Relationship
Thread-On	3/8" (9.5 mm)	<b>WS21-37</b>	1210-1340	Standard	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess
	3/8" (9.5 mm)	<b>WS21T-37</b>	1210-1343	Tapered	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess
	1/2" (12.7 mm)	<b>WS21-50F</b>	1210-1346	Standard	Flush To 1/16" (1.6 mm) Tip Recess
	1/2" (12.7 mm)	<b>WS21-50</b>	1210-1341	Standard	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess
	5/8" (15.9 mm)	<b>WS21-62</b>	1210-1342	Standard	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess

## WS22 Series

Formed Nozzle - 0.750" (19.05 mm) Outside Diameter  
Standard Alloy Copper. Use with Nozzle Insulator Part No. WS32  
(Stock No. 1320-1100).  
2 per pack



WS22 Series



WS32 Insulator  
*(sold separately)*

Nozzle Style	Bore Diameter	Part No.	Stock No.	Nozzle Design	Nozzle/Contact Tip Relationship
Thread-On	3/8" (9.5 mm)	<b>WS22-37SS</b>	1220-1345	Standard Short Stop	Flush to 1/8" (3.2 mm) Tip Recess
	3/8" (9.5 mm)	<b>WS22T-37SS</b>	1220-1336	Standard Short Stop	Flush to 1/8" (3.2 mm) Tip Recess
	1/2" (12.7 mm)	<b>WS22-50</b>	1220-1341	Standard	Adjustable Recess To Protruding
	1/2" (12.7 mm)	<b>WS22-50SS</b>	1220-1346	Standard Short Stop	Flush to 1/8" (3.2 mm) Tip Recess
	5/8" (15.9 mm)	<b>WS22-62</b>	1220-1342	Standard	Adjustable Recess To Protruding
	5/8" (15.9 mm)	<b>WS22-62SS</b>	1220-1347	Standard Short Stop	Flush to 1/8" (3.2 mm) Tip Recess

## WSHD22 Series

3-Piece Nozzle Design - 0.875" (22.2 mm) Outside Diameter  
Standard Alloy Copper. Use with HD52 Series Gas Diffusers. Self-Insulated Nozzle.  
2 per pack



WSHD22 Series

Nozzle Style	Bore Diameter	Part No.	Stock No.	Nozzle Design	Nozzle/Contact Tip Relationship
Slip-On	1/2" (12.7 mm)	<b>WSHD22-50</b>	1220-1330	Standard	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess

## WS23 Series

3-Piece Nozzle Design - 0.875" (22.2 mm) Outside Diameter  
Standard Alloy Copper. Self-Insulated Nozzles.  
2 per pack



WS23 Series

Nozzle Style	Bore Diameter	Part No.	Stock No.	Nozzle Design	Nozzle/Contact Tip Relationship
Thread-On	3/8" (9.5 mm)	<b>WS23-37</b>	1230-1010	Standard	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess
	1/2" (12.7 mm)	<b>WS23-50</b>	1230-1011	Standard	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess
	1/2" (12.7 mm)	<b>WS23-50F</b>	1230-1016	Standard	Flush To 1/16" (1.6 mm) Tip Recess
	5/8" (15.9 mm)	<b>WS23-62</b>	1230-1012	Standard	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess
	5/8" (15.9 mm)	<b>WS23H-62</b>	1230-1221	Heavy Duty	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess
	5/8" (15.9 mm)	<b>WS23-75</b>	1230-1013	Standard	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess

## WS23T Series

3-Piece Nozzle Design - 0.875" (22.2 mm) Outside Diameter  
Standard Alloy Copper. Self-Insulated Nozzles.  
2 per pack



WS23T Series

Nozzle Style	Bore Diameter	Part No.	Stock No.	Nozzle Design	Nozzle/Contact Tip Relationship
Thread-On	3/8" (9.5 mm)	<b>WS23T-37</b>	1230-1035	Tapered	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess
	3/8" (9.5 mm)	<b>WS23T-37F</b>	1230-1303	Tapered	Flush To 1/16" (1.6 mm) Tip Recess

# Nozzles & Nozzle Insulators – Air-Cooled

## WS24A Series

Formed Nozzle - 0.750" (19.05 mm) Outside Diameter  
Use with Nozzle Insulator Part No. WS34A (Stock No. 1340-1125).  
2 per pack



WS24A Series



WS34A Insulator  
(sold separately)

Nozzle Style	Bore Diameter	Part No.	Stock No.	Nozzle Design	Nozzle/Contact Tip Relationship
Slip-On	3/8" (9.5 mm)	<b>WS24A-37SS</b>	1240-1559	Standard Short Stop	Flush to 1/8" (3.2 mm) Tip Recess
	1/2" (12.7 mm)	<b>WS24A-50</b>	1240-1555	Standard	Adjustable Tip Recess - Tip Protruding
	1/2" (12.7 mm)	<b>WS24A-50SS</b>	1240-1560	Standard Short Stop	Flush to 1/8" (3.2 mm) Tip Recess
	5/8" (15.9 mm)	<b>WS24A-62</b>	1240-1556	Standard	Adjustable Tip Recess - Tip Protruding
	5/8" (15.9 mm)	<b>WS24A-62SS</b>	1240-1561	Standard Short Stop	Flush to 1/8" (3.2 mm) Tip Recess
	5/8" (15.9 mm)	<b>WS24AH-62SS</b>	1240-1566	Standard Short Stop	Flush to 1/8" (3.2 mm) Tip Recess

## WS24CT Series

Coarse Thread Nozzle  
Use with Nozzle Insulator Part No. WS34CT (Stock No. 1340-1126).  
2 per pack



WS24CT Series



WS34CT Insulator  
(sold separately)

Nozzle Style	Bore Diameter	Part No.	Stock No.	Nozzle Design	Nozzle/Contact Tip Relationship
Thread-On	1/2" (12.7 mm)	<b>WS24CT-50S</b>	1240-1580	Standard Short Stop	5/32" (3.97 mm) Tip Recess
	5/8" (15.9 mm)	<b>WS24CT-62S</b>	1240-1581	Standard Short Stop	5/32" (3.97 mm) Tip Recess
	5/8" (15.9 mm)	<b>WS24CT-62R</b>	1240-1591	Tapered	1/2" (12.7 mm) Tip Recess
	3/4" (19.5 mm)	<b>WS24CT-75S</b>	1240-1582	Standard Short Stop	5/32" (3.97 mm) Tip Recess

## WS24FN Series

Fine Thread Nozzle  
Use with Nozzle Insulator Part No. WS34FN (Stock No. 1340-1127).  
2 per pack



WS24FN Series



WS34FN Insulator  
(sold separately)

Nozzle Style	Bore Diameter	Part No.	Stock No.	Nozzle Design	Nozzle/Contact Tip Relationship
Thread-On	5/8" (15.9 mm)	<b>WS24FN-62S</b>	1240-1727	Standard Short Stop	5/32" (3.97 mm) Tip Recess

## WSHD24 Series

3-Piece Nozzle Design - 1.125" (28.6 mm) Outside Diameter  
Use with HD54 Series Gas Diffusers.  
2 per pack



WSHD24 Series

Nozzle Style	Bore Diameter	Part No.	Stock No.	Nozzle Design	Nozzle/Contact Tip Relationship
Slip-On (A)	5/8" (15.9 mm)	<b>WSHD24L-62</b>	1240-1572	Tapered	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess
	5/8" (15.9 mm)	<b>WSHD24L-62F</b>	1240-1573	Tapered	Flush To 1/16" (1.6 mm) Tip Recess
	5/8" (15.9 mm)	<b>WSHD24-62</b>	1240-1570	Standard (1)	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess
	3/4" (19.5 mm)	<b>WSHD24L-75</b>	1240-1574	Tapered	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess
	3/4" (19.5 mm)	<b>WSHD24-75</b>	1240-1571	Standard	1/8" - 5/32" (3.2 mm - 3.97 mm) Tip Recess

## Nozzles & Nozzle Insulators – Air-Cooled

### WS25CT Series

Coarse Thread Nozzle  
Use with Nozzle Insulator Part No. WS35CT (Stock No. 1350-1425).  
2 per pack



Nozzle Style	Bore Diameter	Part No.	Stock No.	Nozzle Design	Nozzle/Contact Tip Relationship
Thread-On	1/2" (12.7 mm)	<b>WS25CT-50</b>	1250-1439	Standard	1/8" (3.2 mm) Tip Recess
	5/8" (15.9 mm)	<b>WS25CT-62</b>	1250-1440	Standard	1/8" (3.2 mm) Tip Recess
	3/4" (19.5 mm)	<b>WS25CT-75</b>	1250-1441	Standard	1/8" (3.2 mm) Tip Recess

## Gas Diffusers – Standard Air-Cooled

### MINI-MIG Series

5 per pack



Part No.	Stock No.	Material	Contact Tip	Nozzle
<b>WS35-50</b>	1500-1140	Brass	WS11 Series	WS21 Series

### WM150 Series

5 per pack



Part No.	Stock No.	Material	Contact Tip	Nozzle
<b>WS51</b>	1510-1140	Brass	WS11 Series	WS21 Series

### WM250 Series

5 per pack



Part No.	Stock No.	Material	Contact Tip	Nozzle
<b>WS52</b>	1520-1140	Brass	WS14 Series	WS22 Series
<b>WS52FN</b>	1520-1141	Brass	WS14 Series	WS24A , WS23 Series

### WM400 Series

5 per pack



Part No.	Stock No.	Material	Contact Tip	Nozzle
<b>WS54A</b>	1540-1145	Brass	WS14 Series	WS24A, WS24CT, & WS23 Series

### WM500 Series

5 per pack



Part No.	Stock No.	Material	Contact Tip	Nozzle
<b>WS55SW*</b>	1550-1140	Copper	WS15H Series	WS25CT Series
<b>WS55H**</b>	1550-1141	Copper	WS15H Series	WS25CT Series

\*Use with WS45-3545, WS45-116, and WS45N-3545 Series Conduit Liners  
\*\*Use with WS45H-332, 45H-764, and 45-18 Series Conduit Liners

## WeldSkill® Conductor Tubes – Air-Cooled

### WeldSkill Standard 150

Description	Part No.	Stock No.	Outer Jacket Material	Back End Threads	Front End Threads
60 Degree with 2-1/4" (57 mm) Radius	<b>WM150J-60</b>	1610-1116	Metal	I.D. 3/8"-24 UNF-2B	I.D. M10 x 1.5-6H
45 Degree with 2-1/4" (57 mm) Radius	<b>WM150J-45</b>	1610-1115	Metal	I.D. 3/8"-24 UNF-2B	I.D. M10 x 1.5-6H
60 Degree with 2" (50.5 mm) Radius	<b>WM150-60</b>	1610-1112	Neoprene Rubber	I.D. 3/8"-24 UNF-2B	I.D. M10 x 1.5-6H
80 Degree with 2" (50.5 mm) Radius	<b>WM150-80</b>	1610-1113	Neoprene Rubber	I.D. 3/8"-24 UNF-2B	I.D. M10 x 1.5-6H
180 Degree, Straight	<b>WM150-180</b>	1610-1114	Neoprene Rubber	I.D. 3/8"-24 UNF-2B	I.D. M10 x 1.5-6H

### WeldSkill Standard 250

Description	Part No.	Stock No.	Outer Jacket Material	Back End Threads	Front End Threads
60 Degree with 3" (76.2 mm) Radius	<b>WM250J-60</b>	1620-1310	Metal	I.D. 3/8"-24 UNF-2B	3/8"-24 NF-2B

### WeldSkill Standard 400

Description	Part No.	Stock No.	Outer Jacket Material	Back End Threads	Front End Threads
60 Degree with 3" (76.2 mm) Radius	<b>WM400J-60</b>	1640-1305	Metal	I.D. 3/8"-24 UNF-2B	I.D. 3/8"-24 UNF-2B O.D. 9/16"-18UNF-2A
45 Degree with 3" (76.2 mm) Radius	<b>WM400J-45</b>	1640-1306	Metal	I.D. 3/8"-24 UNF-2B	I.D. 3/8"-24 UNF-2B O.D. 9/16"-18UNF-2A

### WeldSkill Standard 500

Description	Part No.	Stock No.	Outer Jacket Material	Back End Threads	Front End Threads
60 Degree with 5" (127 mm) Radius	<b>WM500J-60</b>	1650-1120	Metal	I.D. 7/16"-20UNF-2B	I.D. 7/16"-20 UNF-2B O.D. 5/8"-18 UNF-2A

## Conduit Liners – For Use With Steel Welding Wires

### WM150 & WM250 Series - Steel Wound

Wire Size	Length	Part No.	Stock No.
.030" - .035" (0.8 - 0.9 mm)	15 ft (5 m)	<b>WS42-3035-15</b>	1420-1140
.030" - .035" (0.8 - 0.9 mm)	25 ft (8 m)	<b>WS42-3035-25</b>	1420-1145
.040" - .045" (1.0 - 1.2 mm)	15 ft (5 m)	<b>WS42-4045-15</b>	1420-1141
.040" - .045" (1.0 - 1.2 mm)	25 ft (8 m)	<b>WS42-4045-25</b>	1420-1146

### WM500 Series - Steel Wound

Wire Size	Length	Part No.	Stock No.
.035" - .045" (0.9 - 1.2 mm)	15 ft (5 m)	<b>WS45-3545-15</b>	1450-1104
.052" - 1/16" (1.3 - 1.6 mm)	15 ft (5 m)	<b>WS45-116-15</b>	1450-1114
3/32" (2.4 mm)	15 ft (5 m)	<b>WS45H-332-15</b>	1450-1134

### WM400 Series - Steel Wound

Wire Size	Length	Part No.	Stock No.
.035" - .045" (0.9 - 1.2 mm)	15 ft (5 m)	<b>WS44-3545-15</b>	1440-1140
.035" - .045" (0.9 - 1.2 mm)	25 ft (8 m)	<b>WS44-3545-25</b>	1440-1145
.052" - 1/16" (1.3 - 1.6 mm)	15 ft (5 m)	<b>WS44-116-15</b>	1440-1141
.052" - 1/16" (1.3 - 1.6 mm)	25 ft (8 m)	<b>WS44-116-25</b>	1440-1146
5/64" (2.0 mm)	15 ft (5 m)	<b>WS44-564-15</b>	1440-1142
5/64" (2.0 mm)	25 ft (8 m)	<b>WS44-564-25</b>	1440-1147



## Conduit Liners - For Use With Aluminum Welding Wires

### WM150 & WM250 Series - Teflon

Wire Size	Length	Part No.	Stock No.
.030" - .035" (0.8 - 0.9 mm)	15 ft (5 m)	<b>WS42N-3545-15</b>	1420-1142

### WM400 Series - Nylon

Wire Size	Length	Part No.	Stock No.
.030" - 3/64" (0.8 - 1.2 mm)	15 ft (5 m)	<b>WS44N-3545-15</b>	1440-1135
1/16" (1.6 mm)	15 ft (5 m)	<b>WS44N-116-15</b>	1440-1136

# Electrode Holders



WS532



WS732

## WeldSkill® Electrode Holders

Amperage	Body Alloy	Electrode	Cable	Length	Part No.	Stock No.
200	Brass Alloy	5/32" (4.0 mm)	2/0 (67.4 mm)	8-1/4" (209 mm)	<b>WS532</b>	9110-1180
250	Brass Alloy	3/16" (5.0 mm)	2/0 (67.4 mm)	9-1/4" (235 mm)	<b>WS316</b>	9110-1181
300	Brass Alloy	7/32" (5.5 mm)	2/0 (67.4 mm)	10" (253 mm)	<b>WS732</b>	9110-1182
350	Copper Alloy	1/4" (6.4 mm)	4/0 (107 mm)	11" (279 mm)	<b>WS350E</b>	9110-1118
400	Copper Alloy	1/4" (6.4 mm)	4/0 (107 mm)	12" (305 mm)	<b>WS400E</b>	9110-1119



WHT-400

## WeldSkill "Hold-Tite" Electrode Holder

Amperage	Body Alloy	Electrode	Cable	Length	Part No.	Stock No.
400	--	1/4" (6.4 mm)	3/0 (85 mm)	--	WHT-400	9120-1010

# Ground Clamps



WS300GC

## Copper Ground Clamps

Amperage	Jaw Opening	Jaw Depth	Cable	Length	Part No.	Stock No.
200	1" (24 mm)	2-1/2" (63 mm)	Through 1/0	6" (152 mm)	<b>WS200GC</b>	9205-1215
300	1-1/2" (38 mm)	3-1/2" (88 mm)	Through 2/0	8-1/4" (209 mm)	<b>WS300GC</b>	9205-1216
500	2" (50 mm)	4-7/8" (123 mm)	Through 3/0	10" (253 mm)	<b>WS500GC</b>	9205-1217



WS300SGC

## Steel Ground Clamps

Amperage	Jaw Opening	Jaw Depth	Cable	Length	Part No.	Stock No.
180	1-3/4" (44 mm)	2" (50 mm)	Through 1/0	6-1/2" (165 mm)	<b>WS180SGC</b>	9205-1245
300	2" (50 mm)	2-1/2" (63 mm)	Through 3/0	7-3/4" (196 mm)	<b>WS300SGC</b>	9205-1246
500	2-1/4" (50 mm)	3" (76 mm)	Through 4/0	9-1/2" (241 mm)	<b>WS500SGC</b>	9205-1247

# Cable Connectors



4-WPC

## Positive-CAM Mechanical Cable Connectors

Description	Cable	Std Pkg	Part No.	Stock No.
Complete Set of Connectors	4, 2, 1	1	<b>1-WPC</b>	9425-1125
Connector Male Half Only	4, 2, 1	2	<b>1-WPC-P</b>	9425-1126
Connector Female Half Only	4, 2, 1	2	<b>1-WPC-R</b>	9425-1127
Complete Set of Connectors	1/0, 2/0, 3/0	1	<b>2-WPC</b>	9425-1225
Connector Male Half Only	1/0, 2/0, 3/0	2	<b>2-WPC-P</b>	9425-1226
Connector Female Half Only	1/0, 2/0, 3/0	2	<b>2-WPC-R</b>	9425-1227
Complete Set of Connectors	3/0 or 4/0	1	<b>4-WPC</b>	9425-1425
Connector Male Half Only	3/0 or 4/0	2	<b>4-WPC-P</b>	9425-1246
Connector Female Half Only	3/0 or 4/0	2	<b>4-WPC-R</b>	9425-1247



WDC-75

## Dinse Style Mechanical Cable Connectors

Description	Cable	Std Pkg	Part No.	Stock No.
Complete Set of Connectors	4, 2, 1	1	<b>WDC-25</b>	9425-1445
Connector Male Half Only	4, 2, 1	2	<b>WDC-25-P</b>	9425-1446
Connector Female Half Only	4, 2, 1	2	<b>WDC-25-R</b>	9425-1447
Complete Set of Connectors	1/0, 2/0, 3/0	1	<b>WDC-50</b>	9425-1430
Connector Male Half Only	1/0, 2/0, 3/0	2	<b>WDC-50-P</b>	9425-1431
Connector Female Half Only	1/0, 2/0, 3/0	2	<b>WDC-50-R</b>	9425-1432

## Miscellaneous Connectors

Description	Part No.	Stock No.
50 mm Dinse Male to Tweco #2 & #4 Positive Cam Connectors	<b>2MDC-CK</b>	9425-1240



WS-120H

## Hammer-on Cable Lugs

Amperage	Cable	Stud Hole Size	I.D. Cable Socket	Std Pkg	Part No.	Stock No.
250	3/0 through 4/0	17/32" (13.5 mm)	.660" (16.8 mm)	5	<b>WS-3040H</b>	9520-1128
225	1 through 2/0	17/32" (13.5 mm)	.559" (14.2 mm)	5	<b>WS-120H</b>	9520-1127

# Warranty Information

ESAB <sup>®</sup> WARRANTY PERIOD		3 YRS.	2 YRS.	1 YR.	90 DAY
<b>ESAB FILLER METALS</b>					
ESAB filler metals are guaranteed from defects in material or workmanship and will conform with ESAB's published product specifications for 12 months after the date of shipment, provided that the products are stored and maintained in accordance to ESAB's Storage Guidelines (Document GEN-27116/NA/EN/03-14-18). This warranty does not cover defects derived from the filler metal selection or from the welding operations, which are the sole responsibility of the purchaser and may have an effect in the product's performance. In case of warranty breach, ESAB will have the right to exchange, or accept the return by the Purchaser of existing inventory and issue credit at the price paid by the Purchaser, plus any shipping costs incurred by the purchaser in connection with the purchase of such Product after ESAB has had the opportunity to analyze the claim. No products may be returned to ESAB without ESAB's written authorization.					
<b>ESAB WELDING EQUIPMENT</b>					
ESAB MIG Welding (GMAW) Equipment					
Power Sources & Wire Feeders – Manual & Semi-Automatic		✓			
Automatic & Robotic GMAW Controls, etc.		✓			
GMAW Torches*					✓
<b>ESAB Submerged Arc Welding (SAW) Equipment</b>					
LAF / TAF series Power Sources		✓			
Multitrac, Mastertrac, MiniMaster, ArcMaster, G Master, Tandem		✓			
Controls & Accessories – Flux Recovery System, Joint Tracking and Positioning System, etc.				✓	
<b>ESAB TIG Welding (GTAW) &amp; Stick Welding (SMAW) Equipment</b>					
Power Sources		✓			
GTAW Torches*, Heliarc Outfits					✓
<b>Optional Kits for ESAB Power Sources and Wire Feeders</b>					
Digital Meters, Pulse Kit, Post/Pre Flow, etc.			✓ <sup>1</sup>		
<b>ESAB Remote Controls and Mechanized Controls</b>					
Foot Controls, Hand Controls, Pendants, Arc Starters, UEC-8 Control, J-Governor Control, etc.					✓
<b>ESAB WELDING EQUIPMENT</b>					
<b>ESAB Plasma Equipment</b>					
Power Sources (other than HP 125)		✓			
Automatic Plasma Controls – Flow Control, Plumbing Boxes, etc.		✓			
Plasma Torches*				✓	
<b>ESAB Automation Products</b>					
Miggytrac Tractors				✓	
Orbital Tig – Power sources, controls, accessories and heads				✓	
Applied Automation (CaB, Gantrac, and Walltrac systems)				✓	
Positioners and Turning Rolls				✓	
Engineering Products (FSW, Laser Hybrid, and NGW)				✓	
<b>Miscellaneous</b>					
Cartridge for Eye-Tech Helmets				✓	
Water Circulators				✓	
Remanufactured Equipment				✓	
Special Customer Order Equipment		✓			
<b>ESAB AUTOMATIC CUTTING MACHINES</b>					
SGX, Combirex, Suprarex, Numorex, Telorex Models				✓ <sup>2</sup>	
Crossbow				✓ <sup>3</sup>	
Replacement Parts					✓

\* ESAB strongly recommends the use of original equipment replacement parts for its equipment. While the use of aftermarket parts does not automatically void ESAB's warranties for its equipment, any obligations arising from ESAB's warranty will be voided if the design, manufacture, or composition of parts or components not manufactured by ESAB are a material cause of the malfunction or poor performance of (or damage to) the equipment.

- (1) Same period as associated power sources and wire feeders.
- (2) For breakdowns or failures occurring more than 6 months after shipment the Purchaser is responsible for ESAB's labor cost or expense of repair or replacement of any components or parts thereof which ESAB's examination proves to be defective.
- (3) The Purchaser is responsible for ESAB's labor cost or expense of repair or replacement of any components or parts thereof which ESAB's examination proves to be defective.

WELDSKILL

VICTOR <sup>®</sup> TURBOTORCH <sup>®</sup> WARRANTY PERIOD	LIFETIME	10 YRS.	7 YRS.	3 YRS.	2 YRS.	1 YR.	90 DAY	+ LABOR
EDGE™ 2.0 Series regulators	✓							
Legacy SR Series regulators		✓						
300 series torches and handles		✓						
All "G" Series regulators			✓					
400 series torches and handles			✓					
TurboTorch®				✓				
HP&I Brass Regulators/Manifolds, Oxygen Conservers, All other Victor Medical products					✓			
Steel Cylinders, Cutting Machine Motor (i.e. VCM200)						✓		
HP&I Stainless Regulators/Manifolds (non-corrosive gas), Parts in Rental Applications						✓		
HP&I Corrosive Gas Regulators/Manifolds							✓	



<b>VICTOR</b> <small>AN ESAB BRAND</small>	<b>TURBOTORCH</b> <small>AN ESAB BRAND</small>	WARRANTY PERIOD	LIFETIME	10 YRS.	7 YRS.	3 YRS.	2 YRS.	1 YR.	90 DAY	+ LABOR
EDGE™ 2.0 Series regulators			✓							
Legacy SR Series regulators				✓						
300 series torches and handles				✓						
All "G" Series regulators					✓					
400 series torches and handles					✓					
TurboTorch®						✓				
HP&I Brass Regulators/Manifolds, Oxygen Conservers, All other Victor Medical products							✓			
Steel Cylinders, Cutting Machine Motor (i.e. VCM200)								✓		
HP&I Stainless Regulators/Manifolds (non-corrosive gas), Parts in Rental Applications								✓		
HP&I Corrosive Gas Regulators/Manifolds									✓	

<b>THERMAL DYNAMICS</b> <small>AN ESAB BRAND</small>	<b>THERMAL DYNAMICS</b> <small>AN ESAB BRAND</small>	WARRANTY PERIOD	4 YRS.	3 YRS.	2 YRS.	1 YR.	180 DAY	90 DAY	+ LABOR
Cutmaster® TRUE™ (Power Source)			✓						✓
Drag-Gun® Plus, PAK® 200						✓			✓
AirCut® 15C, CutSkill® units (Power Source), Stand Off Controls, 1Torch®, SureLok®, XTR, XT / XT-301, Maximizer® torches						✓			✓
All Other "Torch and Leads" Packages							✓		✓
Replacement Repair Parts								✓	
A40i, A60i, Cutmaster A80, Cutmaster A120 (US Power Supply)			✓						✓
A40i, A60i, Cutmaster A80, Cutmaster A120 (Non US Power Supply)				✓					✓
Ultra-Cut XT™ and Auto-Cut XT™ (Power Supplies & Components)					✓				✓ 1 yr.
XT™ / XT™-301 Torch (Excluding Consumable Parts)						✓			✓
Repair/Replacement Parts								✓	

<b>Firepower</b>	WARRANTY PERIOD	3 YRS.	2 YRS.	90 DAY	+ LABOR
MST 3-in-1 Machines (Power Source)			✓		
TIG Welding Machines (Power Source)			✓		
OxyFuel Outfits, Tote, Torch Kit, Regulators, Cutting Attachment, Cutting Welding Handle, Straight Cutting Torch, AirFuel Torches, Auto-Darkening Helmets				✓	
MIG Guns & TIG Torches supplied with Power Source					✓

<b>TWECO</b> <small>AN ESAB BRAND</small>	WARRANTY PERIOD	1 YR.	180 DAY	90 DAY	30 DAY	+ LABOR
TC and TCV Water Coolers		✓				
TSC-96 Smoke Collector: 1 year for parts, no warranty for labor		✓				
Professional MIG Guns (i.e. PulseMaster™ MIG Guns & PullMaster™, Spray Master®, Eliminator®, Supra™, Classic No. #, SEFC, etc)			✓			
All Other Products (Including Fusion™ MIG Guns, WeldSkill® MIG and Spool Guns)					✓	

<b>TWECO</b> <small>AN ESAB BRAND</small>	<b>THERMAL ARC</b> <small>AN ESAB BRAND</small>	WARRANTY PERIOD	3 YRS.	2 YRS.	1 YR.	180 DAY	90 DAY	30 DAY	+ LABOR
ArcMaster®, PowerMaster®, Ultrafeed®, Fabricator®3 in 1, Portable DC Welders 161S, 201TS & 186 AC/DC, Ultima® 150, WC-100B			✓						✓
Auto-Darkening Welding Helmet (Electronic Lens) Head Gear assembly which is 1 month				✓					
Victor® Regulator for Fabricator®3 in 1: 2 years for parts, no warranty for labor				✓					
95S, Water Recirculators: 1 year for parts and labor					✓				✓
All Plasma Welding Consoles (i.e WC-1 Controller, WF-100 Capstain Feeder, etc)					✓				✓
Plasma Welding Torch and Leads Packages						✓			✓
Gas Regulators for "Supplied with Power Sources"						✓			
Remote Controls							✓		
Replacement Repair Parts							✓		
MIG and TIG Torches (Supplied with Power Sources)								✓	
Firepower Welders: 5-2-1 years for parts, no warranty for labor									

<b>ARCAIR</b> <small>AN ESAB BRAND</small>	WARRANTY PERIOD	1 YR.	180 DAY	90 DAY	30 DAY	+ LABOR
Arcair® N7500		✓				
All Other Products					✓	

<b>STOODY</b> <small>AN ESAB BRAND</small>	WARRANTY PERIOD
Contact your Stoodly representative for warranty information on this Product.	

## WARRANTY CLAIMS

For all warranty claims, Purchaser should contact ESAB with all relevant details such as ESAB part number, manufacturing date code, heat and control numbers, serial number, complete description of the difficulty encountered, length of time in service, the conditions under which the Products failed, and original purchase price paid.

**For: Welding Equipment/  
Automated Cutting Systems Goods**  
Phone 843-664-4416  
Fax 800-446-5693

**For: Filler Metal Goods**  
Please contact your ESAB Sales Account Manager. If you are an end user, please contact your local Authorized ESAB distributor for assistance with warranty claims.

**For: Mechanized Cutting Systems**  
Phone 843-664-4405  
Fax 843-664-5539

ESAB will determine whether to have the Products returned for inspection and repair or handled in some other manner (for example: shipping replacement Products "no charge" or issuing credit). Credit for Welding Equipment/Automated Cutting Systems may be subject to a depreciation charge based on length of time the Products were in service.

Written approval in the form of a Return Authorization form ("RA") will be issued if Purchaser is to return Products for repair or replacement. **UNDER NO CIRCUMSTANCES ARE ANY PRODUCTS TO BE RETURNED WITHOUT PRIOR WRITTEN AUTHORIZATION FROM ESAB.** A copy of the RA must accompany the return shipment of the Products to ESAB, and the Products must be received within 30 days of issuance of the RA. Any RA remaining open after 30 days will be cancelled, and the Purchaser will be billed for any "no charge" replacement Products supplied. Any Products subsequently returned against a cancelled RA will be returned to the Purchaser freight collect.

If a returned Product is determined to have failed for reasons other than defects in materials or workmanship within the scope of the warranty policy or if the applicable warranty has expired, Purchaser will be contacted for disposition. If such a Product is to be returned to Purchaser, freight charges will be borne by Purchaser, and Purchaser also will be billed for any "no charge" replacement Products supplied during the investigation of the complaint.

**LIMITED WARRANTY:** ESAB® warrants to the party purchasing Products directly from ESAB or from an Authorized Distributor of ESAB ("Purchaser") that those products listed in the Warranty Period section below ("Products") will be free of defects in workmanship or material for the relevant period specified in the Warranty Period section below beginning on the date that the Products are delivered to the Purchaser. If the Purchaser is buying Products from a party expressly authorized by ESAB in writing to sell ESAB Products (an "Authorized Distributor") rather than from ESAB directly then, notwithstanding the foregoing or anything to the contrary herein, in no event shall the warranty period extend more than the time stated in the Warranty Period section below plus 1 year from the date ESAB delivered the Product to the Authorized Distributor. To the extent that any Product identified herein incorporates parts and materials manufactured by ESAB and parts and materials manufactured by third parties, ESAB makes the warranties set forth in this Limited Warranty section only with respect to the parts and materials of the Products manufactured by ESAB. ESAB's warranty on any products that are not manufactured by ESAB and any parts and materials incorporated into Products that are not manufactured by ESAB is limited to extending to Purchaser any warranty offered by the original manufacturer with respect to that product, part or material to the extent that the warranty is assignable. Should any failure to conform to this warranty appear within the time period applicable to the ESAB Products as stated in the Warranty Period section below, ESAB shall correct such defects by suitable repair or replacement, at ESAB's sole option, of any components or parts of the Product determined by ESAB to be defective upon notification thereof and substantiation that the Product has been stored, installed, operated, and maintained in accordance with ESAB's specifications, instructions, recommendations and recognized standard industry practice, and not subject to abuse, misuse, neglect, alteration, accident, improper care and/or maintenance including lack of lubrication and protection from the elements and use of non-ESAB genuine parts (including consumables) that are a material cause of the Product defect. Such repair or replacement shall be performed by ESAB at no cost or expense to the Purchaser other than travel and accommodation costs and expenses for the ESAB Service Engineer should in-plant service be necessary.

**EXCEPT AS SPECIFIED IN THIS LIMITED WARRANTY SECTION, ESAB HEREBY EXPRESSLY DISCLAIMS ANY AND ALL REPRESENTATIONS AND WARRANTIES, WHETHER WRITTEN OR ORAL, WHETHER EXPRESS OR IMPLIED, WHETHER ARISING BY CONTRACT, AT LAW, INEQUITY, BY STRICT LIABILITY OR OTHERWISE, WITH RESPECT TO THE PRODUCTS, INCLUDING, BUT NOT LIMITED TO, ANY WARRANTY OF MERCHANTABILITY, ANY WARRANTY OF FITNESS FOR A PARTICULAR PURPOSE, ANY WARRANTY AGAINST REDHIBITORY DEFECTS, AND ANY WARRANTY AGAINST PATENT, COPYRIGHT, TRADEMARK, TRADE NAME, TRADE SECRET INFRINGEMENT AND ANY OTHER TYPE OF INTELLECTUAL PROPERTY RIGHT INFRINGEMENT UNDER THE LAWS OF ANY NATION, INCLUDING, WITHOUT LIMITATION, THE LAWS OF THE U.S. THIS WARRANTY BECOMES INVALID IF REPLACEMENT PARTS, COMPONENTS OR ACCESSORIES NOT MANUFACTURED BY ESAB ARE USED WHICH MAY IMPAIR THE SAFETY OR PERFORMANCE OF ANY ESAB PRODUCT OR ARE A MATERIAL CAUSE OF THE MALFUNCTION OR POOR PERFORMANCE (OR DAMAGE TO) THE EQUIPMENT. THIS WARRANTY IS INVALID IF THE PRODUCT IS SOLD BY ANY PARTY OTHER THAN ESAB OR AN AUTHORIZED DISTRIBUTOR.**

**EXCEPTIONS TO LIMITED WARRANTY:** Notwithstanding the foregoing or anything to the contrary herein, the warranty described in the Limited Warranty section above shall not apply to:

- ESAB Filler Metals Products whose defect is derived from the filler metal selection or from the welding operations, which are the sole responsibility of the Purchaser and may have an effect on the Product's performance;
- ESAB Automatic Cutting Machine Products or components thereof that have been subject to misuse or accident, or improper installation, maintenance or application nor to any parts which are subject to normal wear or deterioration

such as lenses, fuses, lamps, scrapers, electrodes, shunts, pump impellers, pump casings for waterjet, cutting nozzle and other consumable type Products;

- Routine mechanical, electrical and electronic adjustments made to ESAB Automatic Cutting Machine Products or components thereof such as are described and explained in the instruction manuals furnished with the Products (such adjustments are the responsibility of the Purchaser);
- Electrical or electronic parts of ESAB Automatic Cutting Machine Products damaged by improper voltage supplies, improper electrical connections to the equipment or improper grounding techniques.

**For ESAB Automatic Cutting Machine Products only:**

- Freight charges after the installation period or 30 days from the shipment date of the ESAB Automatic Cutting Machine Products, whichever comes first, for parts replaced under warranty are the responsibility of the Purchaser; and
- Any and all warranties on such ESAB Automatic Cutting Machine Products are automatically void if arc welding is performed on any part of the ESAB Automatic Cutting Machine Products without the express approval of an authorized ESAB representative.

**For ESAB Filler Metals Products only:**

- In case of warranty breach, ESAB will have the right to exchange, or accept the return by the Purchaser of existing inventory of such defective ESAB Filler Metals Products and issue credit at the price paid by the Purchaser, plus any shipping costs incurred by the Purchaser in connection with the purchase of such ESAB Filler Metals Product after ESAB has had the opportunity to analyze the claim.

**LIMITATION OF LIABILITY:** ESAB's total liability to Purchaser and any third parties with respect to the Products (whether as to Products delivered or for delayed delivery or for non-delivery of Products and whether the claim is based on warranty, on contract, on negligence, on tort, on strict liability, on Products defects or otherwise), shall not exceed the amount of the purchase price of the Products with respect to which the claim is made, and ESAB is hereby released from any claim in excess of the aggregate purchase price of those Products upon which the claim is based. **IN NO EVENT SHALL ESAB BE LIABLE TO PURCHASER OR ANY THIRD PARTIES FOR ANY CIRCUMSTANTIAL, CONSEQUENTIAL, CONTINGENT, EXEMPLARY, INCIDENTAL, INDIRECT, LIQUIDATED, MATERIAL, PUNITIVE, SPECIAL, SPECULATIVE OR OTHER DAMAGES, INCLUDING, WITHOUT LIMITATION, DAMAGES FOR LOST PROFITS OR REVENUES, LOST BUSINESS OR BUSINESS INTERRUPTIONS ARISING IN ANY MANNER IN CONNECTION WITH THIS OFFER AND THE SALE, DELIVERY AND USE OF THE PRODUCTS.** Without limiting the generality of the foregoing, Purchaser assumes any and all risks and liability for the results obtained by use of the Products in combination with any other equipment or materials or in the practice of any process, whether in terms of operation costs, general effectiveness, success or failure. The remedies of the Purchaser set forth herein are exclusive.

**ESAB limited warranty shall not apply to: Consumable Parts for MIG, TIG, Plasma welding, Plasma cutting and Oxyfuel torches, O-rings, fuses, filters or other parts that fail due to normal wear.**

- Warranty repairs or replacement claims under this limited warranty must be submitted by an authorized ESAB repair facility within thirty (30) days of the repair.
- No employee, agent, or representative of ESAB is authorized to change this warranty in any way or grant any other warranty, and ESAB shall not be bound by any such attempt. Correction of non-conformities, in the manner and time provided herein, constitutes fulfillment of ESAB's obligations to purchaser with respect to the Product.
- This warranty is void, and seller bears no liability hereunder, if purchaser used replacement parts or accessories which, in ESAB's sole judgment, impaired the safety or performance of any ESAB Product. Purchaser's rights under this warranty are void if the Product is sold to purchaser by unauthorized persons.

---

## The Americas

**Denton, TX USA****U.S. Customer Care**

Ph: 1-800-426-1888 (tollfree)

Fax: 1-800-535-0557 (tollfree)

## International Customer Care

Ph: 1-940-381-1212

Fax: 1-940-483-8178

**Miami, FL USA****Sales Office, Latin America**

Ph: 1-954-727-8371

Fax: 1-954-727-8376

**Customer Care**

Ph: 1-905-827-4515

Fax: 1-800-588-1714 (tollfree)

**Oakville, Ontario, Canada**

---

## Europe

**Chorley, United Kingdom**  
**Customer Care**

Ph: +44 1257-261755

Fax: +44 1257-224800

**Milan, Italy****Customer Care**

Ph: +39 0236546801

Fax: +39 0236546840

**Neuweied, Germany****Customer Care**

Ph: +49 (0) 2631 9999 60

Fax: +49 (0) 2631 9999 610

---

## Asia/Pacific

**Cikarang, Indonesia**  
**Customer Care**

Ph: 6221-8990-6095

Fax: 6221-8990-6096

**Rawang, Malaysia****Customer Care**

Ph: +603 6092-2988

Fax: +603 6092-1085

**Melbourne, Australia****Customer Care**

Ph: 1300-654-674 (tollfree)

Ph: 61-3-9474-7400

Fax: 61-3-9474-7391

**International**

Ph: 61-3-9474-7508

Fax: 61-3-9474-7488

**Shanghai, China****Sales Office**

Ph: +86 21-64072626

Fax: +86 21-64483032

**Singapore****Sales Office**

Ph: +65 6832-8066

Fax: +65 6763-5812



ESAB / [esab.com](http://esab.com)



U.S. Customer Care: 800-426-1888  
Canada Customer Care: 905-827-4515  
International Customer Care: 940-381-1212



64-2103 / NA / English / 11-01-19 / Note: Specifications subject to change without notice. Products may vary from those pictured.