

SP-180T

208/230 Volt AC Input Compact Wire Welder

The SP-180T can help you get it done for farm, light fabrication, auto or home projects. Just plug it into a 208 or 230 volt outlet in your garage, barn or shop.

Simple two knob tapped control makes it easy to tackle thin steel, stainless or aluminum sheet metal with MIG or thicker steel with flux-cored welding. Compare the precise drive, rugged construction and full list of standard accessories. . . Lincoln® SP-180T is an excellent choice!

Processes
MIG, Flux-Cored



Shown:
K2689-1 SP-180T

Output



Input



Advantage Lincoln

Superior Arc Performance:

- **Forgiving arc** makes dialing in your application easy.
- **Smooth arc starts** with minimal spatter.
- **Wide 30-180 amp welding output range** – use .025” wire on the thinnest sheet metal up to .045” flux-cored wire on thick plate.
- **MIG weld 24 gauge up to 3/16”** sheet metal in a single pass. Weld up to 1/2” steel using self-shielded Lincoln Innershield® wire (FCAW-S).

Professional Features:

- **Precise Wire Drive** features:
 - Precision full adjustment drive system reduces chance of wire tangling and crushing.
 - Brass-to-Brass gun connections for enhanced connectivity.
 - Large industrial closed-design drive motor for improved torque and trouble-free performance.

- **Spool Gun Ready** – add the optional Magnum 100SG spool gun for reliable operation at the high wire feed speeds aluminum welding demands. No expensive outboard modules required.
- **No Hassle Tool-less Design** – for wire spool mounting, wire drive service and polarity changes.
- **Innovative contact tip, drive roll and nozzle storage** – keeps all your consumables close at hand.

Superb Quality:

- **Power Chassis™** channels airflow to cool power systems, structurally secures key components and traps wires and cables to avoid unnecessary abrasion.
- **Toughest PC Board Protection in the industry** – ‘Potted’ to seal sensitive components from the environment, ‘trayed’ in a tough plastic tray to add rigidity and shock resistance.
- **Three Year Lincoln® Warranty/90 Days on gun and cable assembly.**

TECHNICAL SPECIFICATIONS

Product Name	Product Number	Input Power	Rated Output Current/Voltage/Duty Cycle	Input Current @ Rated Output	Output Range	Dimensions H x W x D inches (mm)	Net Weight lbs. (kg)
SP-180T	K2689-1	208/230/1/60	208: 130A/17V/30% 230: 130A/20V/30%	20A	30-180 Amps DC 50-500 ipm WFS (1.3-12.7 m/min) Max. OCV: 33	14 x 10.15 x 18.6 (357 x 258 x 472)	66 (30)



A CLOSER LOOK

SUPERIOR ARC PERFORMANCE

- **Forgiving arc characteristics** make dialing in your application easy.
- **Smooth arc starts** with minimal spatter.



Farm Welding



Home Projects



Repair Work

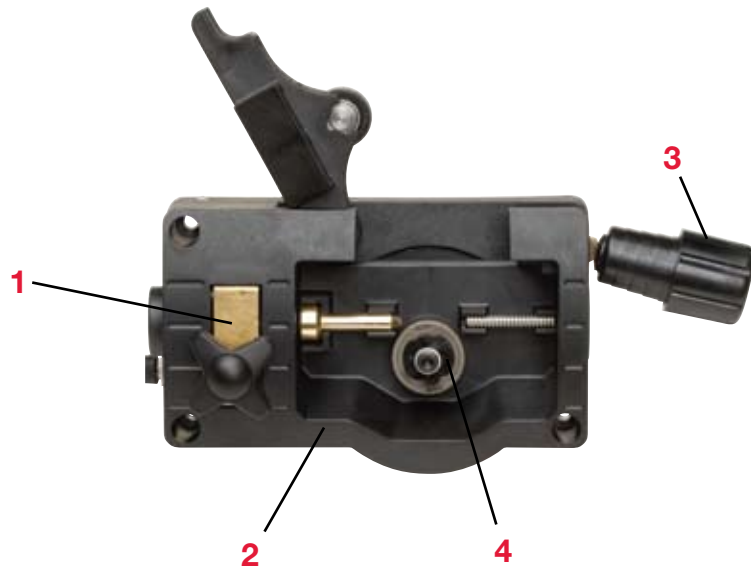
PRECISE WIRE DRIVE

Enhanced Quality

1. Brass Gun Connection Enhances Connectivity
2. Rigid Drive Aids Wire Alignment

Easy to Use

3. Easy Turn Tension Adjustment
4. Tool-less Quick Lock Drive Roll Changeovers



PRECISION ALUMINUM WELDING

Magnum® 100SG Spool Gun

Our low-priced spool gun is your most reliable aluminum feeding solution.



Great For Projects or Repair



Complete Kit. No Bulky Module Required.
Order K2532-1

A CLOSER LOOK

WHAT'S INCLUDED

SP-180T (K2689-1) Includes:

Gun

- Magnum® 100L gun and 10 ft. (3.0 m) cable assembly with brass gun connection and 4-pin MS-Type connection for trigger control (K530-6)
- .025" (0.6 mm) Contact Tips (Qty. 3) (KP11-23)
- .035" (0.9 mm) Contact Tips (Qty. 3) (KP11-35)
- Gasless Nozzle for Innershield® welding (KP1939-1)
- Gas Nozzle for MIG welding (KP21T-39)

Drive

- Spindle Adapter for 8" (203 mm) Diameter Spools (M15445-R)
- .025" (0.6 mm) Wire Diameter Drive Roll for MIG welding (KP2529-1)
- .035" (0.9 mm) Wire Diameter Drive Roll for MIG welding (KP2529-2)
- .030"-.045" (0.7-1.1 mm) Wire Diameter Knurled Drive Roll for Flux-Cored welding (KP2529-3)
- Incoming/Outgoing Wire Guide Set (KP2530-1)

Shielding Gas Apparatus

- Harris® 3000290 Gas Regulator (S25805) and 52 in. (1.3 m) Hose (S19303) for use with CO₂ or argon blend gases. (For use with CO₂ shielding gas, order a Lincoln® S19298 CO₂ shielding gas bottle adapter.)

Welding Wire

- 2 lb. (0.90 kg) Spool of .025" (0.6 mm) diameter SuperArc® L-56® premium MIG wire (ED030583)
- 1 lb. (0.45 kg) Spool of .035" (0.9 mm) diameter Innershield® NR®-211-MP flux-cored wire (ED027641)

Other

- Work Clamp and 10 ft. (3.0 m) Cable
- Handshield (G3364)
- Instruction Manual (IM-891)
- How to Use DVD (S26375)
- Learn to Weld Manual (LTW1)

PERFORMANCE PLUS

SP-180T Welding Capabilities

Process	Wire Dia.	Wire Gauge / Diameter													
		24ga.	22ga.	20ga.	18ga.	16ga.	14ga.	12ga.	10ga.	3/16"	1/4"	5/16"	3/8"	1/2"	
Flux-Cored Welding – Steel	.030"														
	.035"														
	.045"														

Process	Wire Dia.	Wire Type	Pass	DRIVE ROLLS		
				Product Number	Wire Diameter in (mm)	Type/Process
MIG Welding – Steel	.025"	SUPERARC L-56	SP			
	.030"	SUPERARC L-56	SP			
	.035"	SUPERARC L-56	SP			
MIG Welding – Aluminum ¹	.035"	SUPERGLAZE 4043	SP			

SP- Single Pass.
MP- Multiple Pass.

¹Aluminum welding requires optional K2532-1 Magnum® spool gun.

RECOMMENDED OPTIONS

GENERAL OPTIONS



Welding Cart

Full-featured cart is designed to store and transport a welder, 80 cubic foot gas cylinder, welding cables and accessories. Includes an angled top shelf for easy access to welder controls, a lower tray for added storage space, a sturdy handle and a convenient cable wrap hanger.

Order **K2275-1**



Utility Cart

Heavy duty cart stores and transports welder, 150 cubic foot shielding gas cylinder, welding cables and accessories. Includes stable platforms for welder and gas bottle platform, lower tray for added storage capacity and adjustable height handle.

Order **K520**

RECOMMENDED OPTIONS

GENERAL OPTIONS CONT.

Small Canvas Cover

Protect your welder when not in use. Made from attractive red canvas that is flame retardant, mildew resistant and water repellent. Includes a convenient side pocket to hold your welding torch or gun.

Order K2377-1

Spot Timer Kit

This timer allows you to set a fixed weld time of up to 10 seconds that is initiated when you pull the gun trigger. Ideal for making consistent spot welds on thin sheet metal.

Order K2525-1

WIRE FEEDER OPTIONS

Magnum® 100SG Spool Gun

Designed to easily feed 4" (102 mm) diameter 1 lb. (0.45 kg) spools of .030" (0.8 mm) or .035" (0.9 mm) diameter SuperGlaze® aluminum MIG wire. Includes gun, adapter kit, .035" (0.9 mm) contact tips (qty. 3), gas nozzle, and a 1 lb.

(0.45 kg) spool of SuperGlaze® 4043 .035" (0.9 mm) MIG wire.

Packaged in a convenient carrying case.

Order K2532-1

WIRE FEEDER OPTIONS CONT.

.045" (1.1 mm) Innershield® Kit

Includes everything required to weld with .045" (1.1 mm) Innershield® self-shielded flux-cored wire. Includes an .035"-.045" (0.9-1.1 mm) Magnum® 100L gun liner, a .045" (1.1 mm) contact tip, a gasless nozzle, knurled drive roll, .045" (1.1 mm) inner wire guide and a 10 lb. (4.5 kg) spool of .045" (1.1 mm) Innershield® NR®-212 wire.

Order K2528-1

Welding Fume Extractors

Lincoln offers a wide variety of welding fume extraction environmental system solutions, ranging from portable systems easily wheeled around the shop to shop-wide central systems servicing many dedicated welding stations.

Request Publication E13.40



SP-180T ORDER FORM

PRODUCT DESCRIPTION	ORDER NUMBER	QUANTITY	PRICE
SP-180T – 208-230/1/60	K2659-1		
Recommended General Options			
Welding Cart	K2275-1		
Utility Cart	K520		
Small Canvas Cover	K2377-1		
Recommended Wire Feeder Options			
Magnum® 100SG Spool Gun	K2532-1		
.045" (1.1 mm) Innershield® Kit	K2528-1		
Spot Timer Kit	K2525-1		
Welding Fume Extractors	Request Publication E13.40		
	TOTAL:		

CUSTOMER ASSISTANCE POLICY

The business of The Lincoln Electric Company is manufacturing and selling high quality welding equipment, consumables, and cutting equipment. Our challenge is to meet the needs of our customers and to exceed their expectations. On occasion, purchasers may ask Lincoln Electric for information or advice about their use of our products. Our employees respond to inquiries to the best of their ability based on information provided to them by the customers and the knowledge they may have concerning the application. Our employees, however, are not in a position to verify the information provided or to evaluate the engineering requirements for the particular weldment. Accordingly, Lincoln Electric does not warrant or guarantee or assume any liability with respect to such information or advice. Moreover, the provision of such information or advice does not create, expand, or alter any warranty on our products. Any express or implied warranty that might arise from the information or advice, including any implied warranty of merchantability or any warranty of fitness for any customers' particular purpose is specifically disclaimed.

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