



**PLASTICS  
GATE CUTTING  
DEGATING  
ROBOTICS/AUTOMATIC**



MADE IN



U. S. A.

[www.simonds-inc.com](http://www.simonds-inc.com)  
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May 18, 2018



For over thirty years Simonds Inc. has been the acknowledged leader in ergonomic air-powered and hydraulic tools.

Manufacturing from a small town in Massachusetts, this family owned business has distributors all around the world, selling to end users in the injection molding, automotive and aircraft industries. Simonds tools are designed to meet the demanding specifications of the plastics industry and can be mounted either on robots or stationary work stations. Hand held tools are ergonomic in design, helping to reduce injuries due to repetitive motion, along with increasing shop production.

Simonds engineers design specialty cutting blades for work that requires different openings, tighter fits, special angles. All tools are designed with the end users safety, comfort and end product needs in mind.

### **MISSION STATEMENT**

- > TO OWN THE PNEUMATIC/HYDRAULIC HAND TOOL BUSINESS, THROUGH THE USE OF ERGONOMIC DESIGNS AND ADVANCED ENGINEERING
- > TO PROVIDE SOLUTIONS TO THE CUTTING, CRIMPING AND DEGATING PROBLEMS OF THE INDUSTRIES.
- > TO PROVIDE THE FINEST PNEUMATIC HAND TOOLS AS MEASURED BY OUR CUSTOMERS, ASSOCIATES AND SUPPLIERS.

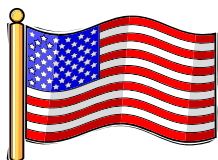
Call Simonds Inc. For A Distributor Near You

Toll Free—866-764-3235 Fax—866-678-5765

[sales@simonds-inc.com](mailto:sales@simonds-inc.com)

### **WARRANTY**

**Simonds power packs are warranted to be free from defects in materials and workmanship for a period of one year, barring alterations, abuse or misuse. All products returned for warranty repair must be sent to Simonds, Inc., Southbridge, MA at end users expense, where it will be repaired or replaced at the company's discretion**



**MADE WITH PRIDE IN THE U.S.A.**

# SQUEEZE-EZE™ POWER PACKS AND JAWS



MSP-1 with optional jaw

## MSP-1 SQUEEZE-EZE™ POWER PACKS

The MSP-1 is our miniature power pack, for use with our PGC –1CH jaw set (see below). Made of durable aluminum, the tool is small (5" long x 1 1/4" diameter) lightweight (8 oz.) and can be operated at air pressures of 60-80 psi. A built in adjusting screw controls the opening of the jaw sets. All Simonds jaw sets are easily re-sharpened at the factory



SP-01P with optional PGC-2CH jaw

## SP-01P and SP-02P SQUEEZE-EZE™ POWER PACKS

High powered tools made specifically for the plastics industry. These precision manufactured tools help increase production while lowering costs.

SP-01P and SP-02P are designed to use all of the jaws below. The SP-01P is further designed with a built in adjusting screw which controls the opening of the jaw sets. Manufactured to high standards from aluminum, these power packs can easily be mounted on EOAT for robots, benches or can be used manually by hand.



SP-02P with optional PGC-7 jaw

For EOAT and bench mounting, a solenoid operated model of each power pack is available. SP-01PF or SP-02PF includes two (2) 5' air hoses, hex key and are designed for use with our optional workstations, tool balancers and bench stands. There are also optional foot switches available for each power pack (Accessories and foot switches found on pages 7-8).

Power packs are priced and sold less jaw sets.



PGC-1CH  
(Use w/MSP-1 )

Angle	25°
Length of Cut	9/16" (14 mm)
Type of Cut	Flush
Plastic Only	



PGC-2-90

Angle	90°
Length of Cut	1" (25 mm)
Type of Cut	Flush
Max. Opening	23/64" (9.06 mm)



PGC-2CH

Angle	18°
Length of Cut	7/8" (22 mm)
Type of Cut	Flush
Max. Opening	31/64" (12.25 mm)



CD-6

Angle	15°
Length of Cut	7/8" (22 mm)
Plastics Only	Tapered Outside Edge
Max. Opening	To 0.18" (4.75 mm)



PGC-2-45

Angle	45°
Length of Cut	5/64" (20 mm)
Type of Cut	Flush
Max. Opening	29/64" (11.48 mm)



PGC-7

Angle	Straight Cutter
Length of Cut	1" (25 mm)
Type of Cut	Flush
Max. Opening	7/16" (11.23 mm)



PGC-2-60

Angle	60°
Length of Cut	3/4" (19 mm)
Type of Cut	Flush
Max. Opening	13/32" (10.50 mm)



PGC-8

Angle	End Cutter
Length of Cut	19/64" (7.5 mm)
Type of Cut	Flush
Max. Opening	29/64" (11.70 mm)

# SQUEEZE-PLIERS™ POWER PACKS

## SQUEEZE-PLIERS™ POWER PACKS—SINGLE STAGE

This group of air operated hand tools comprises three power packs that can be used interchangeably with any jaw set described on page 6. Standard power packs have a stroke of 1 1/2" and may be operated at 60-100 psi. For hand operation each pack is furnished with a lever controlled internal air valve and a 5' air hose.

The power packs can be furnished for foot, robotic and EOAT by designating the suffix "F" in the part number (i.e. SP-002F) This style does not have the lever operated air valve, but instead has two (2) 1/8" ports in the rear of the pack for connection to a footswitch or four way valve. Two (2) 5' air hoses are supplied with "F" models, and an optional four way footswitch is available (Model #107) if required. (These tools can be used with the optional workstation and bench stand as shown on page 7).

**SP-002F**



## SPECIFICATIONS

<b>LENGTH</b>	4" (100 mm)
<b>WEIGHT</b>	1 lb.
<b>DIAMETER</b>	1.72" (43.75 mm)
<b>CFM @ 30 STROKES MIN.</b>	0.09 cu. ft.
<b>CLOSING FORCE @ 80 psi</b>	Finish—1120 lbs.
<b>CAM</b>	Hexagon
<b>MATERIAL</b>	Aluminum

**SP-003**



<b>LENGTH</b>	4" (100 mm)
<b>WEIGHT</b>	1 lb. 7 oz.
<b>DIAMETER</b>	2.22" (56.25 mm)
<b>CFM @ 30 STROKES MIN.</b>	0.16 cu. ft.
<b>CLOSING FORCE @ 80 psi</b>	Finish—2000 lbs.
<b>CAM</b>	Hexagon
<b>MATERIAL</b>	Aluminum

**SP-004**



<b>LENGTH</b>	4" (100 mm)
<b>WEIGHT</b>	1 lb. 8 oz.
<b>DIAMETER</b>	2.46" (62.5 mm)
<b>CFM @ 30 STROKES MIN.</b>	0.20 cu. ft.
<b>CLOSING FORCE @ 80 psi</b>	Finish—2400 lbs.
<b>CAM</b>	Hexagon
<b>MATERIAL</b>	Aluminum

Closing force is measured 1" away from pivot point of jaw.  
 More powerful packs with higher closing forces available, please consult factory for recommendations and quotation.  
 For more complete technical data and other Simonds products, visit our web site at [www.simonds-inc.com](http://www.simonds-inc.com).

**SQUEEZE-EZE™ POWER PACKS—ROBOTIC AUTOMATIC POWER PACK**

The SM-100, SM-55 and SM-50 Robotic/Automatic power pack was designed for automation. Fitted for solenoid activation, these are versatile tool. The square mounting block allows the tool to be attached to existing or new automatic machines. Light weight in design these tools fit easily on to robotic EOAT. All of these features, along with optional jaws makes these some of the most powerful and versatile tools in the industry. (These tools use the optional jaw sets shown on page 3).



**SM-100 with Optional PGC-2CH Jaw**  
Optional Jaws on Page 3

**SM-100 SPECIFICATIONS**

<b>LENGTH</b>	4.38" (111.1 mm)
<b>WEIGHT</b>	10 oz.
<b>DIAMETER</b>	1.50" (38.1 mm)
<b>CFM @ 30 STROKES MIN.</b>	0.060 cfm
<b>THRUST FORCE @ 80 psi</b>	123 lbs.
<b>MATERIAL</b>	Aluminum

**SM-55—TWO STAGE SPECIFICATIONS**

<b>LENGTH</b>	5.02" (127.5 mm)
<b>WEIGHT</b>	7.2 oz.
<b>DIAMETER</b>	1.25" (31.75 mm)
<b>CFM @ 30 STROKES MIN.</b>	0.090 cfm
<b>THRUST FORCE @ 80 psi</b>	112 lbs.
<b>MATERIAL</b>	Aluminum



**SM-55 with Optional PGC-1.5 Jaw**

**SM-50 SPECIFICATIONS**

<b>LENGTH</b>	3.72" (94.49 mm)
<b>WEIGHT</b>	4 oz.
<b>DIAMETER</b>	1.25" (31.75 mm)
<b>CFM @ 30 STROKES MIN.</b>	0.045 cfm
<b>THRUST FORCE @ 80 psi</b>	56 lbs.
<b>MATERIAL</b>	Aluminum



**SM-50 with Optional PGC-1.5 Jaw**

<b>Angle</b>	0°
<b>Length of Cut</b>	7/8" (22 mm)
<b>Type of Cut</b>	Flush
<b>Max. Opening</b>	7/32" (5.56 mm)



**PGC-1.5—PLASTICS ONLY**  
**FOR SM-50 and SM-55 ONLY**

# SQUEEZE-PLIERS™ JAW AND HOUSING


## SQUEEZE-PLIERS™ JAW AND HOUSING ASSEMBLY

Each assembly comprises a pair of movable jaws pivoted in one end of an aluminum housing that screws (hand tight) onto the threaded stem of power packs SP-002 to SP-004. Rollers at the inside ends of the jaws ride on the actuator-cam so that the cutting edges of the jaws are squeezed together as the cam moves forward under air pressure. This even pressure makes cutting gates and sprues easy and clean. Combined with Simonds power packs (page 4 ) this offering of jaws will handle most jobs in the injection molding industry. Special jaws engineered upon request.

All jaws are made of hardened tool steel. (Special order jaws hardened to 59-62 Rockwell are also available). The housing material is aluminum. As with all Simonds jaws, these can be factory sharpened to provide longer life and a higher return on investment. Special jaws may be designed upon request. Download our "Engineering Evaluation Form" from our web site at [www.simonds-inc.com](http://www.simonds-inc.com).

### PGC-4CH

### SPECIFICATIONS



<b>HOUSING LENGTH</b>	4 1/4" (106.25 mm)
<b>OVERALL LENGTH</b>	5 7/8" (149 mm)
<b>WEIGHT</b>	1 lb. 5 oz.
<b>DIAMETER</b>	1 3/4"
<b>LENGTH OF CUT</b>	7/8" (21.62 mm)
<b>MAX. OPENING</b>	5/8" (15.85 mm)
<b>CUTTING ANGLE</b>	25°

### PGC-4-30



<b>HOUSING LENGTH</b>	4 1/4" (106.25 mm)
<b>OVERALL LENGTH</b>	6 5/8" (175 mm)
<b>WEIGHT</b>	1 lb. 5 oz.
<b>DIAMETER</b>	1 3/4"
<b>LENGTH OF CUT</b>	1 1/8" (28.57 mm)
<b>MAX. OPENING</b>	7/8" (22.48 mm)
<b>CUTTING ANGLE</b>	30°

### PGC-4-45



<b>HOUSING LENGTH</b>	4 1/4" (106.25 mm)
<b>OVERALL LENGTH</b>	6 3/16" (157 mm)
<b>WEIGHT</b>	1 lb. 5 oz.
<b>DIAMETER</b>	1 3/4"
<b>LENGTH OF CUT</b>	1 7/64" (28.12 mm)
<b>MAX. OPENING</b>	11/16" (17.23 mm)
<b>CUTTING ANGLE</b>	45°

### PGC-4-60

### SPECIFICATIONS



<b>HOUSING LENGTH</b>	4 1/4" (106.25 mm)
<b>OVERALL LENGTH</b>	6" (152 mm)
<b>WEIGHT</b>	1 lb. 5 oz.
<b>DIAMETER</b>	1 3/4"
<b>LENGTH OF CUT</b>	1 5/32" (29.33 mm)
<b>MAX. OPENING</b>	11/16" (17.23 mm)
<b>CUTTING ANGLE</b>	60°

### PGC-4-90



<b>HOUSING LENGTH</b>	4 1/4" (106.25 mm)
<b>OVERALL LENGTH</b>	5 1/2" (139 mm)
<b>WEIGHT</b>	1 lb. 5 oz.
<b>DIAMETER</b>	1 3/4"
<b>LENGTH OF CUT</b>	15/32" (29.33 mm)
<b>MAX. OPENING</b>	17/32" (13.64 mm)
<b>CUTTING ANGLE</b>	90°



Power Packs designed for use on automated machines and robots

Replacement jaws may be purchased separate from housing. All Simonds jaws are able to be re-sharpened at the factory.

# ERGONOMIC WORK STATIONS AND HOLDERS

Simonds' line of ergonomic support systems is for use with any power pack or jaw set combination. Helping to relieve the strain and fatigue of hefting a power pack all day, these systems will help improve productivity while eliminating injuries through ergonomic design. The optional tool balancer and tool harness is made for holding the power pack and jaw set in a horizontal position.



## WS-2000 ERGONOMIC WORK STATION

The WS-2000 Ergonomic work station is a complete support system for use with any of the power packs in our product line. This heavy duty work station features a 36" horizontal, 180 degree boom, attached to a 48" vertical column with a base that mounts easily to bench tops. The boom can be adjusted vertically higher or lower on the column to suit your specific application.

Also included with the WS-2000 is a balancer trolley. This heavy duty trolley is of ball bearing construction and can support up to 30 pounds, allowing more free space in the work area. The **Optional** tool balancers and tool harness (shown in picture) will support all weights of Simonds tools.

Optional tool balancer and harness shown in picture sold separate

The **WS-2000 and A-202 Series** of work stations and bench stands are designed to be mounted on tables or work stations by either bolting through holes provided or by using Simonds part number BC-1 bench clamp.

The A-202 series of bench stands allows the tool to be rotated easily to position the tool for optimum cutting. The bench stand is further designed to be easily integrated onto robotic arms or moving work stations

## TOOL BALANCER



TB-1	TB-2	TB-3
1 lb.	5 lbs.	11 lbs.

SUPPORTS UP TO WEIGHT SHOWN

## TOOL HARNESS

TH-1	TH-2
Use w\SP-01P—SP-02P	Use w\SP-002—SP-008

## REMOTE POWER PACK BENCH STAND

ITEM NUMBER	USE WITH POWER PACK
A-202-1	SP-01PF
A-202-2	SP-02PF and SP-002F
A-202-3	SP-003F
A-202-4	SP-004F-SP-005F
A-202-6	SP-006F
A-202-8	SP-008F



# ACCESSORIES



103

<b>FOOT SWITCHES</b>
Use with power packs with the "F" suffix



107



<b>AIR HOSES</b>
5, 7, 10, 15 foot with two 1/8" npt fittings
5,7,10,15 foot with one 1/8" npt and one 1/4" npt fitting

**DISTRIBUTOR:**

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VISIT OUR WEB SITE AT:**

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