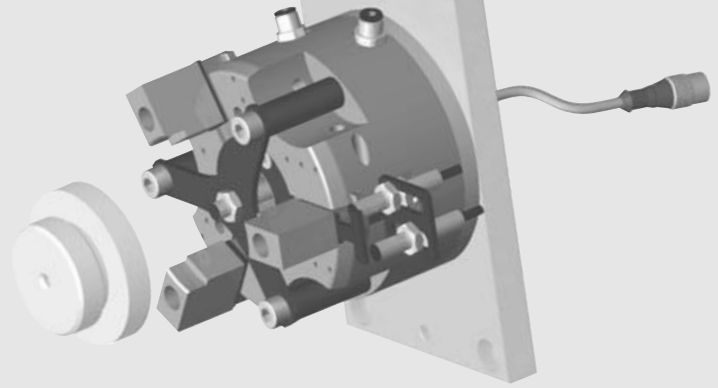
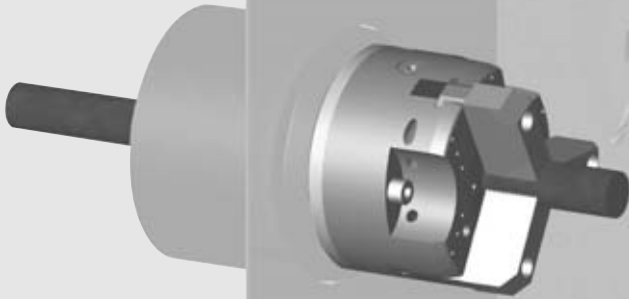


# Through Hole Parallel Gripper PPC Series



**Through Hole Gripper:**

Designed for unique applications where a component ejector is needed after un-gripping the part or to blow air for cleaning the part center. The through hole design allows for the mounting of sensors to detect part presence, and for feeding parts to machining centers.

**Machining applications:**

The 3 concentric jaws and the excellent repeatability make it easier to accurately load and unload round parts.

**Compact, robust and powerful gripper:**

This gripper is designed for use in confined spaces, combining long strokes with a high grip force. Optional safety springs retain the components, should the air supply fail or to increase grip force.

**Harsh environments:**

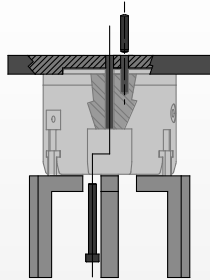
Shielded design repels chips and other particulate from internal drive mechanism.

**Multipurpose gripper:**

A wide range of options and accessories (extended stroke, safety springs for internal or external gripping, inductive sensors, Viton® seals) allow these grippers to be used in a number of applications.

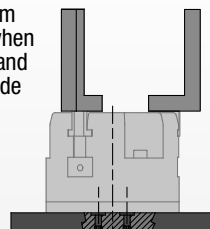
**Mounting Information:**

**Grippers can be mounted and operated in any direction**

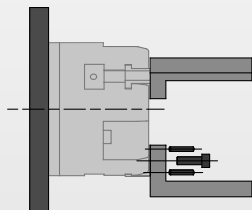


Gripper is located using pilot boss and a dowel pin and assembled with 3 through body screws

The gripper is protected from falling debris when it is mounted and operated upside down



Gripper can be operated utilizing top manifold air ports



Fingers are located on jaws with 2 dowel pins and assembled with 1 screw

**Technical Specifications:**

**Pneumatic Specifications**

Pressure Operating Range without springs  
Pressure Operating Range with springs  
Cylinder Type

**Imperial**

30-100 psi

45-100 psi

**Metric**

2-7 bar

3-7 bar

**Double Acting or Double Acting Spring Assist or Single Acting Spring Return Internally Lubricated Buna-N**

Dynamic Seals  
Valve Required to Operate  
Double Acting  
Single Acting

4-way, 2-position  
3-way, 2-position

**Air Quality Requirements**

Air Filtration  
Air Lubrication  
Air Humidity

40 Micron or Better  
Not Necessary\*  
Low Moisture Content (dry)

**Temperature Operating Range**

Buna-N Seals (standard)  
Viton® Seals (optional)

-30°~180° F  
-20°~300° F

-35°~80° C  
-30°~150° C

**Maintenance Specifications†**

Expected Life  
Normal Application w/ Preventative Maintenance  
Field Repairable  
Seal Repair Kits Available

5 million cycles  
10+ million cycles\*  
Yes  
Yes

\*Addition of lubrication will greatly increase service life  
† See Maintenance Section

## Product Features

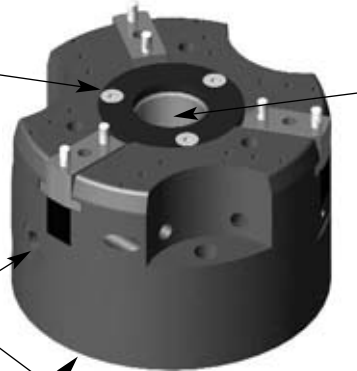
**Viton® Seals**  
Optional for high temperature applications

**Quality Components**  
Made from Aluminum alloy, hard coat anodized with Teflon® Impregnation. The gripper's main components are made of heat treated steel

**Standard Stroke and Extended Stroke**  
Each model of gripper is available in 2 stroke lengths

**Shield and Covers**  
Gripper body is shielded to repel chips and other particulate from internal drive mechanism

**Multiple Ports**  
Side or top manifold ports

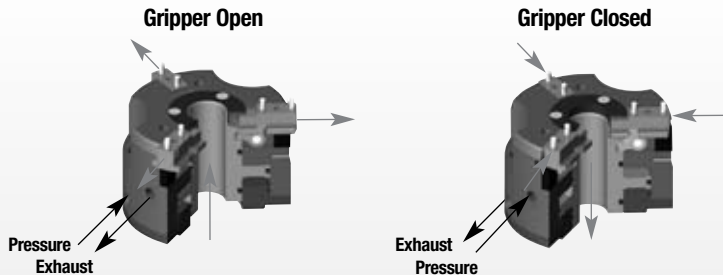
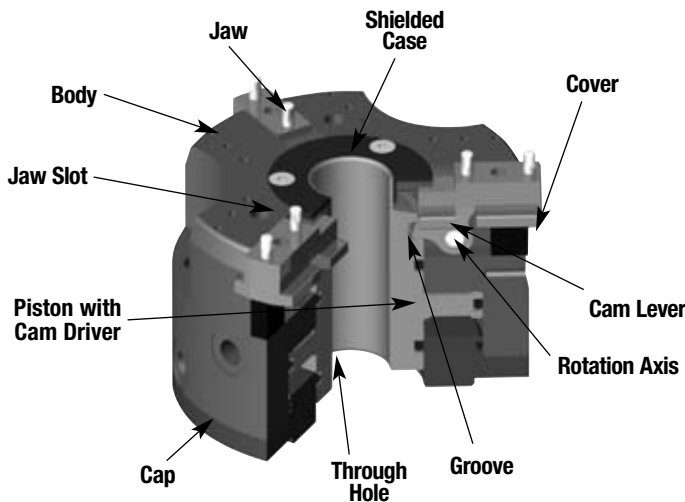


**Through Hole Design**  
The standard hole diameter can be customized with optional sleeves

**Inductive Sensing**  
Inductive sensor kits available. Capable of sensing 4 positions

**Safety Springs**  
Optional Springs for internal gripping (-RI) or external gripping (-RE) in single acting mode or spring assist

## Operating Principle



- A double acting piston with a through hole drives the three cams.
- The piston's motion makes the cam lever rotate and moves the jaws.
- The three cams synchronize the jaw motion.
- Optional springs can be used to increase the grip force or to hold part in the event of loss of air.
- This gripper is suitable for internal or external gripping.

## Style-PPC-12 & PPC-12-C

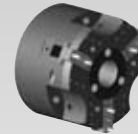


**Style:** PPC-12  
**Total Stroke:** 0.394 in. 10 mm  
**Grip Force:** 331 lb 1474 N  
**Weight:** 2.2 lb 1.00 Kg

**Style:** PPC-12-C  
**Total Stroke:** 0.630 in. 16 mm  
**Grip Force:** 201 lb 896 N  
**Weight:** 2.4 lb 1.10 Kg

See Page **1.270-1.271**

## Style-PPC-25 & PPC-25-C

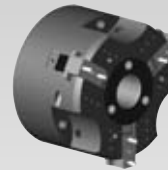


**Style:** PPC-25  
**Total Stroke:** 0.512 in. 13 mm  
**Grip Force:** 589 lb 2620 N  
**Weight:** 4.9 lb 2.20 Kg

**Style:** PPC-25-C  
**Total Stroke:** 0.787 in. 20 mm  
**Grip Force:** 369 lb 1642 N  
**Weight:** 5.1 lb 2.30 Kg

See Page **1.272-1.273**

## Style-PPC-34 & PPC-34-C



**Style:** PPC-34  
**Total Stroke:** 0.787 in. 20 mm  
**Grip Force:** 974 lb 4332 N  
**Weight:** 11.2 lb 5.10 Kg

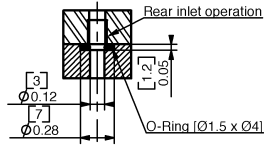
**Style:** PPC-34-C  
**Total Stroke:** 1.181 in. 30 mm  
**Grip Force:** 638 lb 2838 N  
**Weight:** 11.7 lb 5.3 Kg

See Page **1.274-1.275**

# PARALLEL GRIPPERS PPC-12 THROUGH HOLE SERIES

1.270

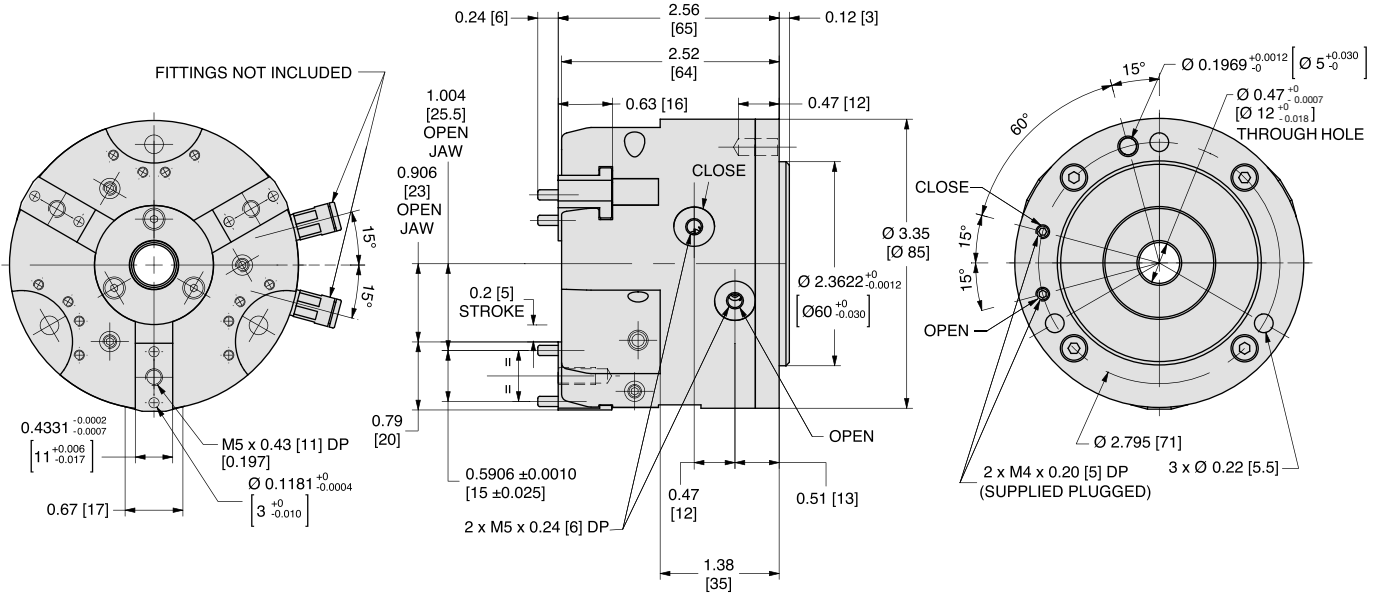
Grippers are supplied with open side air ports and top manifold air ports plugged. Top manifold sealing dimensions shown.



### Specifications

|   | PPC-12               |                    |
|---|----------------------|--------------------|
| Total Rated Grip Force @ 100 psi, 7 bar | 331 lbs.*            | 1474 N*            |
| Total Stroke                            | 0.394 in.            | 10 mm              |
| Weight                                  | 2.2 lbs.             | 1.0 Kg             |
| Pressure Range without Springs          | 30-100 psi           | 2-7 bar            |
| Pressure Range with Springs             | 45-100 psi           | 3-7 bar            |
| Cylinder Bore Ø                         | 2.48 in.             | 63 mm              |
| Displacement                            | 1.40 in <sup>3</sup> | 23 cm <sup>3</sup> |
| Temperature Range                       |                      |                    |
| Standard Seals                          | -30°~180° F          | -35°~80° C         |
| Viton® Seals                            | -20°~300° F          | -30°~150° C        |
| Actuation                               | 0.03 sec.            | 0.03 sec.          |
| Repeatability                           | ±0.0008 in.          | ±0.02 mm           |

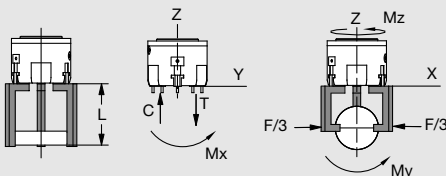
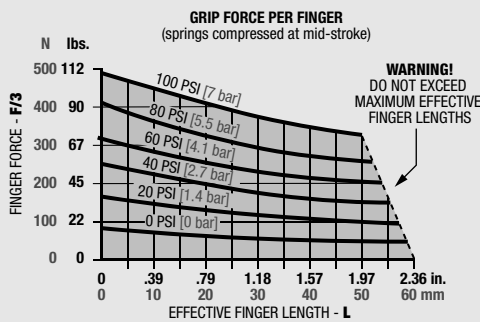
\*With Option RE or RI



UNLESS OTHERWISE NOTED ALL TOLERANCES ARE AS SHOWN BELOW

|   |                        |   |                                |  |   |
|---|------------------------|---|--------------------------------|--|---|
| Dimensions are symmetrical about centerline | Third Angle Projection | All Dowel Holes are SF (Slip Fit).<br>Locational Tolerance ±.0005" or [±.013mm] | Metric Threads<br>Course Pitch | <b>Imperial in.</b><br>0.00 = ±.01<br>0.000 = ±.005<br>0.0000 = ±.0005 | <b>Metric [mm]</b><br>[0.] = [±.25]<br>[0.0] = [±.13]<br>[0.00] = [±.013] |
|---|------------------------|---|--------------------------------|--|---|

## Loading Information



| Loading Capacity <sup>†</sup> | Static       |          | Dynamic     |          |
|-------------------------------|--------------|----------|-------------|----------|
|                               | Value        | [Metric] | Value       | [Metric] |
| Maximum Tensile <b>T</b>      | 191 lbs.     | [850 N]  | 49 lbs.     | [220 N]  |
| Maximum Compressive <b>C</b>  | 259 lbs.     | [1150 N] | 49 lbs.     | [220 N]  |
| Maximum Moment <b>Mx</b>      | 177 in.-lbs. | [20 Nm]  | 53 in.-lbs. | [6 Nm]   |
| Maximum Moment <b>My</b>      | 177 in.-lbs. | [20 Nm]  | 53 in.-lbs. | [6 Nm]   |
| Maximum Moment <b>Mz</b>      | 443 in.-lbs. | [50 Nm]  | 89 in.-lbs. | [10 Nm]  |

<sup>†</sup>Capacities are per set of jaws and are not simultaneous

## How to Order: (Order Accessories separately from Basic Model)

BASIC MODEL

VITON® SEALS

PPC-12 - [ ] - V

SAFETY SPRINGS (See below)

**SAFETY SPRINGS** **RE** External Clamping  
**RI** Internal Clamping  
\_ Leave Blank. No Spring Option (standard)

### SENSOR ACCESSORIES

|   | Order #         | QTY/UNIT      |
|---|-----------------|---------------|
| Inductive Sensor Holder Kit (1 Holder, 1 Flag, 2 Spacers) | <b>OSMK-105</b> | <b>1 to 2</b> |
| Inductive NPN Sensor M8 with Quick Disconnect             | <b>OISN-011</b> | <b>1 to 4</b> |
| Inductive PNP Sensor M8 with Quick Disconnect             | <b>OISP-011</b> | <b>1 to 4</b> |
| Quick Disconnect 2 Meter Cable Length                     | <b>CABL-010</b> | <b>1 to 6</b> |
| Quick Disconnect 5 Meter Cable Length                     | <b>CABL-013</b> | <b>1 to 6</b> |

### PNEUMATIC ACCESSORIES

|                          | Order #          | QTY/UNIT |
|--------------------------|------------------|----------|
| Standard Seal Repair Kit | <b>SLKT-207</b>  | <b>1</b> |
| Viton® Seal Repair Kit   | <b>SLKT-207V</b> | <b>1</b> |

Detailed sensor information at the end of this section.

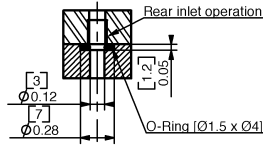


# PARALLEL GRIPPERS PPC-12-C THROUGH HOLE SERIES

PPC SERIES

1.271

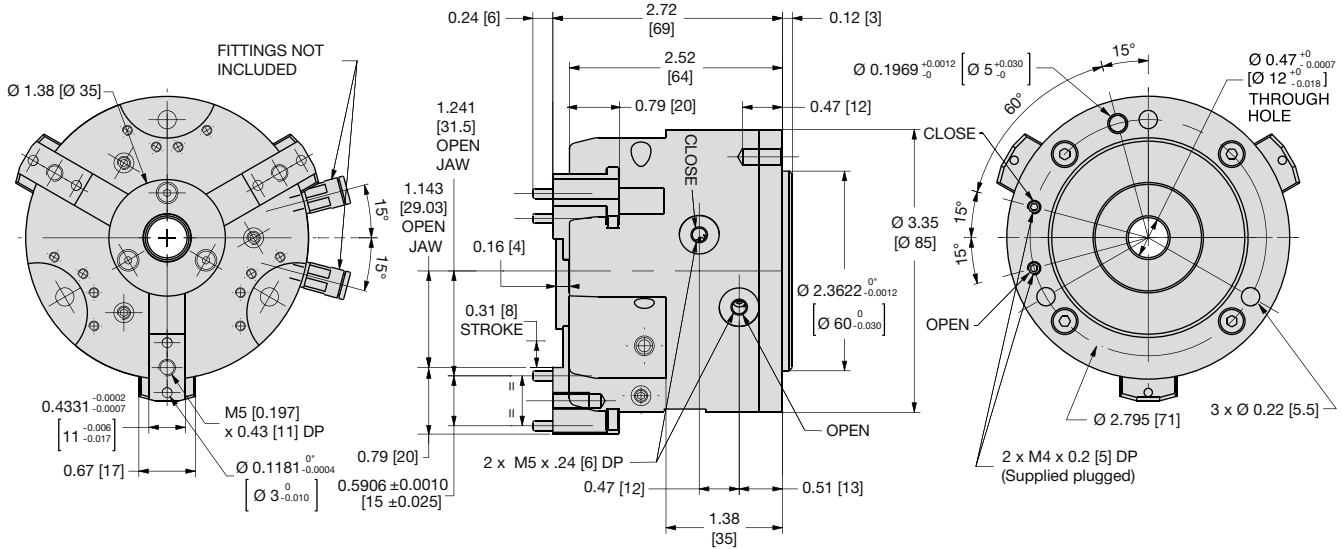
Grippers are supplied with open side air ports and top manifold air ports plugged. Top manifold sealing dimensions shown.



### Specifications

|   | PPC-12-C             |                    |
|---|----------------------|--------------------|
| Total Rated Grip Force @ 100 psi, 7 bar | 201 lbs.*            | 896 N*             |
| Total Stroke                            | 0.630 in.            | 16 mm              |
| Weight                                  | 2.4 lbs.             | 1.1 Kg             |
| Pressure Range without Springs          | 30-100 psi           | 2-7 bar            |
| Pressure Range with Springs             | 45-100 psi           | 3-7 bar            |
| Cylinder Bore Ø                         | 2.48 in.             | 63 mm              |
| Displacement                            | 1.40 in <sup>3</sup> | 23 cm <sup>3</sup> |
| Temperature Range                       |                      |                    |
| Standard Seals                          | -30°~180° F          | -35°~80° C         |
| Viton® Seals                            | -20°~300° F          | -30°~150° C        |
| Actuation                               | 0.03 sec.            | 0.03 sec.          |
| Repeatability                           | ±0.0008 in.          | ±0.02 mm           |

\*with Option RE or RI

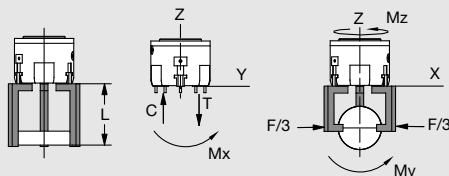
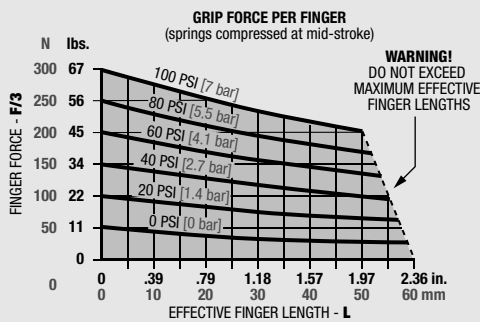


UNLESS OTHERWISE NOTED ALL TOLERANCES ARE AS SHOWN BELOW

|   |                        |  |                             |  |   |
|---|------------------------|--|-----------------------------|--|---|
| Dimensions are symmetrical about centerline | Third Angle Projection | All Dowel Holes are SF (Slip Fit). Locational Tolerance ±.0005" or [±.013mm] | Metric Threads Course Pitch | <b>Imperial in.</b><br>0.00 = ±.01<br>0.000 = ±.005<br>0.0000 = ±.0005 | <b>Metric [mm]</b><br>[0.] = [±.25]<br>[0.0] = [±.13]<br>[0.00] = [±.013] |
|---|------------------------|--|-----------------------------|--|---|

## Loading Information

## How to Order: (Order Accessories separately from Basic Model)



| Loading Capacity†            | Static                |       | Dynamic             |       |
|------------------------------|-----------------------|-------|---------------------|-------|
|                              | Value                 | Value | Value               | Value |
| Maximum Tensile <b>T</b>     | 214 lbs. [950 N]      |       | 49 lbs. [220 N]     |       |
| Maximum Compressive <b>C</b> | 281 in.-lbs. [1250 N] |       | 49 lbs. [220 N]     |       |
| Maximum Moment <b>Mx</b>     | 177 in.-lbs. [20 Nm]  |       | 53 in.-lbs. [6 Nm]  |       |
| Maximum Moment <b>My</b>     | 177 in.-lbs. [20 Nm]  |       | 53 in.-lbs. [6 Nm]  |       |
| Maximum Moment <b>Mz</b>     | 531 in.-lbs. [60 Nm]  |       | 89 in.-lbs. [10 Nm] |       |

†Capacities are per set of jaws and are not simultaneous

### BASIC MODEL

### EXTENDED STROKE

**PPC-12 - [ ] - C - V**

### SAFETY SPRINGS (See below)

### VITON® SEALS

**SAFETY SPRINGS** **RE** External Clamping  
**RI** Internal Clamping  
 \_\_\_ Leave Blank. No Spring Option (standard)

### SENSOR ACCESSORIES

|   | Order #         | QTY/UNIT      |
|---|-----------------|---------------|
| Inductive Sensor Holder Kit (1 Holder, 1 Flag, 2 Spacers) | <b>OSMK-105</b> | <b>1 to 2</b> |
| Inductive NPN Sensor M8 with Quick Disconnect             | <b>OISN-011</b> | <b>1 to 4</b> |
| Inductive PNP Sensor M8 with Quick Disconnect             | <b>OISP-011</b> | <b>1 to 4</b> |
| Quick Disconnect 2 Meter Cable Length                     | <b>CABL-010</b> | <b>1 to 6</b> |
| Quick Disconnect 5 Meter Cable Length                     | <b>CABL-013</b> | <b>1 to 6</b> |

### PNEUMATIC ACCESSORIES

|                          | Order #          | QTY/UNIT |
|--------------------------|------------------|----------|
| Standard Seal Repair Kit | <b>SLKT-207</b>  | <b>1</b> |
| Viton® Seal Repair Kit   | <b>SLKT-207V</b> | <b>1</b> |

Detailed sensor information at the end of this section.

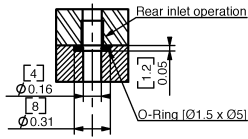
Please see back cover for DE-STA-CO Global Locations. [www.destaco.com](http://www.destaco.com)

[www.comoso.com](http://www.comoso.com)

# PARALLEL GRIPPERS PPC-25 THROUGH HOLE SERIES

1.272

Grippers are supplied with open side air ports and top manifold air ports plugged. Top manifold sealing dimensions shown.

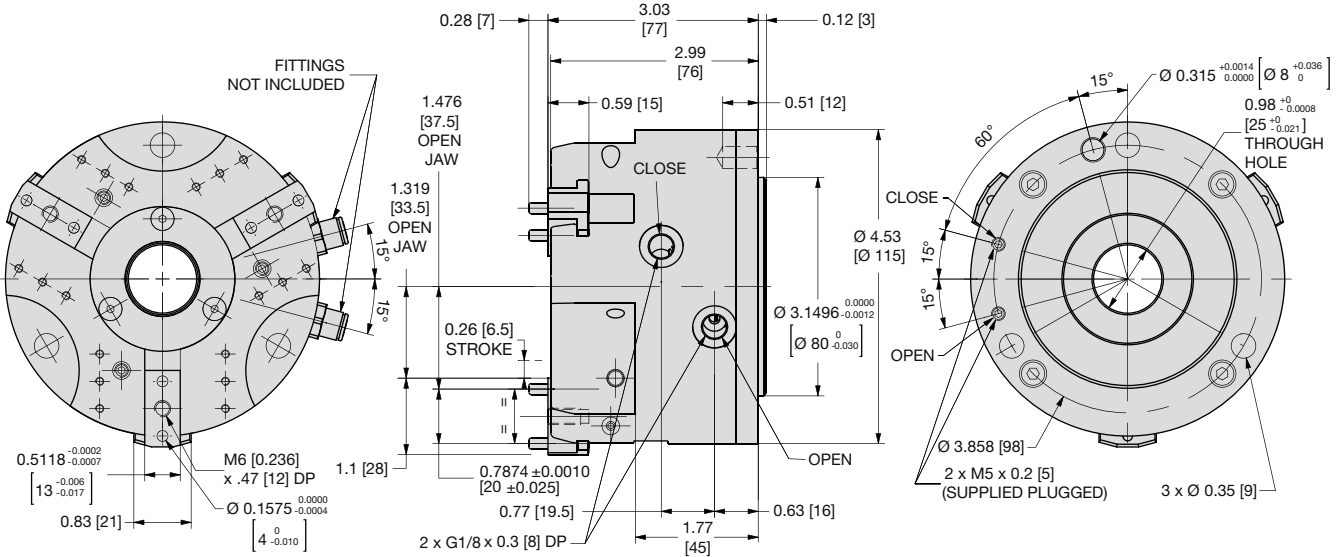


### Specifications

### PPC-25

|   |                      |                    |
|---|----------------------|--------------------|
| Total Rated Grip Force @ 100 psi, 7 bar | 589 lbs.*            | 2620 N*            |
| Total Stroke                            | 0.512 in.            | 13 mm              |
| Weight                                  | 4.9 lbs.             | 2.2 Kg             |
| Pressure Range without Springs          | 30-100 psi           | 2-7 bar            |
| Pressure Range with Springs             | 45-100 psi           | 3-7 bar            |
| Cylinder Bore Ø                         | 3.35 in.             | 85 mm              |
| Displacement                            | 3.11 in <sup>3</sup> | 51 cm <sup>3</sup> |
| Temperature Range                       |                      |                    |
| Standard Seals                          | -30°~180° F          | -35°~80° C         |
| Viton® Seals                            | -20°~300° F          | -30°~150° C        |
| Actuation                               | 0.04 sec.            | 0.04 sec.          |
| Repeatability                           | ±0.0008 in.          | ±0.02 mm           |

\*With Option RE or RI

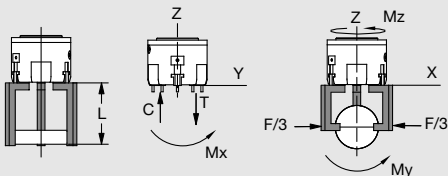
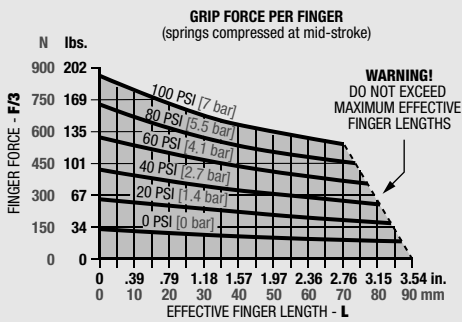


UNLESS OTHERWISE NOTED ALL TOLERANCES ARE AS SHOWN BELOW

|   |                        |   |                                |  |   |
|---|------------------------|---|--------------------------------|--|---|
| Dimensions are symmetrical about centerline | Third Angle Projection | All Dowel Holes are SF (Slip Fit).<br>Locational Tolerance ±.0005" or [±.013mm] | Metric Threads<br>Course Pitch | <b>Imperial in.</b><br>0.00 = ±.01<br>0.000 = ±.005<br>0.0000 = ±.0005 | <b>Metric [mm]</b><br>[0.] = [±.25]<br>[0.0] = [±.13]<br>[0.00] = [±.013] |
|---|------------------------|---|--------------------------------|--|---|

## Loading Information

## How to Order: (Order Accessories separately from Basic Model)



| Loading Capacity <sup>†</sup> | Static               | Dynamic              |
|-------------------------------|----------------------|----------------------|
| Maximum Tensile <b>T</b>      | 292 lbs. [1300 N]    | 88 lbs. [390 N]      |
| Maximum Compressive <b>C</b>  | 337 lbs. [1500 N]    | 88 lbs. [390 N]      |
| Maximum Moment <b>Mx</b>      | 266 in.-lbs. [30 Nm] | 115 in.-lbs. [13 Nm] |
| Maximum Moment <b>My</b>      | 266 in.-lbs. [30 Nm] | 115 in.-lbs. [13 Nm] |
| Maximum Moment <b>Mz</b>      | 575 in.-lbs. [65 Nm] | 221 in.-lbs. [25 Nm] |

<sup>†</sup>Capacities are per set of jaws and are not simultaneous

### BASIC MODEL

### VITON® SEALS

**PPC-25** - [ ] - **V**

### SAFETY SPRINGS (See below)

**SAFETY SPRINGS** **RE** External Clamping  
**RI** Internal Clamping  
\_ Leave Blank. No Spring Option (standard)

### SENSOR ACCESSORIES

|   | Order #         | QTY/UNIT      |
|---|-----------------|---------------|
| Inductive Sensor Holder Kit (1 Holder, 1 Flag, 2 Spacers) | <b>OSMK-106</b> | <b>1 to 2</b> |
| Inductive NPN Sensor M8 with Quick Disconnect             | <b>OISN-011</b> | <b>1 to 4</b> |
| Inductive PNP Sensor M8 with Quick Disconnect             | <b>OISP-011</b> | <b>1 to 4</b> |
| Quick Disconnect 2 Meter Cable Length                     | <b>CABL-010</b> | <b>1 to 6</b> |
| Quick Disconnect 5 Meter Cable Length                     | <b>CABL-013</b> | <b>1 to 6</b> |

### PNEUMATIC ACCESSORIES

|                          |                  |          |
|--------------------------|------------------|----------|
| Standard Seal Repair Kit | <b>SLKT-208</b>  | <b>1</b> |
| Viton® Seal Repair Kit   | <b>SLKT-208V</b> | <b>1</b> |

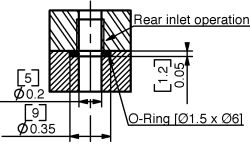
**Detailed sensor information at the end of this section.**



# PARALLEL GRIPPERS PPC-34 THROUGH HOLE SERIES



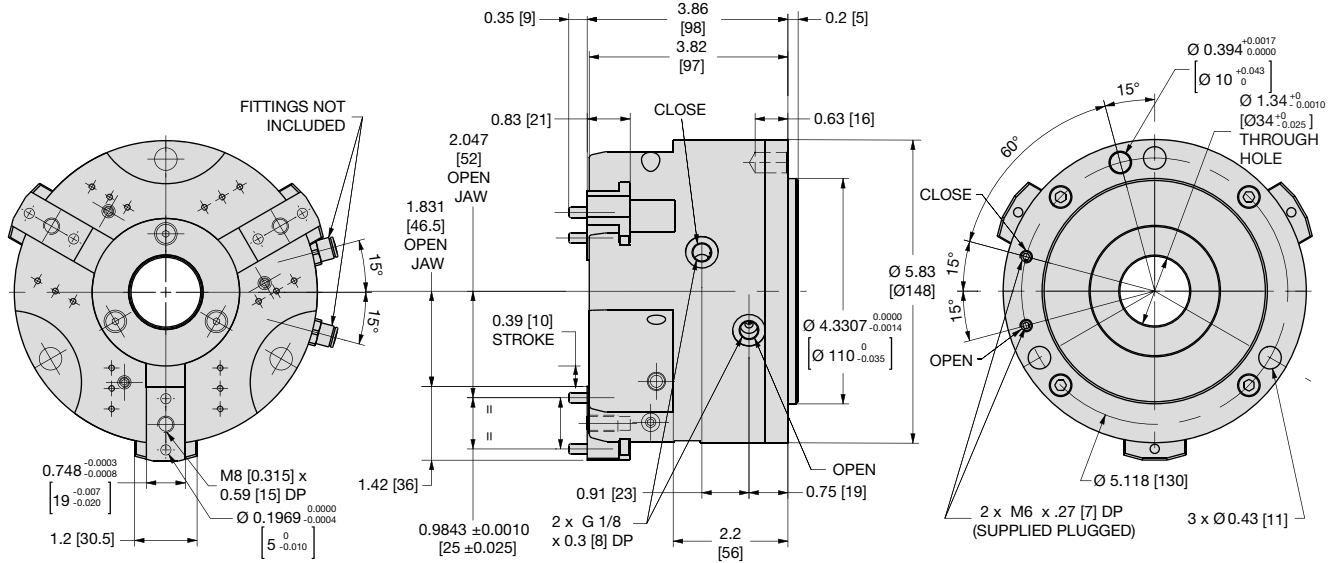
Grippers are supplied with open side air ports and top manifold air ports plugged. Top manifold sealing dimensions shown.



### Specifications

|   | PPC-34               |                     |
|---|----------------------|---------------------|
| Total Rated Grip Force @ 100 psi, 7 bar | 974 lbs.*            | 4332 N*             |
| Total Stroke                            | 0.787 in.            | 20 mm               |
| Weight                                  | 11.2 lbs.            | 5.1 Kg              |
| Pressure Range without Springs          | 30-100 psi           | 2-7 bar             |
| Pressure Range with Springs             | 45-100 psi           | 3-7 bar             |
| Cylinder Bore Ø                         | 4.33 in.             | 110 mm              |
| Displacement                            | 7.81 in <sup>3</sup> | 128 cm <sup>3</sup> |
| Temperature Range                       |                      |                     |
| Standard Seals                          | -30°~180° F          | -35°~80° C          |
| Viton® Seals                            | -20°~300° F          | -30°~150° C         |
| Actuation                               | 0.06 sec.            | 0.06 sec.           |
| Repeatability                           | ±0.0008 in.          | ±0.02 mm            |

\*With Option RE or RI

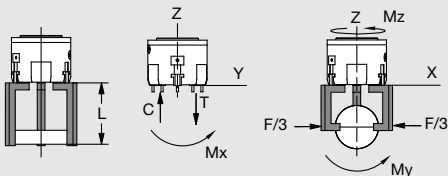
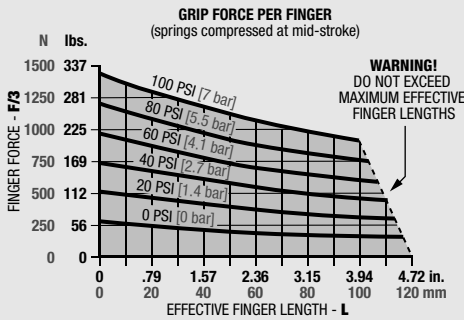


UNLESS OTHERWISE NOTED ALL TOLERANCES ARE AS SHOWN BELOW

| Symbol | Imperial in.    | Metric [mm]      |
|--------|-----------------|------------------|
|        | 0.00 = ±.01     | [0.] = [±.25]    |
|        | 0.000 = ±.005   | [0.0] = [±.13]   |
|        | 0.0000 = ±.0005 | [0.00] = [±.013] |

Dimensions are symmetrical about centerline  
Third Angle Projection  
All Dowel Holes are SF (Slip Fit). Locational Tolerance ±.0005" or [±.013mm]  
Metric Threads Course Pitch

## Loading Information



| Loading Capacity*            | Static                | Dynamic              |
|------------------------------|-----------------------|----------------------|
| Maximum Tensile <b>T</b>     | 438 lbs. [1950 N]     | 146 lbs. [650 N]     |
| Maximum Compressive <b>C</b> | 483 lbs. [2150 N]     | 146 lbs. [650 N]     |
| Maximum Moment <b>Mx</b>     | 575 in.-lbs. [65 Nm]  | 283 in.-lbs. [32 Nm] |
| Maximum Moment <b>My</b>     | 575 in.-lbs. [65 Nm]  | 283 in.-lbs. [32 Nm] |
| Maximum Moment <b>Mz</b>     | 885 in.-lbs. [100 Nm] | 487 in.-lbs. [55 Nm] |

\*Capacities are per set of jaws and are not simultaneous

## How to Order: (Order Accessories separately from Basic Model)

BASIC MODEL

VITON® SEALS

**PPC-34** - [ ] - **V**

SAFETY SPRINGS (See below)

**SAFETY SPRINGS** **RE** External Clamping  
**RI** Internal Clamping  
\_ Leave Blank. No Spring Option (standard)

### SENSOR ACCESSORIES

|   | Order #         | QTY/UNIT      |
|---|-----------------|---------------|
| Inductive Sensor Holder Kit (1 Holder, 1 Flag, 2 Spacers) | <b>OSMK-107</b> | <b>1 to 2</b> |
| Inductive NPN Sensor M8 with Quick Disconnect             | <b>OISN-011</b> | <b>1 to 4</b> |
| Inductive PNP Sensor M8 with Quick Disconnect             | <b>OISP-011</b> | <b>1 to 4</b> |
| Quick Disconnect 2 Meter Cable Length                     | <b>CABL-010</b> | <b>1 to 6</b> |
| Quick Disconnect 5 Meter Cable Length                     | <b>CABL-013</b> | <b>1 to 6</b> |

### PNEUMATIC ACCESSORIES

|                          |                  |          |
|--------------------------|------------------|----------|
| Standard Seal Repair Kit | <b>SLKT-209</b>  | <b>1</b> |
| Viton® Seal Repair Kit   | <b>SLKT-209V</b> | <b>1</b> |

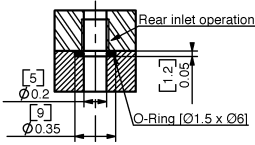
Detailed sensor information at the end of this section.



# PARALLEL GRIPPERS PPC-34-C THROUGH HOLE SERIES

PPC SERIES  
1.275

Grippers are supplied with open side air ports and top manifold air ports plugged. Top manifold sealing dimensions shown.

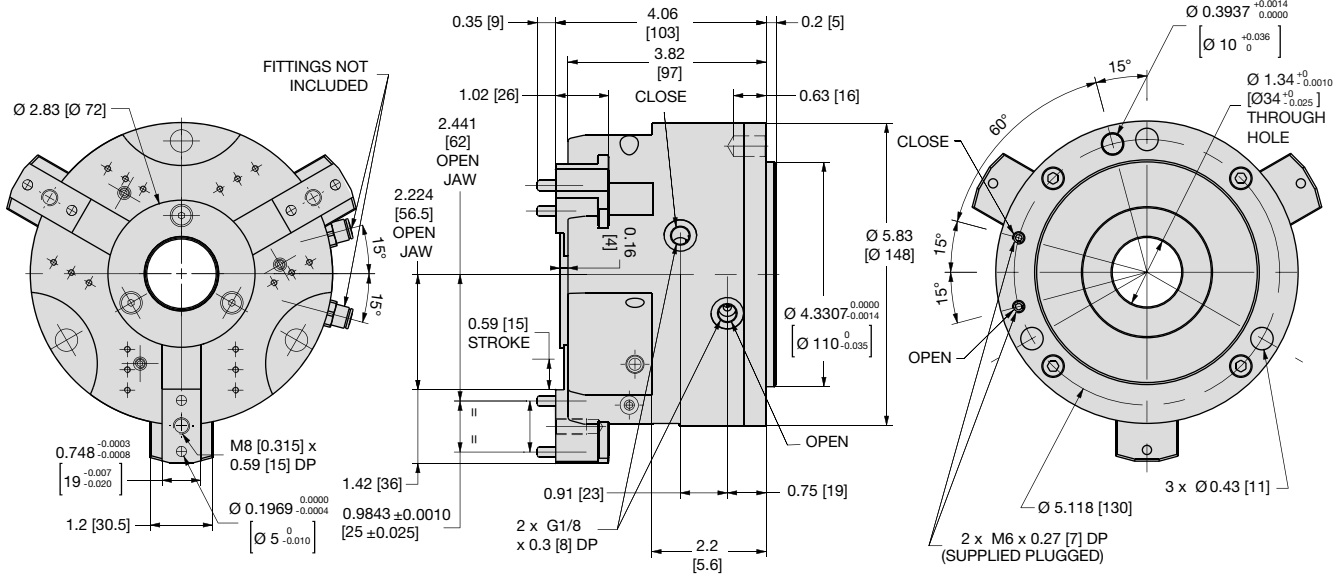


## Specifications

## PPC-34-C

|   |                      |                     |
|---|----------------------|---------------------|
| Total Rated Grip Force @ 100 psi, 7 bar | 638 lbs.*            | 2838 N*             |
| Total Stroke                            | 1.181 in.            | 30 mm               |
| Weight                                  | 11.7 lbs.            | 5.3 Kg              |
| Pressure Range without Springs          | 30-100 psi           | 2-7 bar             |
| Pressure Range with Springs             | 45-100 psi           | 3-7 bar             |
| Cylinder Bore Ø                         | 4.33 in.             | 110 mm              |
| Displacement                            | 7.81 in <sup>3</sup> | 128 cm <sup>3</sup> |
| Temperature Range                       |                      |                     |
| Standard Seals                          | -30°~180° F          | -35°~80° C          |
| Viton® Seals                            | -20°~300° F          | -30°~150° C         |
| Actuation                               | 0.06 sec.            | 0.06 sec.           |
| Repeatability                           | ±0.0008 in.          | ±0.02 mm            |

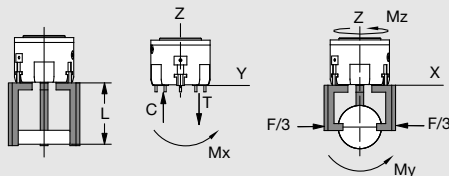
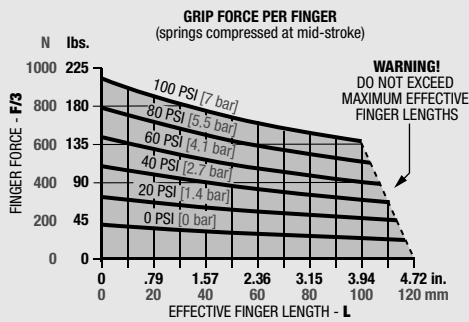
\*With Option RE or RI



UNLESS OTHERWISE NOTED ALL TOLERANCES ARE AS SHOWN BELOW

|   |                        |   |                                |  |   |
|---|------------------------|---|--------------------------------|--|---|
| Dimensions are symmetrical about centerline | Third Angle Projection | All Dowel Holes are SF (Slip Fit).<br>Locational Tolerance ±.0005" or [±.013mm] | Metric Threads<br>Course Pitch | <b>Imperial in.</b><br>0.00 = ±.01<br>0.000 = ±.005<br>0.0000 = ±.0005 | <b>Metric [mm]</b><br>[0.] = [±.25]<br>[0.0] = [±.13]<br>[0.00] = [±.013] |
|---|------------------------|---|--------------------------------|--|---|

## Loading Information



| Loading Capacity*            | Static                 | Dynamic              |
|------------------------------|------------------------|----------------------|
| Maximum Tensile <b>T</b>     | 438 lbs. [2150 N]      | 146 lbs. [650 N]     |
| Maximum Compressive <b>C</b> | 528 lbs. [2350 N]      | 146 lbs. [650 N]     |
| Maximum Moment <b>Mx</b>     | 575 in.-lbs. [65 Nm]   | 283 in.-lbs. [32 Nm] |
| Maximum Moment <b>My</b>     | 575 in.-lbs. [65 Nm]   | 283 in.-lbs. [32 Nm] |
| Maximum Moment <b>Mz</b>     | 1062 in.-lbs. [120 Nm] | 487 in.-lbs. [55 Nm] |

\*Capacities are per set of jaws and are not simultaneous

## How to Order: (Order Accessories separately from Basic Model)

BASIC MODEL

EXTENDED STROKE

PPC-34 - [ ] - C - V

SAFETY SPRINGS (See below)

VITON® SEALS

**SAFETY SPRINGS** RE External Clamping  
RI Internal Clamping  
\_ Leave Blank. No Spring Option (standard)

### SENSOR ACCESSORIES

| Order #   | QTY/UNIT               |
|---|------------------------|
| Inductive Sensor Holder Kit (1 Holder, 1 Flag, 2 Spacers) | <b>OSMK-107</b> 1 to 2 |
| Inductive NPN Sensor M8 with Quick Disconnect             | <b>OISN-011</b> 1 to 4 |
| Inductive PNP Sensor M8 with Quick Disconnect             | <b>OISP-011</b> 1 to 4 |
| Quick Disconnect 2 Meter Cable Length                     | <b>CABL-010</b> 1 to 6 |
| Quick Disconnect 5 Meter Cable Length                     | <b>CABL-013</b> 1 to 6 |

### PNEUMATIC ACCESSORIES

|                          |                    |
|--------------------------|--------------------|
| Standard Seal Repair Kit | <b>SLKT-209</b> 1  |
| Viton® Seal Repair Kit   | <b>SLKT-209V</b> 1 |

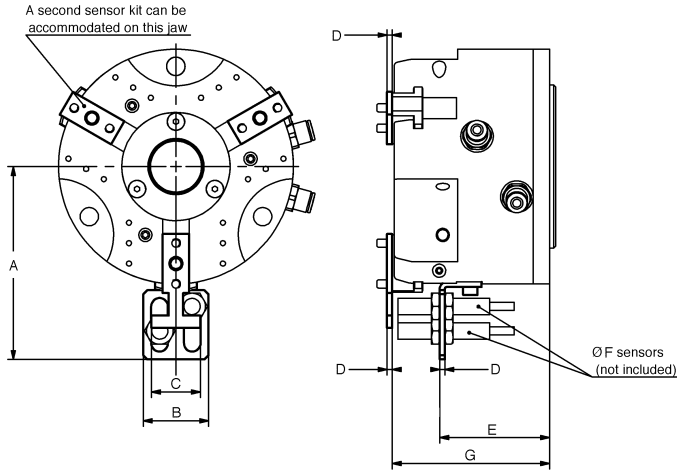
Detailed sensor information at the end of this section.



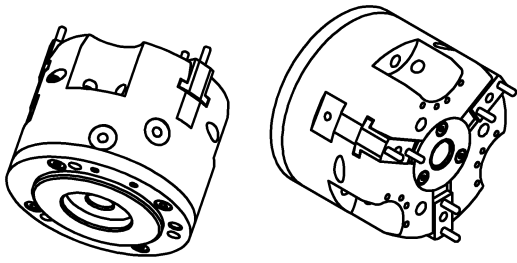
# SENSOR ACCESSORIES

## Accessory (OSMK): Inductive Sensor Holders

Each kit allows sensing up to 2 jaw positions: open jaws, closed jaws, or part present. Two kits can be used on each gripper allowing sensing up to 4 positions. The accessory (OSMK) comes with 1 sensor holder, 1 flag, 2 spacers and screws for mounting. The sensors are not included.



|                 | A              | B            | C            | D            | E               | F  | G             |
|-----------------|----------------|--------------|--------------|--------------|-----------------|----|---------------|
| <b>PPC-12</b>   | 3.13<br>[79.5] | 1.26<br>[32] | 0.95<br>[24] | 0.1<br>[2.5] | 1.72<br>[43.75] | M8 | 2.56<br>[65]  |
| <b>PPC-12-C</b> | 3.13<br>[79.5] | 1.26<br>[32] | 0.95<br>[24] | 0.1<br>[2.5] | 1.72<br>[43.75] | M8 | 2.72<br>[69]  |
| <b>PPC-25</b>   | 3.72<br>[94.5] | 1.26<br>[32] | 0.95<br>[24] | 0.1<br>[2.5] | 2.12<br>[53.75] | M8 | 3.03<br>[77]  |
| <b>PPC-25-C</b> | 3.72<br>[94.5] | 1.26<br>[32] | 0.95<br>[24] | 0.1<br>[2.5] | 2.12<br>[53.75] | M8 | 3.23<br>[82]  |
| <b>PPC-34</b>   | 4.69<br>[119]  | 1.26<br>[32] | 0.95<br>[24] | 0.1<br>[2.5] | 2.84<br>[72.05] | M8 | 3.86<br>[98]  |
| <b>PPC-34-C</b> | 4.69<br>[119]  | 1.26<br>[32] | 0.95<br>[24] | 0.1<br>[2.5] | 2.84<br>[72.05] | M8 | 4.06<br>[103] |

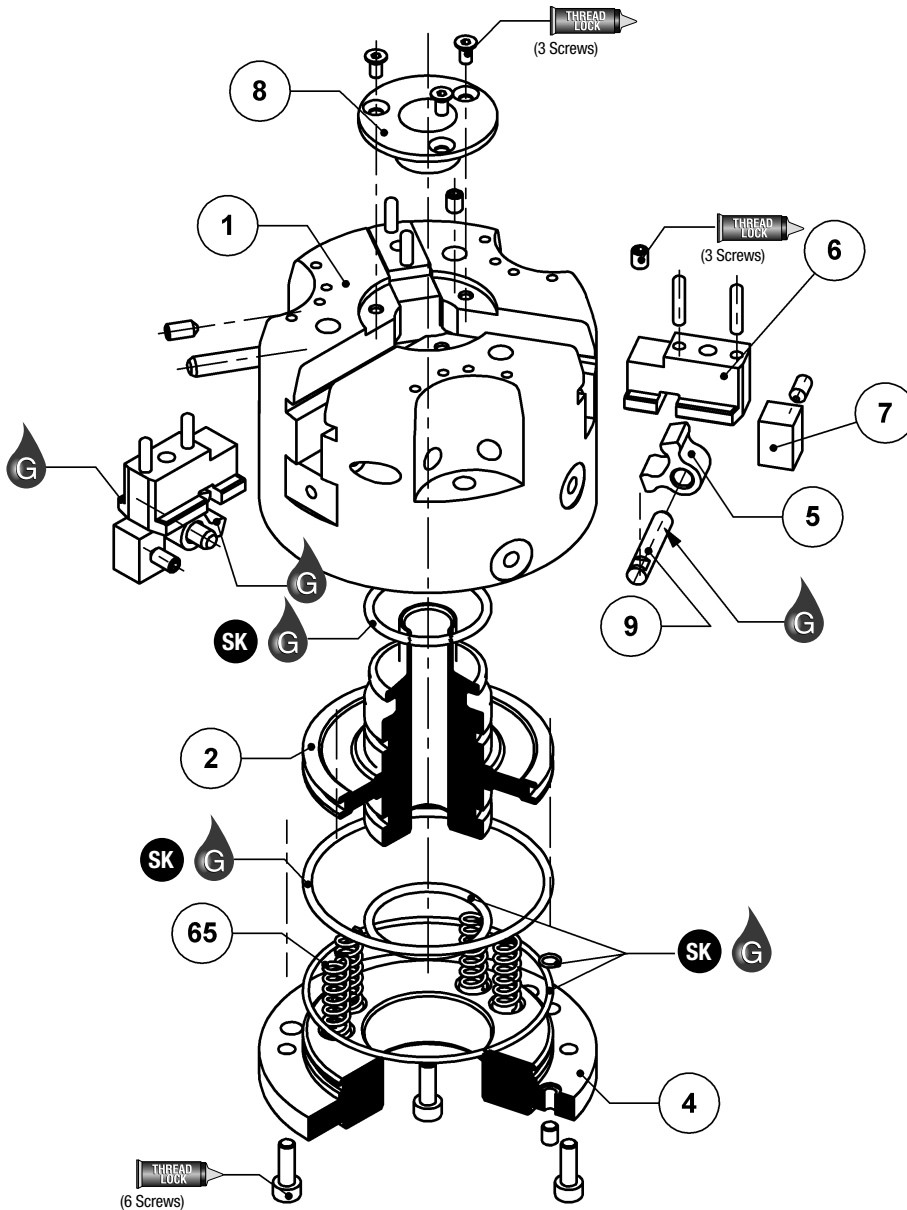


| Item | Qty | Name              |
|------|-----|-------------------|
| 01   | 1   | Body              |
| 02   | 1   | Cam Driver Piston |
| 04   | 1   | Cap               |
| 05   | 3   | Cam Lever         |
| 06   | 3   | Jaw               |
| 07   | 3   | Cover             |
| 08   | 1   | Shielded Case     |
| 09   | 3   | Pivot Pin         |
| 65   | 6   | Springs           |

**NOTE:** Contact the Robohand Sales Department for a complete spare parts list with order numbers and prices.

### Assembly Procedure

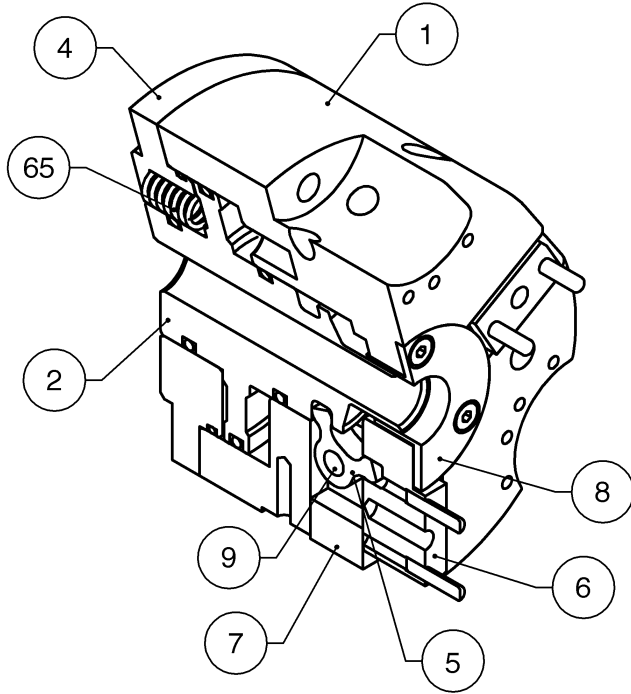
- 1) Lubricate and install the seals onto the cam driver piston
- 2) Lubricate and install the seals into the cap
- 3) Plug rear ports in the cap if rear inlets are not used. If rear inlets are used, plug body ports.
- 4) Insert the piston into body. Place springs into counterbore holes between the body and the piston for **-RE** option or between the piston and the cap for **-RI** option
- 5) Assemble the cap
- 6) Insert together the jaw and the cam lever into the body
- 7) Insert the pivot pin aligning cam lever hole. Screw SS Screw into the body for preventing pivot pin from moving
- 8) Assemble the cover
- 9) Assemble the shielded case



**SK Seal Repair Kit Order #'s See Product Data Sheets**

|                |               |                   |                         |                      |              |                        |
|----------------|---------------|-------------------|-------------------------|----------------------|--------------|------------------------|
|                |               |                   |                         |                      |              |                        |
| Seal Kit Items | Thread Locker | Krytox™ Lubricant | Lightweight Machine Oil | Teflon™ Based Grease | Super Bonder | Third Angle Projection |

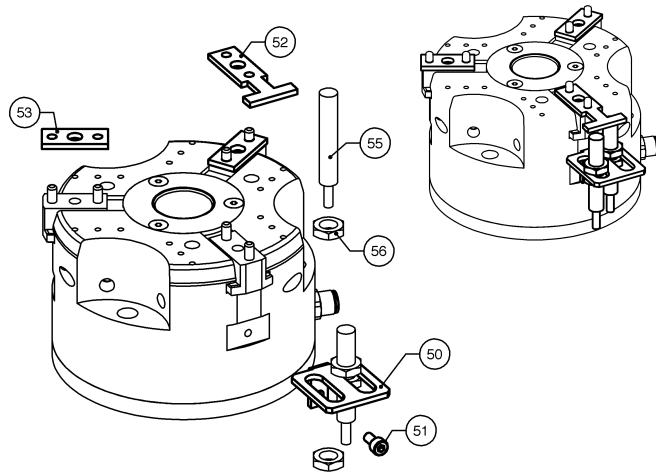
## PPC SERIES ASSEMBLED VIEW



| Item | Qty | Name              |
|------|-----|-------------------|
| 01   | 1   | Body              |
| 02   | 1   | Cam Driver Piston |
| 04   | 1   | Cap               |
| 05   | 3   | Cam Lever         |
| 06   | 3   | Jaw               |
| 07   | 3   | Cover             |
| 08   | 1   | Shielded Case     |
| 09   | 3   | Pivot Pin         |
| 65   | 6   | Springs           |

**NOTE:** Contact the Robohand Sales Department for a complete spare parts list with order numbers and prices.

## Accessory Installation & Adjustment Instructions



### Installation-Inductive Sensor

- 1) Assemble the sensor holder (#50) onto the gripper
- 2) Place the flag (#52) on one of the jaws above the sensor holder
- 3) Place the spacer (#53) on the other jaws
- 4) Position sensor for desired stroke position
- 5) Tighten sensor locking nuts (#56) to hold sensor depth
- 6) Repeat these operations in case of the use of two sensors holders