

Series HMI Metric Hydraulic Cylinders

Parts Identification

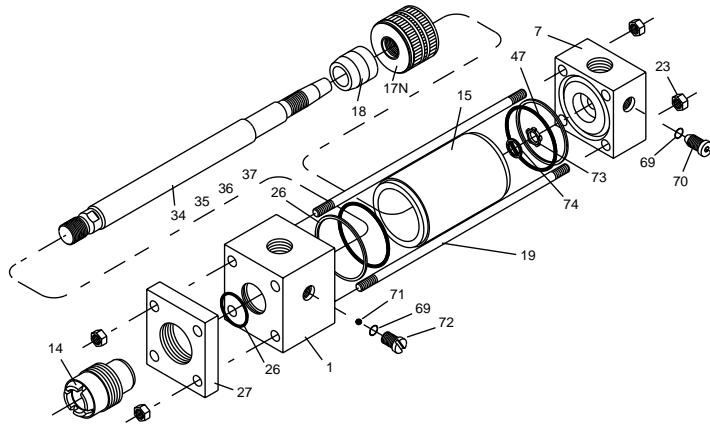
Service Assemblies and Seal Kits

Service Assembly Kits and Seal Kits for HMI cylinders simplify the ordering and maintenance processes. They contain sub-assemblies which are ready for installation, and are supplied with full instructions. When ordering Service Assemblies and Seal Kits, please refer to the identification plate on the cylinder body, and supply the following information.

Serial Number - Bore - Stroke - Model Number - Fluid Type

Key to Part Numbers

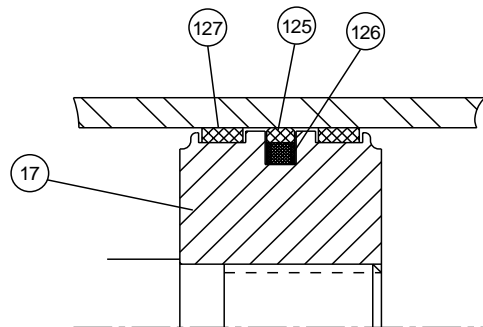
- 1 Head
- 7 Cap
- 14 Gland/bearing cartridge
- 15 Cylinder body
- 17 Piston - N-Style
- 18 Cushion sleeve
- 19 Tie rod
- 23 Tie rod nut
- 26 Back-up washer (not 25-50mm bore cylinders)
- 27 Retainer
- 34 Piston rod – single rod, no cushion
- 35 Piston rod – single rod, cushion at head end



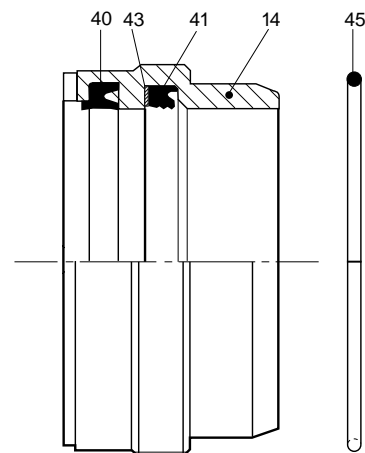
- 36 Piston rod – single rod, cushion at cap end
- 37 Piston rod – single rod, cushion at both ends
- 40 Wiperseal – for 14
- 41 Lipseal – for 14
- 43 Back-up washer, gland lipseal 41 (not Group 1 seals)
- 45 O-ring – gland/head
- 47 O-ring – cylinder body
- 57¹ Piston rod – double rod, no cushion
- 58¹ Piston rod – double rod, cushion one end
- 60¹ Piston rod – double rod, no cushion
- 61¹ Piston rod – double rod, cushion one end
- 69 O-ring – needle valve and check valve screws
- 70 Needle valve, cushion adjustment
- 71 Ball – cushion check valve
- 72 Cushion check valve screw
- 72a Cushion check valve, cartridge type
- 73 Floating cushion bush
- 74 Retaining ring for cushion bush
- 125 Standard piston seal
- 126 Energising ring for standard seal 125
- 127 Wear ring for standard piston

¹Not illustrated

| Rod Ø | Gland Cartridge Wrench | Spanner Wrench |
|----------|------------------------------|-------------------|
| 12 | 69590 | 11676 |
| 14 | 69590 | 11676 |
| 18 | 84765 | 11676 |
| 22 | 69591 | 11676 |
| 28 | 84766 | 11703 |
| 36 | 69592 | 11703 |
| 45 | 69593 | 11677 |
| 56 | 69595 | 11677 |
| 70 | 69596 | 11677 |
| 90 | 84768 | 11677 |
| 110 | – | – |
| 140 | – | – |



N-Style Piston



Gland Cartridge and Seals

For additional information – call your local Parker Cylinder Distributor.

Series HMI Metric Hydraulic Cylinders

Seal Kits and
Replacement Parts

Contents and Part Numbers of Seal Kits for Piston and Gland

(See key to part numbers opposite)

RG Kit – Gland Cartridge and Seals* Contain items 14, 40, 41, 43, 45. Where the original gland incorporates a gland drain, please consult the factory.

RK Kit – Gland Cartridge Seals* Contain items 40, 41, 43, 45.

| Rod Ø | RG Kit* | PK Kit* |
|----------|------------|------------|
| 12 | RG2HM0121 | RK2HM0121 |
| 14 | RG2HM0141 | RK2HM0141 |
| 18 | RG2HM0181 | RK2HM0181 |
| 22 | RG2HM0221 | RK2HM0221 |
| 28 | RG2HM0281 | RK2HM0281 |
| 36 | RG2HM0361 | RK2HM0361 |
| 45 | RG2HM0451 | RK2HM0451 |
| 56 | RG2HM0561 | RK2HM0561 |
| 70 | RG2HM0701 | RK2HM0701 |
| 90 | RG2HM0901 | RK2HM0901 |
| 110 | RG2HM1101 | RK2HM1101 |
| 140 | RG2HM1401 | RK2HM1401 |

CB Kit – Cylinder Body End Seals* Contain two each of items 47, 26 (not 25-50mm bore).

PN Kit – Standard Piston Seals* (includes cylinder body end seals) Contains two each of items 42, 26 (not 25-50mm bore), two of item 127, and one each of items 125, 126.

| Bore Ø | CB Body Seal Kit* | N-Style Piston Seal Kit* |
|-----------|----------------------|-----------------------------|
| 25 | CB025HM001 | PN025HM001 |
| 32 | CB032HM001 | PN032HM001 |
| 40 | CB040HM001 | PN040HM001 |
| 50 | CB050HM001 | PN050HM001 |
| 63 | CB063HM001 | PN063HM001 |
| 80 | CB080HM001 | PN080HM001 |
| 100 | CB100HM001 | PN100HM001 |
| 125 | CB125HM001 | PN125HM001 |
| 160 | CB160HM001 | PN160HM001 |
| 200 | CB200HM001 | PN200HM001 |

*Seal Groups – Ordering

The part numbers shown in the tables above are for Group 1 seals, denoted by the last character of each part number. For Group 5 seals, substitute a '5' for the '1' at the end of the number sequence.

Contents and Part Numbers of Seal Kits of Service Assembly Kits

(See key to part numbers opposite)

Head Assembly

Non-cushioned: 1, 26, 47

Cushioned: 1, 26, 47, 70, 71, 72, (72a)

Cap Assembly

Non-cushioned: 7, 26, 47

Cushioned: 7, 26, 47, 69, 70, 73, 74

Cylinder Body

All Types: 15

Cushion Screw Assembly

Screw type: 69, 70

Check Valve Screw Assembly

Screw type: 69, 71, 72

Piston Rod Assemblies

These kits contain a fully assembled piston and rod assembly which is ready to install. They comprise a piston assembly of the appropriate type, see parts list below, plus a rod assembly from the types listed below.

Piston Assemblies

N-Style: 17, 125, 126, 127 x 2

Rod Assemblies

| | |
|-------------------------------------|----------------|
| Single rod, non-cushioned: | 34 |
| Single rod, cushioned head: | 35, 18 |
| Single rod, cushioned cap: | 36 |
| Single rod, cushioned both ends: | 37, 18 |
| Double rod, non-cushioned: | 57, 60 |
| Double rod, cushioned stronger end: | 58, 60, 18 |
| Double rod, cushioned weaker end: | 58, 61, 18 |
| Double rod, cushioned both ends: | 58, 61, 18 x 2 |

Tie Rod Torques

Please refer to the table in the mounting information section.

Repairs

Although HMI cylinders are designed to make on-site maintenance or repairs as easy as possible, some operations can only be carried out in our factory. It is standard policy to fit a cylinder returned to the factory for repair with those replacement parts which are necessary to return it to 'as good as new' condition. Should the condition of the returned cylinder be such that repair would be uneconomical, you will be notified.

NOTE: For installation instructions for Seal Kits for Series HMI cylinders, see bulletin 0995-M17.

For Cylinder Division Plant Locations – See Page II.