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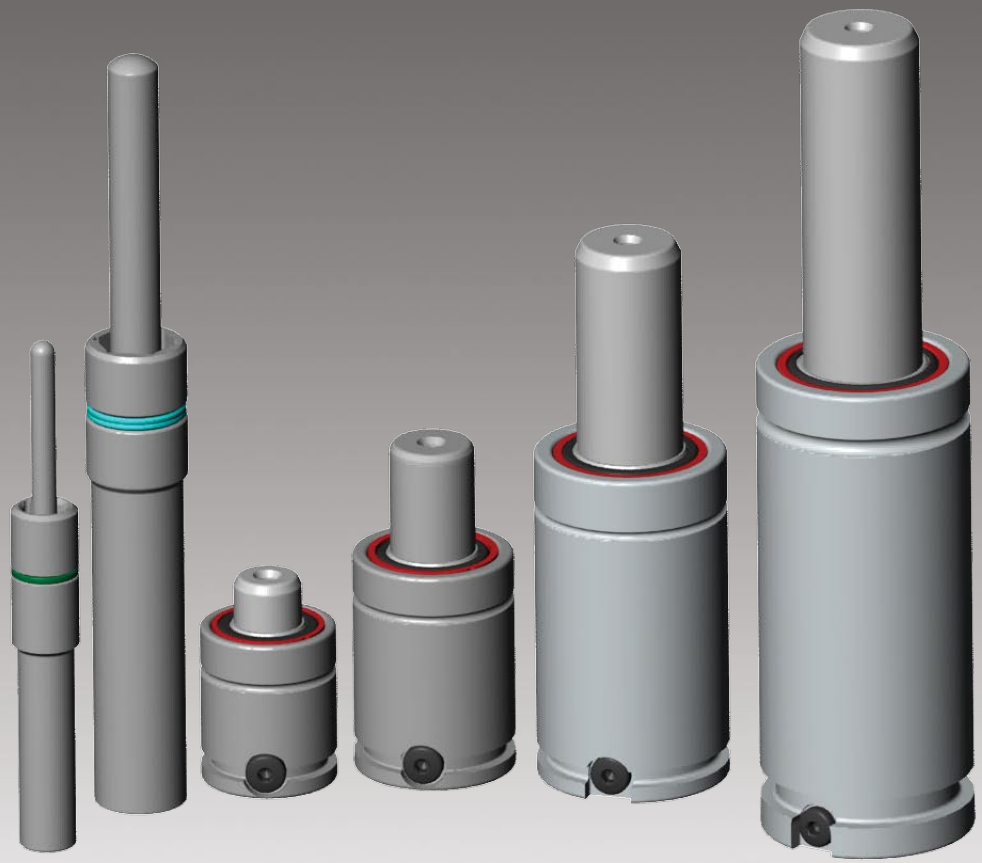
APPROVED PED 97/23/EC

*New!*



# **Mold Temp** MT Series

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# Mold Temp MT Series

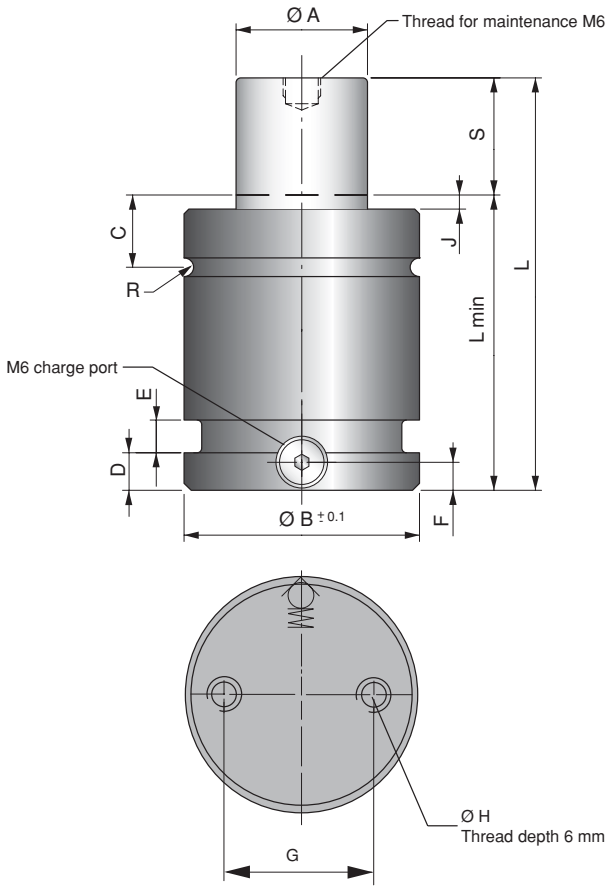
Mold Temp gas springs have been engineered to withstand higher working temperatures, like those commonly associated with plastic molding tools. Mold Temp gas springs are compact and powerful piston rod-sealed gas springs, which can be used in temperatures up to 120°C/248°F.

Millimeters to Inches: mm ÷ 25.4 = inches
Kilograms to Pounds: Kg ÷ 0.45 = pounds
Pounds Force to DecaNewtons: LbF x 0.4448 = decaNewtons

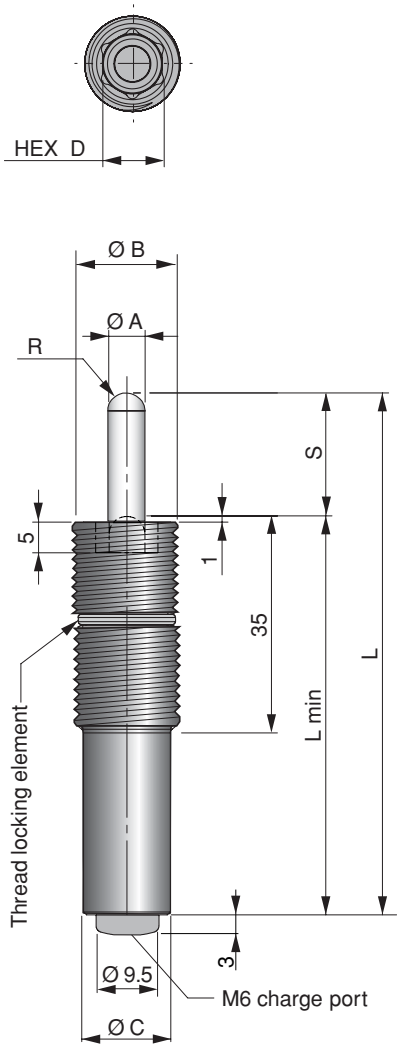
**Features:**

- For applications up to 120°C/248°F.
- Fully adjustable charge pressure.
- Various mounting possibilities using standard mounts as well as bottom threaded holes.
- MT 16 and MT 24 have threaded upper cylinders for easy and adjustable mounting.
- M6 gas ports can be connected to the special high temp version of Micro-Tube™ system for remote pressure control.

## MT 300 to MT 1000 Models




## MT 16 & 24 Models




| Model | Pounds Force (lbF) Initial | Ø A | Ø B | Ø C | D | R |
|---|---|---|---|---|---|---|
| MT 16 | 95 | 6 | M16x1.5 | 13.5 | 10 | 3 |
| MT 24 | 382 | 12 | M24x1.5 | 21.7 | 17 | 8 |

| Model | Pounds Force (lbF) Initial | Ø A | Ø B | C | D | E | F | G | Ø H | J | R |
|---|---|---|---|---|---|---|---|---|---|---|---|
| MT 300 | 675 | 16 | 31.9 | 12.5 | 4 | 3.5 | 6 | 20 | M6 | 2 | 1 |
| MT 500 | 1060 | 20 | 37.9 | 12.5 | 4 | 4 | | 25 | M6 | 2 | 1 |
| MT 750 | 1665 | 25 | 45.2 | 15.5 | 4 | 4 | | 20 | M8 | 2 | 1 |
| MT 1000 | 2095 | 28 | 50.2 | 15.5 | 8 | 7 | | 20 | M8 | 3 | 2 |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# Mold Temp MT Series

**Length dimensions per stroke length**

| Model | | Stroke length 10 | 20 | 30 | 40 | 50 | 60 | 70 | 80 |
|---|---|---|---|---|---|---|---|---|---|
| MT 16 | L | 65 | 85 | 105 | 125 | 145 | 165 | 185 | 205 |
| | Lmin | 55 | 65 | 75 | 85 | 95 | 105 | 115 | 125 |
| MT 24 | L | 65 | 85 | 105 | 125 | 145 | 165 | 185 | 205 |
| | Lmin | 55 | 65 | 75 | 85 | 95 | 105 | 115 | 125 |

| Model | | Stroke length 10 | 13 | 16 | 19 | 25 | 32 | 38 | 50 | 63 | 75 | 80 |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| MT 300 | L | 50 | 56 | 62 | 68 | 80 | 94 | 106 | 130 | 156 | 180 | 190 |
| | Lmin | 40 | 43 | 46 | 49 | 55 | 62 | 68 | 80 | 93 | 105 | 110 |
| MT 500 | L | 50 | 56 | 62 | 68 | 80 | 94 | 106 | 130 | 156 | 180 | 190 |
| | Lmin | 40 | 43 | 46 | 49 | 55 | 62 | 68 | 80 | 93 | 105 | 110 |
| MT 750 | L | 52 | 58 | 64 | 70 | 82 | 96 | 108 | 132 | 158 | 182 | 192 |
| | Lmin | 42 | 45 | 48 | 51 | 57 | 64 | 70 | 82 | 95 | 107 | 112 |
| MT 1000 | L | - | 64 | 70 | 76 | 88 | 102 | 114 | 138 | 164 | 188 | 198 |
| | Lmin | - | 51 | 54 | 57 | 63 | 70 | 76 | 88 | 101 | 113 | 118 |

Longer stroke lengths available at request

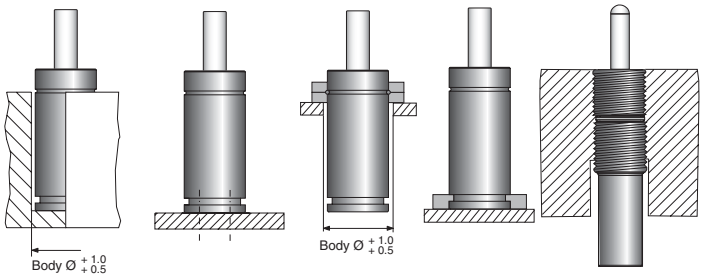
**Maximum charge pressure and stroke frequency will depend on the operating temperature, according to the following table:**

| Operating temperature interval | Max strokes per minute (spm) | Max charge pressure at 20°C (psi) | Pounds Force (lbF) Initial | Gas spring model MT 16 | MT 24 | MT 300 | MT 500 | MT 750 | MT 1000 |
|---|---|---|---|---|---|---|---|---|---|
| 0 - 80°C<br>0 - 176°F | 20 | 2175 | at 80°C/176°F<br>(at 20°C/68°F) | 115<br>(95) | 460<br>(382) | 817<br>(679) | 1278<br>(1060) | 1996<br>(1656) | 2504<br>(2079) |
| 80 - 100°C<br>176 - 212°F | 15 | 1815 | at 100°C/212°F<br>(at 20°C/68°F) | 101<br>(80) | 405<br>(318) | 720<br>(565) | 1125<br>(884) | 1757<br>(1381) | 2205<br>(1732) |
| 100 - 120°C<br>212 - 248°F | 10 | 1670 | at 120°C/248°F<br>(at 20°C/68°F) | 98<br>(73) | 394<br>(292) | 697<br>(520) | 1090<br>(812) | 1703<br>(1271) | 2139<br>(1593) |

## Basic Information

Pressure medium ..... Nitrogen
Max. charging pressure ..... See table above
Min. charging pressure ..... 25 bar/360 psi
Operating temperature ..... 0-120°C/0-248°F
Force increase by temperature ..... ±0.3%/°C
Recommended max strokes/min ..... See table above
Max piston rod velocity ..... 1.0 m/s
Service life (0 to 80°C) ..... 1,000,000 strokes
or ..... 100,000 strokemeters
Service life (80 to 120°C) ..... 500,000 strokes
or ..... 50,000 strokemeters
Tube & rod surface ..... Nitrided
Repair kits ..... Available for MT 300-1000

## Mounting Possibilities




**Drop - In** | **Bottom Threads** | **Top Mount** | **Foot Mount** | **Thread Mount**

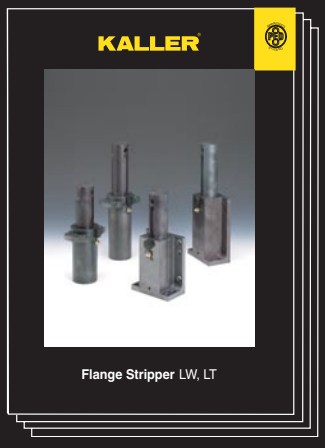
(Only MT 16 & 24)
Lock nut available
M16x1.5 503681
M24x1.5 503928

# KALLER®

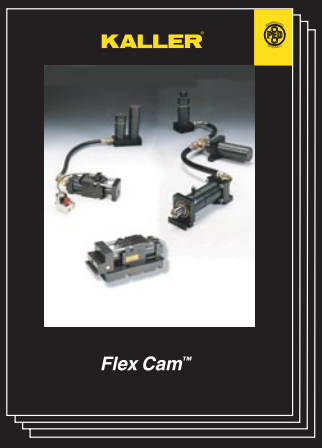
## The Safer Choice


**Gas Springs**
Kaller developed the first nitrogen gas spring for press tools and today offers a comprehensive selection of high quality gas springs for use in different tool & die applications.


**Controllable Gas Springs-KF2**
Kaller controllable springs are a family of gas springs, for use in press tools, that can be locked in their bottom position and where the return stroke of the spring can be controlled.




**Flange Stripper Unit**
Kaller Flange Stripper Unit is used in flanging dies for stripping/lifting a flanged part after forming. It provides 200 daN of stripping force, can be top or bottom mounted and is self guiding.




**Flex Cam™**
The Flex Cam is used for piercing, cutting, forming and flanging operations. The system allows for a flexible distribution of forces with optimal direction and velocity. By using a Flex Cam, fewer tools are required in production.


**Roller Cam**
Kaller Roller Cam is used for piercing, trimming, flanging and restriking. The Roller Cam can be mounted in both vertical and horizontal angles.


**Counter Balance**
Kaller Counter Balance gas springs can be used to lift, lower, assist, balance, and hold in a multitude of applications.

KALLER® GAS SPRINGS

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For more information see our website
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