



# CALIBRE

## C-80

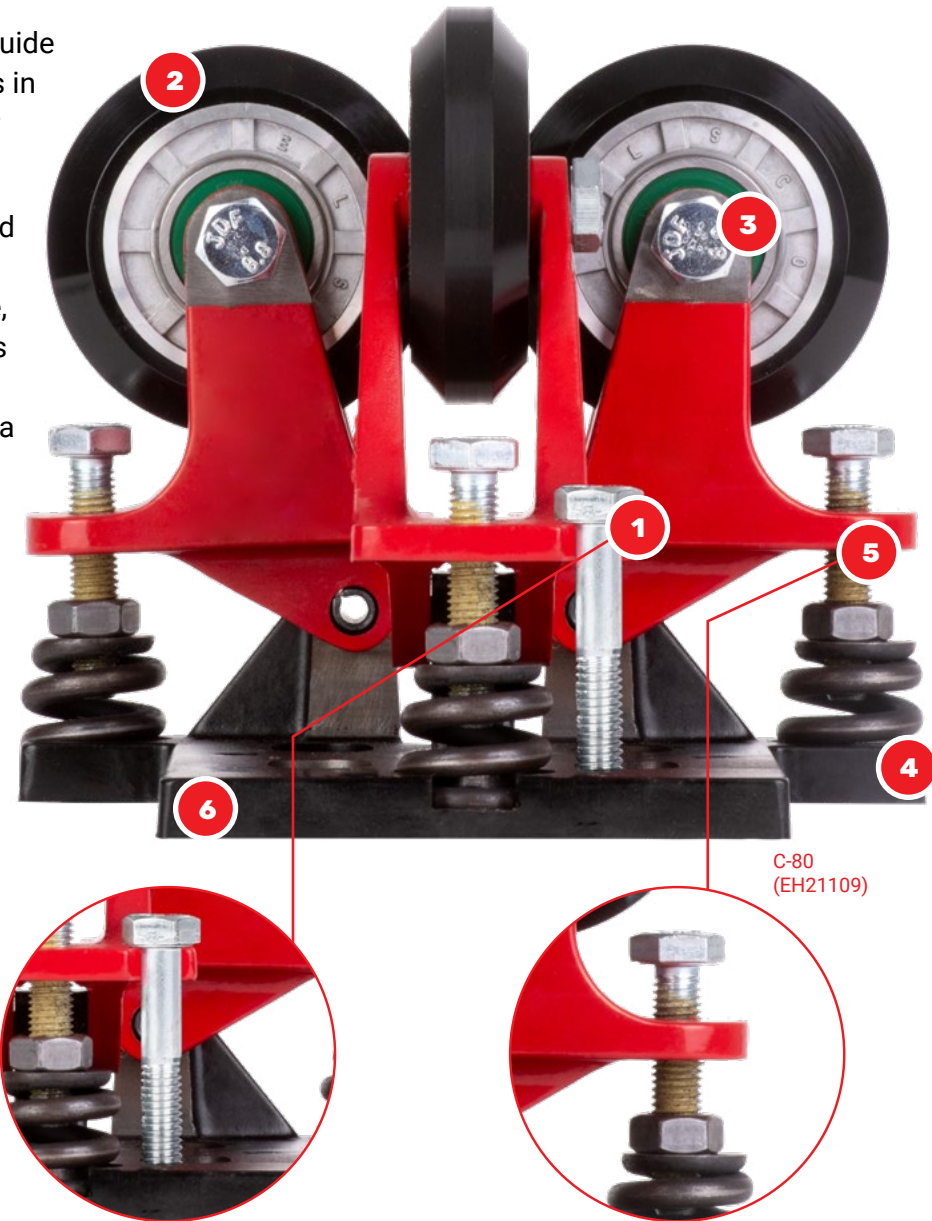
**Designed using quality components to deliver performance, ride quality and exceptional value**

Combining ease of installation and hoistway adjustability, the C-80 roller guide is compatible with a wide range of elevator counterweight, car and guide rail sizes.

Designed for counterweights up to 3.0 m/s (600 fpm) and 1,800 kg (4,000 lbs) capacity and elevator cars up to 1.5 m/s (300 fpm) and 1,100 kgs (2,500 lbs) capacity in low- to mid-rise buildings.

The Calibre C-80 is a three-wheel roller guide with spring suspension, adjustable stops in all directions, and three 80 mm diameter polyurethane roller wheels.

Engineered and tested to meet EN 81 and ASME A17.1/CSA B44 standards, the Calibre C-80 is constructed from durable, precision machined, ductile iron castings and is assembled using quality parts to ensure the installed roller guide delivers a lifetime of reliable performance.



**QUICK AND EASY INSTALLATION**

**1 Face Arm Retention Bolt**

- › After the guide is accurately positioned and secured, remove the face arm retaining bolt and the correct roller wheel pre-load force will be applied to the rail
- › Precise factory setup for either 8, 9, 10 or 16 mm rail sizes reduces installation steps, which means there is no need for adjustment in the field
- › This innovative feature simplifies the accurate installation of the guides saving time and money

**LOW NOISE AND VIBRATION**

**2 Polyurethane Roller Wheels**

- › Precisely molded and finished tread profile provides a balanced and concentric roller
- › 85A durometer tread dampens vibration and reduces noise

**3 Precision Ball Bearings**

- › Dual bearing design provides the roller extra stability to ensure a true ride, with minimal noise and vibration
- › Industrial grade, high quality ball bearings will last for millions of cycles

**4 Fully Adjustable Stabilizing Springs**

- › Stabilizing springs are factory-set, but can be adjusted in the field, to minimize bumps and vibration
- › Spring adjustments can be used to further reduce peak-to-peak lateral forces to measurably improve ride quality

**5 Adjustable Stops**

- › Are factory-set to provide an optimal 3 mm (1/8") of float to deal with troublesome hoistway issues
- › Can be adjusted in the field, to minimize bumps and vibration if required
- › Can be set to have restricted float for use in hydraulic elevator applications

**CONTROL OF COUNTERWEIGHT/CAR FLOAT**

- › The C-80 is capable of being adjusted to allow a range of elevator car or counterweight float which is excellent for troubleshooting stubborn hoistway issues

**DURABLE, ENGINEERED DESIGN**

**6 Robust Casting and Design Features**

- › Precisely machined castings ensure the final assembly is of the highest quality
- › Tested to meet applicable codes and standards ensuring the guides provide a lifetime of reliable performance

**APPLICATIONS TABLE**

Use the counterweight or car table depending on the roller guide usage. Find the intersection of the car or counterweight's speed and capacity to confirm the roller guide is recommended for the application.

| CAPACITY kg/lbs       | PASSENGER /HOSPITAL /FREIGHT & SERVICE CAR COUNTERWEIGHT   |     |     |     |     |     | PASSENGER CAR / FREIGHT/SERVICE CAR<br><small>PLATFORM UP TO 10' WIDE X 8' DEEP/<br/>(3050 mm X 2440 mm)</small> |     |     | HOSPITAL CAR<br><small>PLATFORM UP TO 6' WIDE X 10' DEEP/<br/>(1830 mm X 3050 mm)</small> |     |     |     |
|-----------------------|--|-----|-----|-----|-----|-----|--|-----|-----|---|-----|-----|-----|
|                       | m/s  | 0.5 | 1.0 | 1.5 | 2.0 | 2.5 | 3.0  | 0.5 | 1.0 | 1.5   | 0.5 | 1.0 | 1.5 |
|                       | fpm  | 100 | 200 | 300 | 400 | 500 | 600  | 100 | 200 | 300   | 100 | 200 | 300 |
| ≤ 900 kg<br>2,000 lbs |  |     |     |     |     |     |  |     |     |   |     |     |     |
| 1,100 kg<br>2,500 lbs |  |     |     |     |     |     |  |     |     |   |     |     |     |
| 1,400 kg<br>3,000 lbs |  |     |     |     |     |     |  |     |     |   |     |     |     |
| 1,600 kg<br>3,500 lbs |  |     |     |     |     |     |  |     |     |   |     |     |     |
| 1,800 kg<br>4,000 lbs |  |     |     |     |     |     |  |     |     |   |     |     |     |
| 2,000 kg<br>4,500 lbs | Not every elevator is the same. If your application is not indicated in the red shaded area, please contact ELSCO Customer Service for expert application assistance |     |     |     |     |     |  |     |     |   |     |     |     |

**ROLLER GUIDE RAIL COMPATIBILITY**

● Compatible    ◐ Check Clearance

The C-80 is available in four factory set versions, for either 8, 9, 10 or 16 mm rails. It can be adjusted in the field to run on 5 mm rails.

| ISO<br>ASME<br>WIDTH               | RAIL SIZES       |                  |                    |                    |                   |                   |                             |                       |                 |                        |                        |                        |                        |
|------------------------------------|------------------|------------------|--------------------|--------------------|-------------------|-------------------|-----------------------------|-----------------------|-----------------|------------------------|------------------------|------------------------|------------------------|
|                                    | T45              | T50              | T65                | T70                | T75               | T78               | T82                         | T89                   | T90             | T114                   | T125                   | T127-1                 | T127-2                 |
|                                    | 5 mm<br>(0.197") | 5 mm<br>(0.197") | 7.9 mm<br>(0.311") | 9.0 mm<br>(0.354") | 10 mm<br>(0.394") | 10 mm<br>(0.394") | 5.75#<br>9.0 mm<br>(0.354") | 8#<br>16 mm<br>(5/8") | 16 mm<br>(5/8") | 11#<br>16 mm<br>(5/8") | 12#<br>16 mm<br>(5/8") | 12#<br>16 mm<br>(5/8") | 15#<br>16 mm<br>(5/8") |
| <b>Standard ELSCO Bolt Pattern</b> | ADJUST IN FIELD  |                  | EH21108            | EH21109            | EH21110           |                   | EH21109                     | EH21116               |                 |                        |                        |                        |                        |

**RECOMMENDATIONS & SPECIAL CONDITIONS**

- For elevators with higher capacity and speed applications, or if the car is heavily leaning or unbalanced, contact ELSCO Customer Service for guide selection recommendations
- Suited for use on hydraulic elevators when adjusted to have restricted float

**OPTIONAL ACCESSORIES**



**SEISMIC ACCESSORIES**

Seismic plates must be installed if the guide is used to meet the elevator seismic requirements per ASME A17.1/CSA B44.19, section 8.4 in seismic risk zones 2 or greater. Seismic Flex-Mount™ Adjustable Adapter Plates can be used when mounting to pre-existing bolt patterns.

| ISO<br>ASME   | RAIL SIZES   |           |                |             |               |               |
|---|--------------|-----------|----------------|-------------|---------------|---------------|
|   | T82<br>5.75# | T89<br>8# | T114<br>11#    | T125<br>12# | T127-1<br>12# | T127-2<br>15# |
| <b>Seismic Plate</b>                                | ED06005      | ED06008   | ED06011        | ED06011 ◐   | ED06012       | ED06015       |
| <b>Seismic Flex-Mount™ Adjustable Adapter Plate</b> | EC07100-S-8  |           | EC07100-S-15 ◐ |             | EC07100-S-15  |               |

**CRITICAL DIMENSIONS**

**GUIDE MEASUREMENTS**

|   |                      |
|---|----------------------|
| <b>A</b> - Height, overall                          | 161 mm<br>(6-3/8")   |
| Height, overall with optional Flex-Mount™           | 223 mm<br>(8-13/16") |
| Height, overall with optional Seismic Plate         | 174 mm<br>(6-7/8")   |
| Height, minimum clearance with optional Cover Plate | 229 mm<br>(9")       |
| <b>B</b> - Width, overall                           | 186 mm<br>(7-5/16")  |
| <b>C</b> - Depth, overall                           | 169 mm<br>(6-5/8")   |
| <b>D</b> - Distance from front to face of rail      | 31 mm<br>(1-1/4")    |
| <b>E</b> - Depth, from face of rail                 | 137 mm<br>(5-7/16")  |

**BOLT SLOT LOCATIONS**

|  |                    |
|--|--------------------|
| <b>F</b> - Depth, from face of rail to center of bolt slots        | 30 mm<br>(1-3/16") |
| <b>G</b> - Distance between bolts on center, y-axis (post-to-post) | 61 mm<br>(2-7/16") |
| <b>H</b> - Distance from center of face wheel to center of bolt    | 30 mm<br>(1-3/16") |
| <b>I</b> - Distance between bolts on center, x-axis                | 60 mm<br>(2-3/8")  |

**MOUNTING BOLT SLOTS**

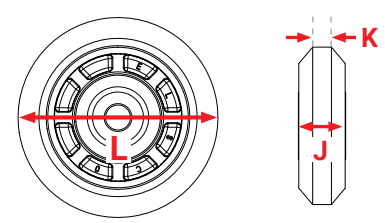
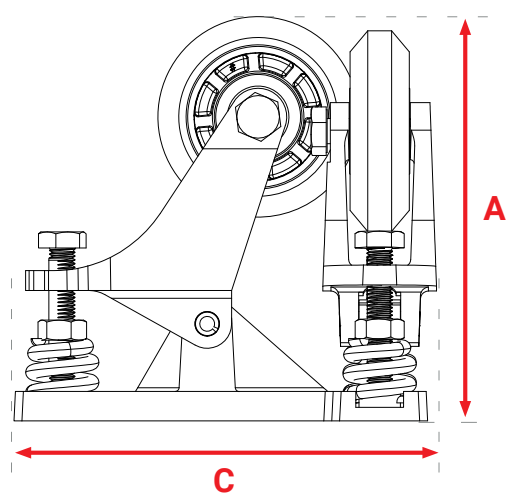
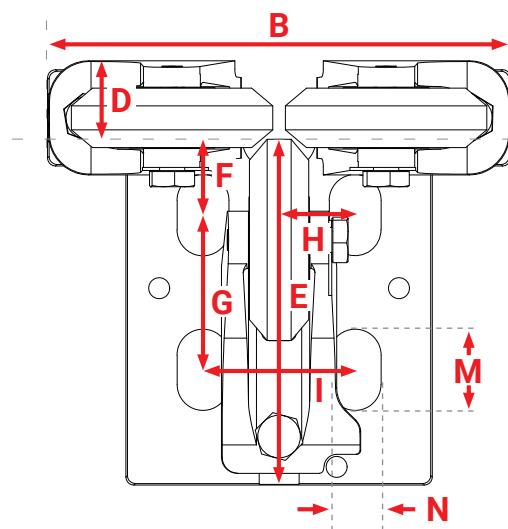
|                      |                                    |
|----------------------|------------------------------------|
| Number of bolt slots | 4                                  |
| Bolt slot dimensions | 32 mm x 21 mm<br>(1 1/4" x 13/16") |

**WEIGHT**

|            |                     |
|------------|---------------------|
| Each guide | 4.2 kg<br>(9.2 lbs) |
|------------|---------------------|

**ROLLER WHEELS**

|                                     |                    |
|-------------------------------------|--------------------|
| <b>J</b> - Width at hub             | 24 mm<br>(15/16")  |
| <b>K</b> - Polyurethane tread width | 9.5 mm<br>(3/8")   |
| <b>L</b> - Diameter                 | 80 mm<br>(3-3/16") |
| Bearing I.D.                        | 10 mm<br>(0.394")  |
| Runout (total indicator reading)    | 0.1 mm<br>(0.004") |



Scan here to learn more about the C-80 Roller Guide and other ELSCO products.