Product/s concerned: SECTOR Traffic Barrier
Internal: YES  External: YES

Subject: Converting the Orientation of the SECTOR Traffic Barrier

It may be necessary to convert the orientation of a SECTOR traffic barrier to comply with certain installation requirements. In this instance, it’s important to observe a few important aspects, so we’ve compiled this bulletin to assist you with this.

Establish the orientation of the SECTOR
What’s considered a left-hand (LH) or right-hand (RH) orientation?
It’s always recommended to install the SECTOR with the access door facing the oncoming traffic. That way if a vehicle fails to stop and knocks the barrier pole, the pole can swing away from the SECTOR and reduce the amount of damage to the SECTOR and vehicle alike. We strongly advise that you fit a SECTOR breakaway coupling, which will improve the safety of the installation. The default orientation is to have the operator installed on the right hand side of the roadway, with the access door facing oncoming traffic and this we refer to as a right-hand orientation.
## Identification of Parts

<table>
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<tr>
<th>Item</th>
<th>QTY</th>
<th>Part Number</th>
<th>Description</th>
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<td>Boom Retainer</td>
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<td>Gearbox Assembly (3m)</td>
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<td>8</td>
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<td>Gearbox Assembly (4.5 &amp; 6m)</td>
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<td>Counterbalance Assembly (3m)</td>
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<td>Spring Locating Washer</td>
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To convert the orientation from RH to LH

1) Remove Counterbalance Spring Assembly
   a. Unlock and remove the Access Door.
   b. Raise the Barrier Pole to the vertical position to make sure the spring is under minimum tension - this is very important!
   c. Isolate the mains power supply to the SECTOR and disconnect the battery.
   d. Remove the Electronics Assembly tray.
   e. Remove the Barrier Pole.
   f. Loosen the Tension Bar Nut until the Taper Bush can rotate freely below the Cross Beam.
   g. Remove the Counterbalance Spring Assembly.

2) Convert
   a. Remove the Counterbalance Spring Pivot from the RH orientation’s hole.
   b. Fit the Pivot and related parts to the LH orientation’s hole in the Output Plate (Put thread locking gel on bolt threads).
3) **Fit Counterbalance Assembly**
   
   a. Push the Taper Bush through the slot in the Cross Beam and rotate it 90° so that it sits perpendicularly across the beam.
   
   b. Fit the Counterbalance Assembly. (NB - please note the orientation of the spring in the 4.5m and 6m models, as detailed below)
   
   c. Tighten the Tension Bar Nut.

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**Correct counterbalance spring orientation for 4.5m and 6m SECTOR models**

We’d like to highlight a subtle, but very important, consideration regarding the orientation of the counterbalance spring in the SECTOR 4.5 metre and 6 metre models. When changing the orientation of these models it’s important to pay attention to the correct orientation of the counterbalance spring when reinstalling this component. Failure to do so may cause the spring to hit against the Output Shaft Plate resulting in collisions.

**For a RH orientation (4.5 m and 6m SECTOR)**
For a LH orientation (4.5 m and 6m SECTOR)

Remove the Barrier Coupler
When changing the orientation of the Barrier from Right Hand to Left Hand or vice versa, the Barrier Coupler will be out of sequence and has to be removed, rotated and then refitted.

A Coupler Puller is required to remove the Barrier Coupler. The Coupler Puller can be purchased from CENTURION, or a similar one can be fabricated.

Coupler Puller
**Fit the Coupler Puller**

- Prior to fitting the Coupler Puller please remove the existing M10 cap screw and washer holding the couple in place. Replace this with the 35mm M10 cap screw supplied in the Coupler Puller kit.
- Fit the Coupler Puller to the Barrier Coupler with two M8 Bolts and Nuts supplied in the Coupler Puller kit.

**Remove the Coupler**

- Using an 8mm Allen Key, loosen the Cap Screw inside the Barrier Coupler. The Cap Screw can be turned with the Allen Key through the middle hole in the Coupler Puller.
- Keep loosening the Cap Screw until it buts up against the Coupler Puller.
- Carry on loosening the Cap Screw until it releases the Barrier Coupler.
Fit the Coupler

- With the Counterbalance Assembly under minimum tension (Barrier Pole raised) position, fit the Barrier Coupler.
- Engage the Barrier Coupler / Output Shaft Splines so that the Barrier Coupler is in its closest vertical position.
- Fit the Washer and Cap Screw and then tighten using an 8mm Allen Key.
- Attached Barrier Pole
Levelling the Barrier Pole

To level the Barrier Pole, the procedure is as follows:

a) Loosen Lock Nuts on the Adjustment Link.

b) Turn the Adjustment Link to level the Barrier Pole.

c) Tighten Lock Nuts.

We trust that this information will assist you with your SECTOR installations.

We are committed to providing you with the best technical and after sales support. Should you require any additional information you may call any of our branches, or our Technical Support Centre on 0860 – CENTURION (0860-236-887).

In addition, you can find a lot of information and documentation on our website which we hope you will find to be most useful – go to www.centsys.co.za.

Yours sincerely,

Adam Butchart
Marketing Manager