

R0015278 Mount Completed Assemblies

Instructions to mount completed assemblies to main frame

 Difficulty **Medium**

 Duration **9 hour(s)**

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Comments

Introduction

Tools Required

Standard Hex key set
Standard spanner set
300 mm rule
1000mm rule

Parts Required

D0008288 Takeup Pad Left (D7339) (Wet/P F Matt) x 1
D0015583 Take Up Beam Joiner x 1
D0015598 Datum Flag: Saw Infeed x 1
D0015717 Energy Chain Angle Bracket Lower x 5
D0015718 Energy Chain Angle Bracket Upper x 5

D0015720 Carriage Bracket x 1
D0015721 Energy Chain Tray Deep Long x 1
D0015723 Energy Chain Tray Shallow x 1
D0015724 Energy Chain Tray Deep x 1
D0015725 Energy Chain Tray Shallow Medium x 1
D0015742 Takeup Pad Right ZX5 x 1
E0000336 Sensor: M8; 2mm, PNP N/O, M8 conn x 1
R0015011 Bench Assemble Gripper
R0015063 Bench Assemble Roller Tables
R0015096 Bench Assemble Transfer Drive Assembly
R0015101 Bench assembly take up assembly
R0015286 Bench Assemble X axis components and energy chain

Step 1 - This Dokit has two parts

This dokit is split into 2 parts , please ensure part 2 is used

Step 2 - Unless otherwise stated

Use loctite 243 on all fasteners

Use Loctite 572 on all threaded pneumatic connections

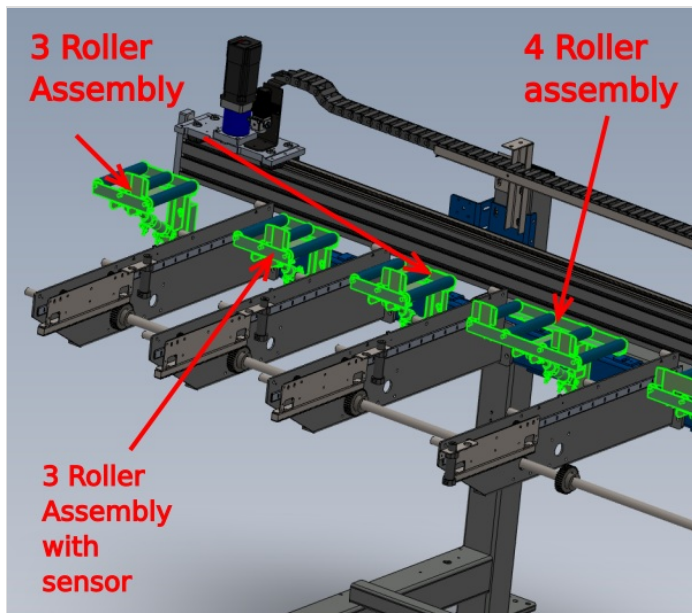
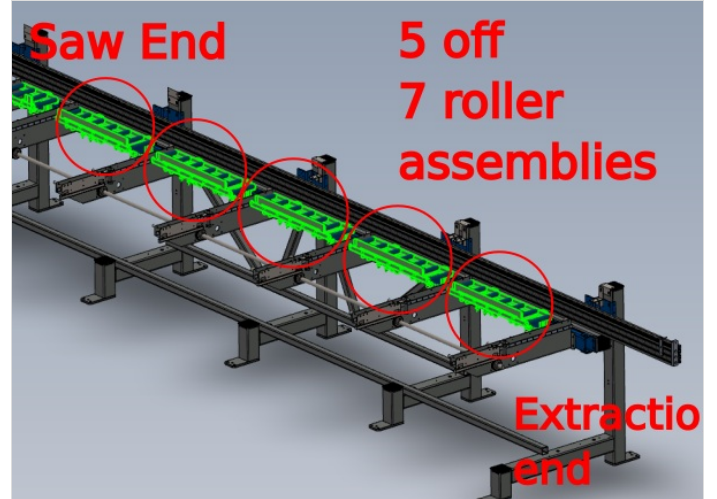
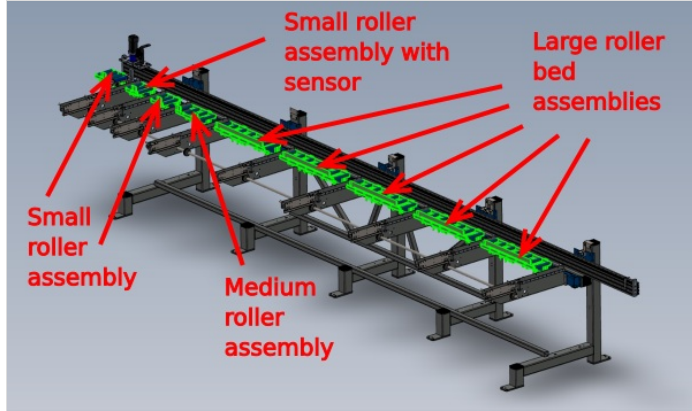
Pen mark all fasteners to show finalised



Step 3 - Mount pre built R0015063 Bench Assemble Roller Tables

Mount roller beds as indicated , using M8 x 25 socket caps and heavy M8 washers.

Do not apply adhesive to fasteners and only apply holding tension to fasteners

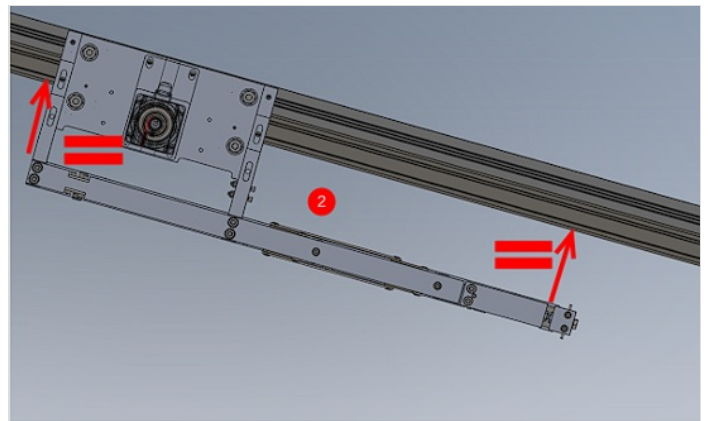
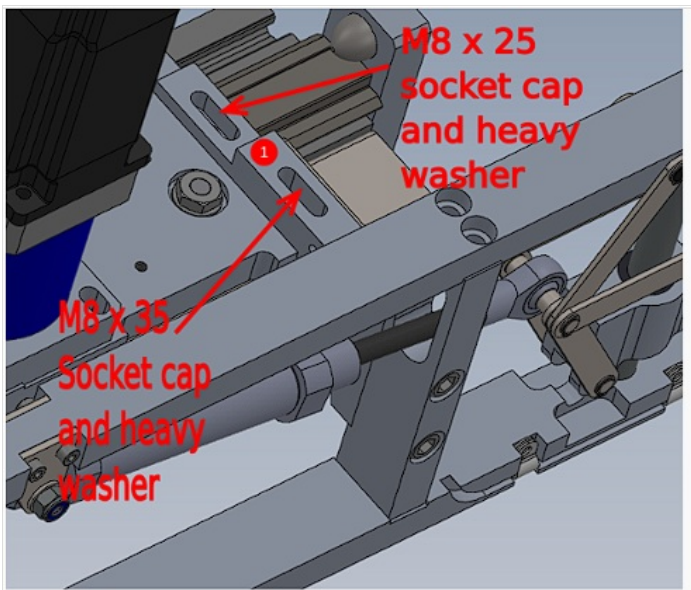
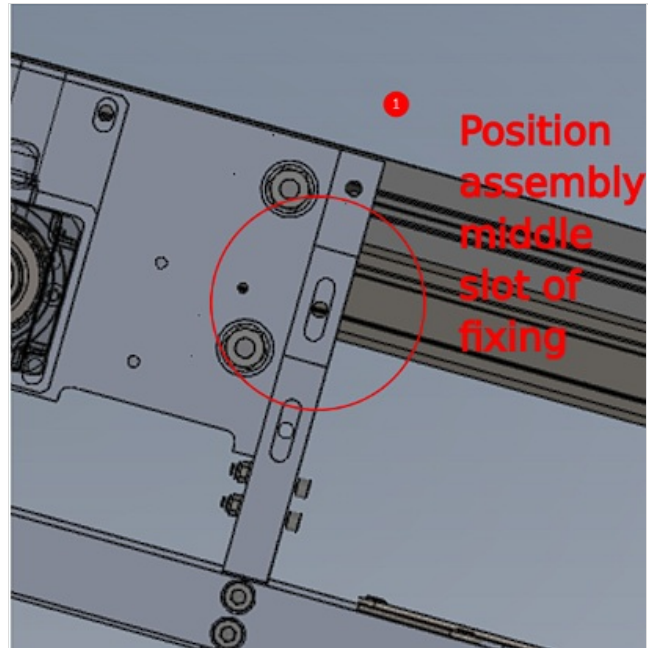
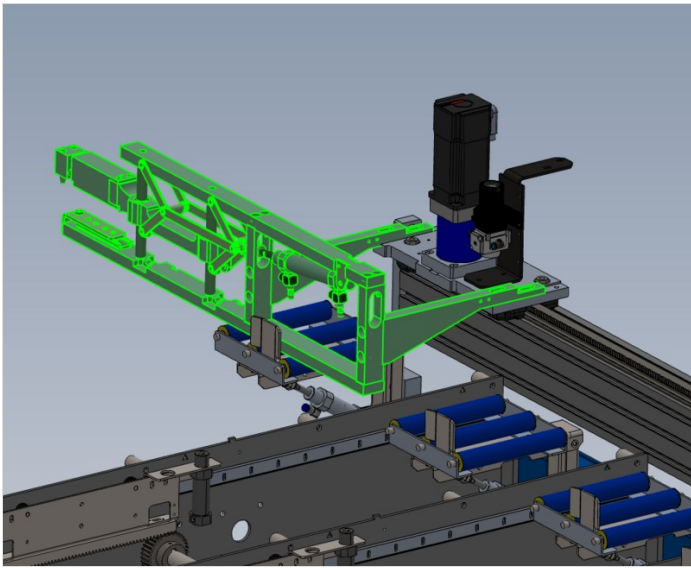


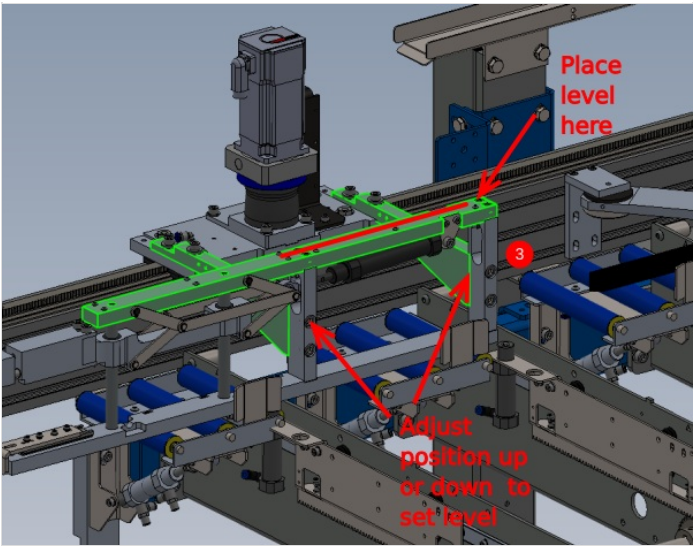
Step 4 - Mount pre built R0015011 Bench Assemble Gripper

1 Mount Gripper assembly to carriage using 2 off M8 x 35 socket caps 2 off M8 x 25 socket caps and heavy M8 washers

2 Check and adjust parallel to ensure gripper is true to hepcos beam both indicated measurements should be identical

3 Finalise level of gripper. Use engineers level on indicated face . Manipulate mounting brackets to set level. Finalise fasteners once set
Tolerance 0.5mm

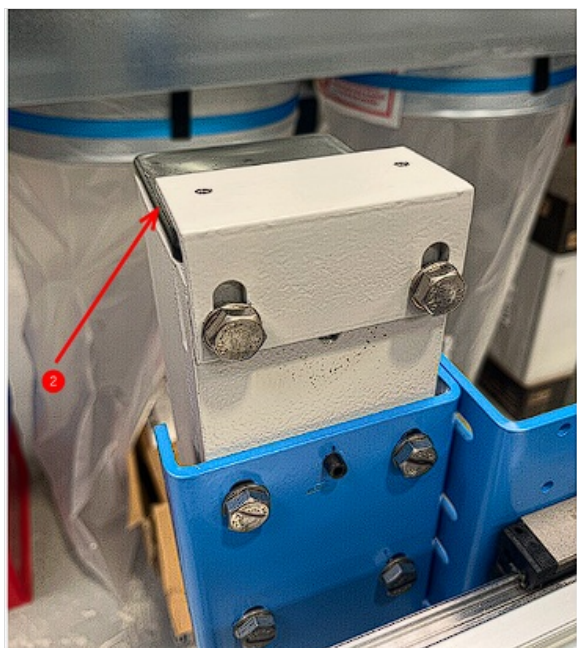
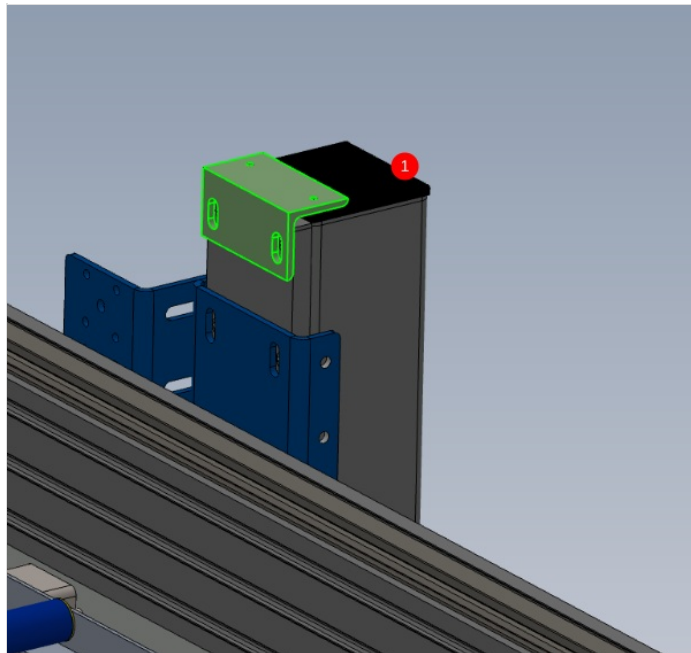
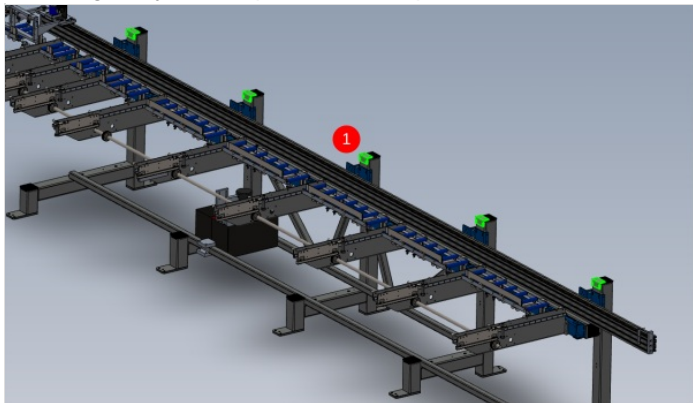




Step 5 - Mount Energy chain angle brackets Lower

1 Mount 5 off D0015717 Lower mounting angle with 2 off M10 x 30 set bolts and A form washers per bracket . Do not apply adhesive at this point

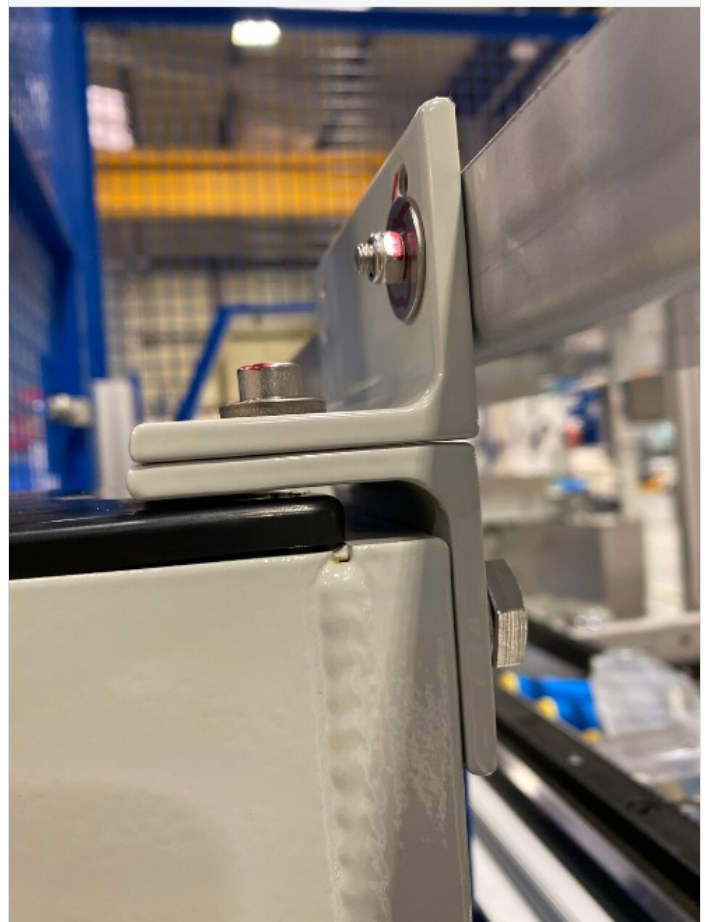
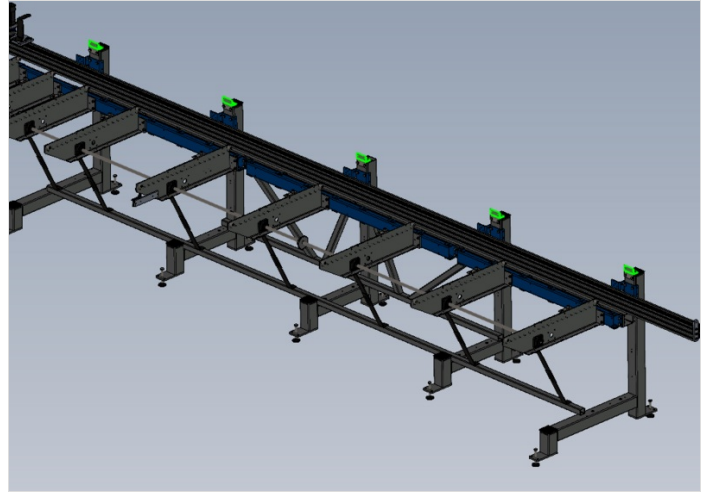
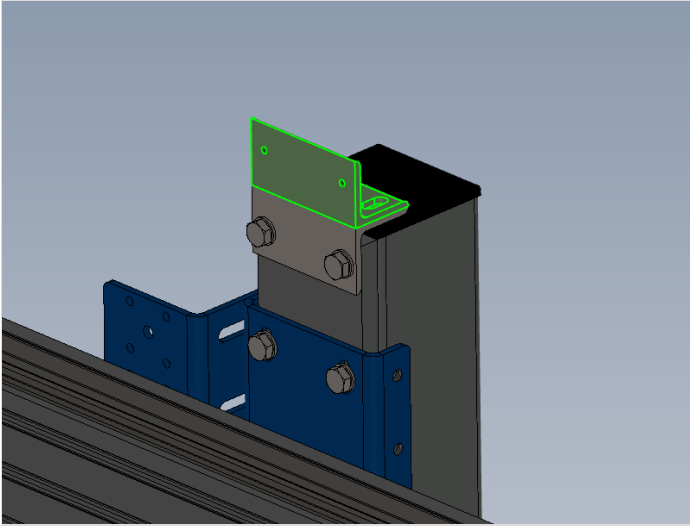
2 Set height to just clear plastic frame cap and set bracket level



Step 6 - Mount short upper chain angle brackets

Mount 5 off D0015718 to indicated points using M6 x 12 socket caps and heavy M6 washers . Set faces flush as with previous step

Do not apply adhesive at this point

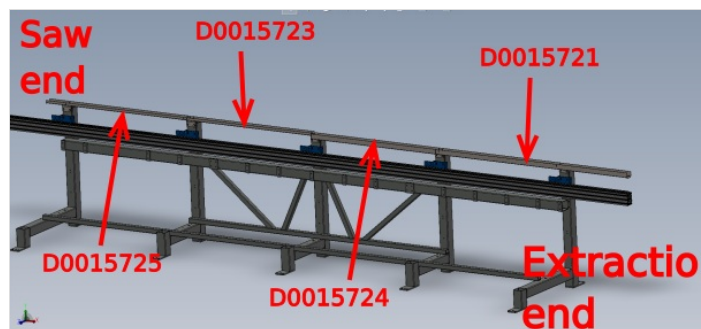
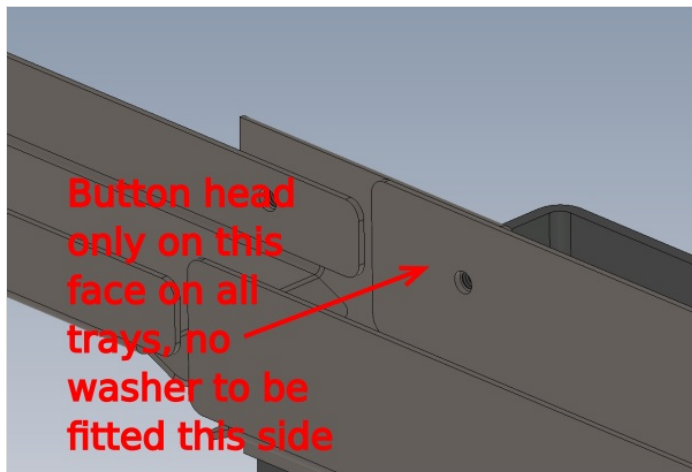


Step 7 - Fit lower chain trays

Lightly fix these parts, as adjustment will be required later

⚠ ...Do not fit washers under the heads of button heads on all internal faces on energy chain trays. See picture

- 1 Fit D0015721 to indicate point Using M5 x 16 button hex bolt, M5 penny washer and M5 nyloc nut .
- 2 Fit D0015724 to indicate point with same fixings as above
- 3 Fit D0015723 to indicate point with same fixings as above
- 4 Fit D0015725 at indicated position .



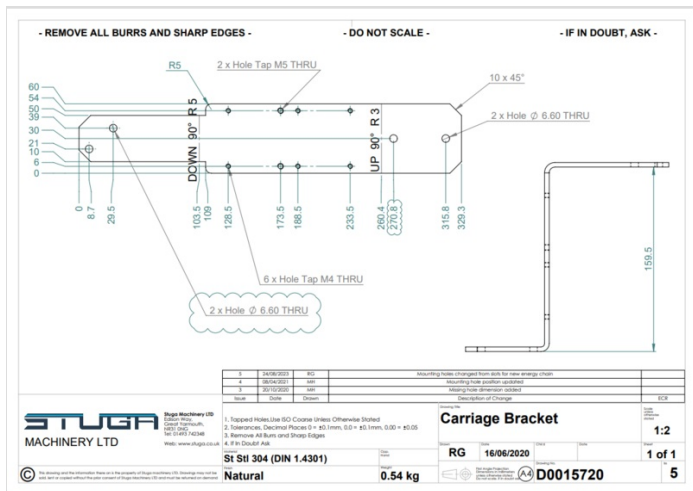
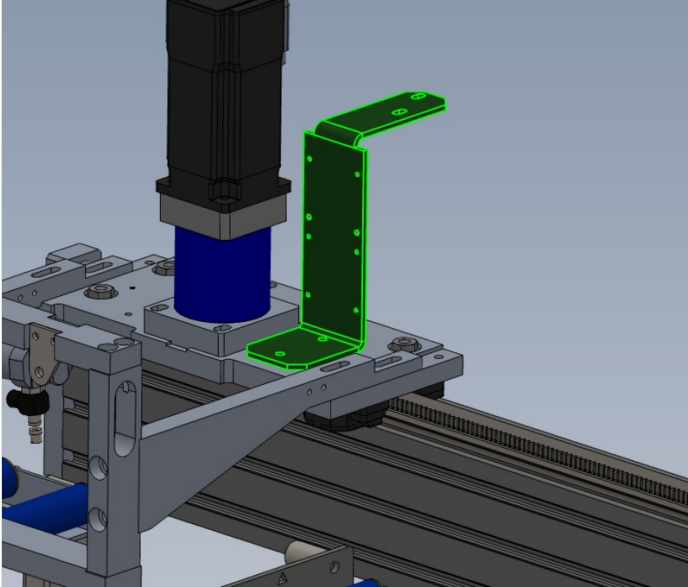
Step 8 - Fit Carriage bracket



..ECR requested to amend bracket with below changes. Rework to shown picture if new style is not issued

Fit D0015720 carriage bracket as shown using M6 x 16 socket caps and A form washers

Ensure bracket is mounted square on carriage plate

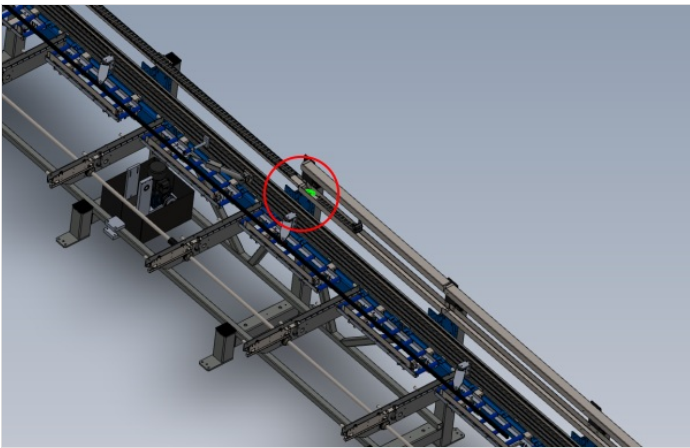
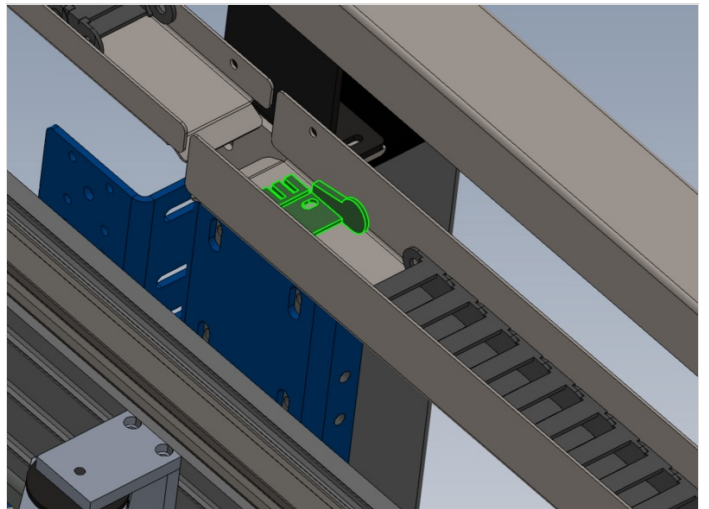
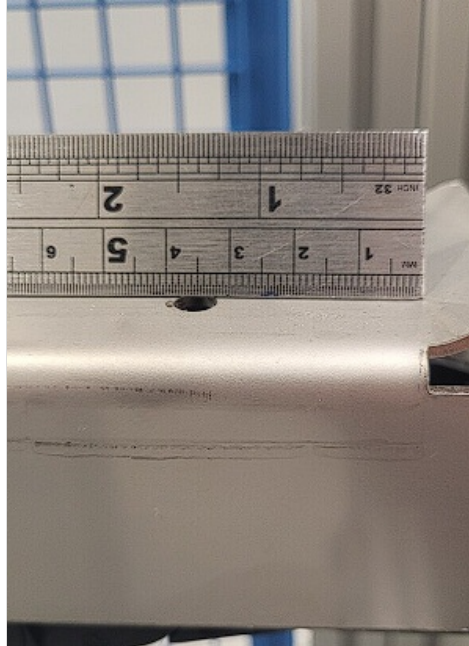
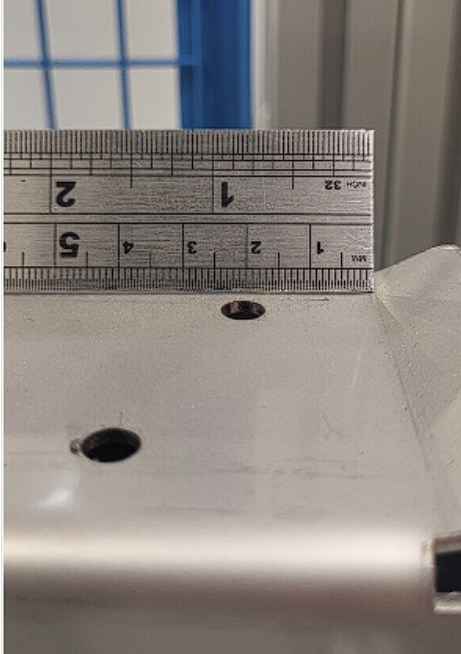


Step 9 - Fixed end fixing position

⚠ ...It is vital this position is checked and adhered too so energy chain clash on fencing is not encountered when at full travel

Fixed part of energy chain be be at this position on mounting tray

- 1st hole 20mm from fold
- 2nd hole 35mm from fold



- REMOVE ALL BURRS AND SHARP EDGES - - DO NOT SCALE - - IF IN DOUBT, ASK -

Item	Code	Quantity	Notes
1	100/200	80	4 of 1st diameter added
2	120/200	80	4 of 2nd diameter added
3	140/200	80	4 of 3rd diameter added
4	160/200	80	4 of 4th diameter added

STUGA Energy Chain Tray Deep
MACHINERY LTD

St SH 304 (DIN 1.4301) 3.79 kg

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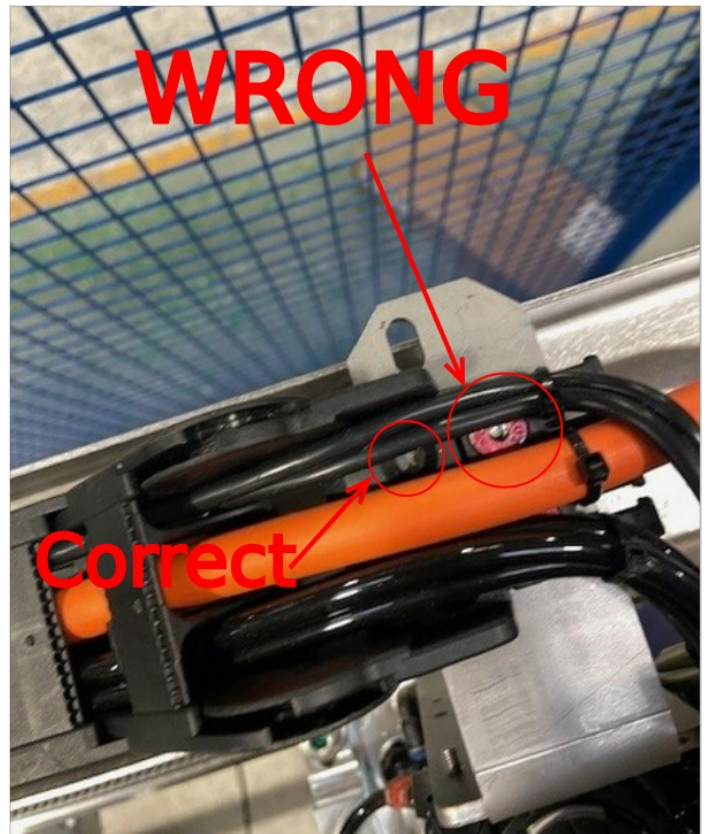
D0015724 5

Step 10 - Important Information

Energy chain assembly has 2 different mounting positions

It is VITAL the correct ones are used

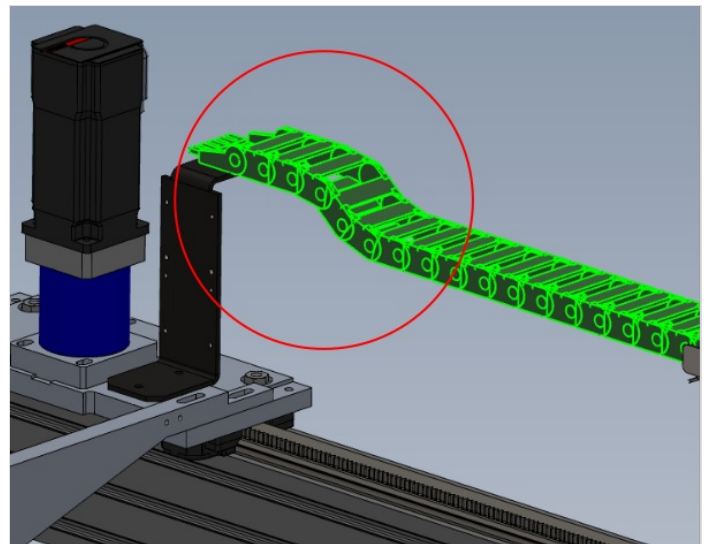
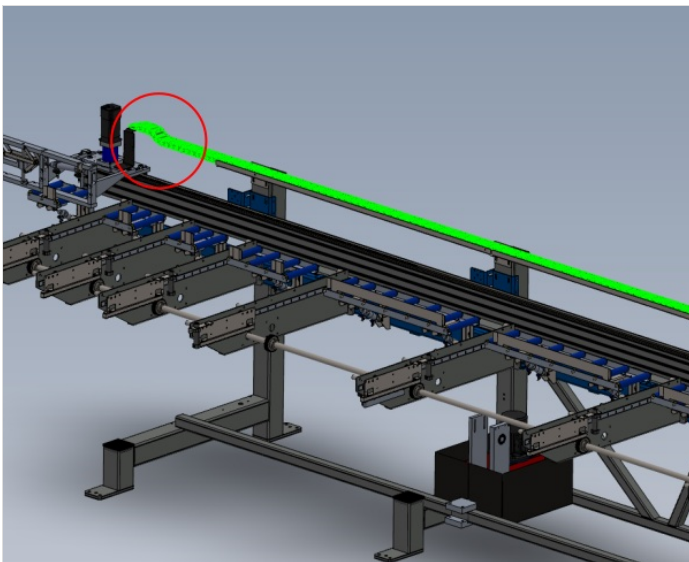
Please fit using correct holes. Picture attached shows the energy chain fitted using the WRONG holes for mounting



Step 11 - Attach pre built R0015286 energy chain

Fit pre built energy chain from assembly R0015286 and attach using M6 x 16 countersunk fasteners, M6 a form washers and M6 nyloc nuts

⚠ ...Ensure reversed links are fitted to the gripper assembly connection end Ensure energy chain brackets are fixed so the energy chain runs parallel to the trays



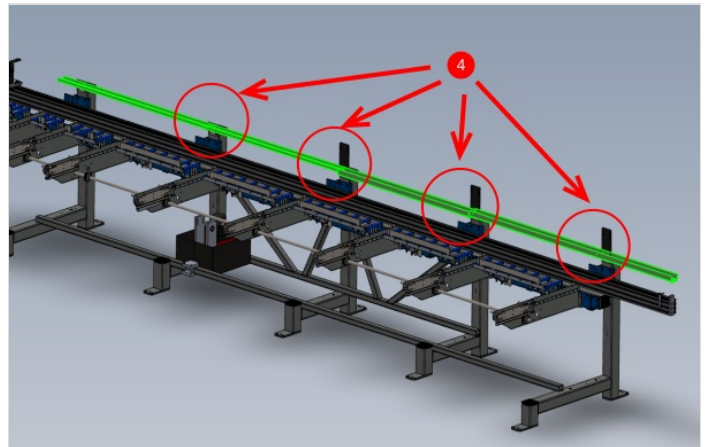
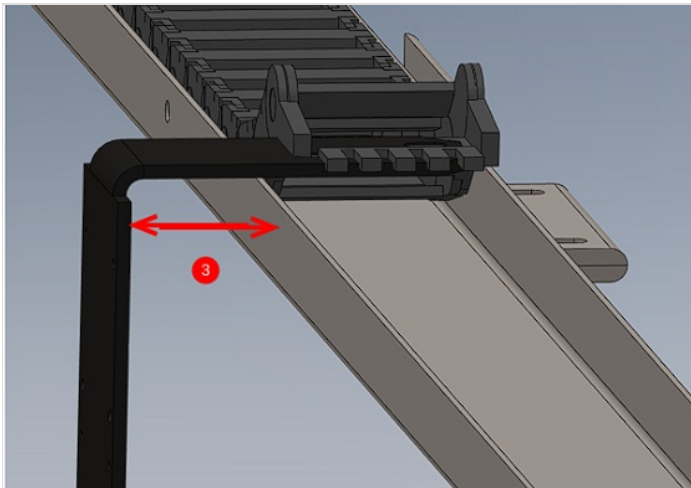
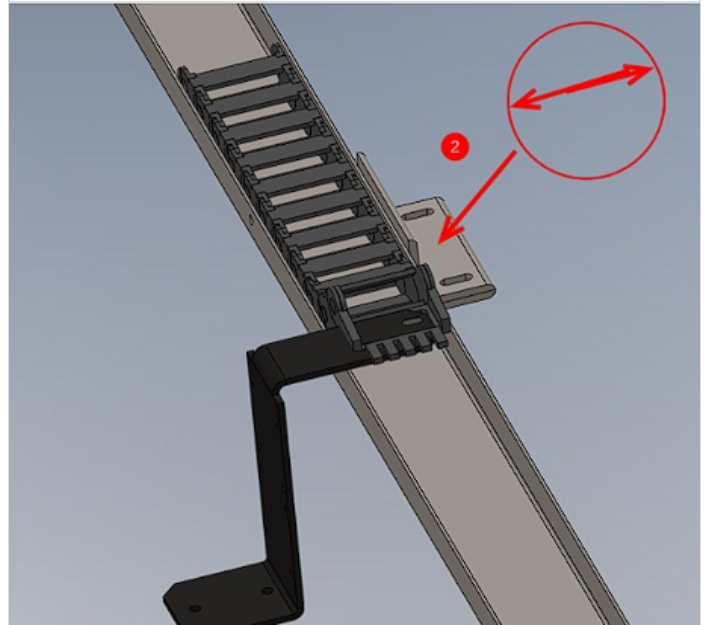
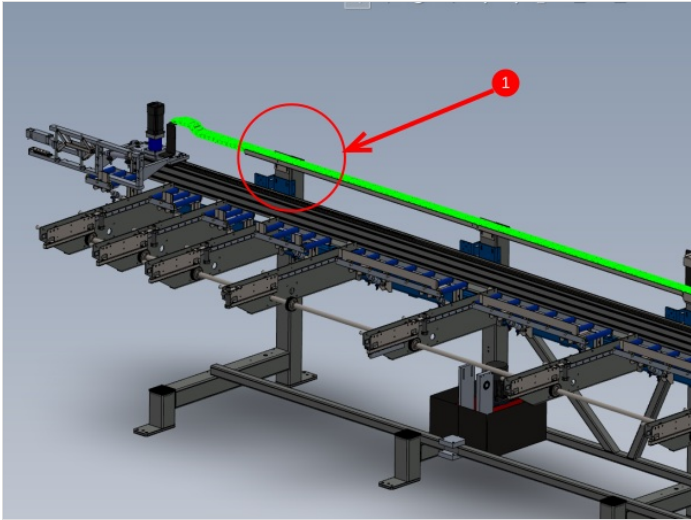
Step 12 - Adjust lower trays to suit energy chain

1 Move gripper with energy chain attached to point indicated

2 Adjust bracket in indicated direction so that energy chain sits central in the tray

3 Measure indicated distance S

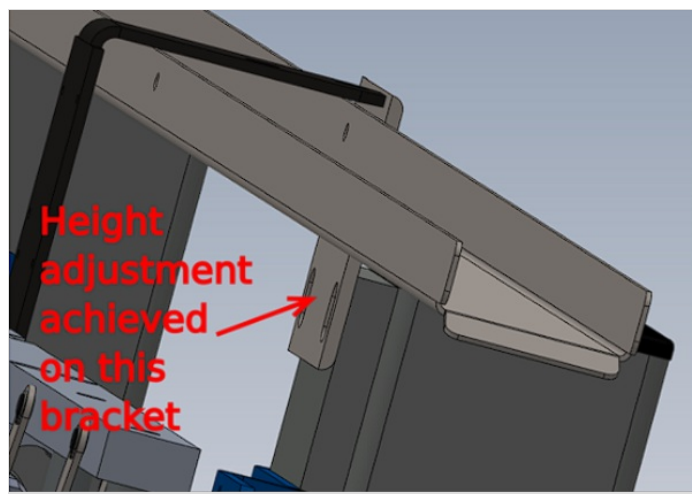
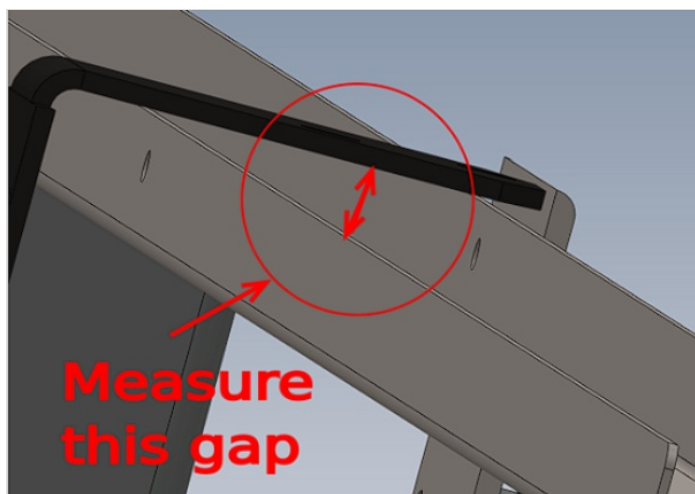
4 Set the next 4 lower tray mounting points to replicate this measurement using the same method of adjustment with the angled bracket



Step 13 - Adjust lower tray height

Using the first point used to set the brackets , measure the gap indicated and replicate this measurement on the other 4 points . This is adjusted by moving the indicated bracket up or down .

i ... enough adjustment is not available on remaining positions, first position can be moved up and new measurement taken



Step 14 - Quality check

Move Gripper carriage along the complete length of the hepco beam , and monitor the energy chain .
Check that there is no sideways pressure on the chain from misalignment
Check that no snags occur on fixings when energy chain is travelling



Step 15 - Finalise fixings

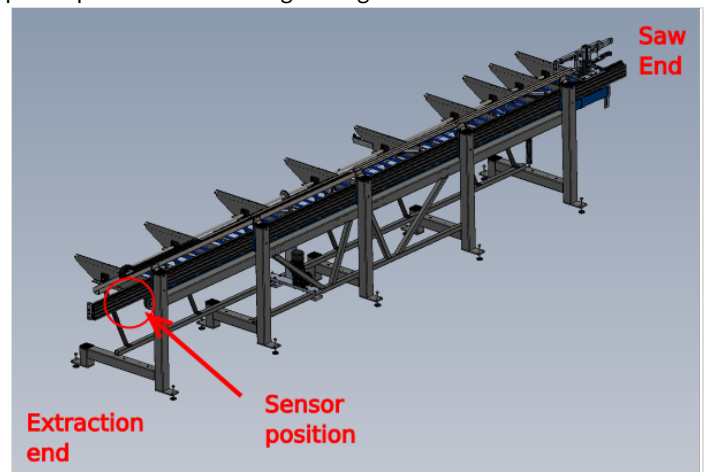
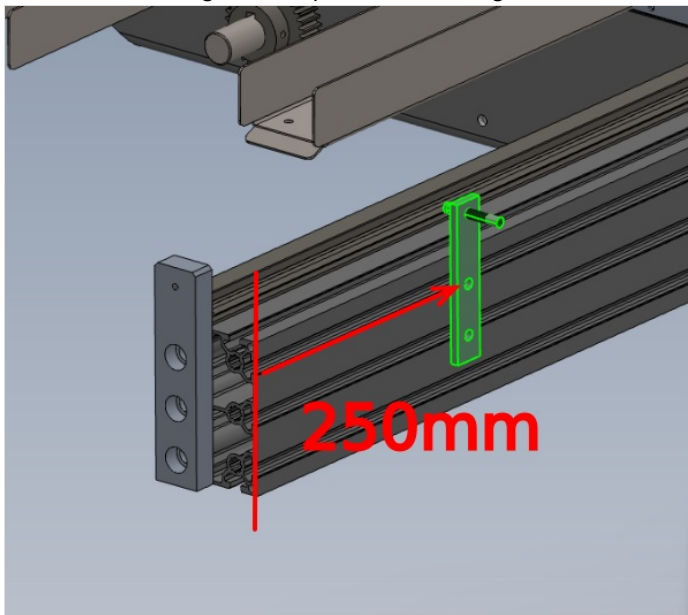
Now aligned, ensure all fixings used to assemble the energy trays and brackets have adhesive applied and final tension added to fasteners and pen marked



Step 16 - Mount Datum Sensor and bracket

Mount D0015598 with E0000366 as shown at 250mm from end. Use M8 D nuts, M8 x 16 socket caps and A form washers

Set sensor to carriage face. Gap should be no larger than 1mm. Check gap at all points of travel along carriage face

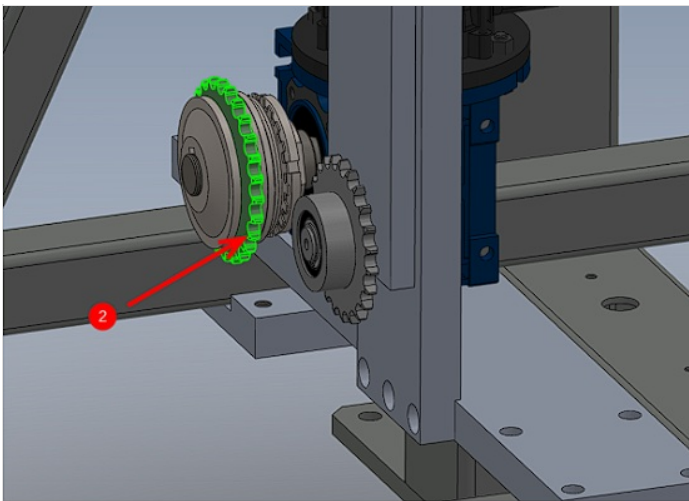
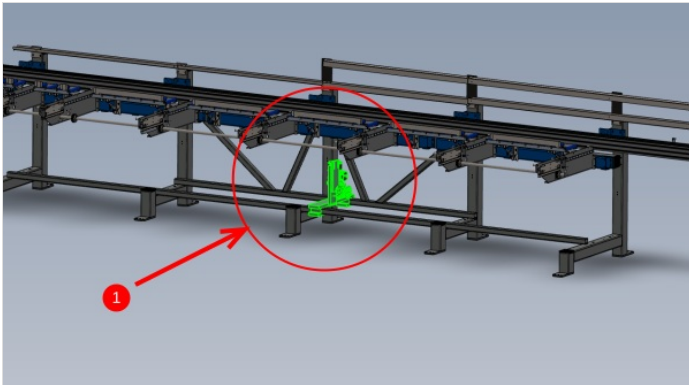


Step 17 - Mount R0015096 Bench Assemble Transfer Drive Assembly

1 Position 1 off drive assembly in the positions indicated

2 Use a 1000mm steel rule to align indicated sprocket with drive sprocket on drive shaft indicated

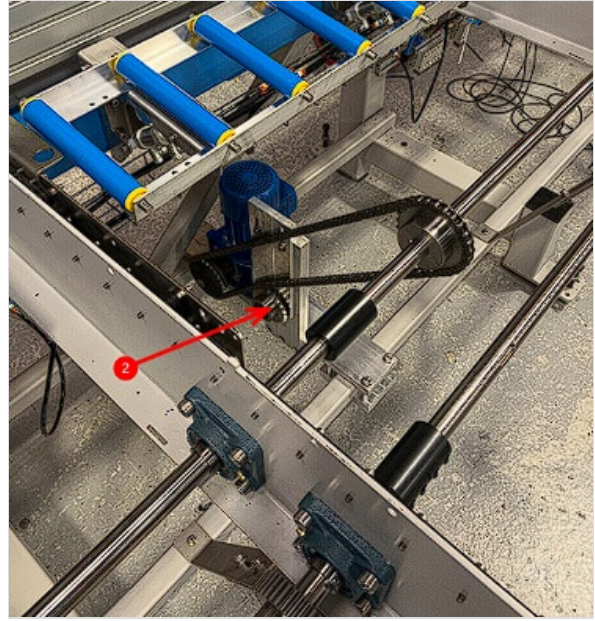
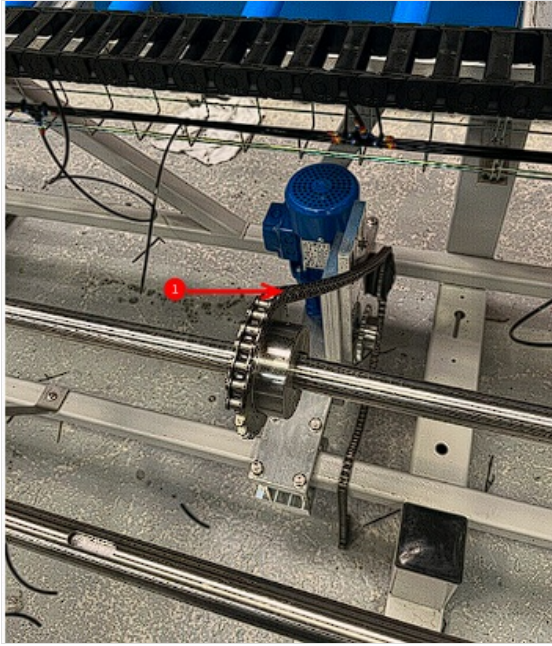
i ...Sprocket can be moved slightly along shaft but ensure key is always fully engaged into sprocket keyway. Motor assembly can be moved to aid alignment



Step 18 - Add drive chain

1 Fit drive chain to shaft sprocket and motor assembly.

2 Adjust tensioner to apply tension to chain. This should be set so chain has minimal slack, but is not under excessive tension.



Step 19 - Now move to section two

Section two of this dokit must be followed

Found here

R0015278 Mount Completed Assemblies Section two
