PLAYSEAT CHALLENGE

LOCK-MOD X

Assembly Manual

About

This is the assembly guide for the Lock-Mod X, an all encompassing upgrade for the Playseat Challenge X (Logitech edition) sim racing rig.

Use in conjunction with the Lock-Mod X Torque Guide to ensure proper assembly of the kit. Accompanying accessory assembly manuals can be found here.

Note:

The original Playseat Challenge and Playseat Challenge Actifit is not compatible with the Lock-Mod X; see the original Lock-Mod upgrade kit for these models.

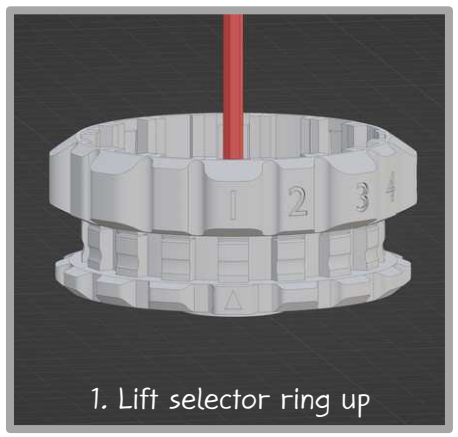
Contents

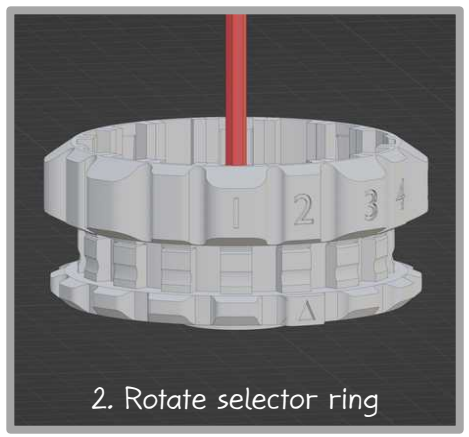
Tools

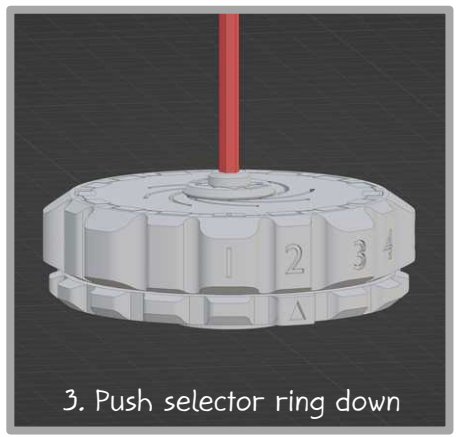
The Lock-Mod X kit comes with an adjustable torque wrench with 2 extra long ball ended hex keys (M3 & M4 size) that interfaces with it.

The adjustable torque wrench has 8 settings, ranging from 0.25 – 1.54nm. The values are as follows (nm value accurate to within ±10%):

T1: 0.25nm, **T2**: 0.44nm, **T3**: 0.63nm, **T4**: 0.82, **T5**: 1nm, **T6**: 1.18nm, **T7**: 1.36nm, **T8**: 1.54nm





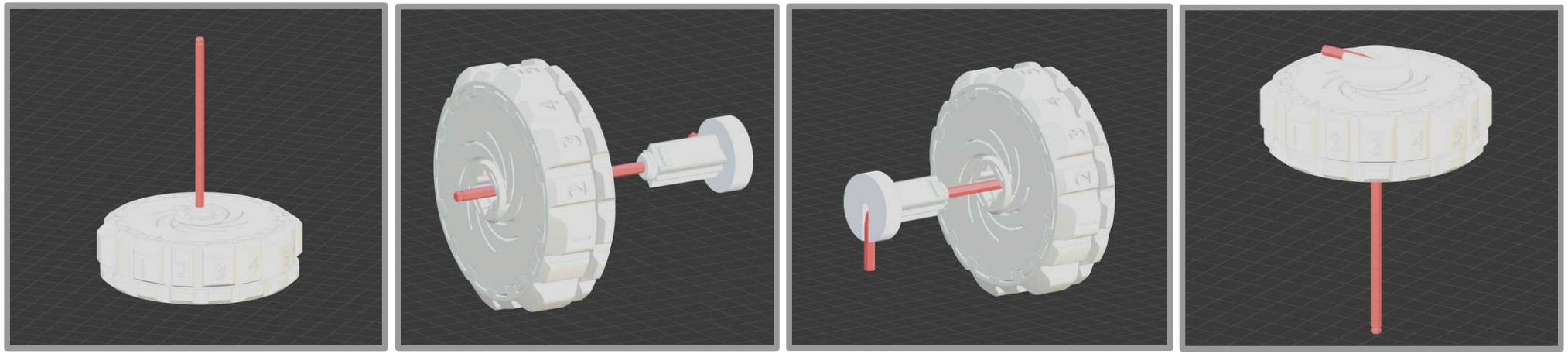


The torque values for each part can be found here.

To ensure proper function of the Lock-Mod kit, these torque values should be followed. However, if you notice that, for instance, a clamp has not fully secured a tube from sliding, you may need to increase the tightness of the relevant bolts. If so, do not go above 140% of the bolts' listed spec to avoid damaging the part, and keep in mind that this is not recommended if the part is already functioning properly.

Additional Torque Wrench Guidelines

- For best torque value consistency, tighten bolts until the wrench clicks over 3 times consecutively, as the first few clicks can sometimes be below the referenced torque value.
- Limit rate of clicks to about 3 per second. Going faster than this reduces accuracy.
- Tool measures in clockwise (tightening) rotation. Anti-clockwise rotation can be used if needed, but won't click over at a consistent value.
- If stored in a hot enclosed space or left in direct sunlight for extended period, allow to stabilise to room temperature before use.
- Temperatures above 65°C/149°F can cause the plastic to permanently warp, reducing the torque wrench's accuracy and possibly breaking it.



- The torque wrench typically only measures in the clockwise direction, but the half of the QR mechanisms need to be calibrated in the counter-clockwise direction. For these cases the hex key interface can be installed in reverse to allow accurate counter-clockwise operation.

Required Tools

- An **M5 hex key** is required for a pair of parts and is not included in the Lock-Mod X kit, but a dual purpose hex key (M4/M5) is included with the Playseat Challenge X.
- A **flat head screwdriver** is required for a pair of small screws

Optional Tools

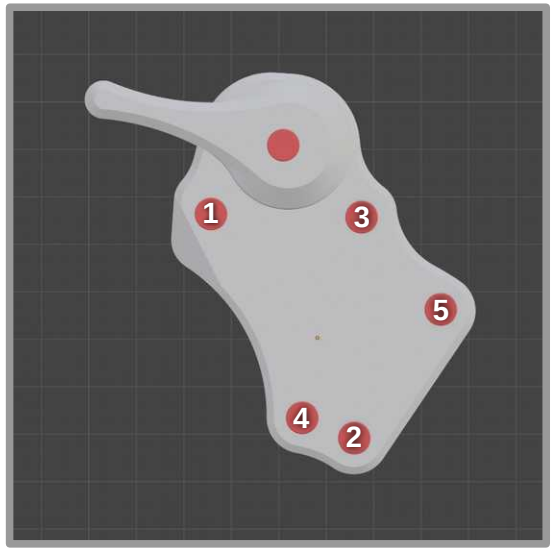
- An electric screwdriver can be used to quickly thread bolts into place, but the bolt should only be fully tightened with a torque wrench. To avoid accidentally over-tightening with an electric screwdriver, set the clutch slip to a very low setting or feel for when torque on the bit begins increasing.
- Graphite pencil and/or permanent marker, to mark the telescoping tubes to make setup quicker and easier.

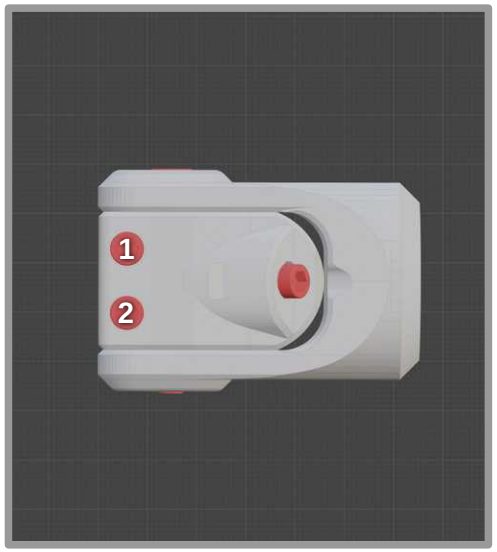
Additional Assembly Information

Cross Pattern Tightening

Where applicable, bolts should be tightened with cross pattern tightening. This applies to parts where multiple bolts are sharing a load, and involves incrementally increasing the torque while jumping between (roughly) opposite sides of the part. Doing this when assembling (or disassembling) a part will ensure a single bolt doesn't become over-strained, which can cause the thread/nut to seize up.

Examples of the cross pattern sequence are illustrated below. Note that this sequence will be repeated many times as you bring the bolts up to their final torque rating.





Care Instructions & Warranty

Care Instructions

- Storing the kit in temperatures above 53° C or 127 F should be avoided to avoid parts from warping.
- A PTFE infused emulsified wax solution has been applied to lubricate sliding surfaces in the Lock-Mod X. This should last the lifetime of the kit, but a few drops of liquid chain wax can be re-applied if necessary.
- All QR attachments should be in the open, unlocked position if storing the assembled Lock-Mod X for an extended period of time. This will help prevent the plastic warping over time.

Warranty

This kit comes with a 2-year warranty from the date of purchase, and it covers any failures resulting from reasonable use. Reasonable in this case assumes:

- All instructions in the assembly manual are followed.
- Maximum 20nm torque limit for the wheelbase in standard/reverse configuration, and 10nm in quick release configuration.
- Maximum 80kg of pedal force.
- Maximum 25kg force for the handbrake and shifter side assembly.

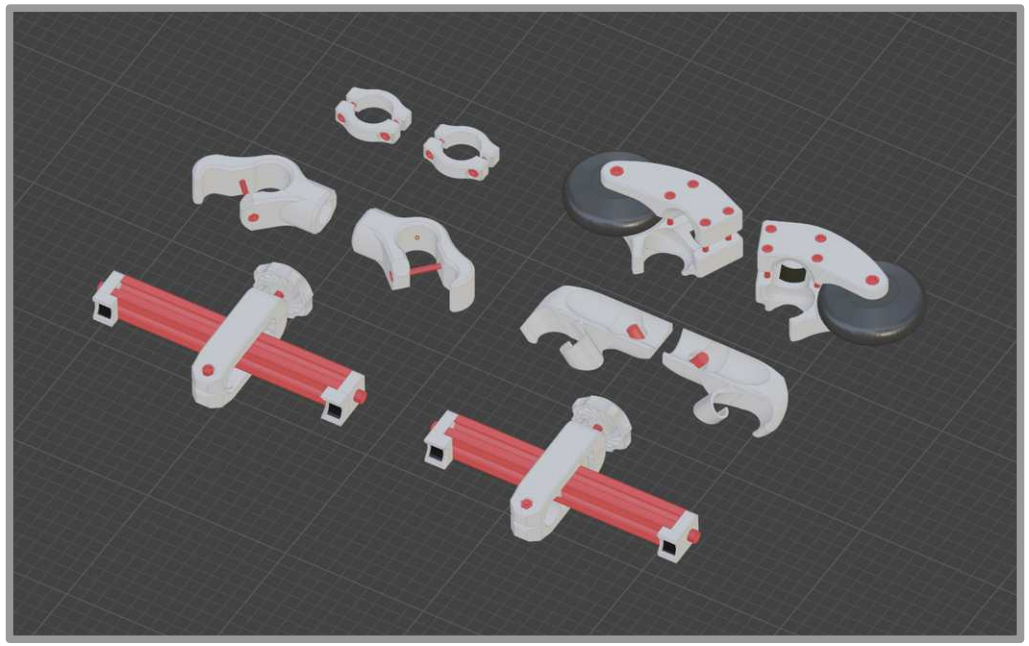
If these points are not adhered to the longevity of the Lock-Mod X cannot be guaranteed.

If any problems are encountered with the kit, use the contact found here:

https://psyskip.com/about/

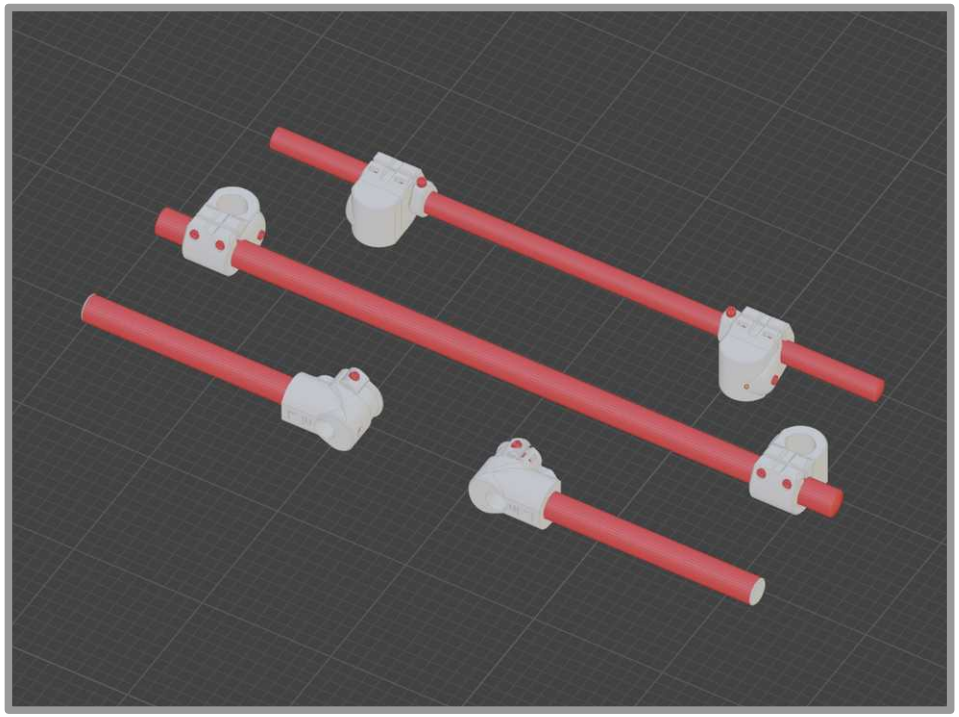
Kit Contents

Not including optional extras, the Lock-Mod kit comes packaged in 6 part bundles. These bundles are loosely grouped in their respective location on the Playseat Challenge X rig.



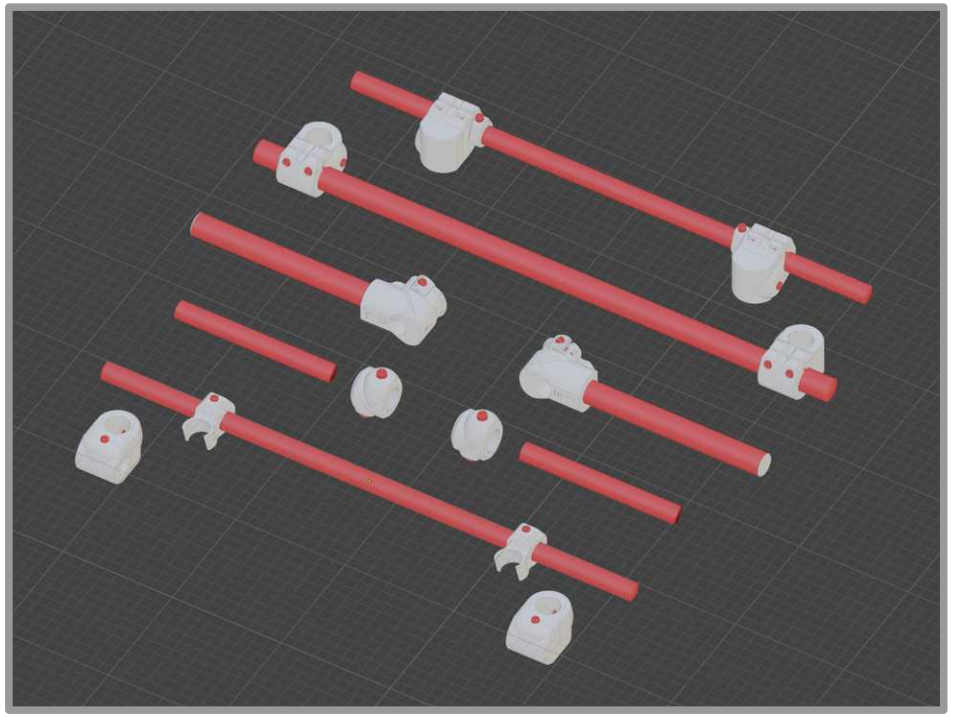
1. Rollers & Pedal Reinforcements

Includes the roller wheels and parts used to reinforce/lock the pedal tray assembly.



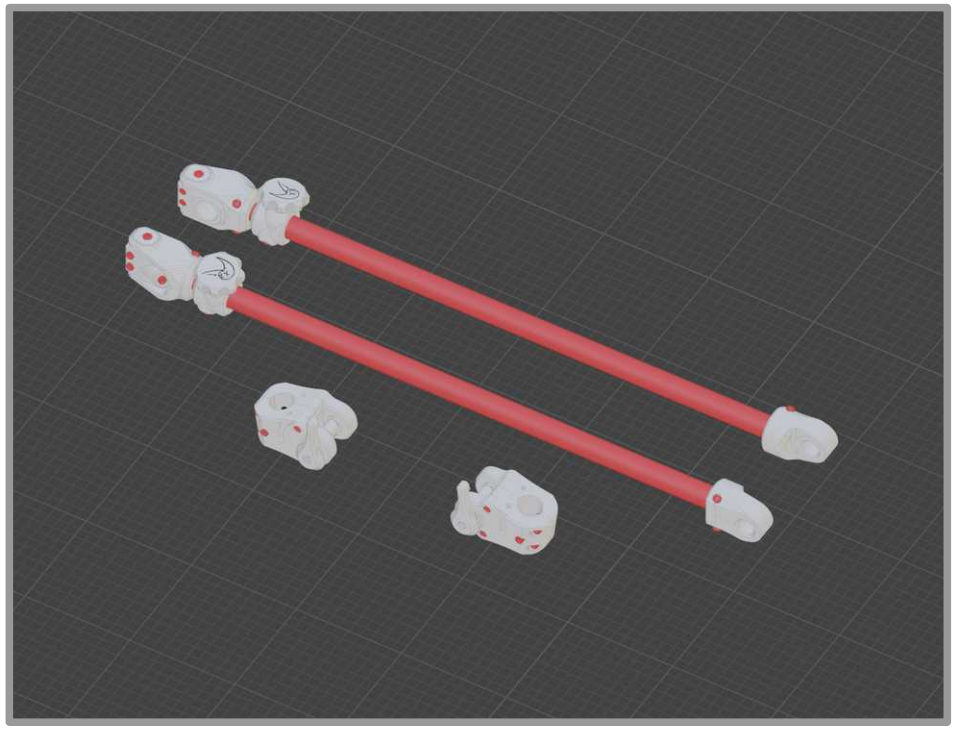
2.A. Pedal Assembly: Low Height

To keep the pedal base at the stock height, chose this option. The pedal base height will be non adjustable.



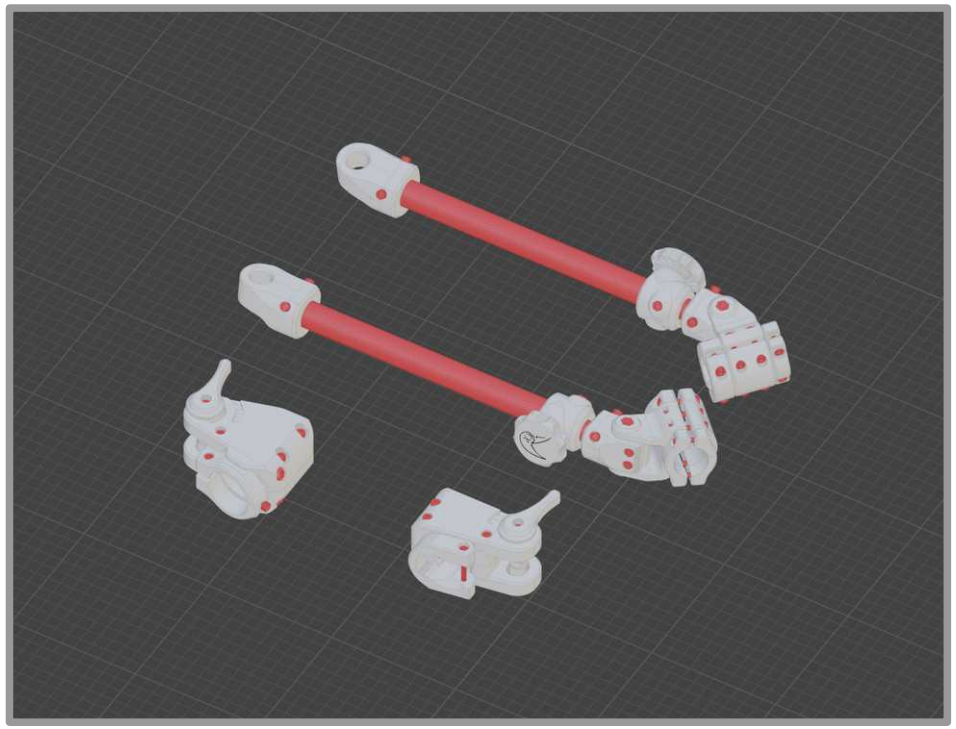
2.B. Pedal Assembly: Extended Height Options

These extra parts adds an additional pedal tray height of up to 200mm. Still allows minimum height to be used. Allows a wide variety of seating positions (GT/Formula style).



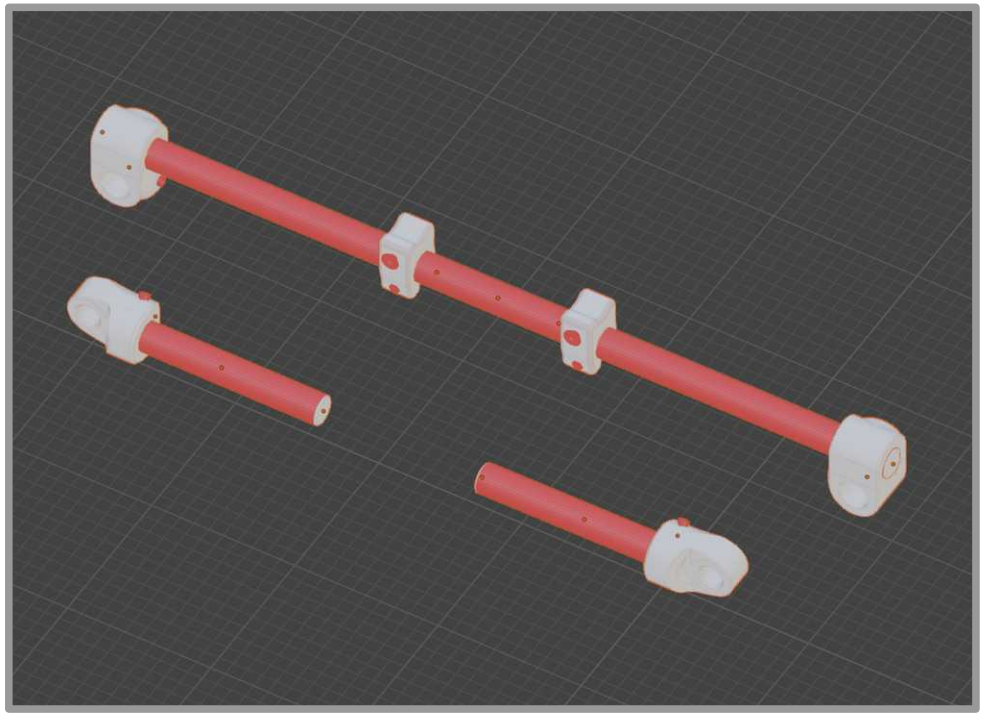
3. Telescoping Pedal/Wheelbase Reinforcing Struts

Connects the pedal tray and wheelbase assembly to prevent the rig flexing under braking and generally improves rigidity



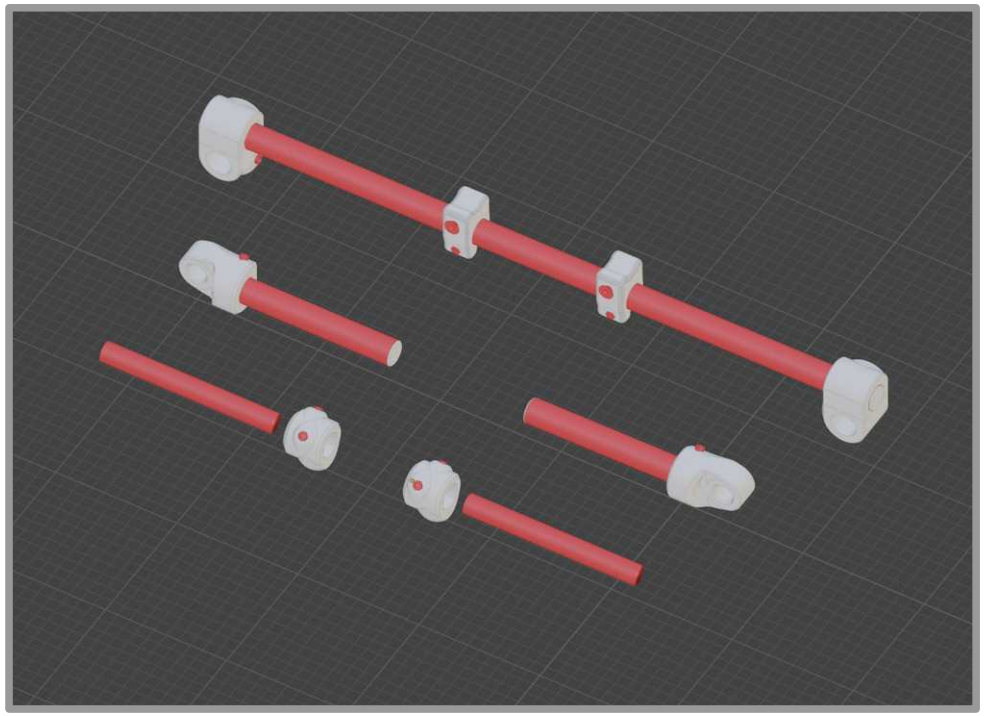
4. Side Struts & Wheelbase Hinge/Clamp Reinforcement

This sub-assembly reinforces the wheelbase by connecting the rig with telescoping tubes and direct hinge/clamp reinforcement.



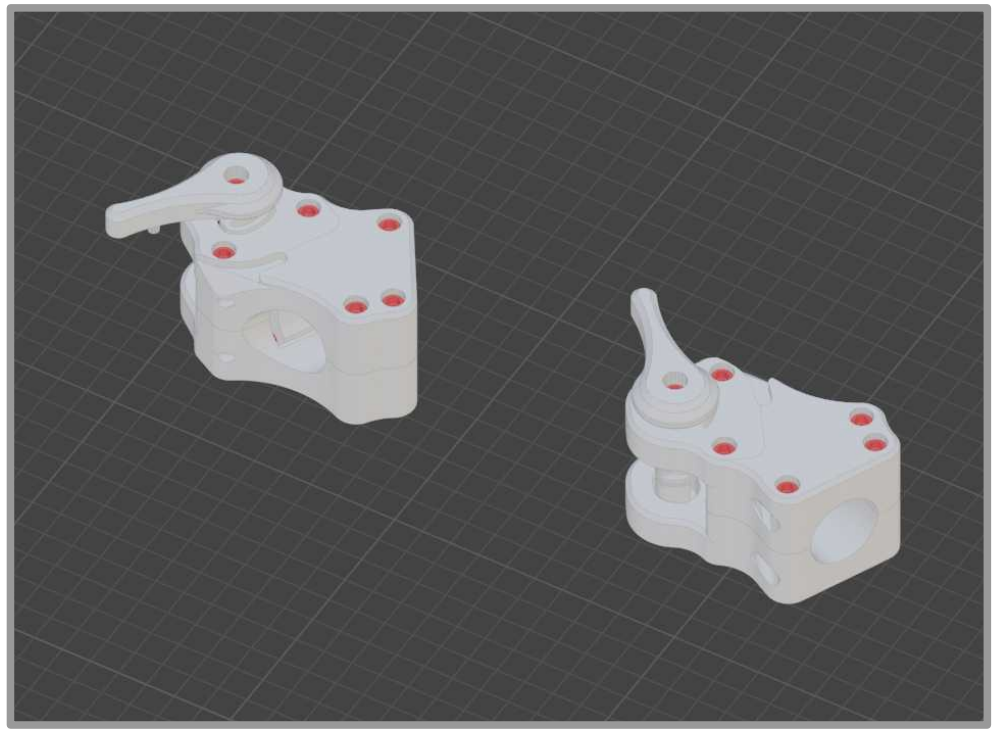
5.A. Wheelbase Reinforcing Assembly

If your wheelbase configuration angles the Playseat Challenge X wheelbase plate so that the struts are quite short, this configuration without the telescoping struts can be chosen. Max distance between the wheelbase plate and the QR connector is ~160mm.



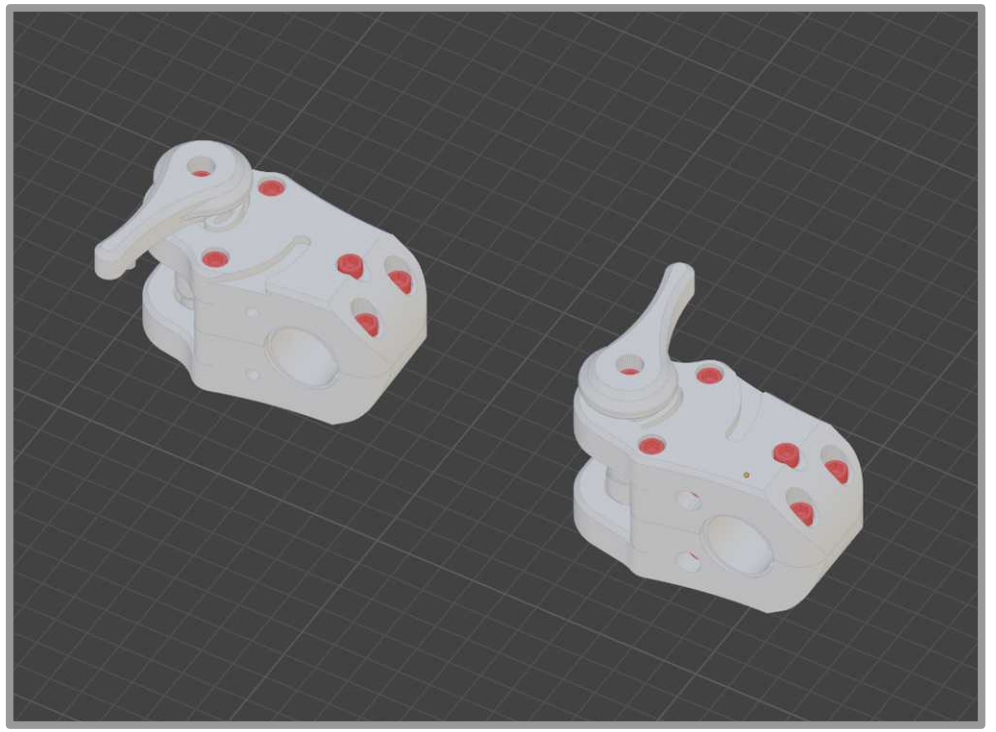
5.B. Wheelbase Reinforcing Assembly w/ Telescoping Struts

The optional telescoping struts provides extended length to allow for a greater range of configurations. Distance between wheelbase plate and the QR connector is up to ~330mm. Recommended if unsure of exact wheelbase positioning.



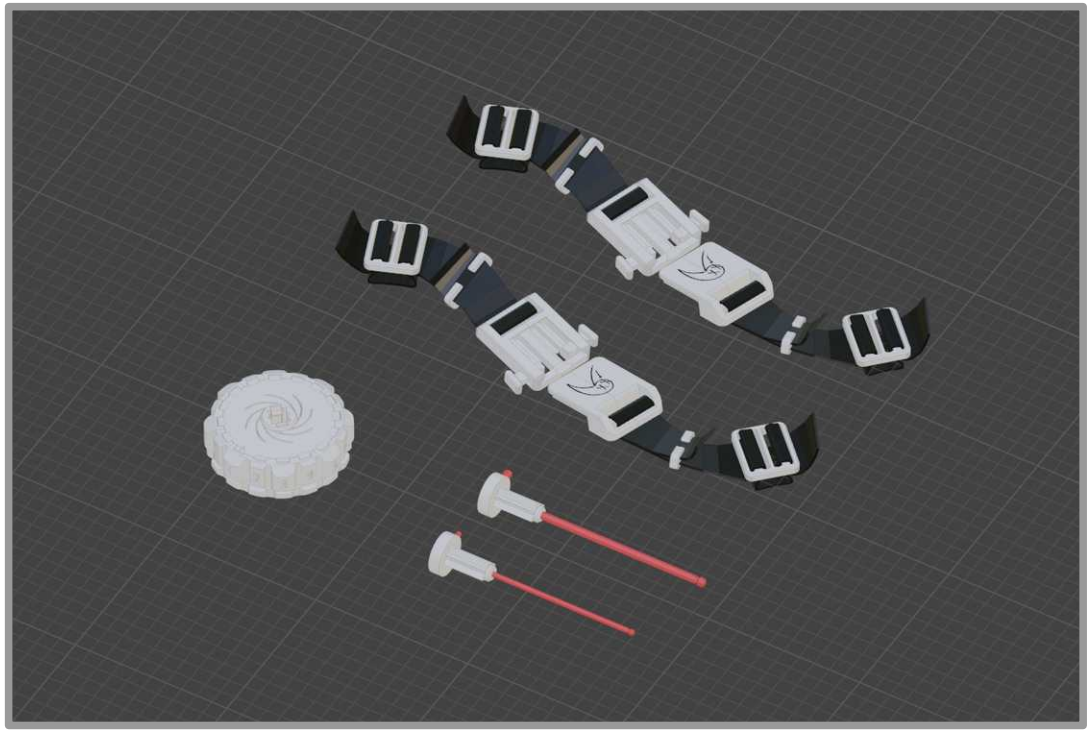
5.A. Standard Wheelbase QR Strut Connectors (Close Configuration)

QR connectors which connect directly to the Playseat Challenge X frame, just behind the wheelbase clamp/hinge. Used if mounting the wheelbase plate in the *close* position.



5.B Reverse Wheelbase QR Strut Connectors (Far Configuration)

QR connectors which connect to the *Telescoping Pedal/Wheelbase Reinforcing Struts*. Used if mounting the wheelbase plate in the *far* position.



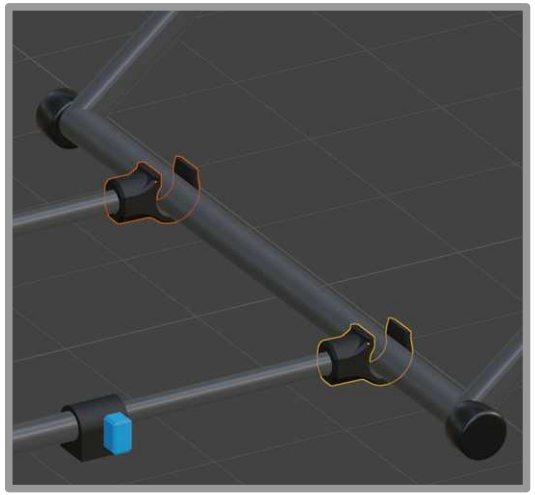
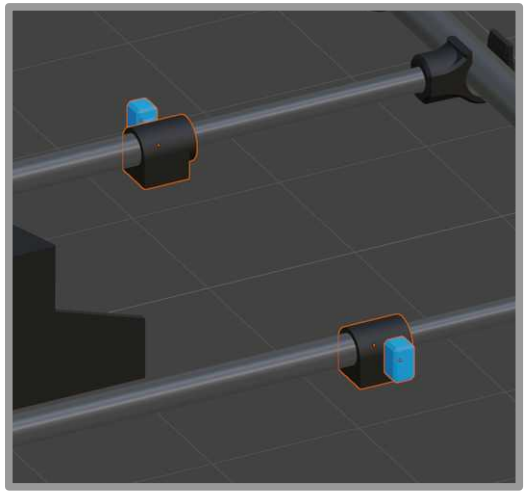
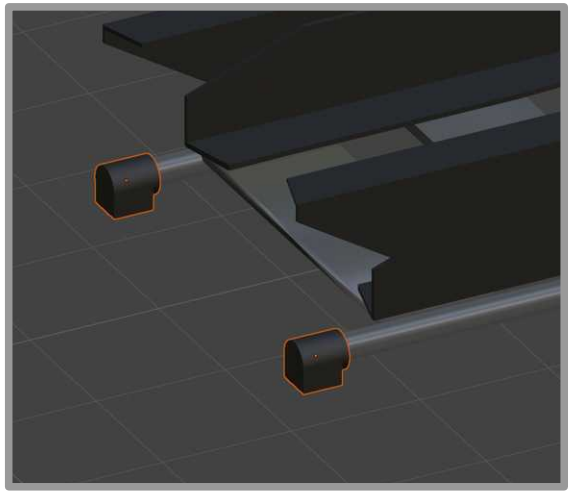
6. Torque Wrench and Locking Straps

The 3D printed adjustable torque wrench with M3/M4 hex keys, and locking straps with QR buckles to lock the *Side Struts* in place when the rig is folded for storage.

Assembly Instructions

Preparing Playseat Challenge Frame

Before adding Lock-Mod parts to the Playseat Challenge X, a few original parts need to be removed first.

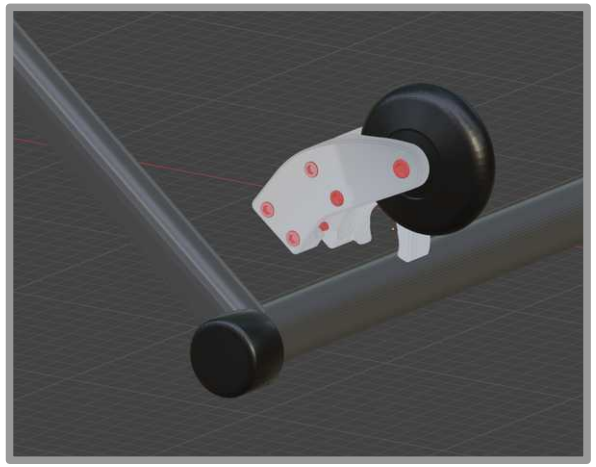
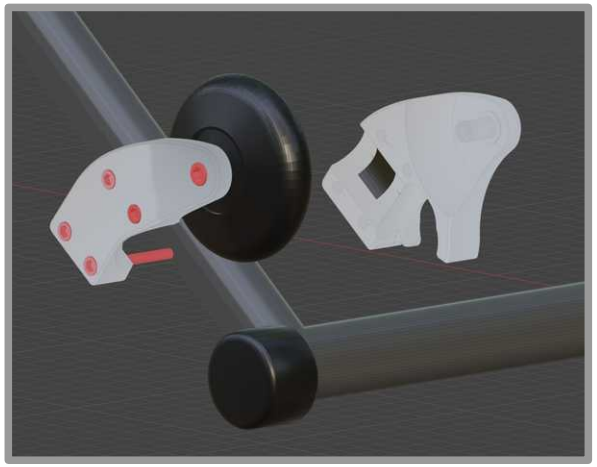
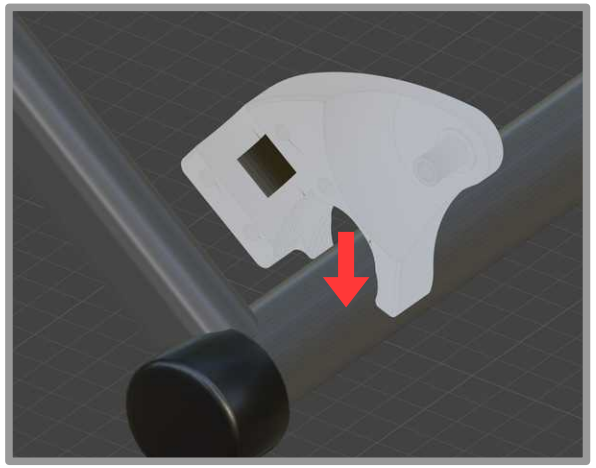
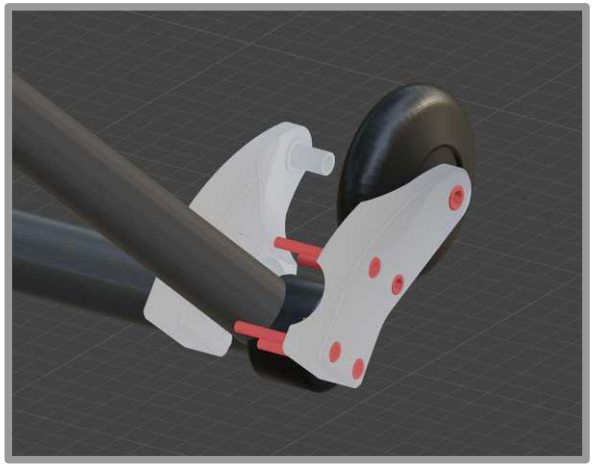
Some of the above parts are secured in placed with small screws. Unscrew these to remove them from the frame.

If wanting the option to revert the PSC-X to it's stock form, any original parts replaced with the Lock-Mod X upgrade should be saved.

Also note that the build process for the Lock-Mod X is much easier if the Playseat Challenge has no gear attached. Pedals/wheels should be removed before proceeding.

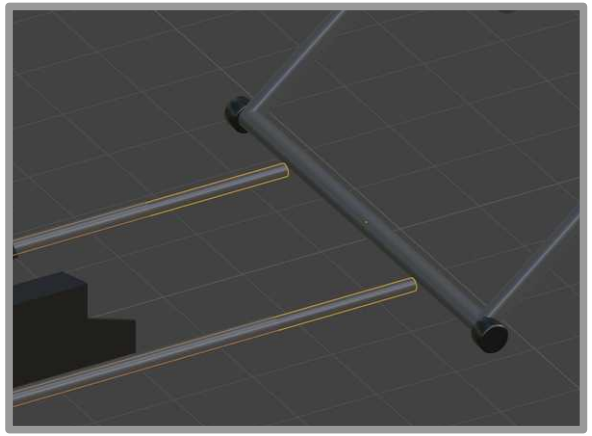
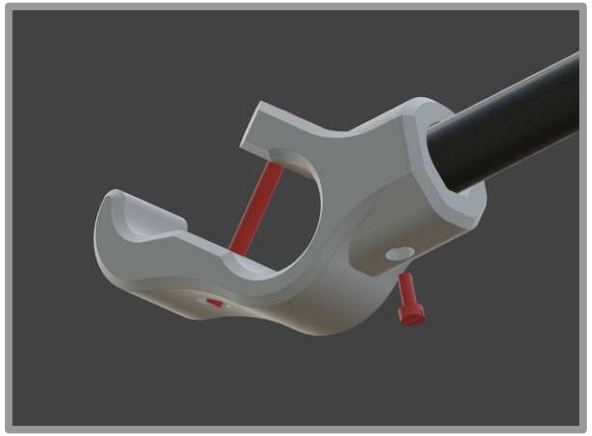
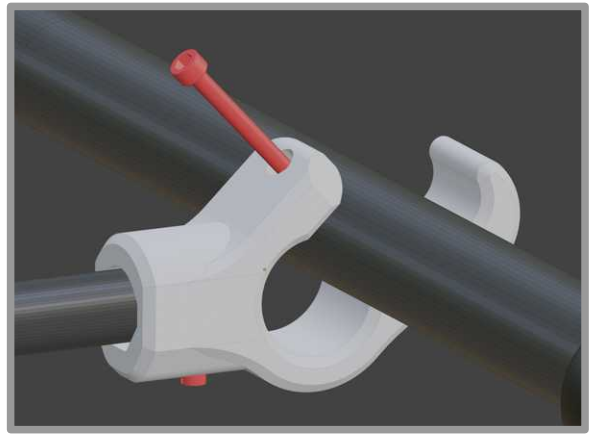
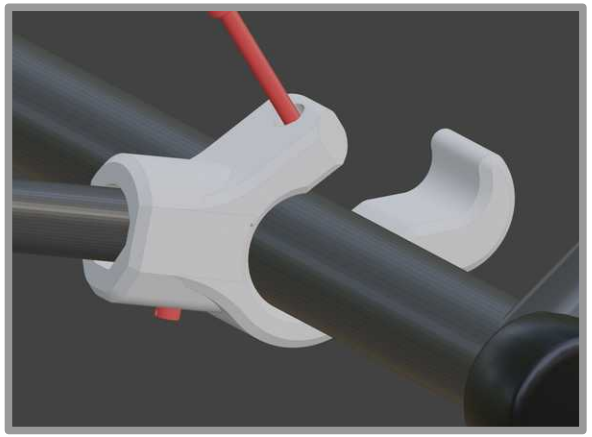
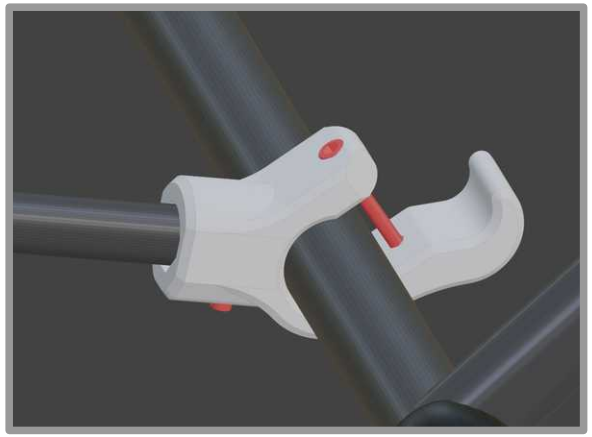
Roller Wheels

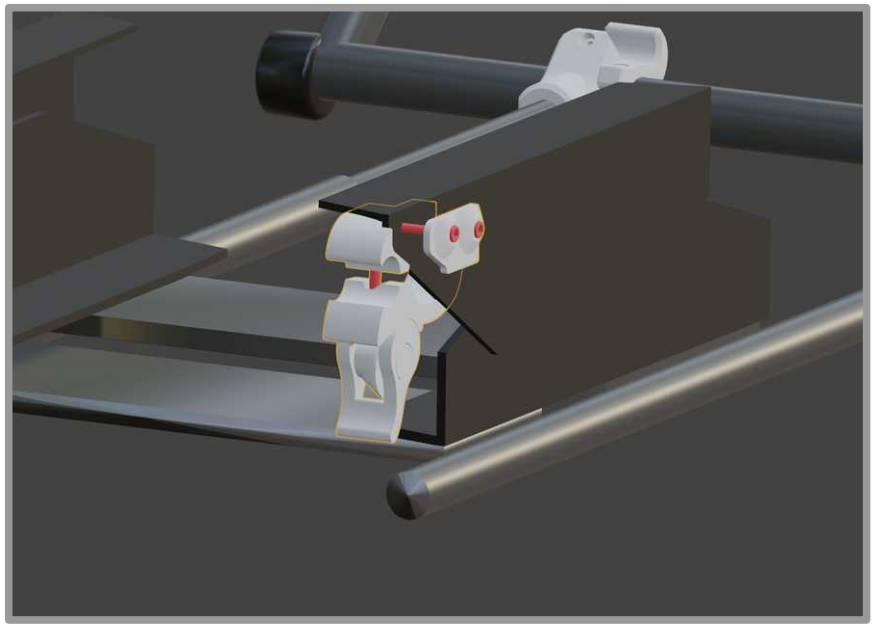
Separate the roller wheel assembly into two parts, press the inner half (the one with the hook) onto the bottom tube, then rejoin and bolt into place.

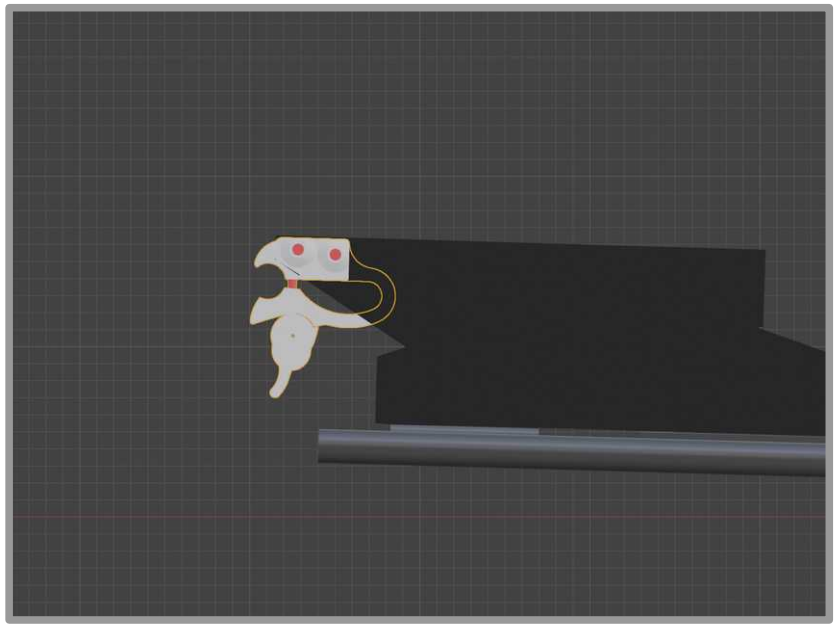






Pedal Assembly

The first part to attach will be the replacement pedal hinge. Slide on each part to the end of the pedal tray inner tubing, and secure in place by screwing the small flat head screw into the thread of the tubing. It can help to remove the small screw first to help get the part aligned before threading it in. the pedal hinges can then be pressed onto the bottom front tube of the frame. Finish by threading the long retaining bolt back through (avoid overtightening to allow the hinge to still rotate).

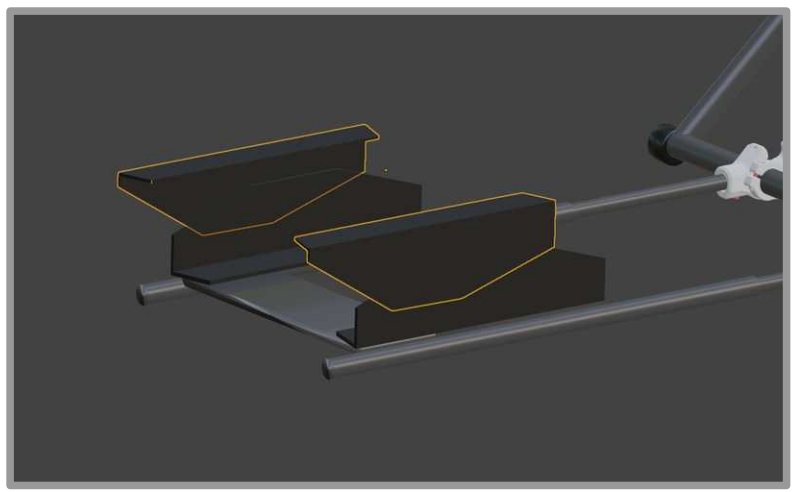


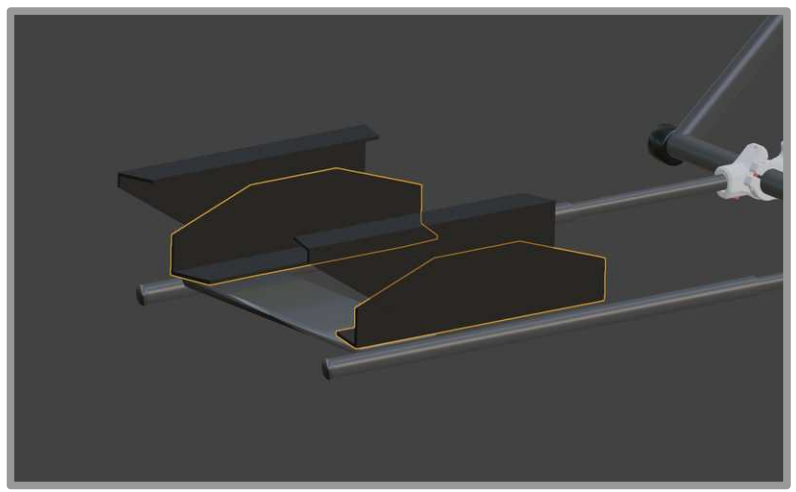


Install the **Pedal Tray QR Clamp**. It is positioned underneath the upper pedal plate, and should fit snugly in position. It will only fit on the end of the upper pedal plate that has an extended lip, so if it doesn't fit in place the upper plate may need to be reversed.

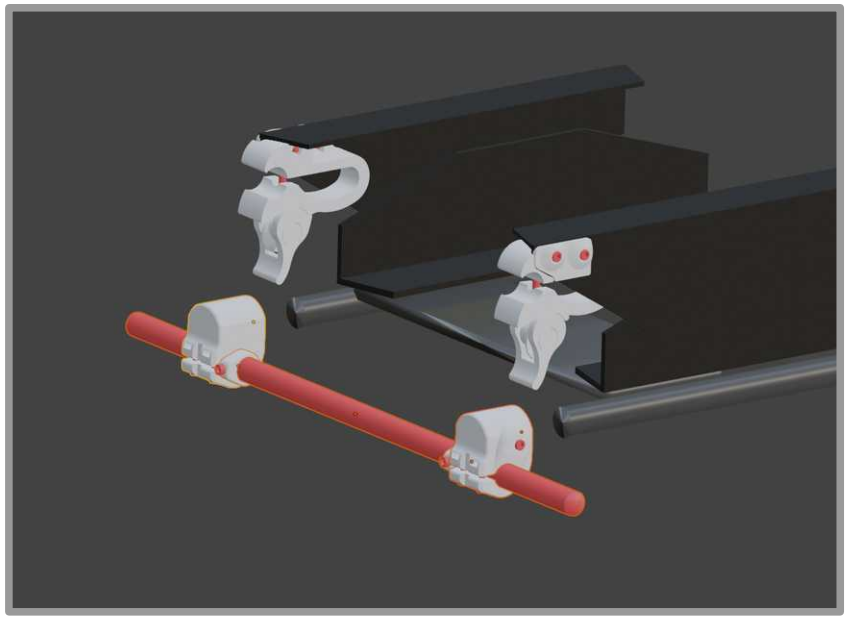
Before building up the rest of the pedal structure, the angle of the pedal tray needs to be set. This will depending on the pedal set set used, the angle of the pedal faces, and the height that you set the pedal structure at (in addition to your preferences).

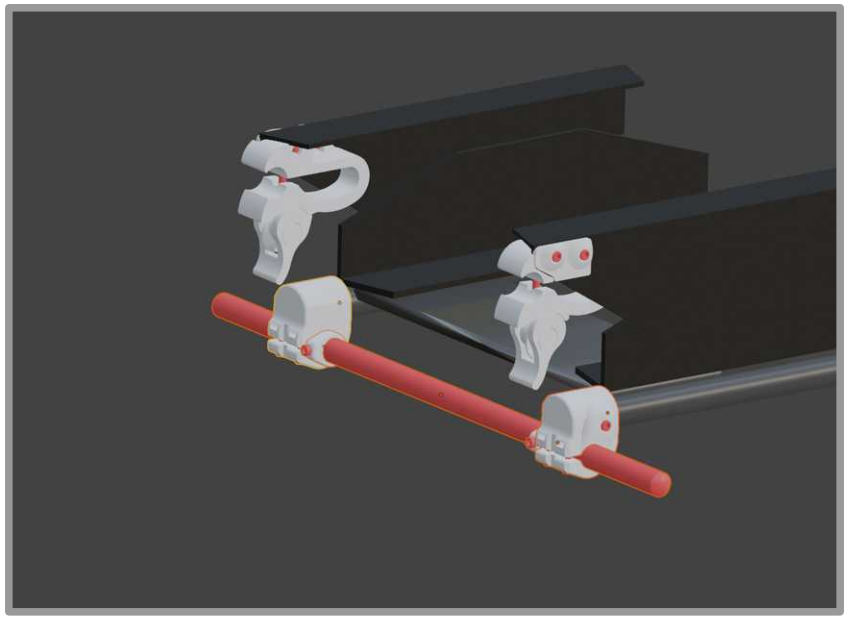
There are 3 combinations of positions the pedal tray can be set at that are compatible with the Lock-Mod X pedal structure. These configurations place the pedal tray on the back mounting holes of the bottom plate, which prevents the top plates from excessively overhanging. This is needed for the Lock-Mod X parts to align correctly.





2 of these configurations (the medium and high angle configurations) are achieved with the bottom pedal tray plates in the standard position, whereas the flat configuration (shown in the image above) requires the bottom pedal plates to be reversed (rotated 180 degrees and sides switched), which allows the top plates to be mounted with less angle.





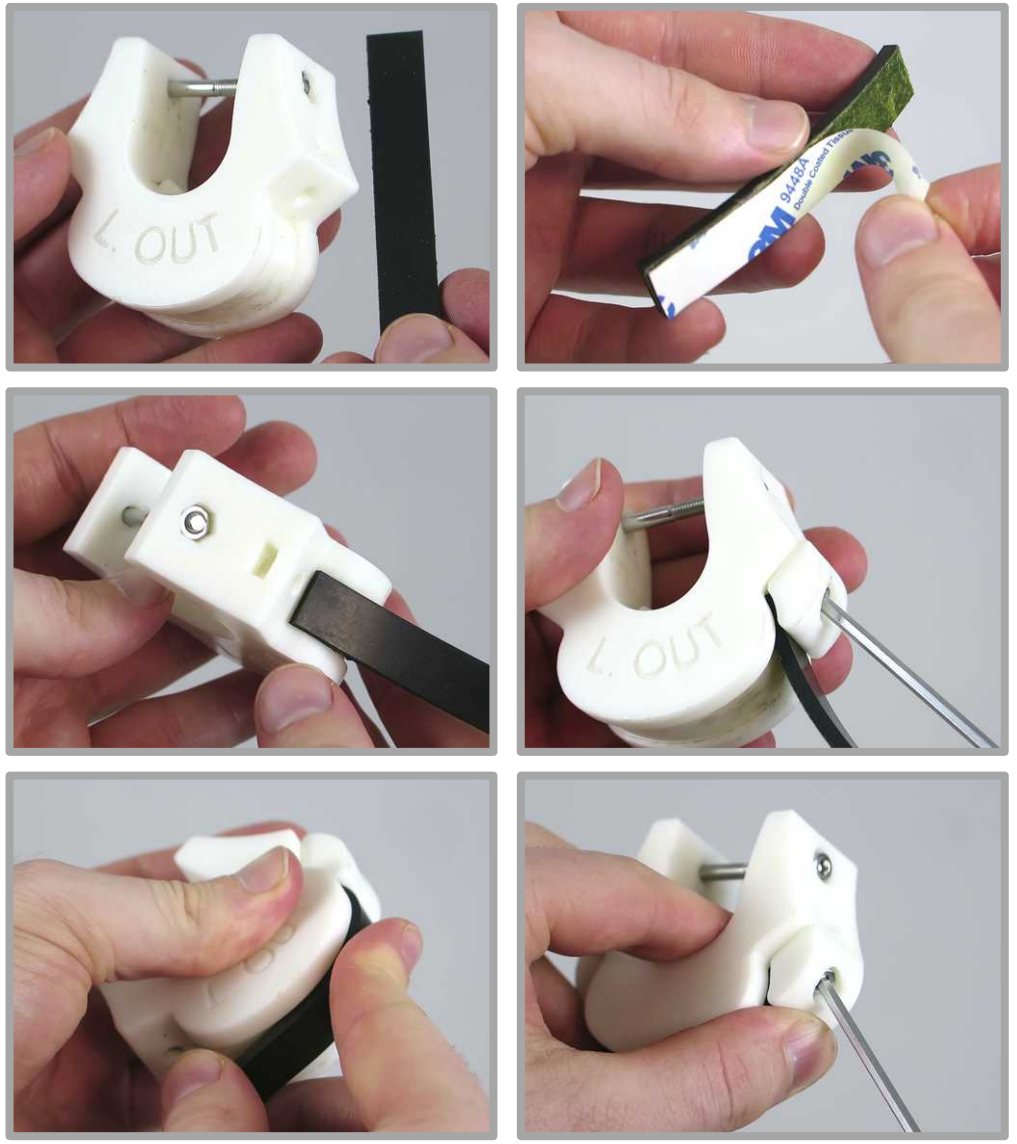
Attach the pictured sub-assembly to the pedal tray, making sure the tubes are fully inside the **Pedal Tray Hinge Interface** and lightly tighten the set screw to secure it. The final positioning of this and many other parts may change after the structure has been fully assembled, so save final tightening for later.

Rubber Feet Inserts (Optional)

The Lock-Mod X pedal feet come with rubber adhesive strips that can be applied to increase the friction applied to the floor, which can reduce the amount the rig moves around during use.

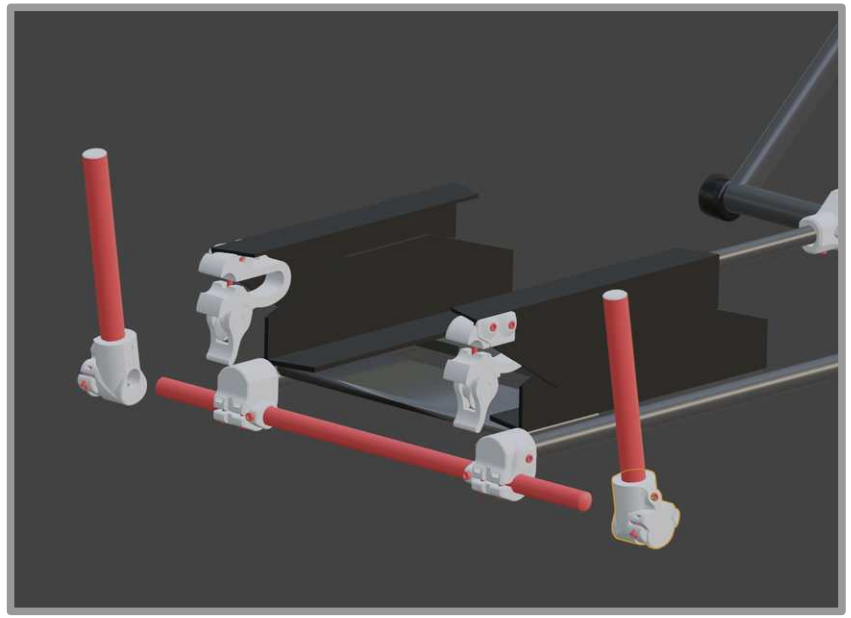
To attach the rubber strips to the feet:

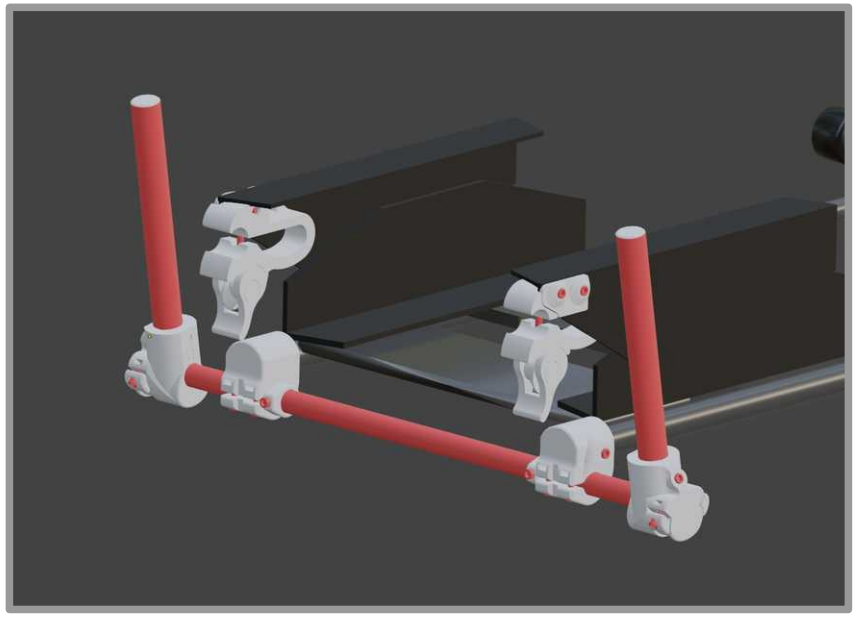
1) Remove the rubber anchors.
2) Apply rubber strip to one side.
3) Re-attach anchor to that side.
4) Ensure strip is taught while adhering it to the foot.
5) Re-attach remaining rubber anchor.

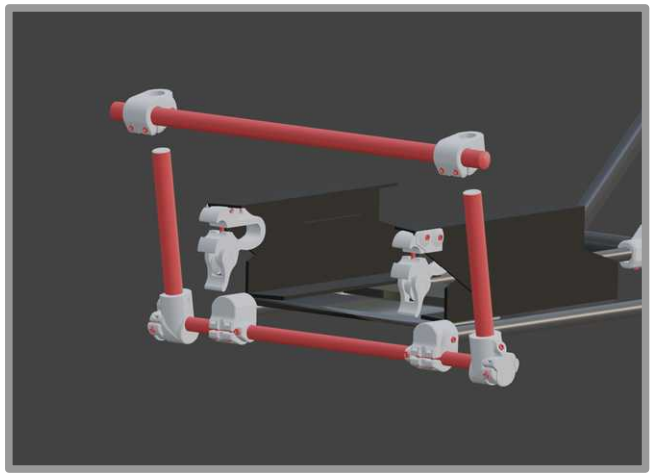
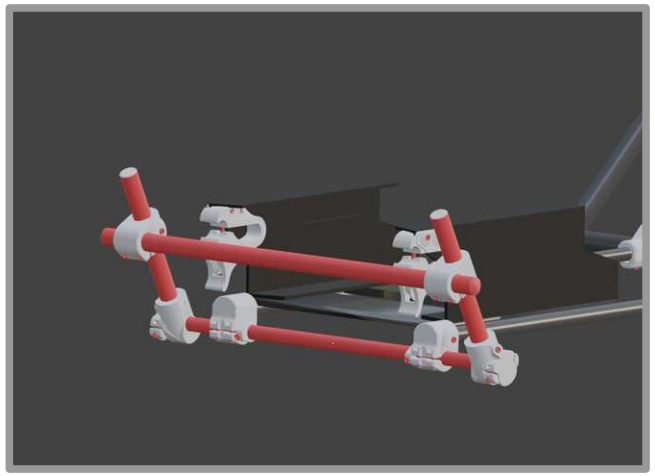


Low Pedal Configuration

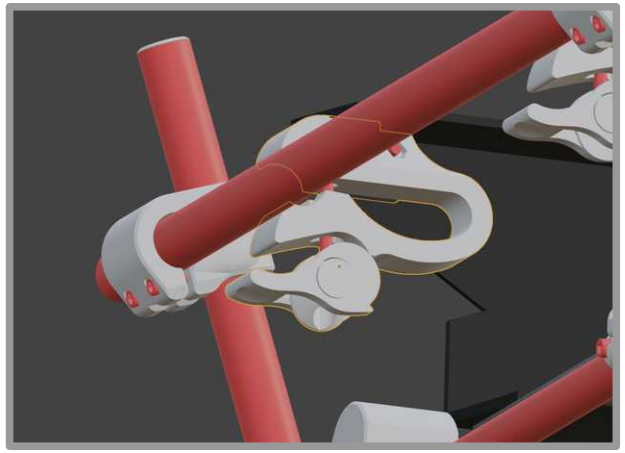
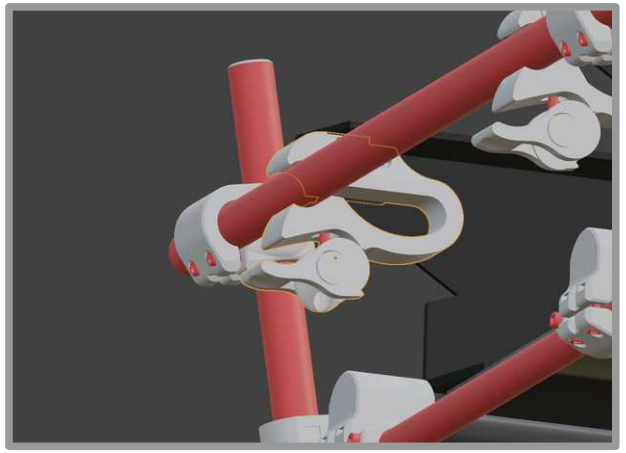
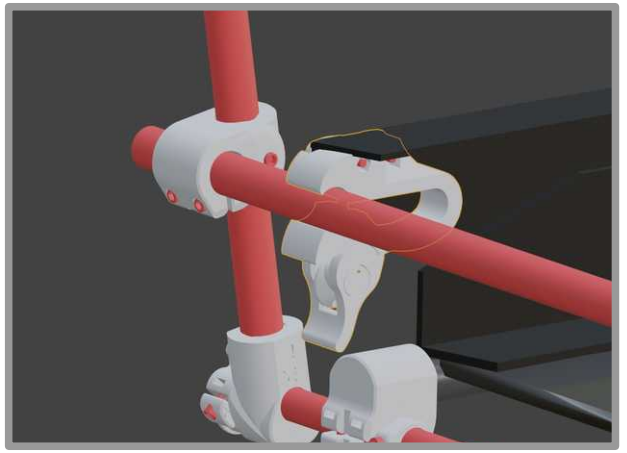
For the **Low Pedal** configuration (which should be used if you want the pedals to be kept at the stock height), attach the feet sub-assemblies directly as shown and lock in place with the set screw. Skip to page 26 for the **Extended Pedal Height** configuration (gives up to 90mm of extra height), or page 29 for the **Telescopic Pedal Height** configuration (up to 200mm of extra height).



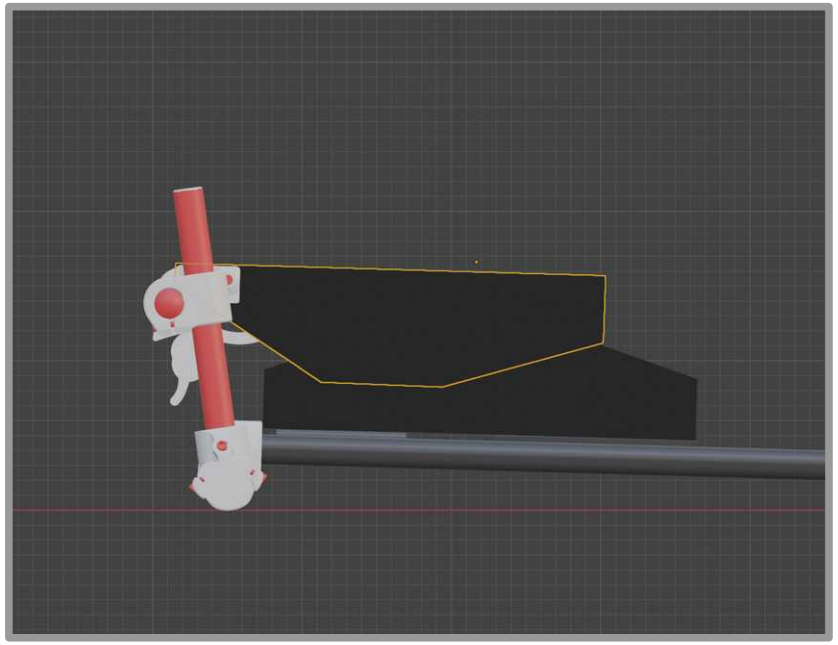


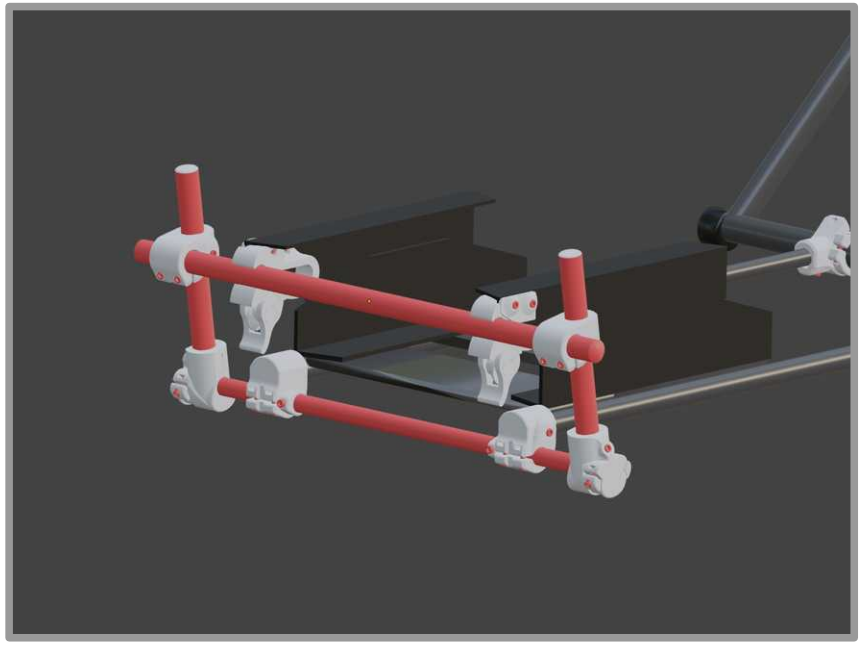



Slide the top horizontal sub-assembly onto the feet struts.

Before tightening the set screws, latch the sub assembly into the **Pedal Tray QR Interface** parts and lock it in place. This will set the sub assembly at the correct height, after which the set screws can be tightened.

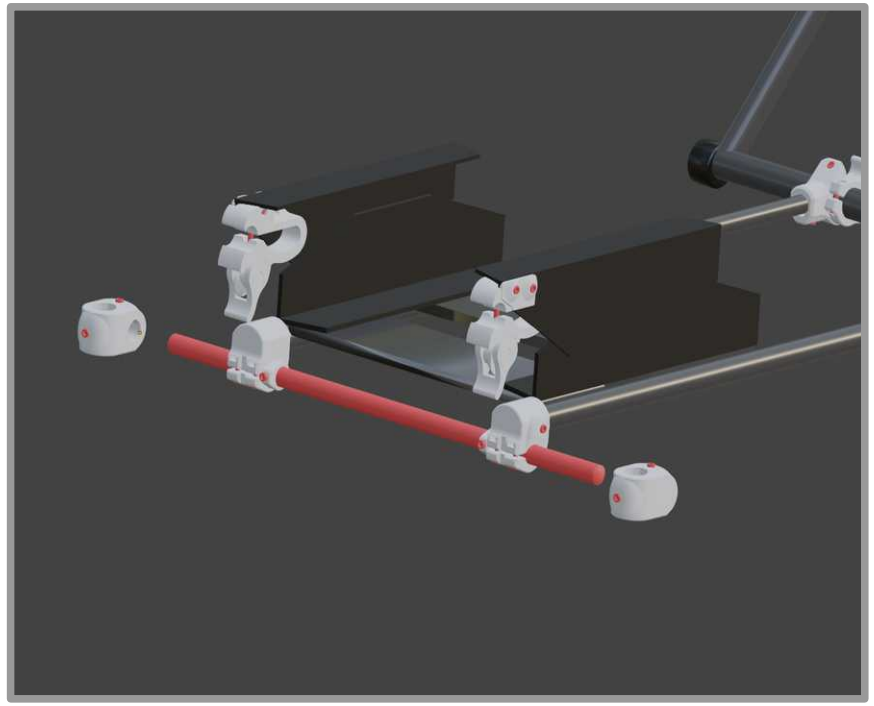


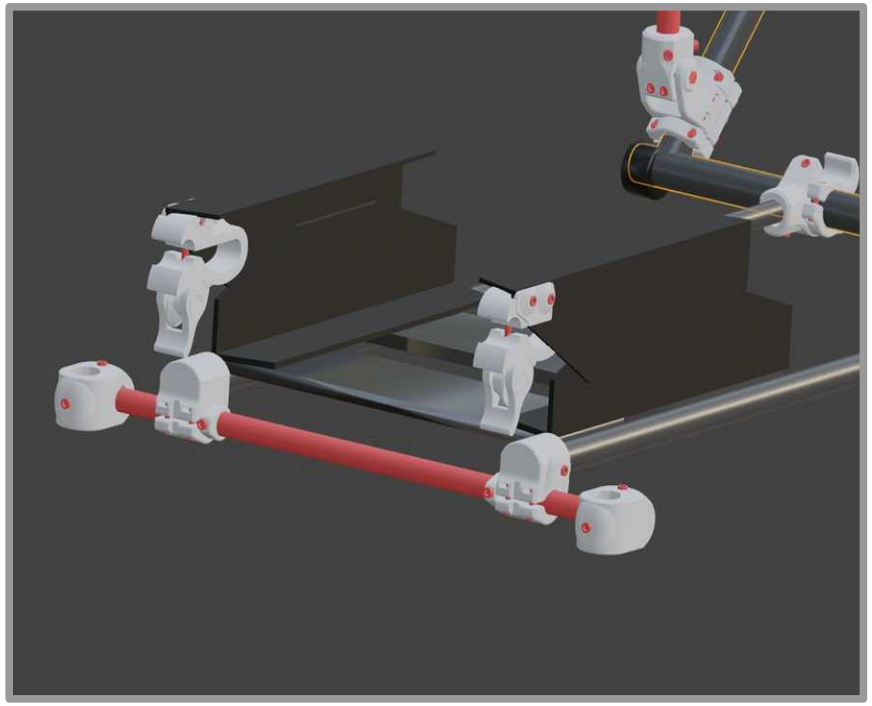


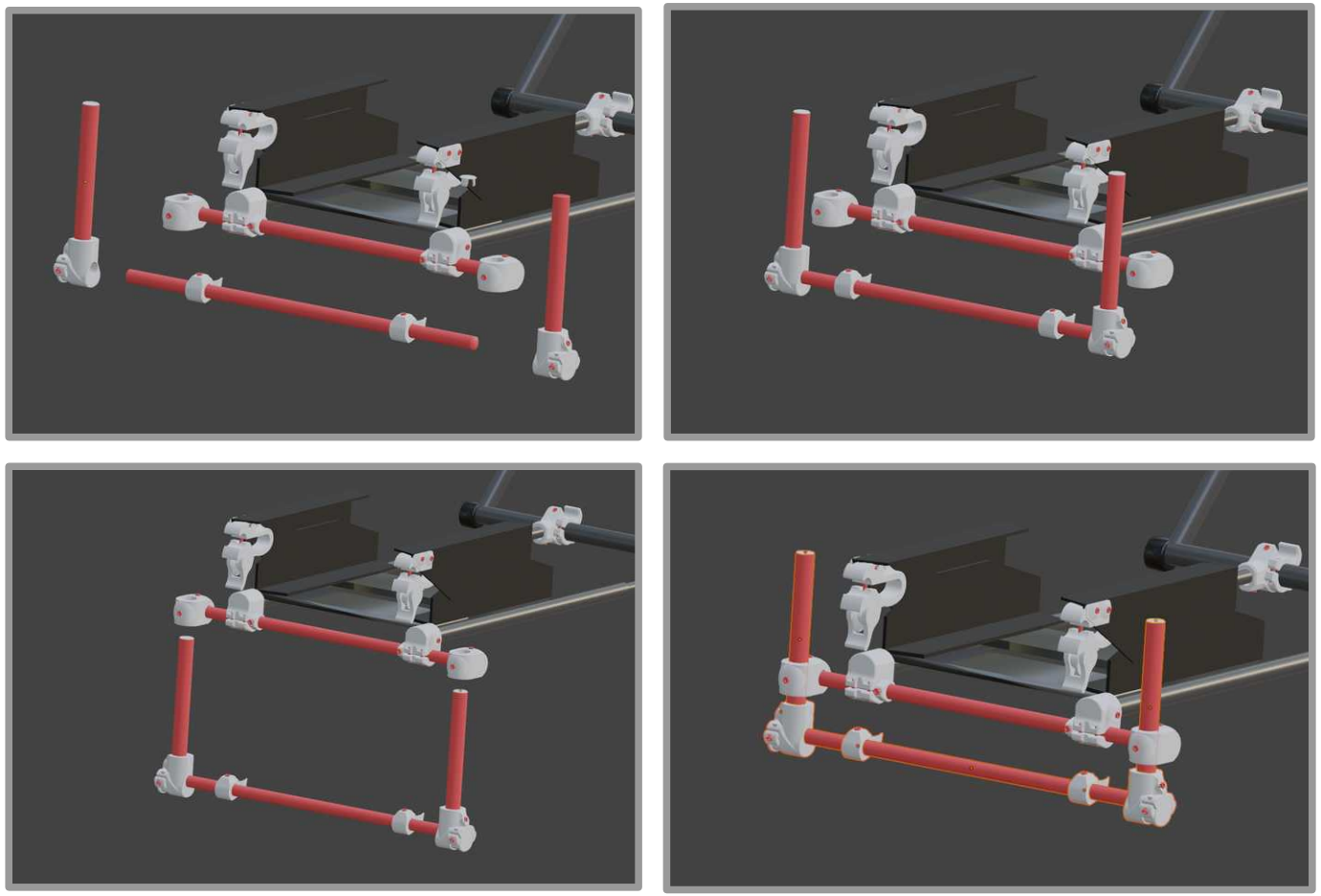
To ensure the pedal reinforcement assembly can unlatch and latch into place easily with the QR parts, the pedal struts should be close to vertical. If the pedal struts are angled much more than shown it can become difficult for the QR latch mechanism to smoothly engage with the horizontal tubing. Ensure that the Playseat Challenge X pedal tray plate is in the rear-most mounting holes so that the pedal tray doesn't overhang by too much. Skip ahead to page 33 to continue assembly.

Extended Pedal Height Configuration

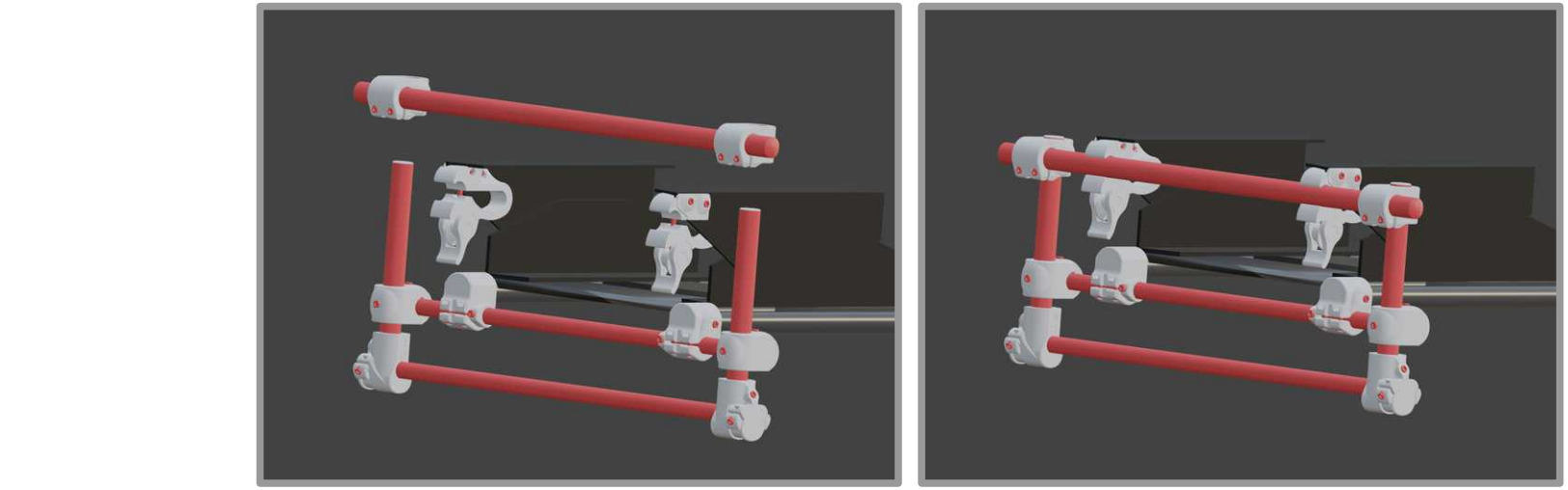
For the **Extended Pedal Height** configuration, slide the **Pedal Offset L Joint Clamps** on the horizontal tubing as shown.

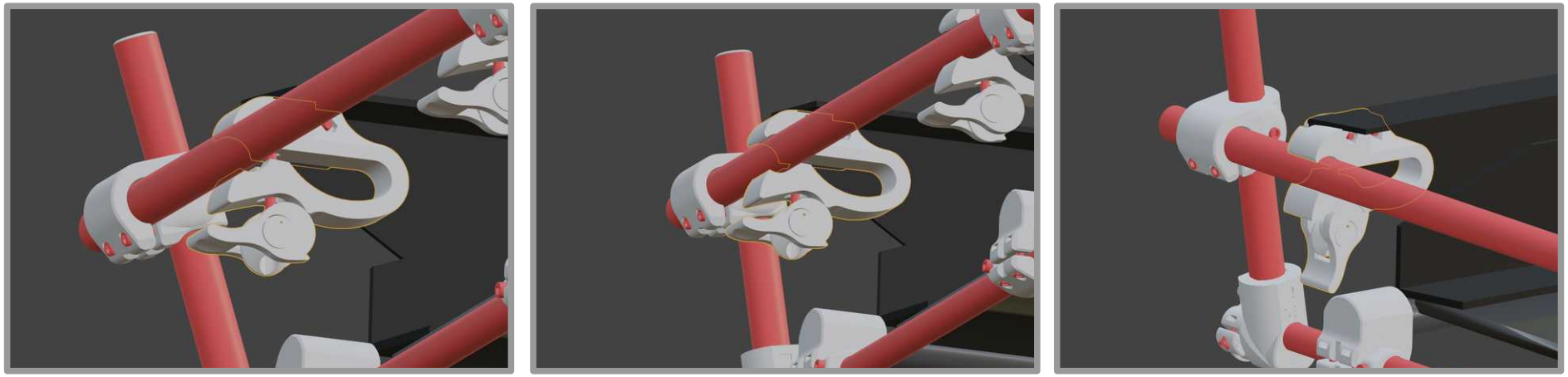






Attach the pedal feet struts to the lower pedal sub-assembly. This assembly can then be slid up through the **Pedal Offset L Joint Clamps**.

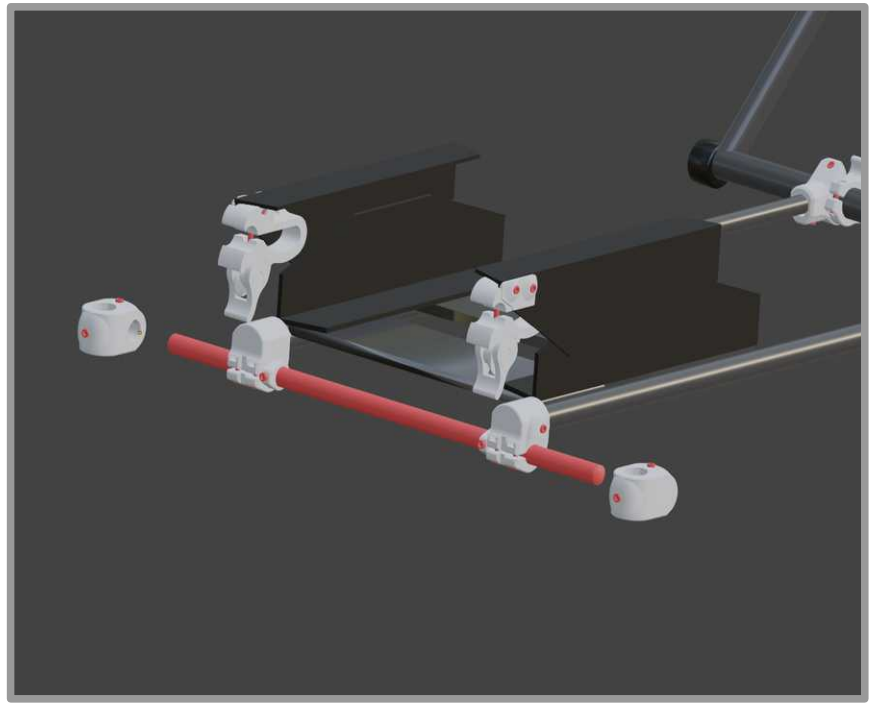


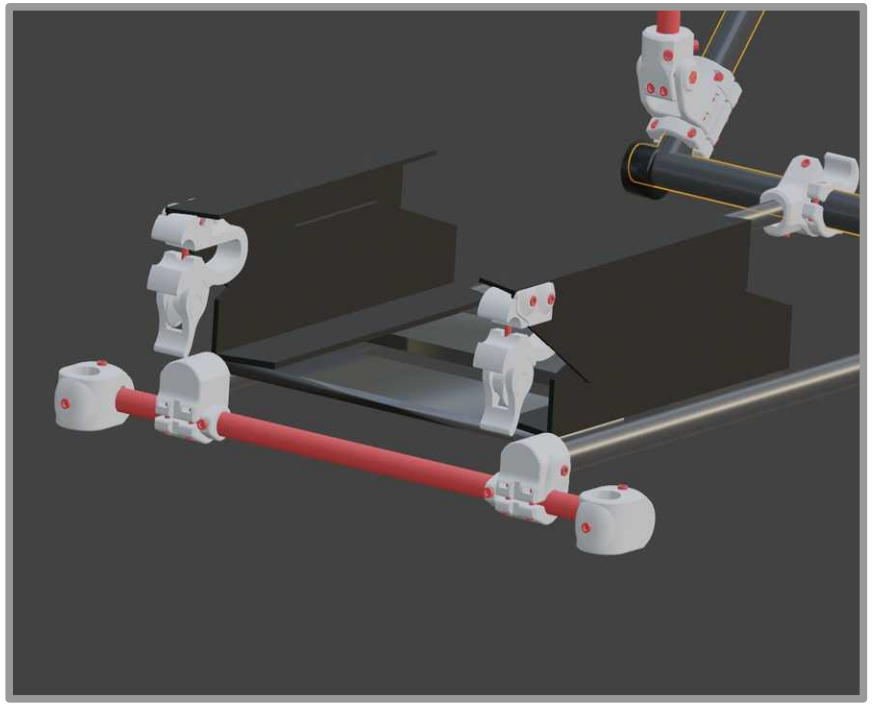


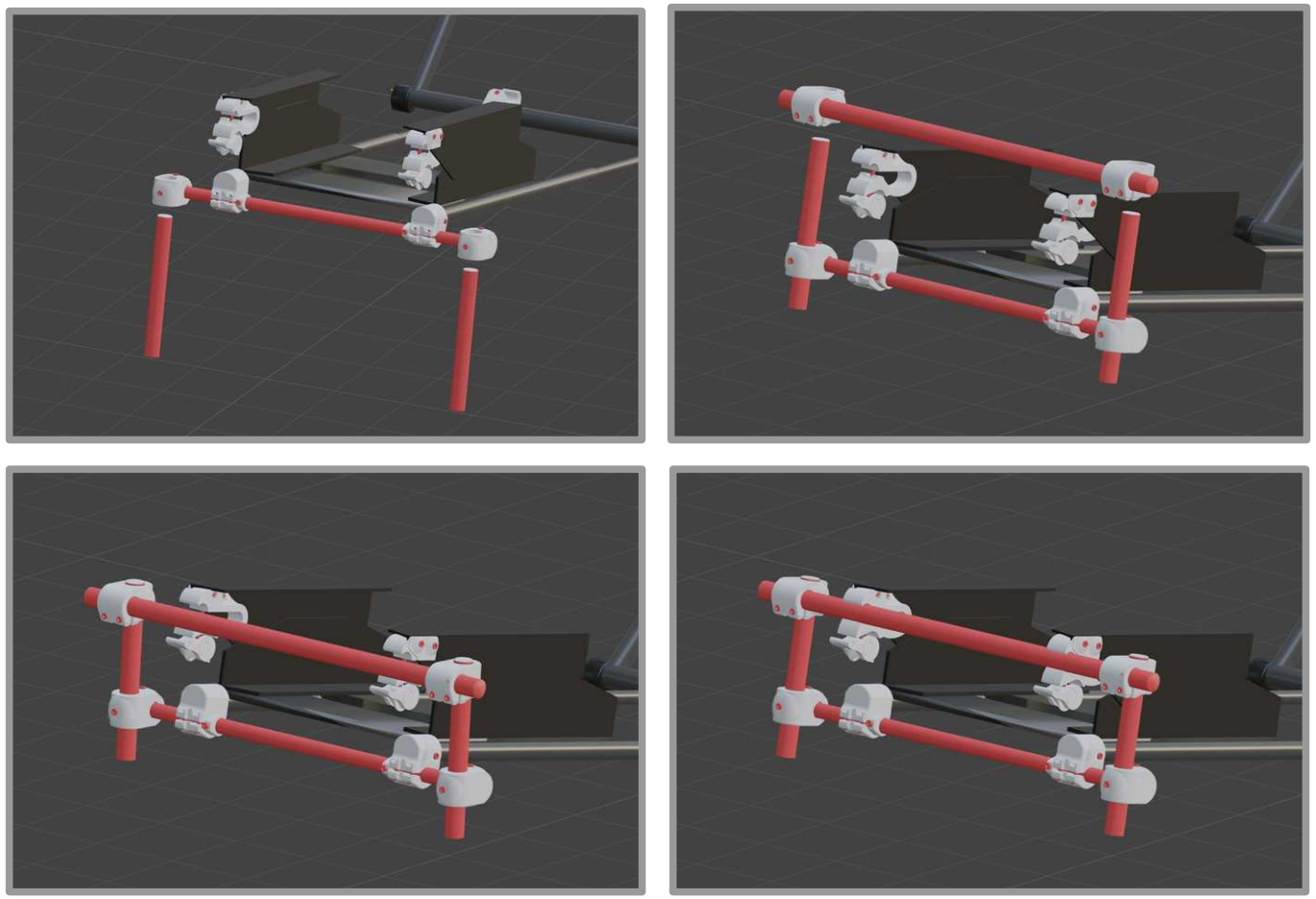
Slide the top horizontal sub-assembly onto the feet struts. Before tightening the set screws, latch the sub assembly into the **Pedal Tray QR Interface** parts and lock it in place. This will set the sub assembly at the correct height, after which the set screws can be tightened. Skip ahead to page 33 to continue assembly.

Telescopic Pedal Height Configuration

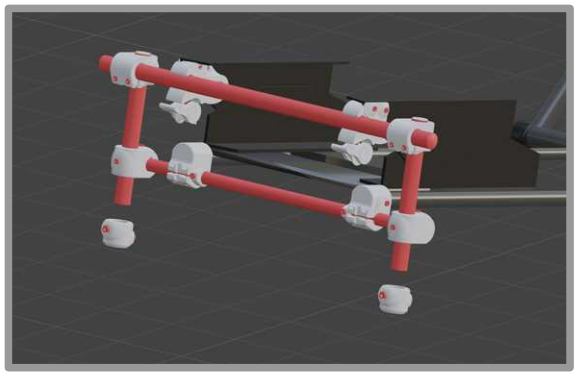
For the **Telescopic Pedal** Height configuration, slide the **Pedal Offset L Joint Clamps** on to the horizontal tubing as shown.

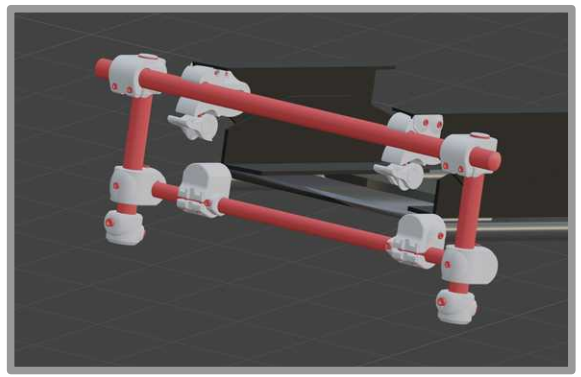






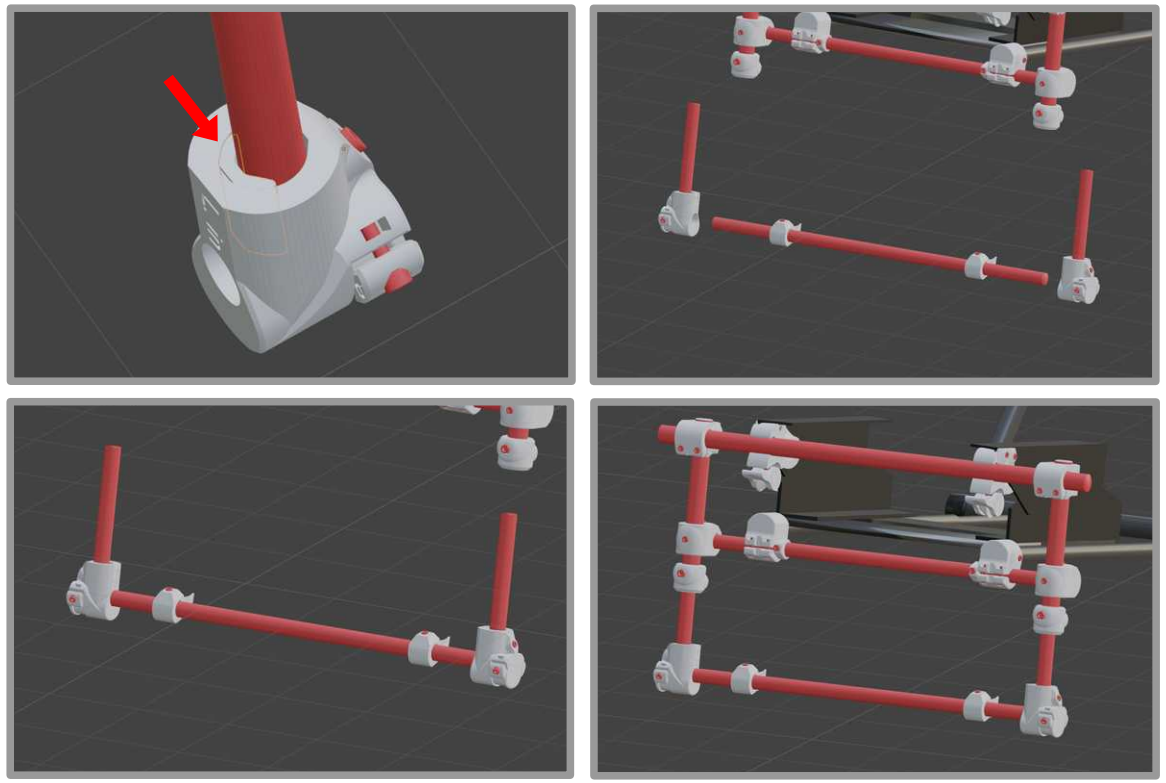
Separate the pedal feet from the 20mm tubing and slide the vertical struts into the offset L joint. Note that the part of the tubing with the hole in it should be at the bottom and facing outwards. The top horizontal tube sub-assembly can now be slid onto the vertical struts, and then latched into the pedal interface QR latches. After setting the height of the vertical struts, secure the position by tightening the set screws of the connected parts.



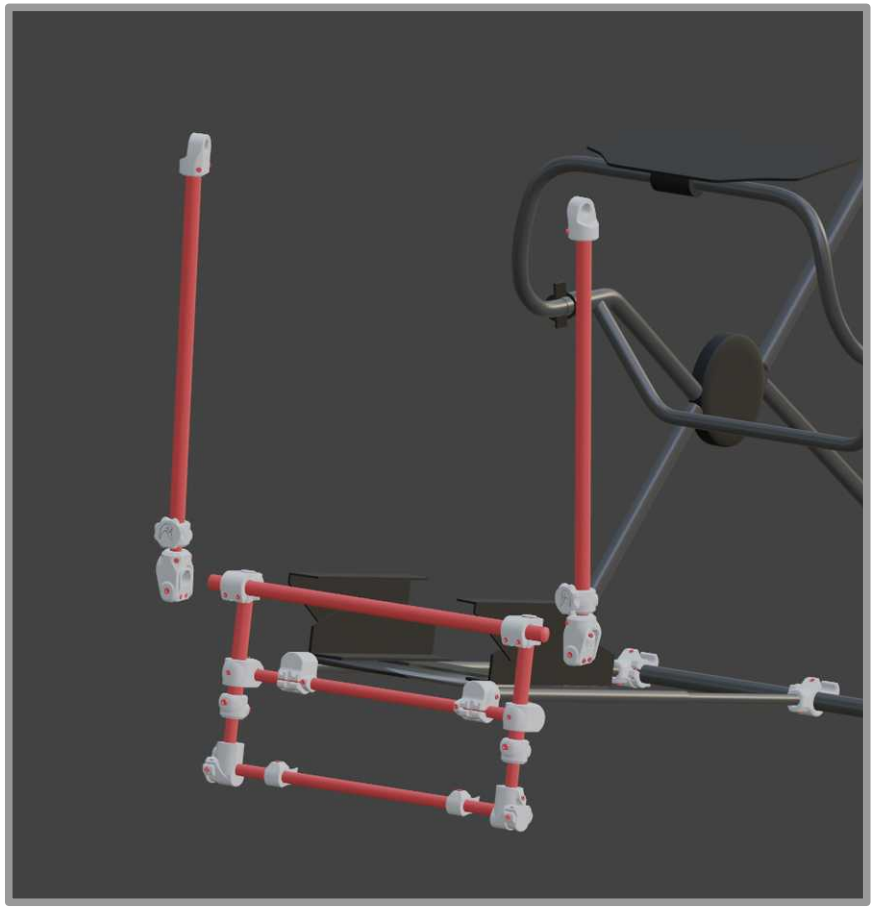


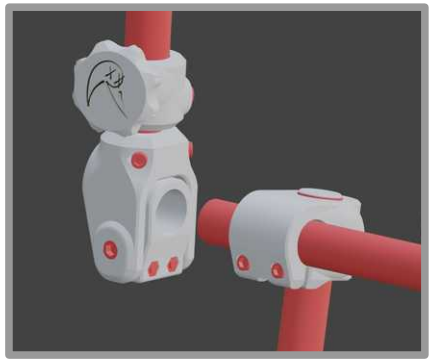
The telescoping part that will attach to the end of the 20mm tubing has 3 set screws; 2 small and 1 large. Remove the large set screw, line up the hole of the tube with the large set screw's thread, then push the part onto the tubing. Make sure the holes are aligned before locking the position with the 2 smaller set screws. The large set screw can be partially threaded back in, but not so far as to stop the inner tube from entering the outer tube.

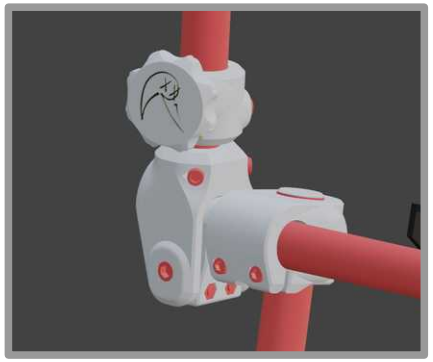
In this configuration the pedal feet come with an adapter shim for the 16mm telescoping tube. Place it inside the foot as shown and secure with the set screw. The 2 feet struts can then be attached to the lower strut and pushed into the 20mm telescoping tubing. Push all the way up until it has bottomed out, then tighten the set screws at the bottom of the feet to secure the horizontal bar. The height of the pedal tray will be set later, so for now just lightly tighten the large set screws to stop the lower sub-assembly from falling out.

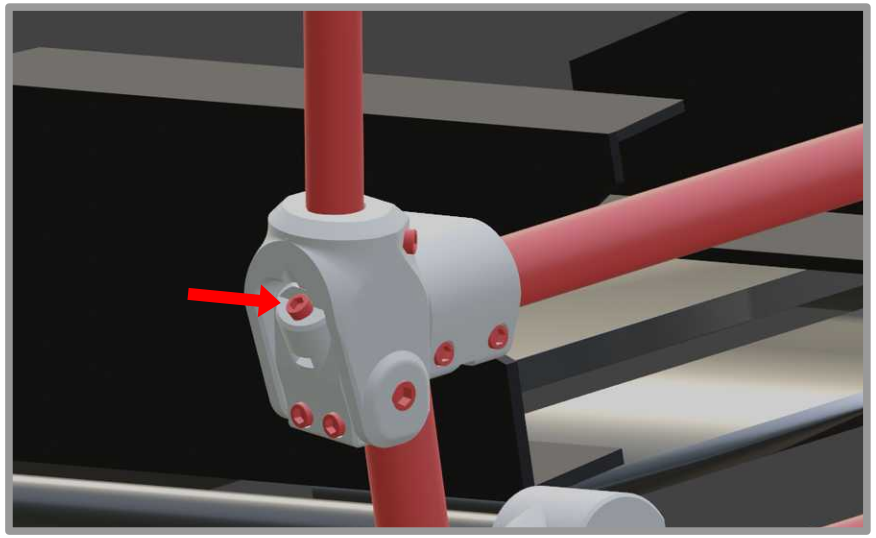


All Pedal Configurations

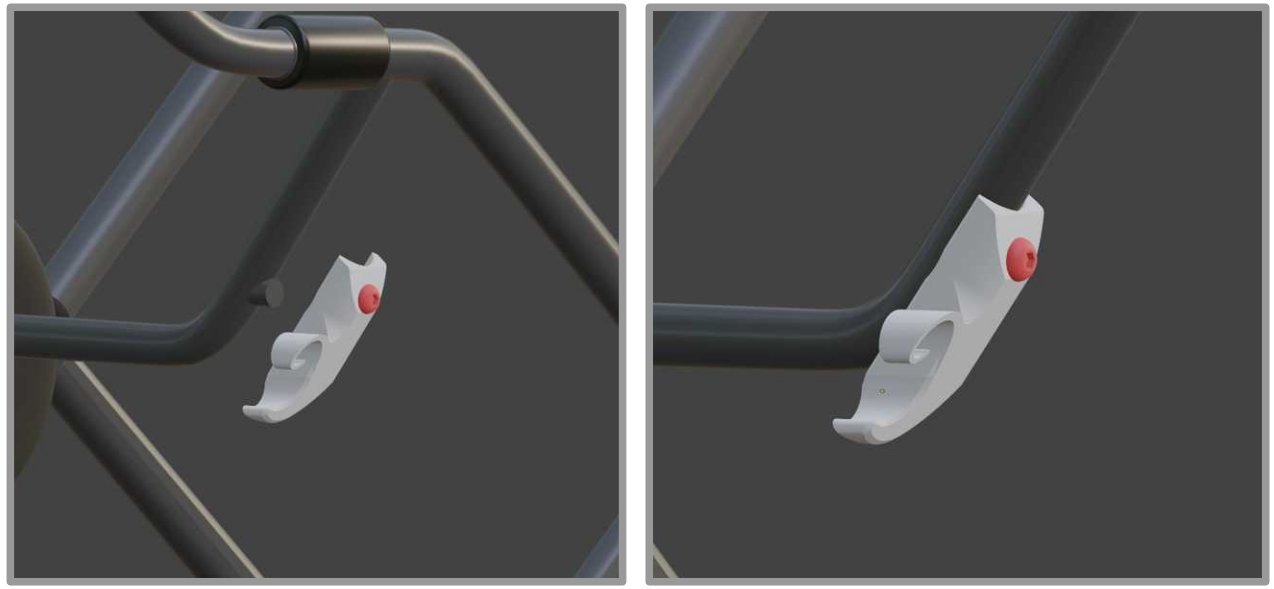




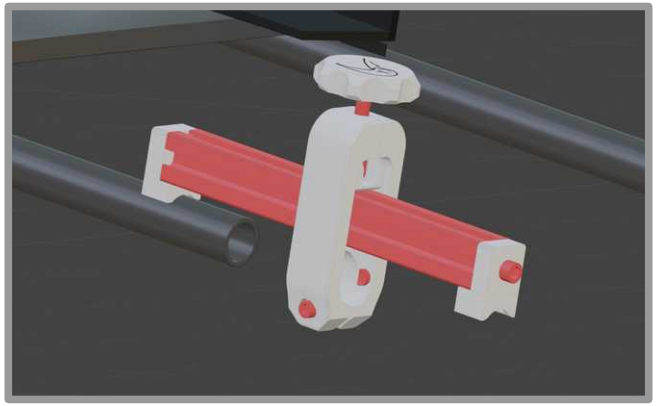
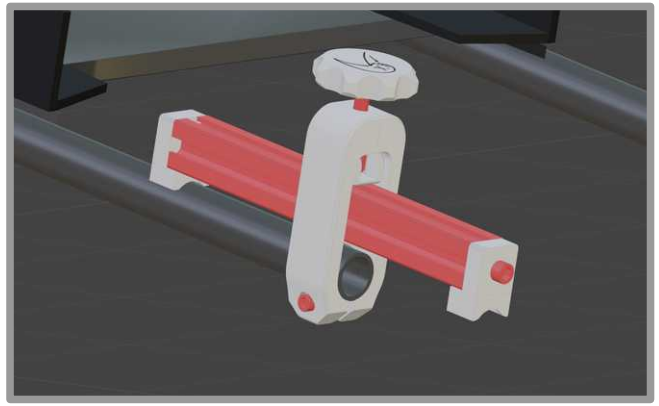
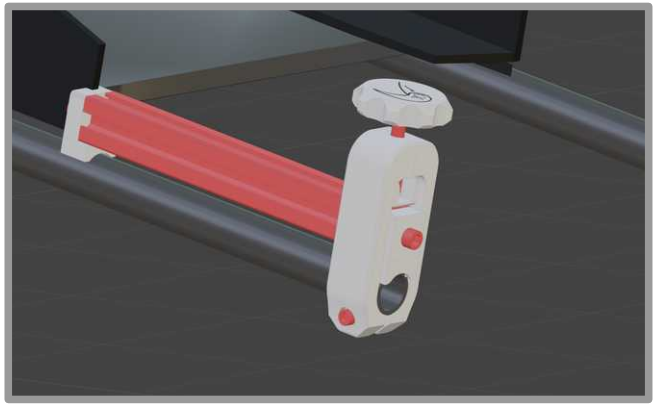




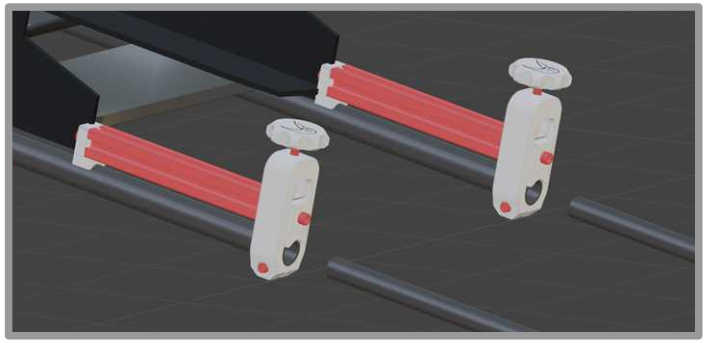
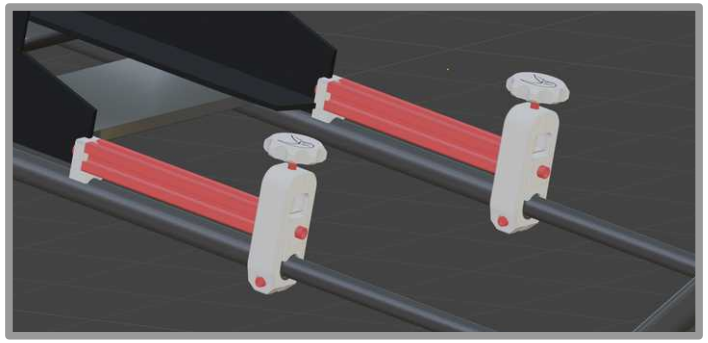
Attach the pair of **Telescoping Pedal/Wheelbase Reinforcing Struts** to the top horizontal tube of the pedal reinforcement structure, making sure the tube interface is fully seated. When tightening the internal set screw to secure the part in place, press the part firmly against the tubing, as the set screw can push the part outwards when tightened.



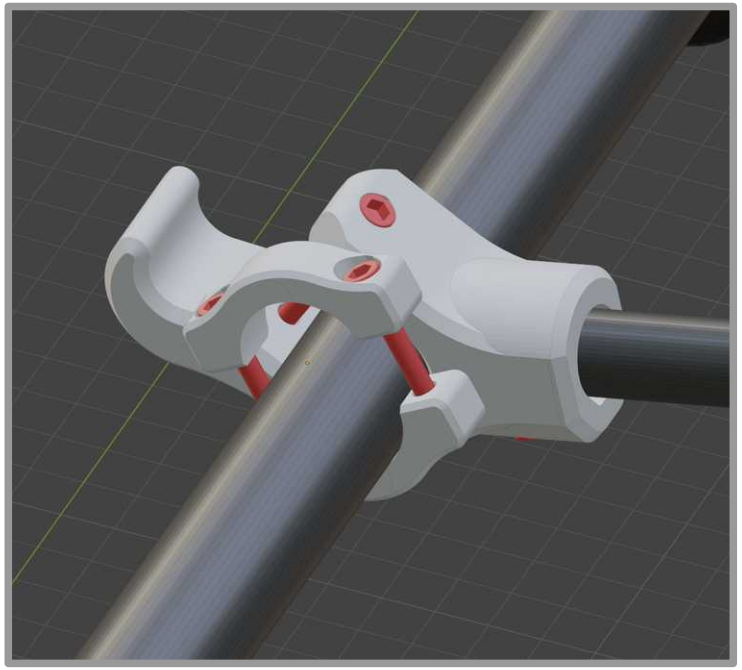
Attach the **Pedal Folding Hooks** to the underside tubing of the Playseat Challenge X frame. Interfacing with the existing M8 thread attachment.

The **Pedal Tray Sliding Lock** replaces the original thumbscrew lock of the pedal tray. The new part is attached to the end of the pedal-side of the telescoping tube. To slide it into position, the clamping bolt (at the bottom) needs to be completely loosened, after which the part can be pried open slightly so that the side detents interface with the holes in the tubing.

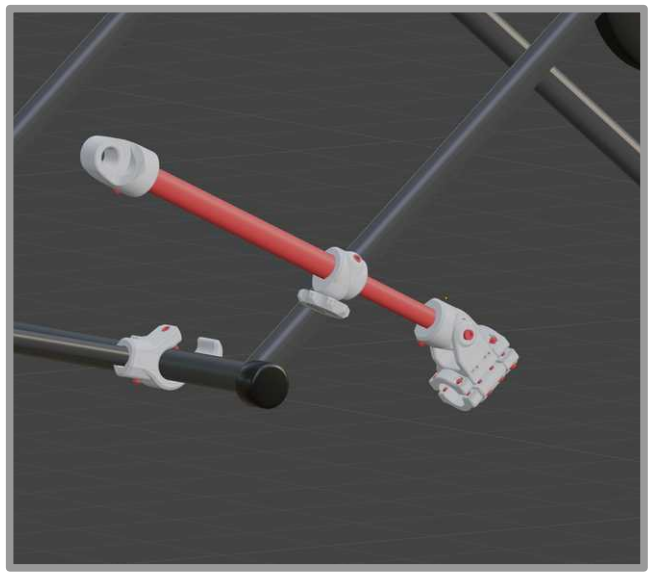
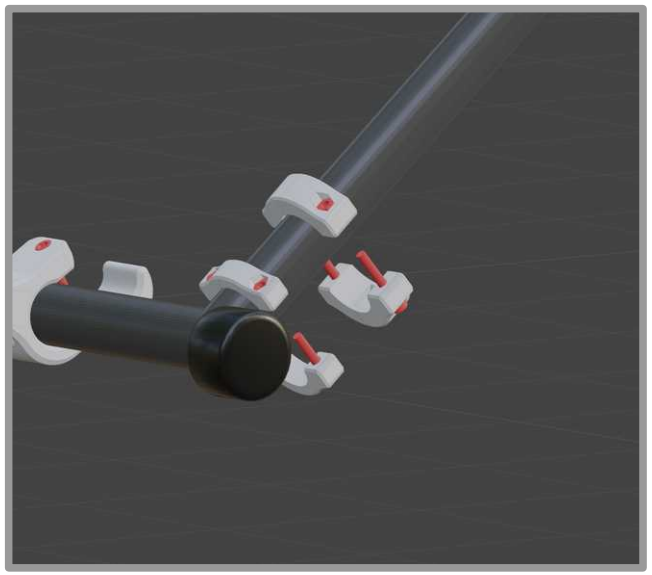
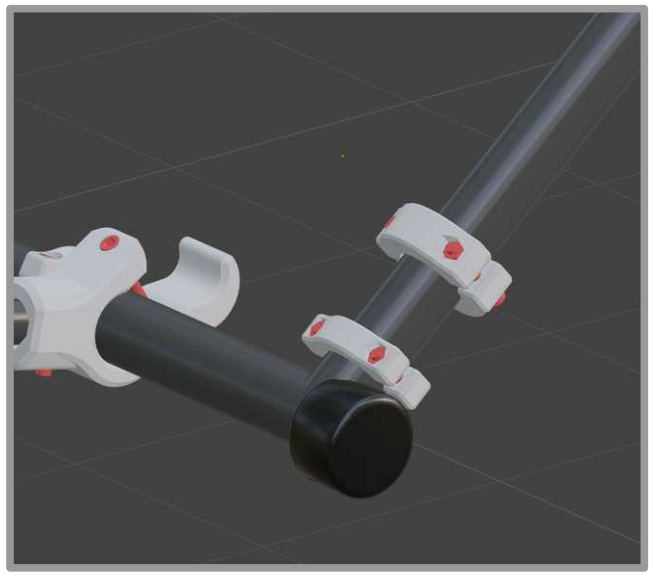
When the part snaps into position, it should sit flush with the pedal tray tubing. The bottom clamping bolt can now be tightened, the sliding aluminium reinforcement pushed back, and the inner telescoping tubing re-inserted into place.

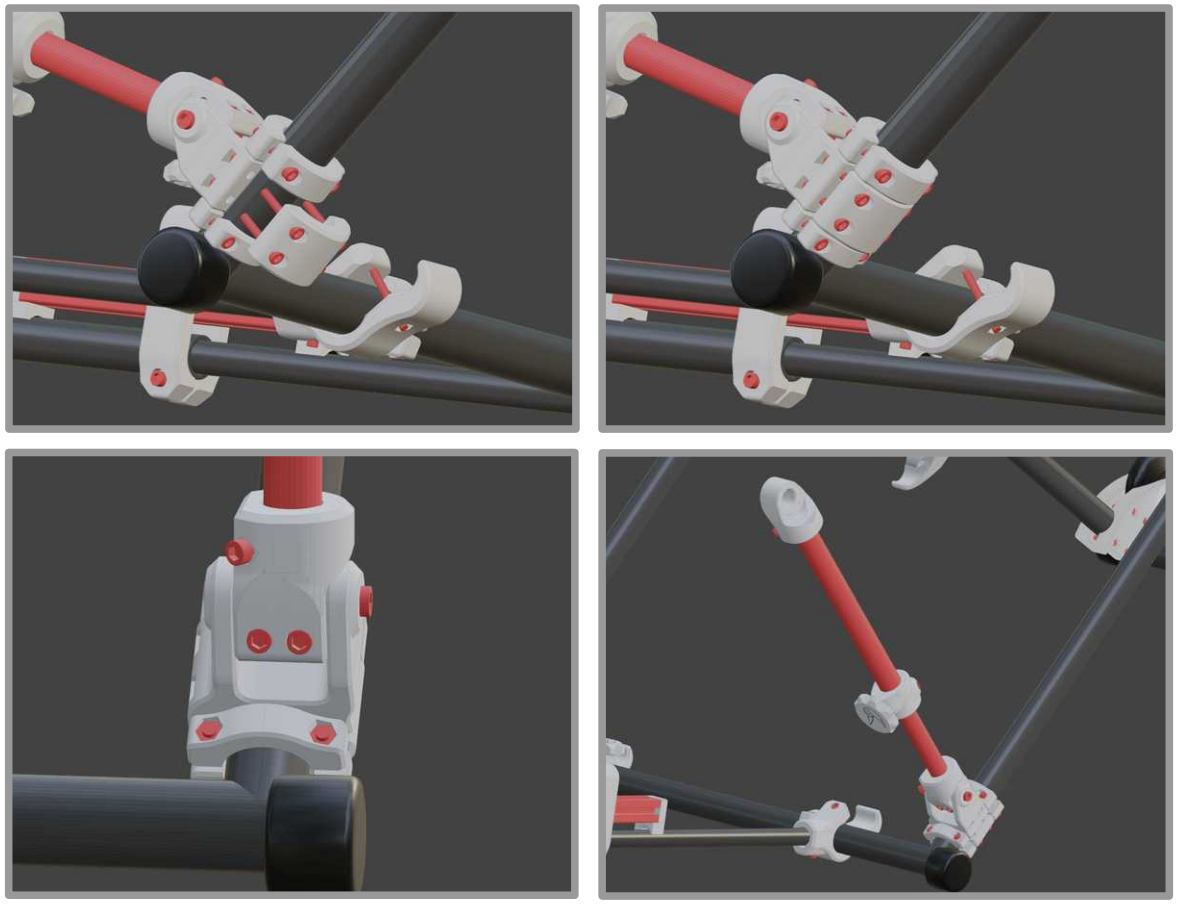


Centre the pedal tray in relation to the main rig seat, then add the pedal hinge position clamps to the Playseat tubing. These ensure that the pedals don't drift sideways over time.

Side Struts

To attach the side struts, first separate the position clamps and loosely attach them to the Playseat tubing as shown. The bigger clamp with the rubber insert is positioned above, the smaller one below.

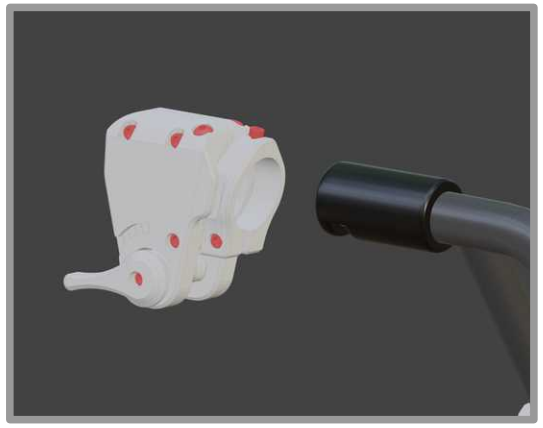
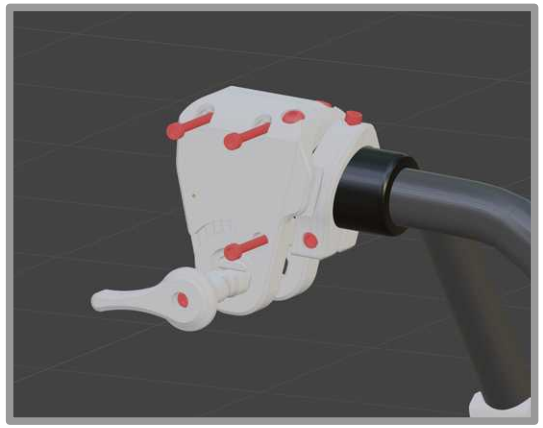
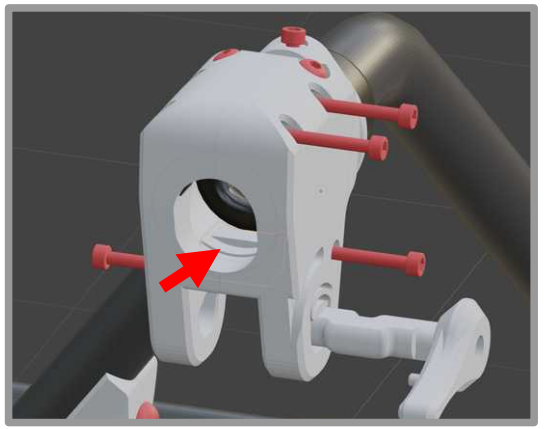






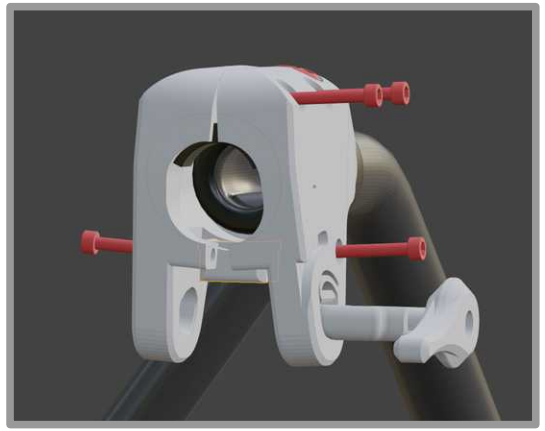
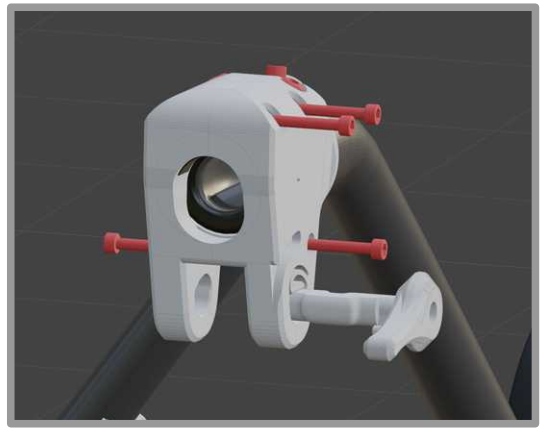
Attach the side strut clamp between the two position clamps as shown. If using the **Side Mount Assembly** then it is especially important that the side strut is aligned as shown.

Seat Frame Strut Connector/Reinforcers

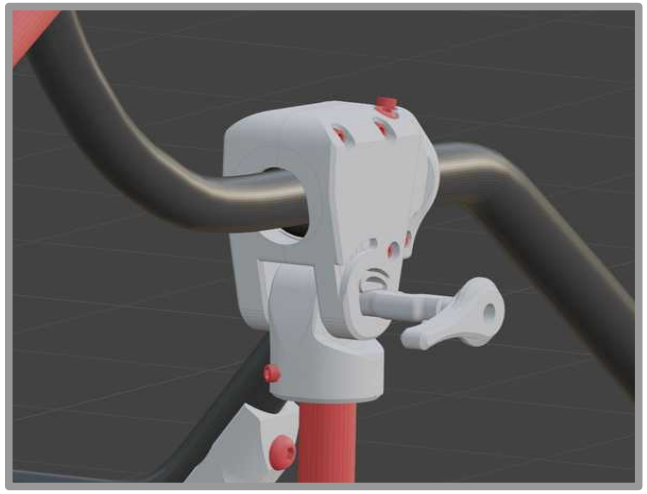
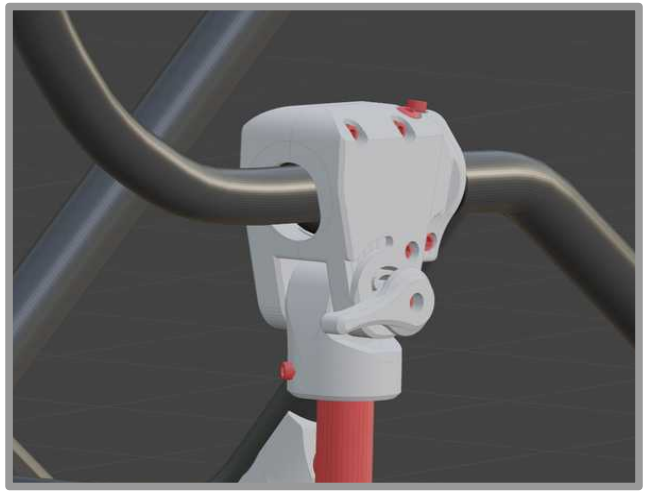
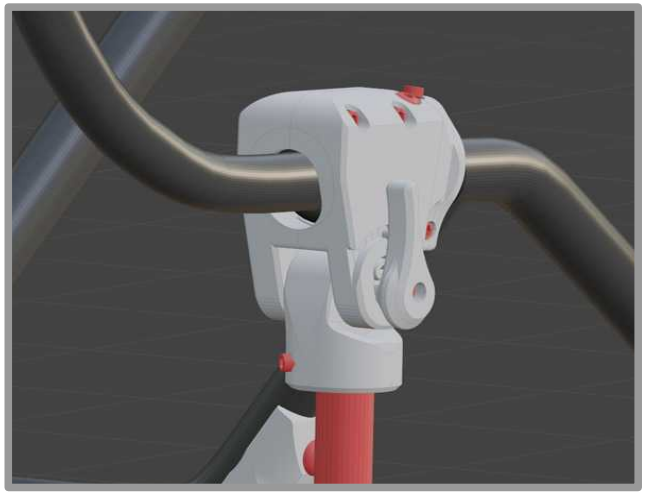
Remove the wheelbase structure by opening the wheelbase, depressing the spring loaded pin, and pulling it out of the Playseat frame. Also undo the front velcro straps of the seat fabric to make it easier to access the hinges.

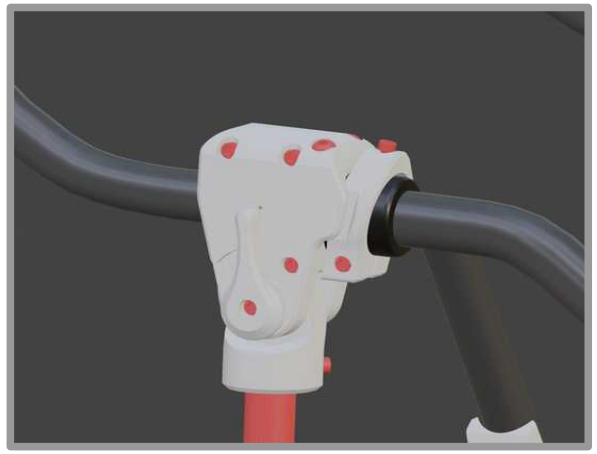
Starting with the left **Seat Frame Strut Connector/Reinforcer**, loosen the clamping bolts, the set screws, pull out the clamp lever, but don't separate the two main halves. The assembly should slide onto the black plastic hinge easily until it hits the bottom interface, which fits into the bottom slot of the hinge.


To fully seat the part, slightly open the bottom of the part as shown while ensuring the interface block doesn't fall out the bottom. This will give you enough clearance to move the part further back, after which the interface block can be pushed up into position and the two halves bolted together.

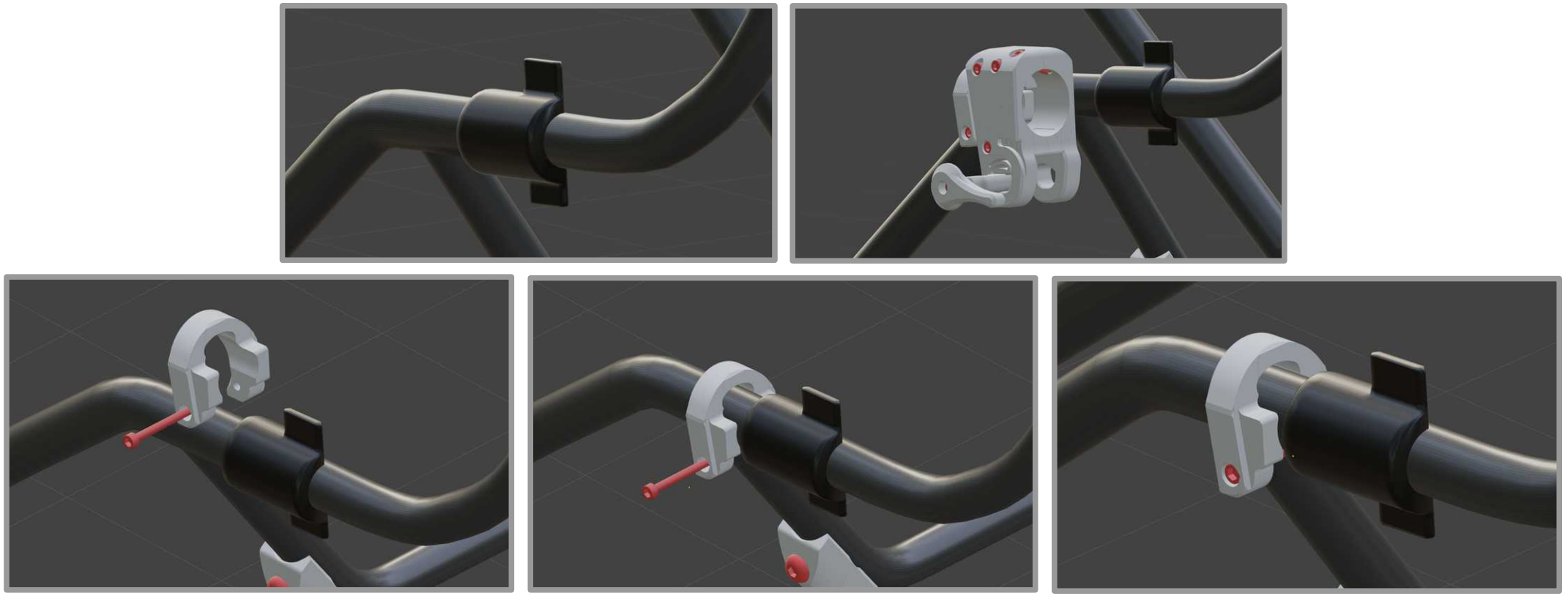




The Playseat wheelbase assembly can now be re-inserted into position. To check the functionality of the part, slide the **Side Strut** into place and lock it in position, as shown in the above images. There shouldn't be too much resistant initially. If the lever doesn't flick into place easily, check that the interface block is in place and that the top pair of set screws are loosened.

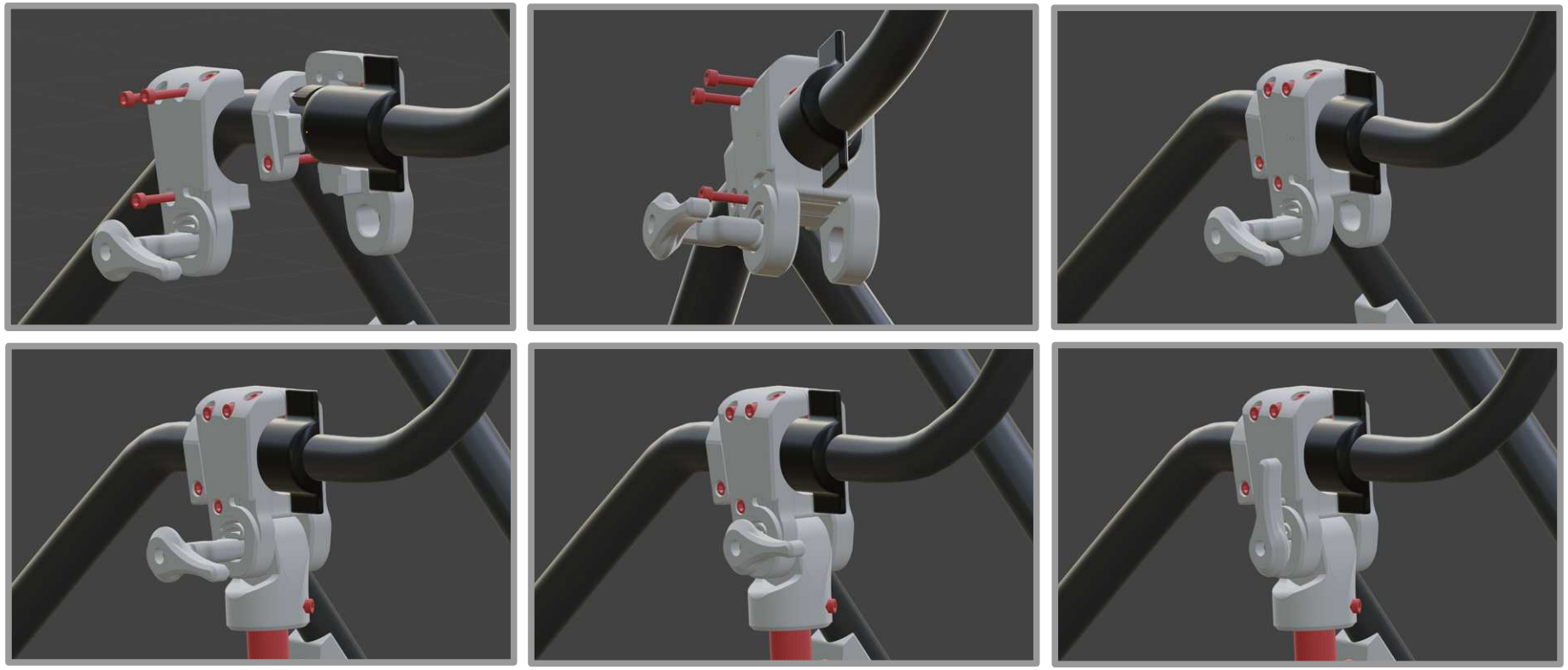


With the lever in the locked position, secure the small clamp by tightening the clamping bolt and top set screw.

To adjust the tension of the mechanism when locked, tighten the top pair of set screws while checking the tension by unlocking/locking the cam lever. The tension is calibrated with the torque wrench. Instructions in how to do so are found in the torque guide.



For the right **Seat Frame Strut Connector/Reinforcer,** remove the small clamp from the main unit and push it on the tubing just behind the black plastic hinge. Once in position the clamping bolt can be loosely threaded back into place.



Loosen the clamping bolts of the main piece and slide the cam lever out. Line the 2 halves up and clamp them back into a single piece. It can be a bit tricky to keep the tension block and the rubber inset in place while combining the pieces. The best workflow is to first align the top of the parts so the rubber inset is seated properly, then close the bottom while pushing the tension block into place. The clamping bolts can now be fully tightened.

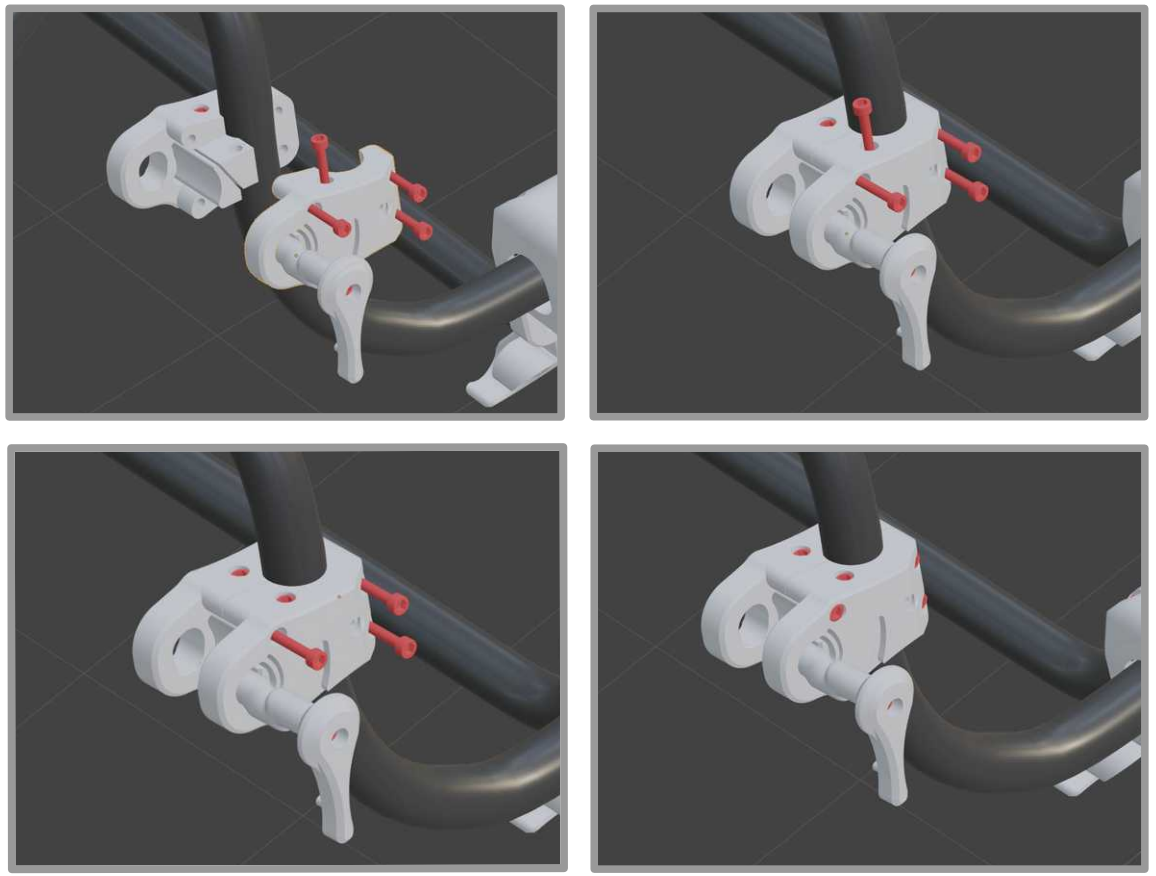
Lock in the **Side Strut** and tighten the small alignment clamp to lock in the alignment of the part. The tension of the QR locking mechanism can then be dialled in with the pair of set screws at the top of the part.

Pedal/Wheelbase Strut QR Connector

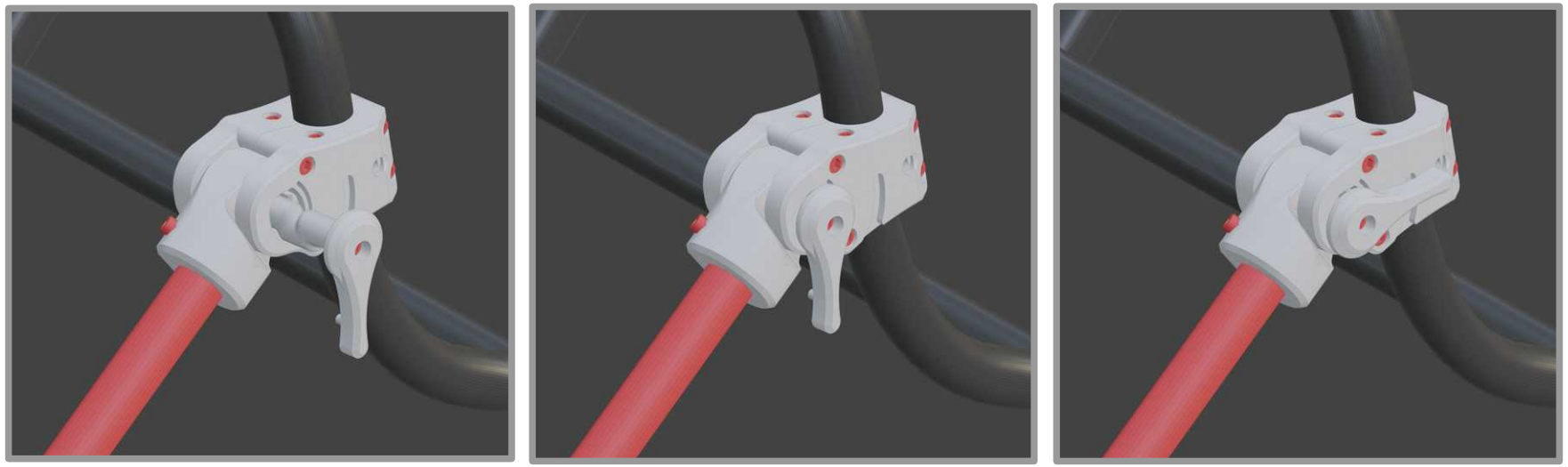
The QR connector for the pedal/wheelbase can be attached to either the Playseat wheelbase tubing (recommended) or the **Side Struts**, which will exchange rigidity in the rig for easier/quicker opening and closing of the wheelbase.



If attaching to the wheelbase tubing, as will be shown in this guide, remove the inner sleeve and unscrew the set screw. These are only needed if attaching this part to the 20mm aluminium tubing of the **Side Struts**.



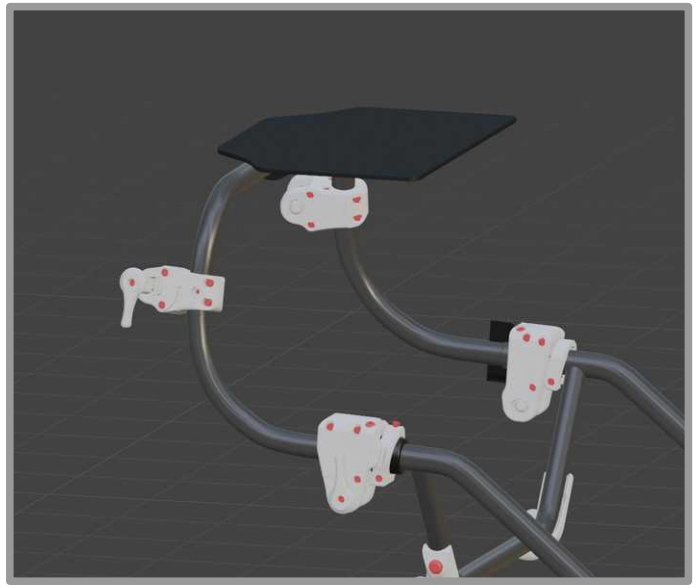
To separate the 2 halves of the QR mechanism, unscrew the clamping bolts and one of the tension adjustment screws. After placing the part over the tubing as shown, screw the adjustment bolt back into place first, then loosely screw in the clamping bolts.

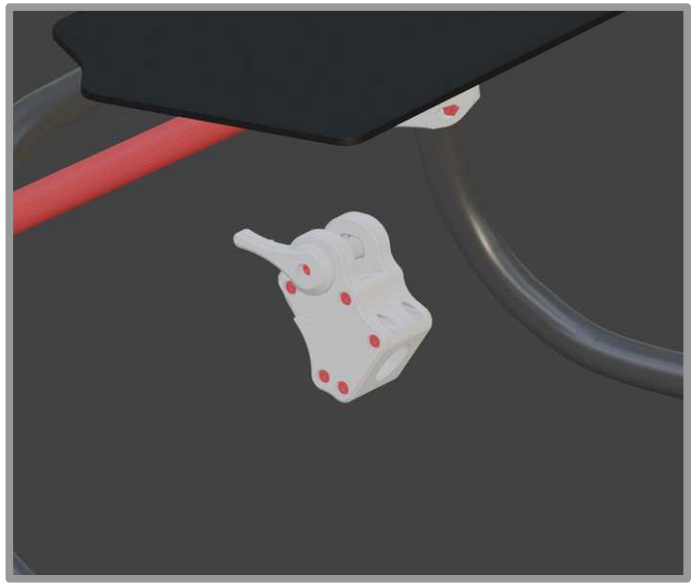


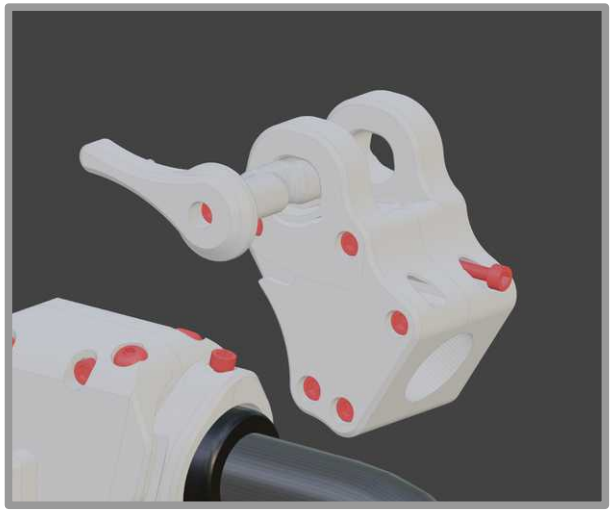
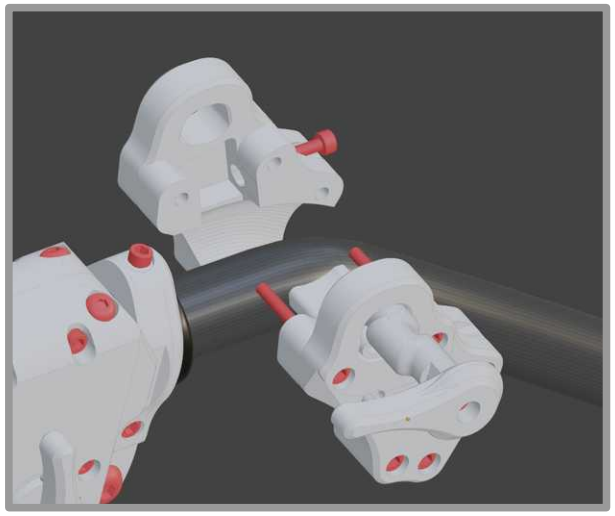
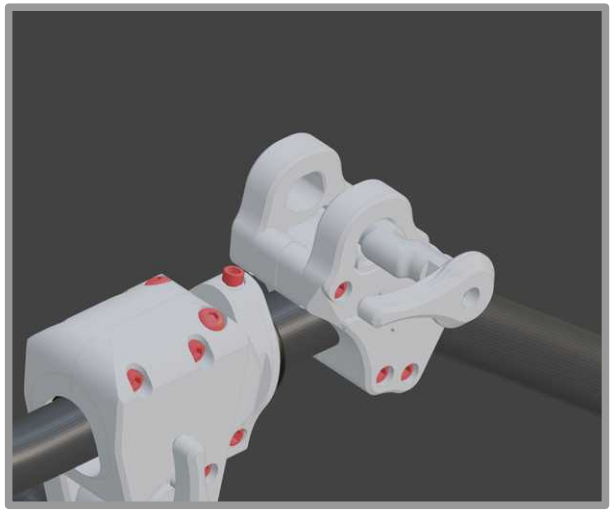
When both **Pedal/Wheelbase Strut QR Connectors** have been put in place, slide in the telescoping strut QR interface and lock in place. Before fully tightening the clamping bolts, check that the left and right side are equal heights. After this you can adjust the tension bolts to attain the specified tension for the QR connector.

Close Wheelbase Strut Connector

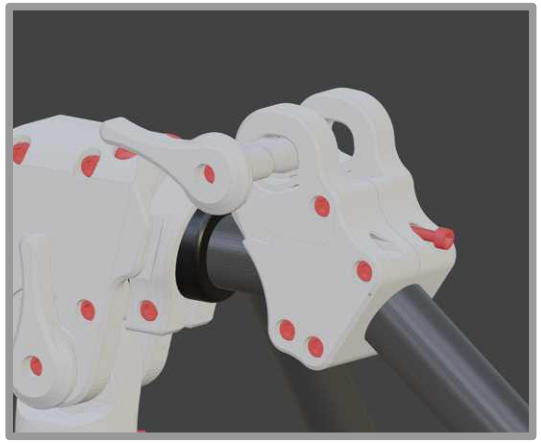
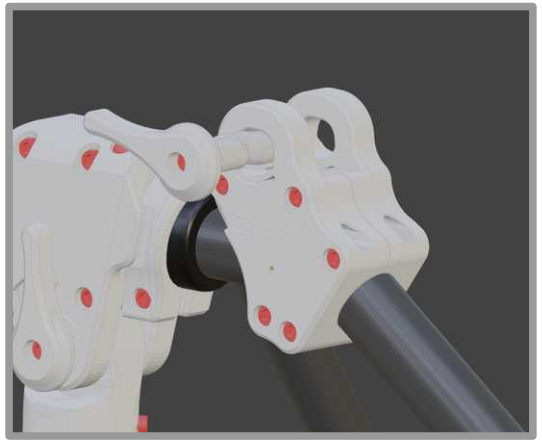
If setting up your Playseat Challenge X with the wheelbase closer to the driver, this is the wheelbase strut connector you'll be using. If setting the base-plate in the far (reversed) position, skip ahead to the Far Wheelbase Strut Connector section.



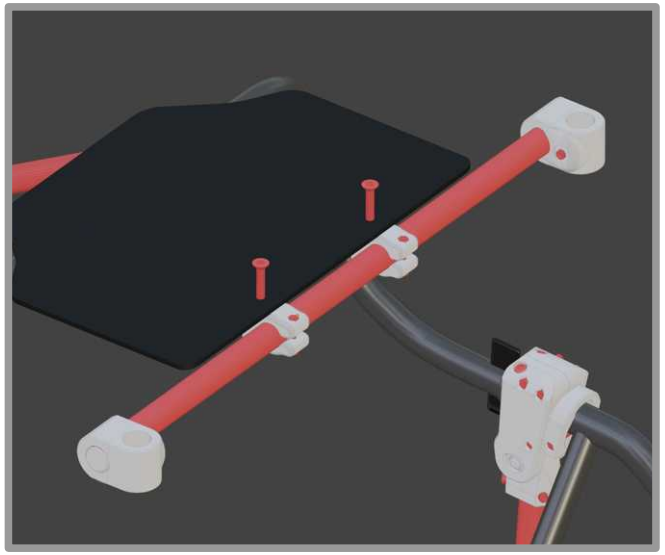
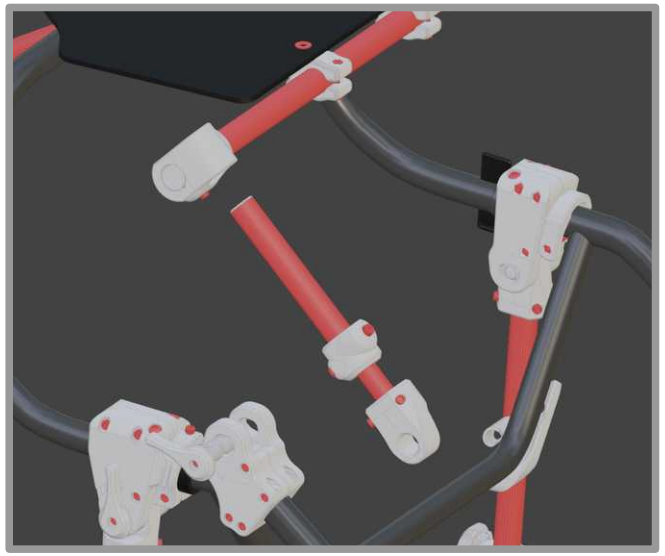
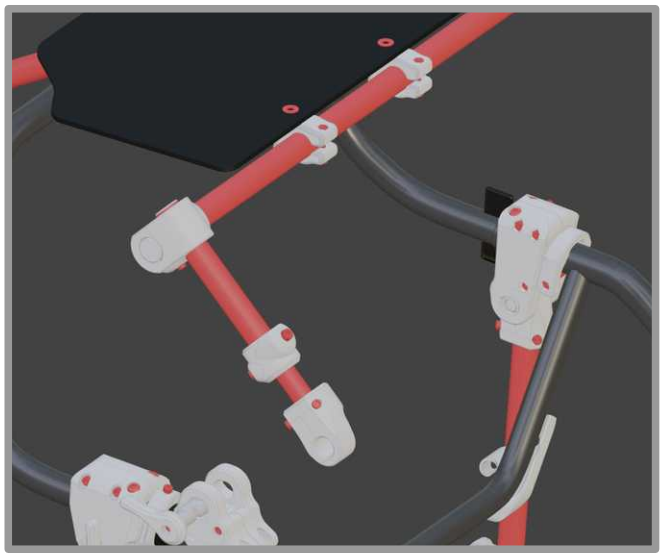


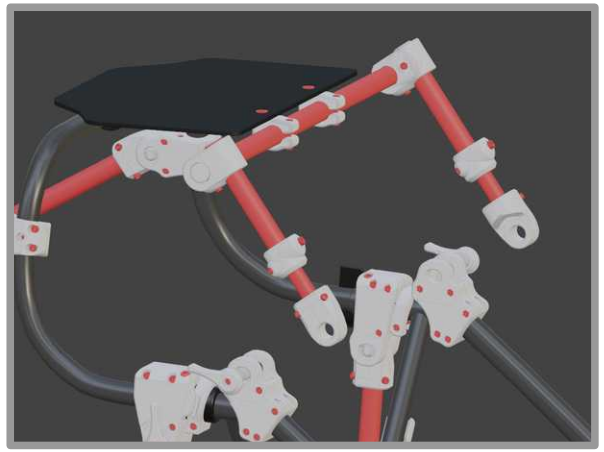
Like with the **Pedal/Wheelbase Strut QR Connector**, undo the clamping bolts and one of the QR tension bolts to separate the two halves. The part can then be placed over the top of the bend in the frame just behind the plastic hinge.

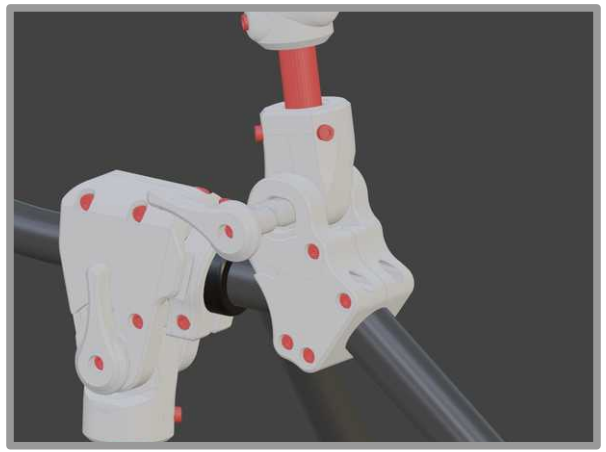



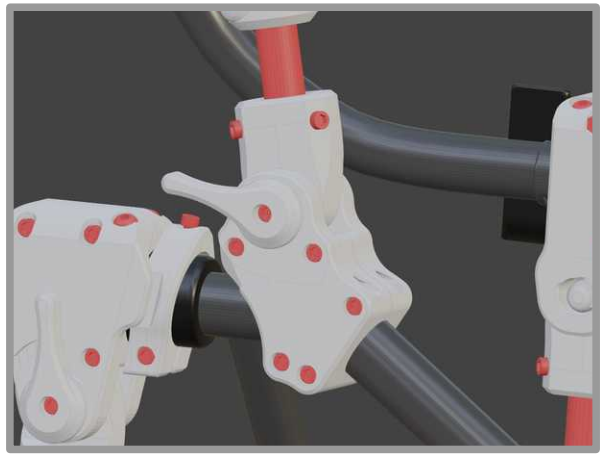
Thread the tension bolt back into place, followed by loosely tightening clamping bolts into place.

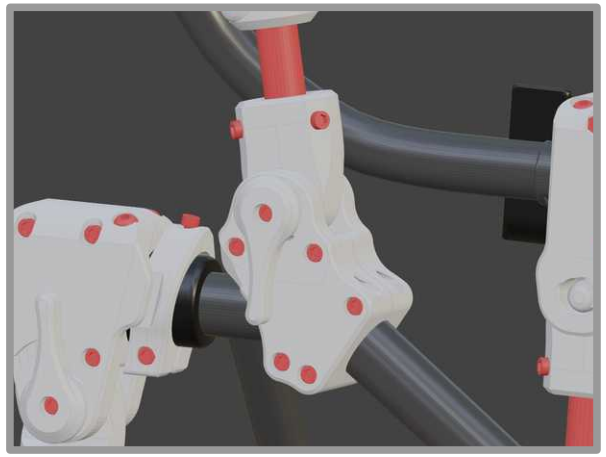




Attach the wheelbase reinforcement horizontal bar to the wheelbase plate as shown. The wheelbase reinforcement side struts can then attached. As with the telescopic pedal height extender, the wheelbase can also be fitted with telescopic extenders if needed. Attaching these is exactly the same, so refer to the previous instructions if needed..







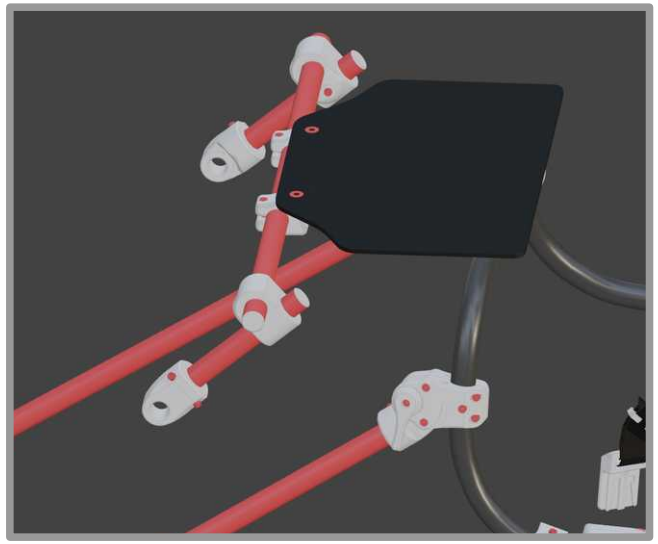


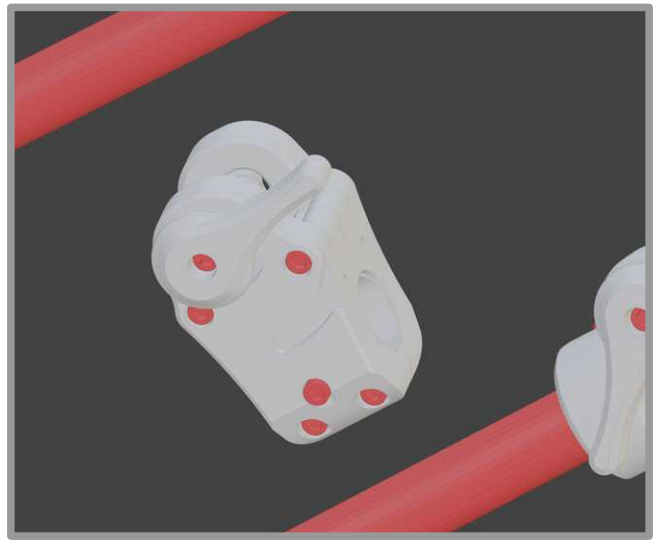
The wheelbase reinforcement assembly can now be locked into the **Close Wheelbase Strut Connector** QR interfaces, the clamping bolts fully tightened, and the tension bolts adjusted to dial in the tension of the QR mechanism.

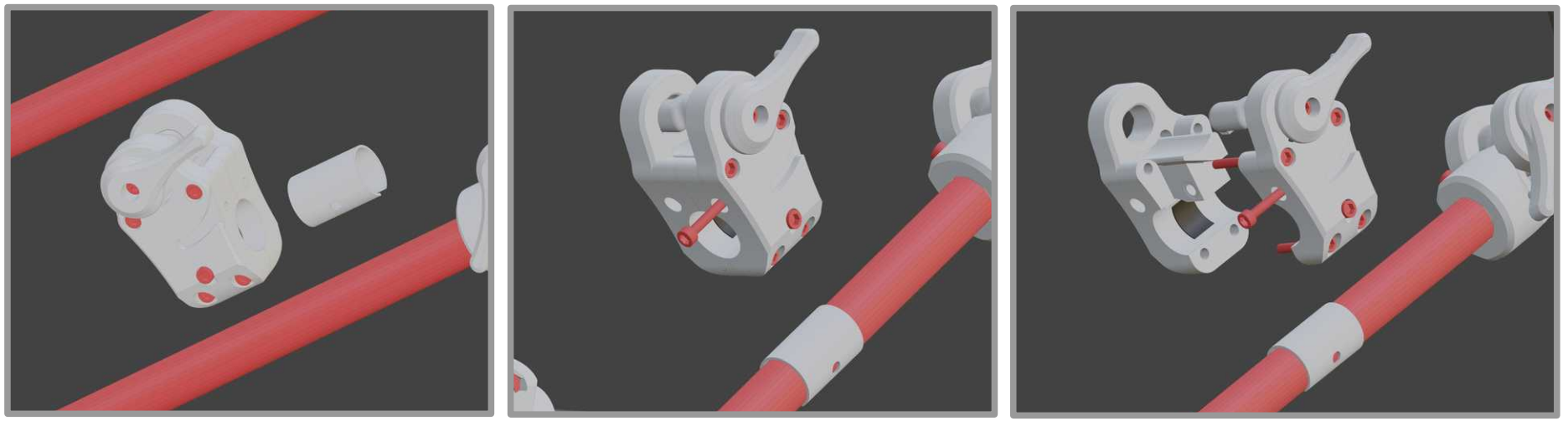
At this point the velcro straps of the seat fabric can also be reattached; they loop inbetween the two strut connectors, slightly overlapping the hinge reinforcement strut connectors. It is a relatively tight fit, but once in place the straps shouldn't impede the use of the QR mechanisms.

Far Wheelbase Strut Connector

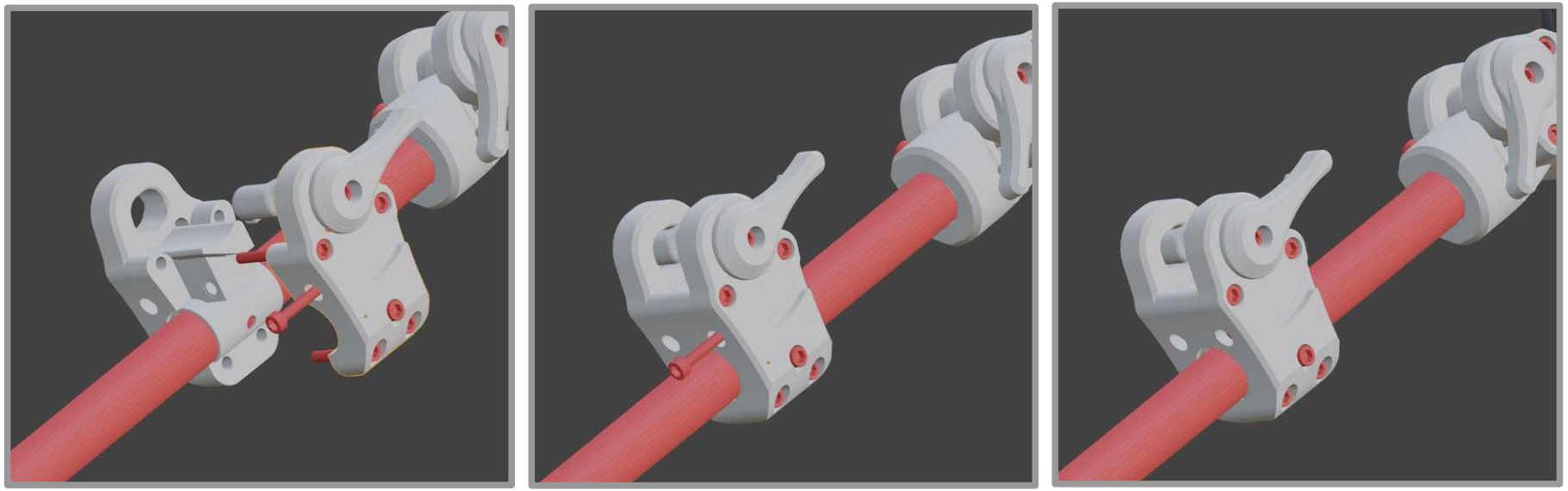
This configuration places the wheelbase plate further away from the driver, and requires the wheelbase reinforcement QR to connect to the telescopic tubing instead of the Playseat frame. The **Far Wheelbase Strut Connectors** are identical to the **Pedal/Wheelbase Strut QR Connectors**.



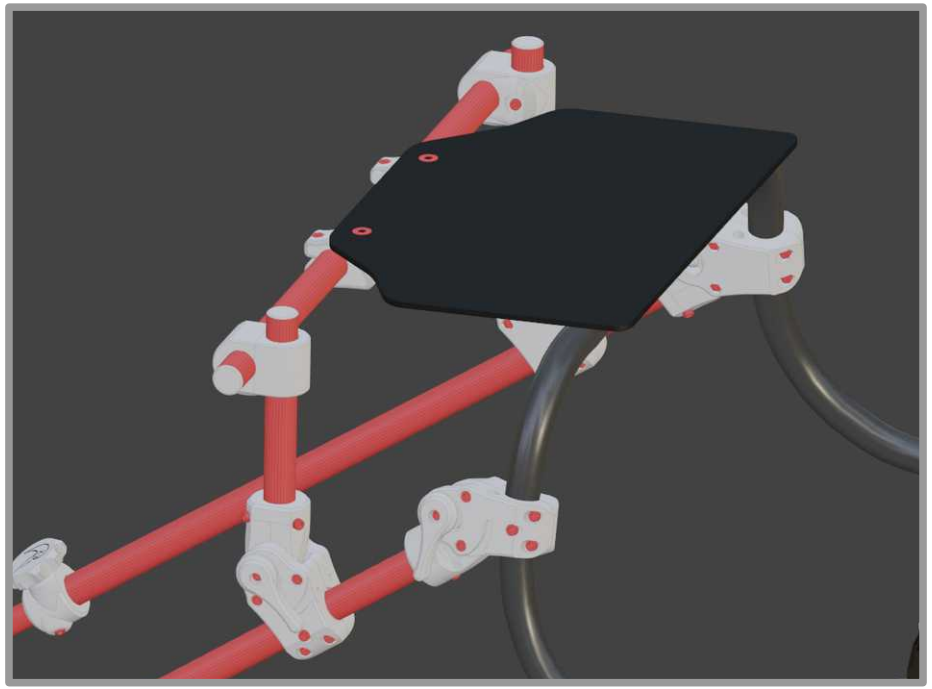




Start by sliding the internal sleeve out and snapping it over the telescopic tubing in the location you'll mount the part. As before, unscrew the clamping bolts and one of the tension adjustor bolts to separate the two halves.



Before clamping the part over the interface sleeve, unscrew the set screw and set it aside. This will make it easier to line up the set screw bolt with the hole the the interface sleeve. Clamp the 2 halves in place, thread through the tension bolt and loosely tighten the clamping bolts in place.

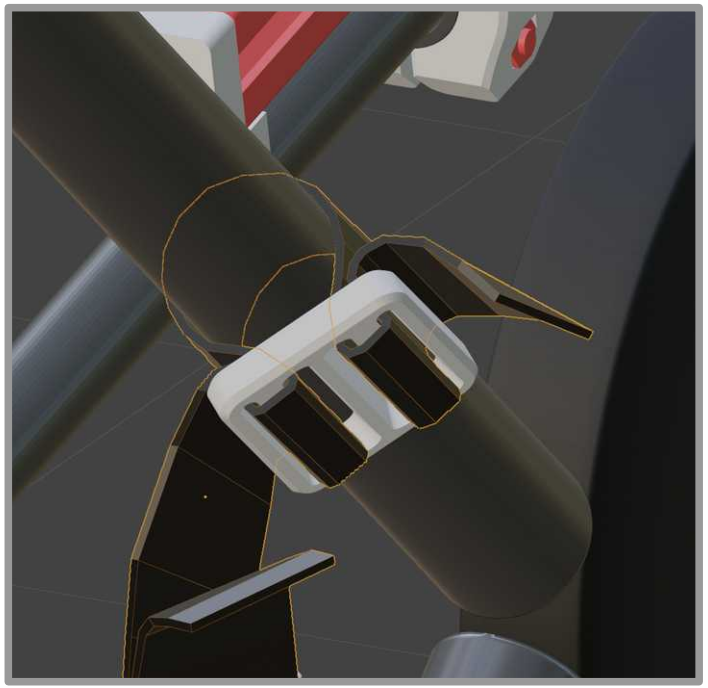


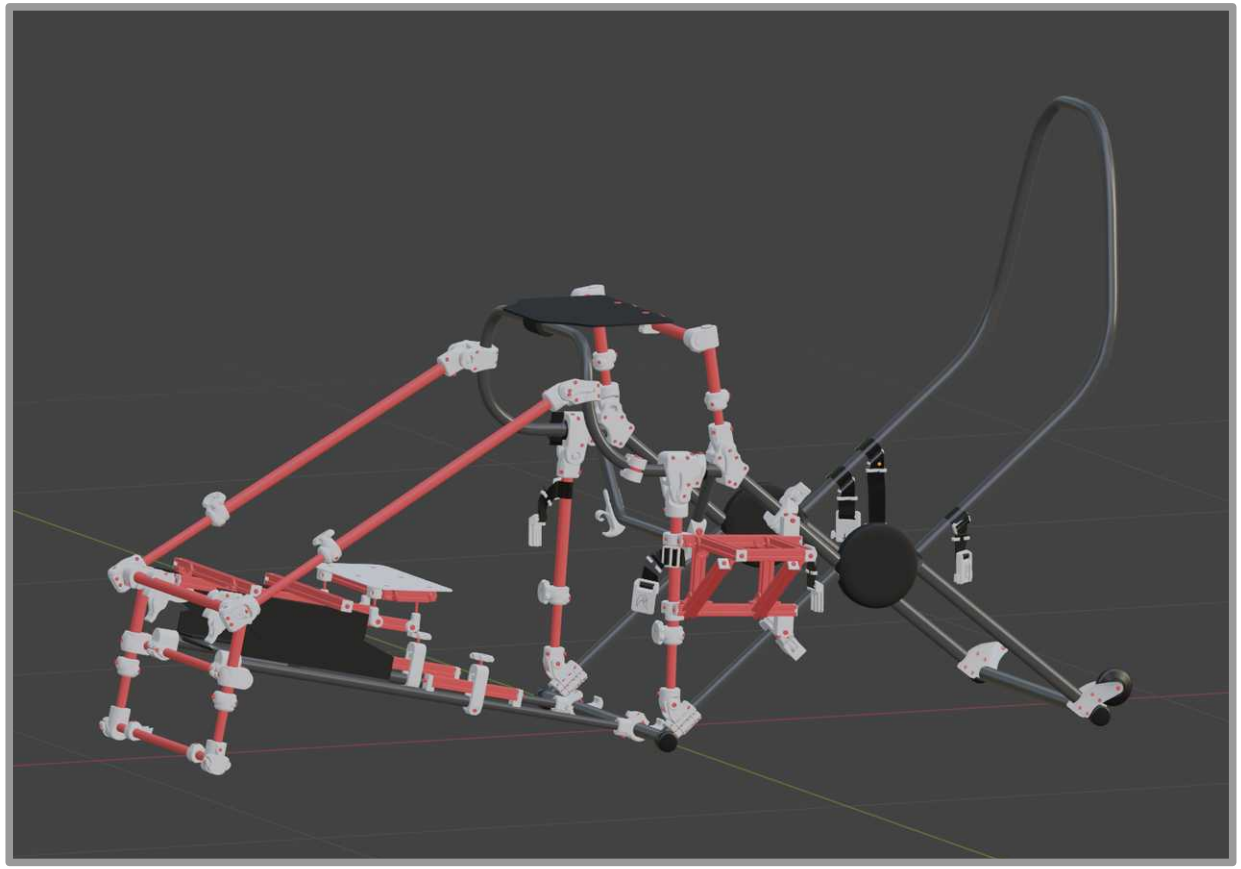
Following the steps shown on page 48, assemble and attach the wheelbase reinforcement sub-assembly to the wheelbase plate. For the far configuration the telescopic extenders for the wheelbase struts may not be needed, but this will depend on the angle of the wheelbase.

Lock in the QR interface with the struts, tighten the clamping bolts of the two halves, and tension the QR mechanism as needed.

Folding Locks

To secure the side struts (and side mount assembly) when folded, a set of straps and buckles are included with the Lock-Mod X. One end is attached to the side strut itself, and the other at some point on the back of the Playseat Challenge X. In the following images it is shown attached to the seat tubing just behind the seat angle adjustor. To attach the strap to the seat, free one end of the strap from the buckle, loop it around the tubing and then thread it back through, looking something like the images below. If wanting the strap to be more securely held in position (especially for the **Side Struts)**, run some double sided tape around the tubing that the strap will sit on before tightening the strap.





Assembly Finished

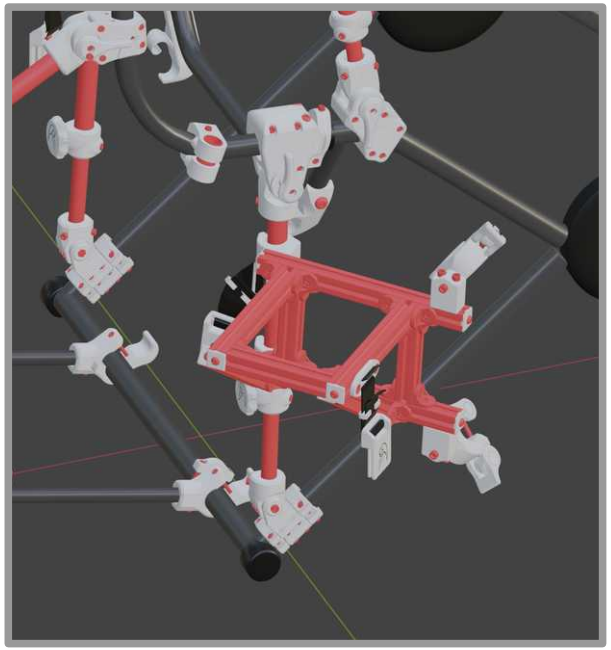
That covers the assembly of the base components of the Lock-Mod X. Instructions for the optional extras for the Playseat Challenge X, like the **Side Mount Assembly**, **Pedal Mount** or the **Keyboard Mount**, can be found here.

With all the components of the Lock-Mod X kit attached, now is the time to mount your equipment to the rig and set your driving position. The cables can be attached if you want to verify the seating position by actually driving in game, but these will be removed to verifying the folding in the next step.

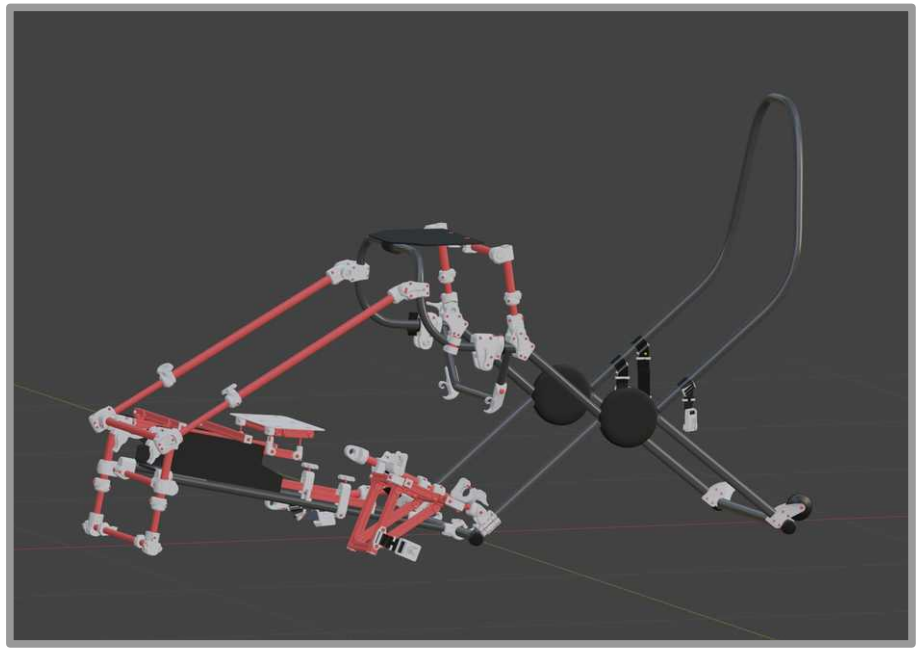
Once you're happy with the positioning of everything, go around and do a final tightening of all the fasteners using the torque wrench and the matching guide.

Folding Test

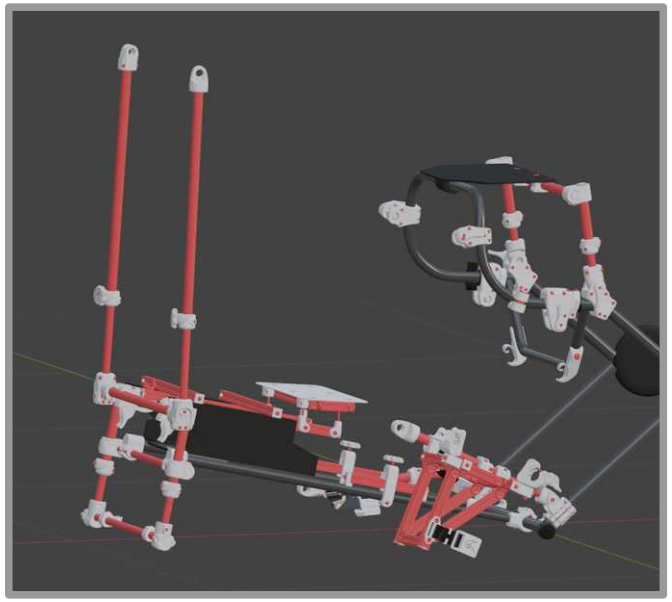
With the first folding test, make sure to take it slowly and ensure there is sufficient clearance between components at each step. Avoid forcing things in to place if they don't fit, as you may need to adjust the position of some parts or how they are folded, depending on configuration choice.



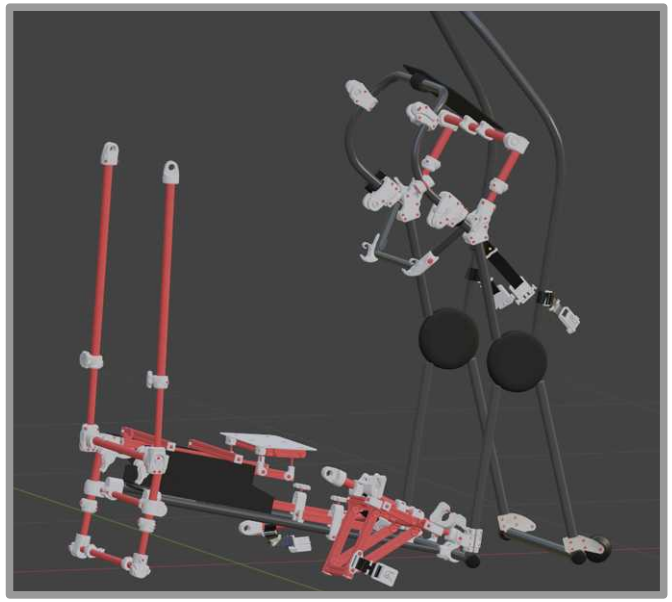
1. If using the **Side Mount Assembly**, detach the rear tube clamps and swing it out.



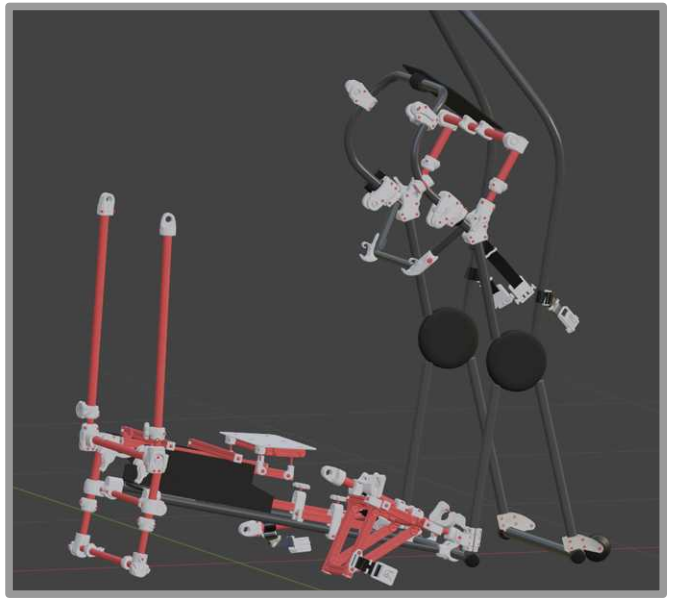
2. Unlatch the side struts and lay them to the side of the rig.



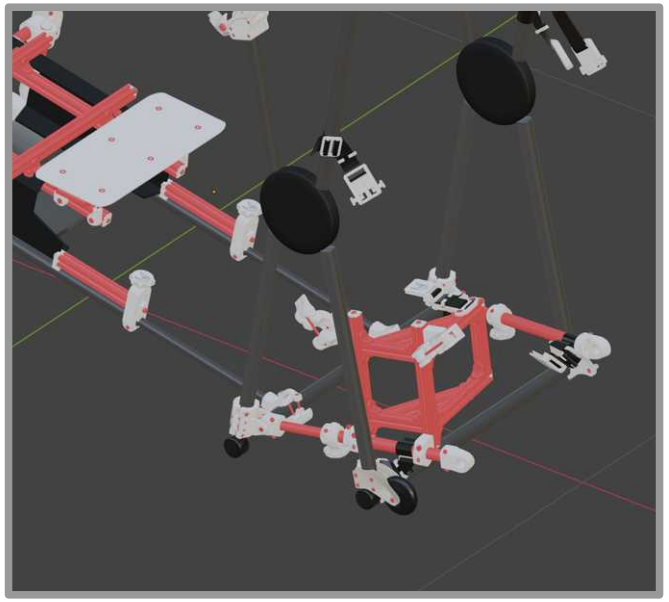
3. Unlatch the pedal/wheelbase telescoping struts and put them in an upwards resting position.



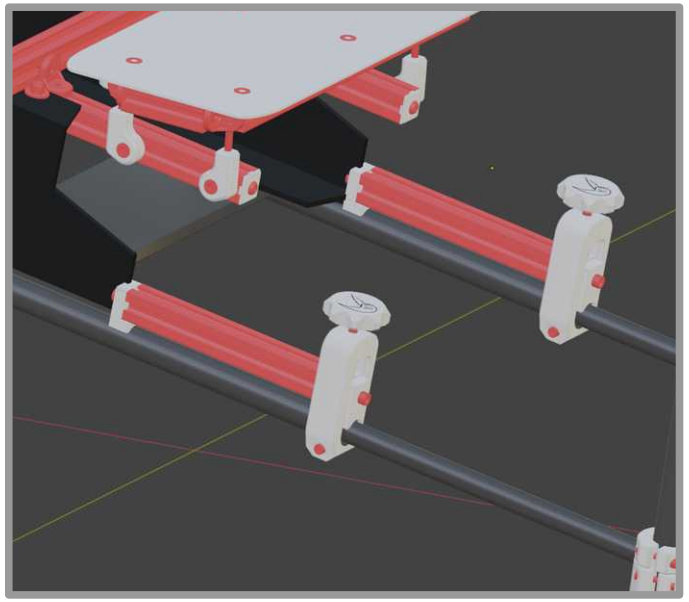
4. Fold the chair legs and lock in position. How tightly the legs can be folded will depend on the gear mounted to the rig, but this can be adjusted later.



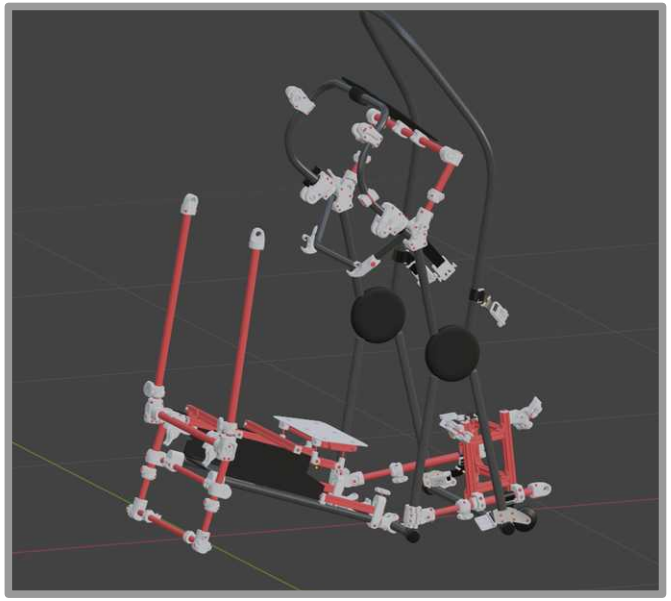
5. Retract the telescoping tubes to their minimum length.



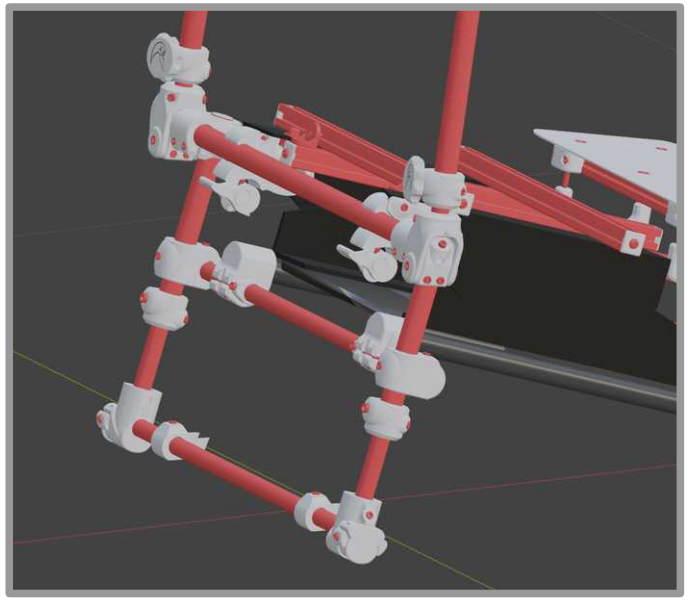
6. Fold the side struts (and side mount assembly) between the Playseat Challenge legs and rest them along the back horizontal tube.



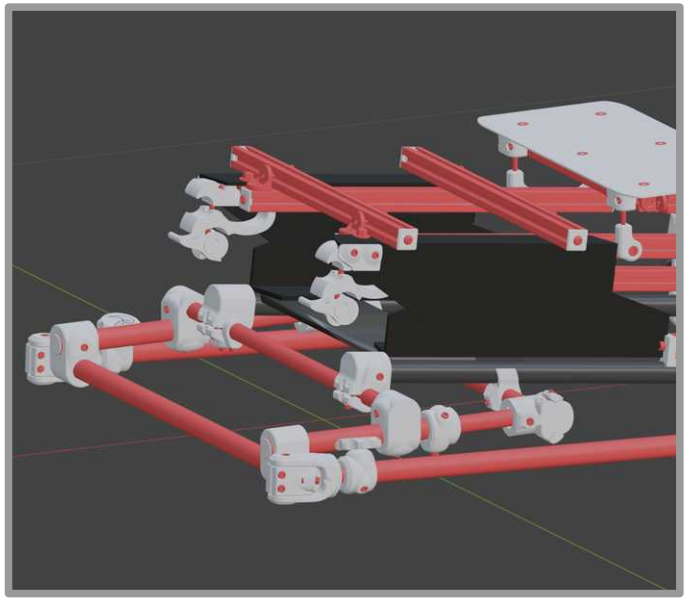
7. Loosen the pedal tray thumbscrews enough so that the aluminium reinforcement profile can be pushed all the way up into the housing.



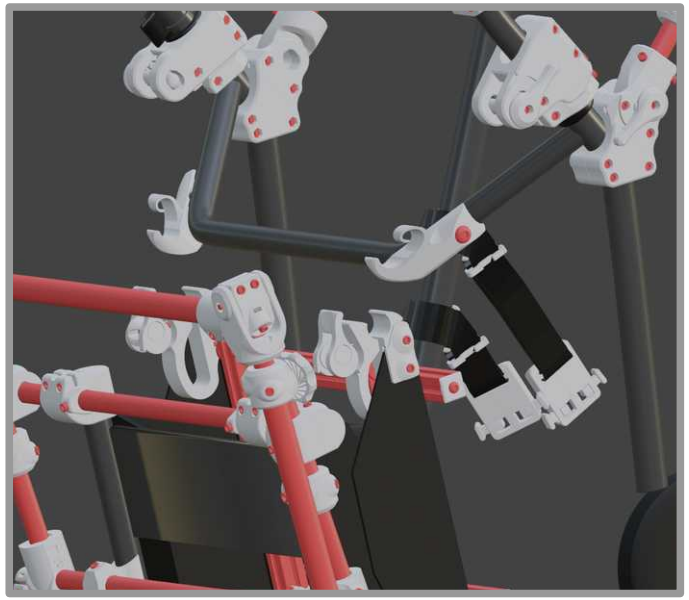
8. Fully retract the pedal tray.



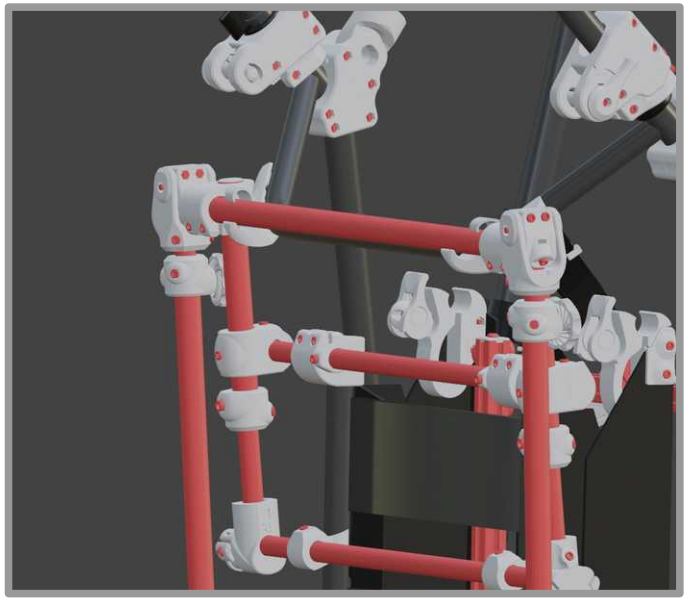
9. Unlatch the **Pedal Tray Interface QR** and fold the pedal reinforcement structure down.



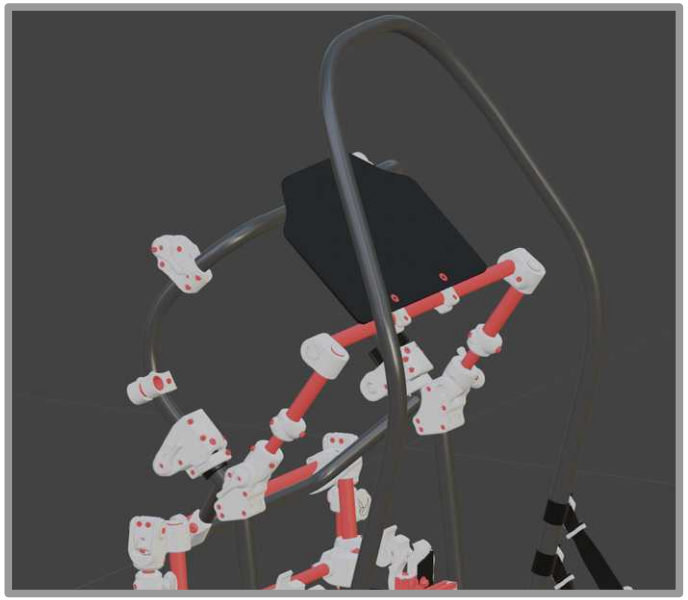
10. If using the **Extended Pedal Height** extra, the structure can be secured to the bottom of the pedal tray with the included latches. To properly align these latches; loosen the set screws of both, push the latches into place, then re-tighten.

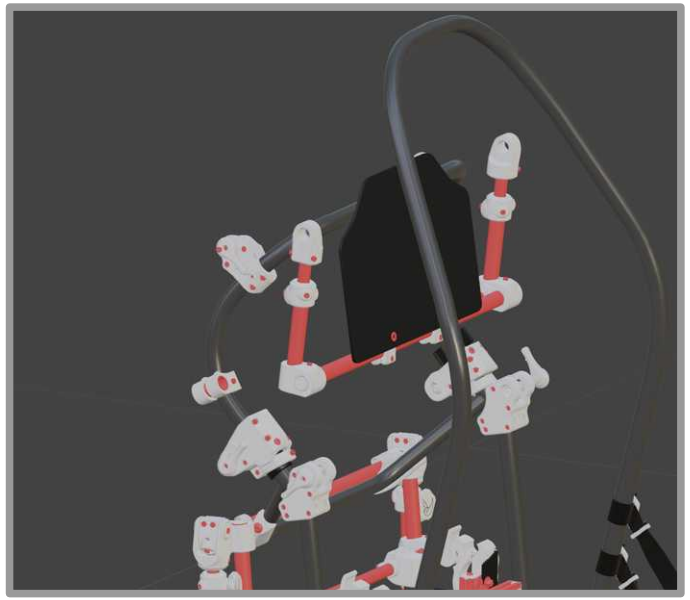


11. Fold the pedal tray up. Depending on the height of the pedal set attached, you may need to shuffle the fabric of the seat upwards to make space for the pedal tray to fold properly.

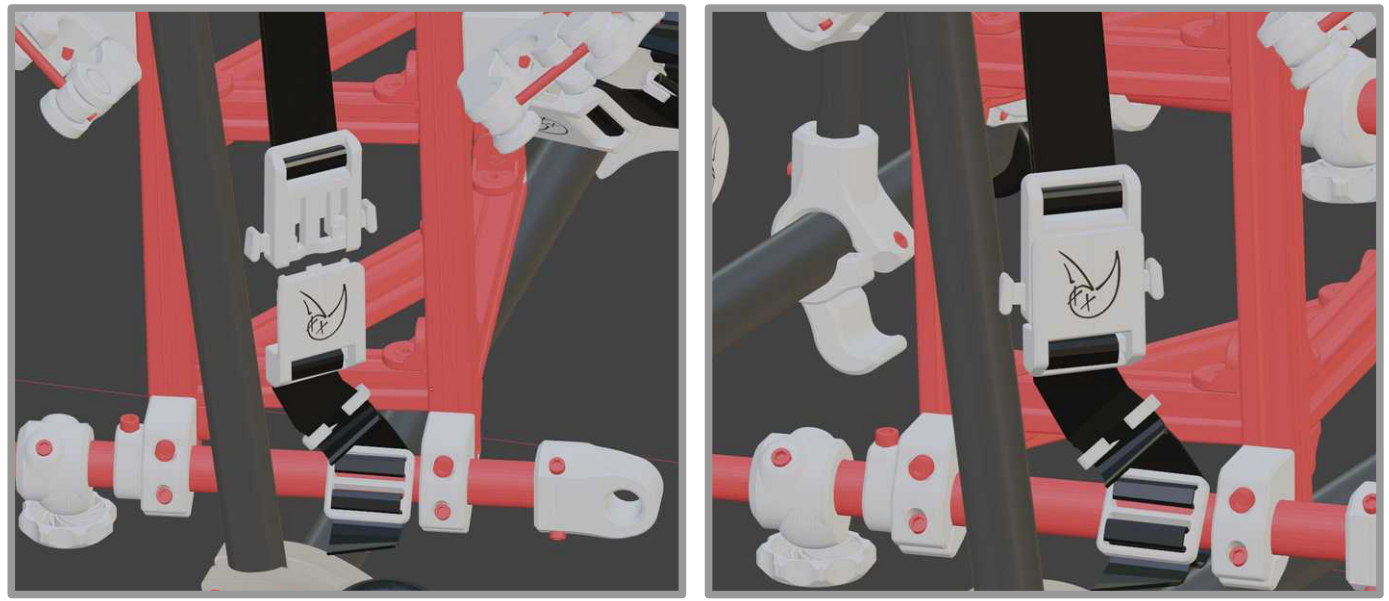


12. Lock the pedal tray in place by latching the top horizontal pedal tube to the pedal tray folding hooks.

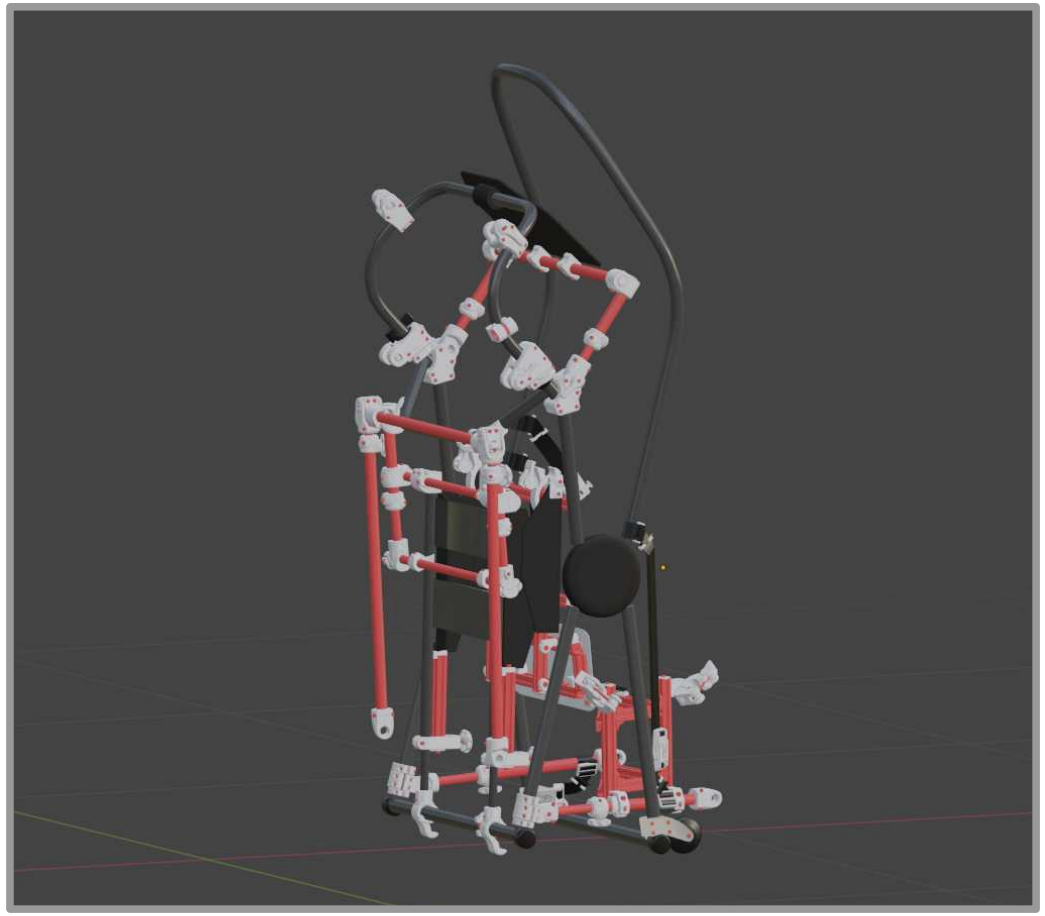




13 (optional). Depending on the configuration of your rig and the size of the wheelbase unit you have installed, you may need to fold the wheelbase. If your wheelbase has a quick release mechanism it may be easier to just remove the rim and store it within the seat fabric.



14. The final step is to use the straps and buckles to secure the side struts (and side mount assembly). Latch the buckles into place, and tighten the straps as much as necessary.



Folding & unfolding the rig a few times will help solidify the process and ensure that everything works as intended. Once you are happy with how everything is position and that it folds correctly, it is time to move on to cable management.

Cable Routing

The following section was repurposed from the original Lock-Mod manual, as both rigs are functionally the same as far as cable routing goes.

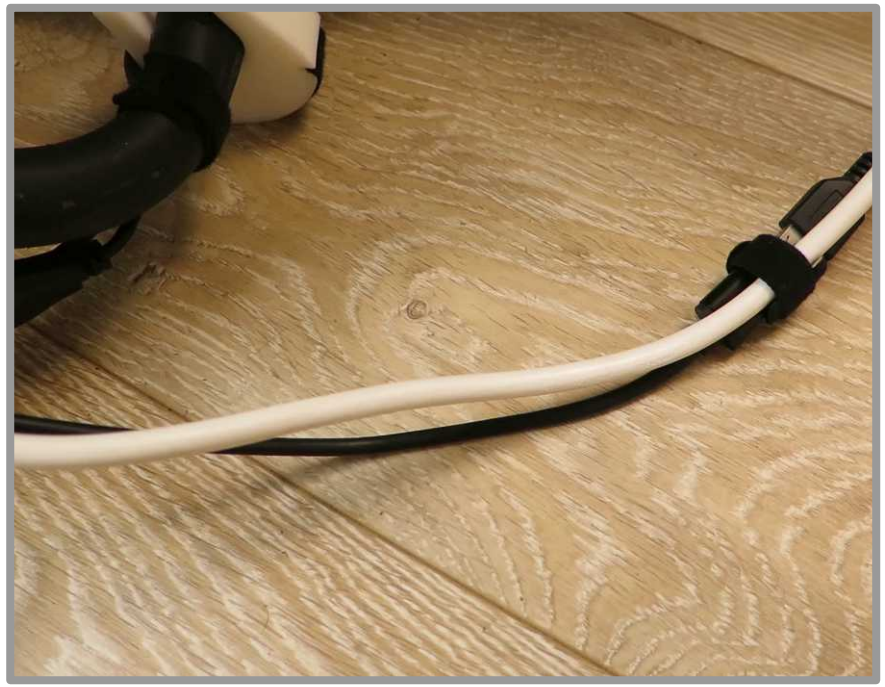
To make unfolding & folding the Lock-Mod X as quick and easy as possible, it's recommended to route the cables along the PSC X frame so that they can remain on the rig without fear of snagging or getting tangled.

It does take a bit of time to get it sorted, but not having to figure out a spaghetti mess of cables before each play session makes it well worth it, especially if your setup includes more than just a wheelbase and pedals.

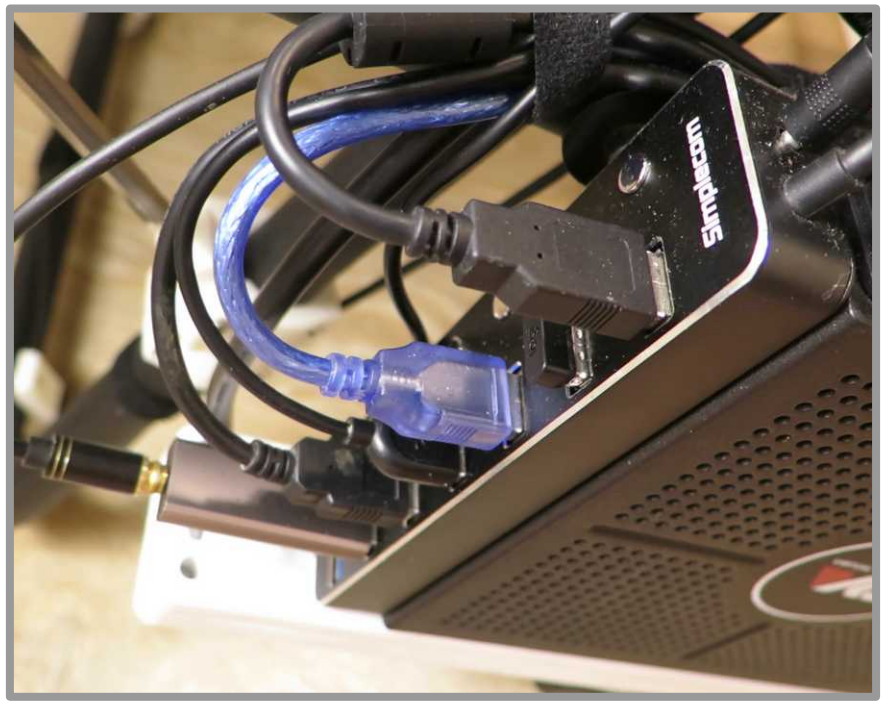
Accessories for Cable Management

The Lock-Mod X kit comes with a set of 20 Velcro zip ties for cable management. The following items can be purchased separately to further improve your setup:

- **Zip ties and/or cable sleeves**
  - In addition to the included Velcro zip ties, additional zip ties or even cable sleeves can be useful if you're rig has a lot of cables.
- **Power-board**
  - If you have more than one accessory that needs active power delivery then a power-board mounted to the PSC X frame is recommended, as only a single power cable needs to be plugged in when setting up for a session.



- **USB hub (powered) and USB cable extender**
  - A USB hub to manage your USB devices is highly recommended, although may not be necessary if your devices interface with a proprietary wheelbase hub (Thrustmaster, Logitech, etc).
  - A powered USB hub should be used to avoid issues related to signal degradation. There is a limit to the length of a passive USB cable before loss of data occurs unless it is repeated with a powered device (powered USB hub, actively powered USB cable, etc). This length can be calculated from the last powered USB outlet (powered USB hub, computer USB port, etc) to the USB device.
  - USB 2.0 is the ideal standard for sim racing; the 480mb/s data rate limit is not an issue (in almost all standard use cases), it has the longest passive cable length of any USB standard (5 meters, *vs* USB 3's 2-3 meters), and does not interfere with 2.4Ghz wireless devices like USB 3 does. Technically USB 2.0 does induce an extra *fraction* of a millisecond of latency compared to USB 3, but this is impossible for humans to notice.
  - Finding quality USB 2.0 hubs can be difficult, but a work-around is to pair a USB 3 hub that has USB 2.0 backwards compatibility (practically all USB 3 hubs support this) with a USB 2.0 cable extender connecting to your computer, which can be found easily and cheaply. This forces the USB 3 hub to operate as a USB 2.0 hub.

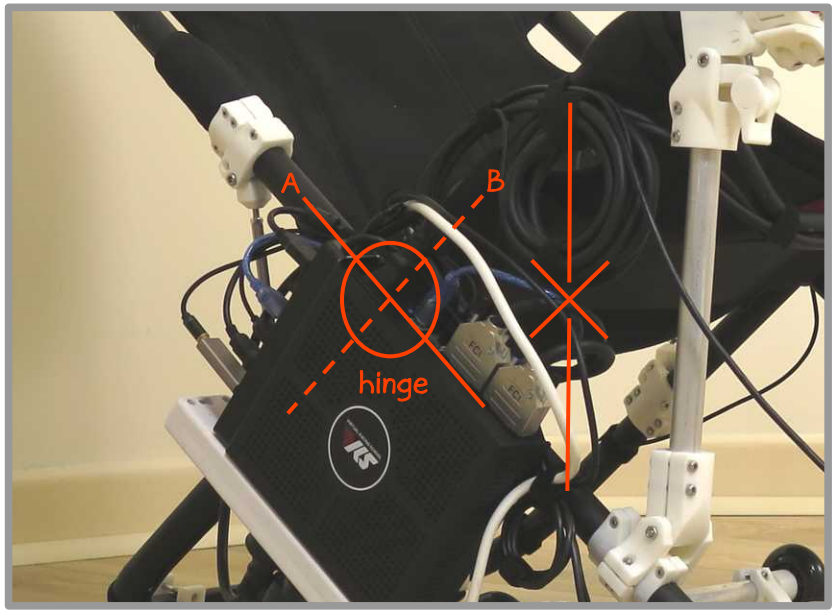


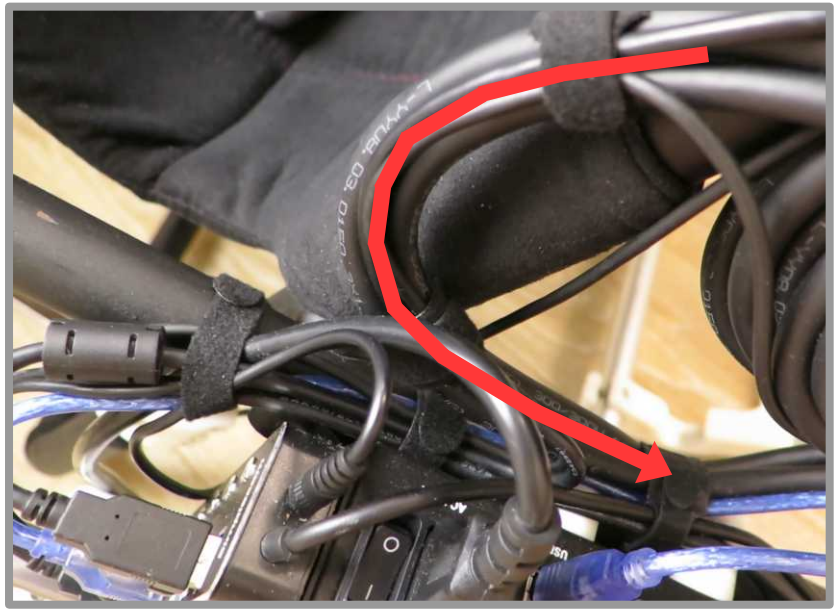
Cable Routing Guidelines

Special care needs to be taken when routing cables from the tubing of section **A** to section **B**. Cables that go between these sections need to be routed close to the **hinge**.

This path will keep the distance the cable needs to traverse roughly the same when the rig is folded/unfolded. Using a more direct path would require a large amount of slack to avoid the cable overextending when the rig is folded.

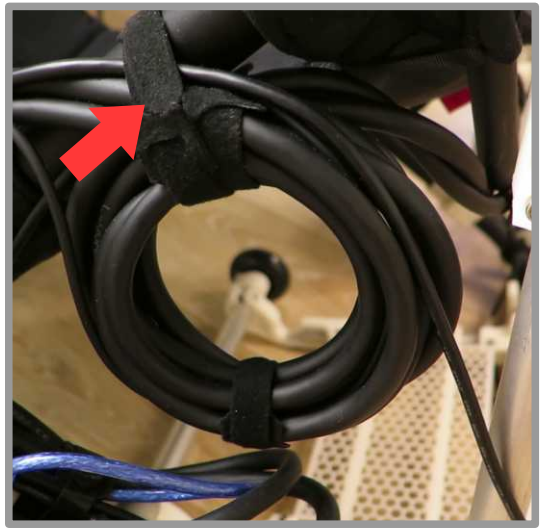
Once the cable path has been tied down with the zip ties, start folding the rig to see how the cable moves. The aim should is to minimise the cable being stretched, balanced with reducing the cables' freedom of motion to reduce the risk of it snagging on something.

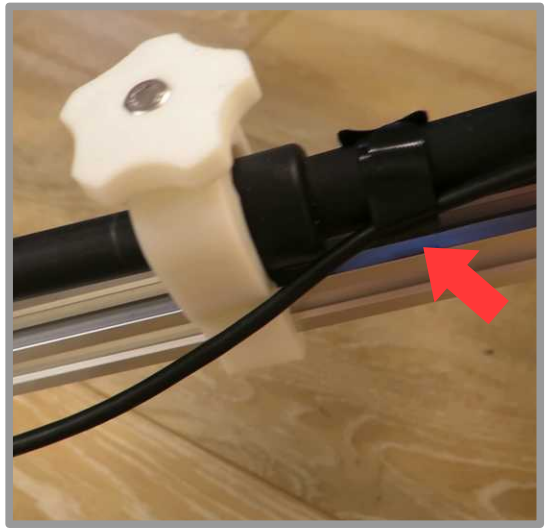


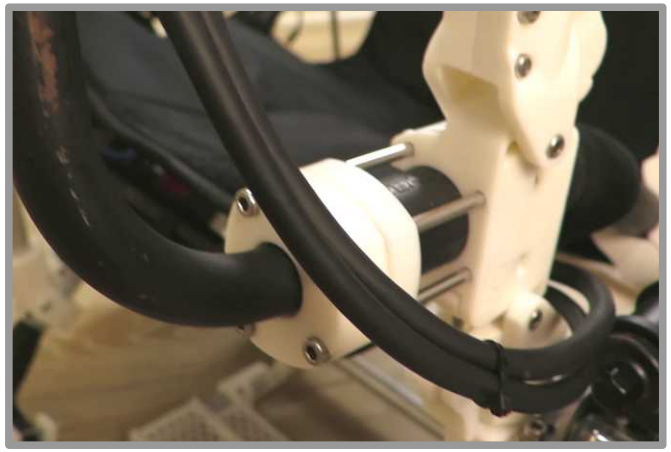


Cable running between the main rig and the pedal tray needs a different approach. Due to the pedal tray extending/retracting when folding/unfolding, a fairly large amount of cable slack is required. The zip tie anchor points shown in the image below gives enough slack to prevent the cable over-extending while also keeping the it from dragging along the ground when moving the folded rig.

A good way to estimate the length needed is to set the cable up so that it droops to just above the pedal tubing (example picture shows cable slightly longer than necessary).

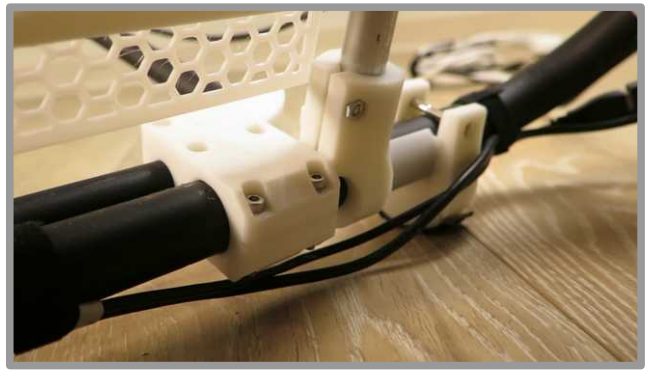




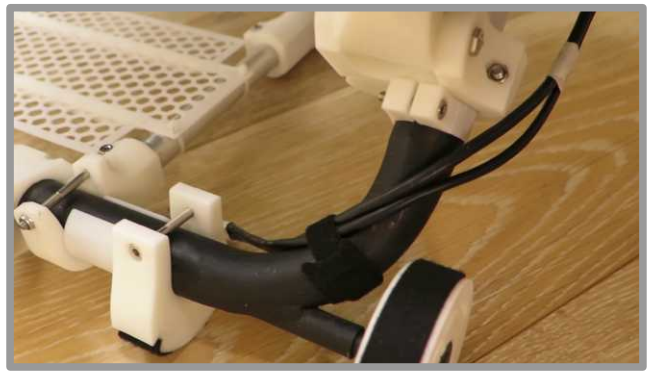


If you want to retain the functionality of opening/closing the wheelbase then any cables going to the wheelbase area should be routed around the outside of the left hinge. If not then outside the right hinge is viable as well.

A good place to coil excess cable is just below the seat fabric velcro on the PSC X tubing. Here it doesn't interfere with folding and won't drag along the ground when folded.



For cables going along the bottom-front tubing, route the cables behind the pedal feet and underneath the roller lock struts, and zip tie in place outside of both front feet and to the middle of the tubing. With a small amount of slack in the cable, this arrangement will allow folding/unfolding without risk of damage to the cables.



Cables going to the side mount assembly should be routed over the front of the front leg tubing. If routed behind the tubing the cable can be over-extended when the assembly rotates and folds inside of the Playseat Challenge X legs.

Final touches

With the cable routing complete, the final step is to slowly and *carefully* fold and unfold the rig, checking for possible problems in your cable layout. Keep in mind that it's quite easy to damage your gear if a cable gets pulled taught, especially if the Playseat is setup with heavy gear.

After going through those final checks, the Playseat Challenge X: Lock-Mod X is ready to use.

Happy racing~