Installation instructions for JM4-RP2 Rotopax / Hi-Lift Mount for Toyota Land Cruiser 80 Series

It is <u>highly recommended</u> that you use a thread lock compound such as Loctite brand on all threads to keep them from vibrating loose.

Please read these instructions entirely before starting.

This picture shows the components of the JM4-RP2. Parts will be referred to by the names & numbers shown here. If you are missing anything please email RefinedCycle@gmail.com.



JM4 Components

- 1. JM4-RP2 Main Bracket
- 2. RP2
- 3. JM4-RP2 Hanger Bracket
- 4. 3/8-16x4 Carriage Bolt
- 5. 3/8-16x2 Button Head Cap Screw (qty. 2)
- 6. 3/8-16x1.75 Button Head Cap Screw (gty. 2)
- 7. M10-1.25x40 Socket Head Cap Screw (qty. 4)
- 8. M6-1.0x20 Hex Head Cap Screw (qty. 4)
- 9. 7" Pin

- 10. Pin Clip
- 11. 3/8-16 Star Knob
- 12. Bronze Flange Bearing (qty. 2)
- 13. M10-1.25 Nut (qty. 4)
- 14. 3/8-16 Lock Nut (qty. 7)
- 15. M6-1.0 Nut (qty. 4)
- 16. M6 Washer (qty. 8)
- 17. 5/16" Washer (qty. 12)
- 18. 3/8" Washer (qty. 8)



Place a 3/8" Washer onto each of the M10-1.25x40 Socket Head Cap Screws, insert them into the JM4 Hanger Bracket and put some threadlock onto the Screws.



Secure the Hanger to the existing holes in the bumper with four more 3/8" Washers and M10-1.25 Nuts on the inside of the bumper.

Note: Start the top nuts first since access is limited. Once all four nuts are started make sure the Hanger is straight and tighten everything. This is the most difficult part of the install; I promise it gets better from here!

If you have a spare tire mounted underneath you will want to lower it and move it out of the way while you work. Don't forget to put it back!



Now stop for a moment to reward yourself for your perseverance and reflect on your strength of will. The rest is a piece of cake!

Insert the Flange Bearings as shown with the flange on the outside.



Thread the Carriage Bolt about 3/4 of the way into the JM4 Main Bracket.

DO NOT USE threadlock here, in fact the use of an anti-seize or at least a bit of grease is a fantastic idea here.



Thread a 3/8-16 Lock Nut onto the Carriage bolt leaving 7/8" of thread exposed.



Use threadlock on the exposed thread generously.



Use a wrench to hold the Nut and thread the Star Knob on tight against the nut.

Note: When everything is assembled and the JM4 is in the upright (closed) position, after the Pin and Pin Clip are in place, you will use this knob to tighten against the Hanger Bracket which will keep the assembly from rattling. A half-turn is about all it takes to loosen and tighten again, once you get it adjusted the first time.



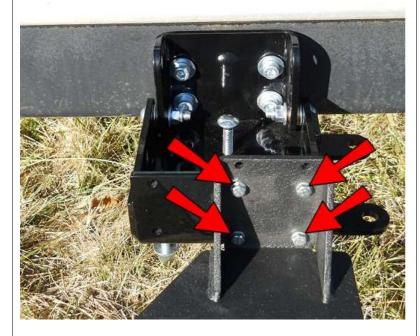
Place a 5/16" Washer onto a 3/8-16x1.75 Socket Head Cap Screw and barely insert it into the bottom holes, then place another 5/16" Washer on the inside as shown.



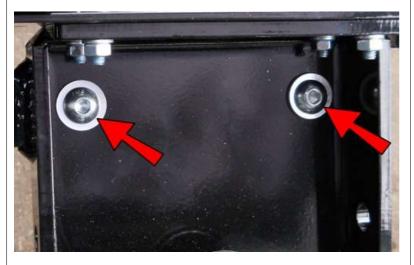
Line up the screws you just inserted in the Main Bracket with the Flange Bearings in the Hanger Bracket and push the Screws through the Flange Bearings to join the two pieces. Place another 5/16" Washer onto the Screw and secure with a 3/8-16 Lock Nut. Do this on both sides.



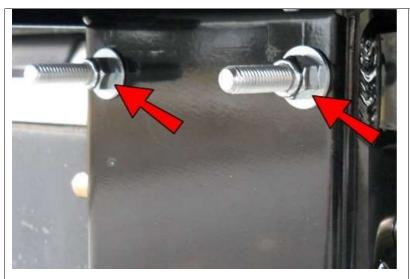
Place four M6 Washers onto four M6-1.0x20 Hex Head Cap Screws.



Line up the 4 closest holes to the inside bend of the RP2 with the 4 holes on the right side of the top of the Main Bracket as shown and insert the M6 Hex Head Cap Screws with Washers and secure with 4 more M6 Washers and M6 Nuts.



Place 3/8-16x2 Button Head Cap Screws into 5/16" Washers and insert them into these two holes.



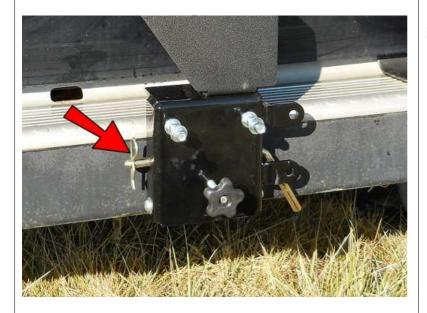
Secure the 3/8 Screws with 5/16" Washers and 3/8" Lock Nuts as shown.

It is recommended that at this point you double check that ALL connections are tight.

Replace your spare tire if needed.



To secure the JM4 in the upright position, support the top with your left hand and insert the 7" Pin into the side hole with your right hand, with the Pin handle behind the lock tab.



Insert the Pin Clip into the 7" Pin.



Turn the Star Knob about a 1/2 turn to tighten it up. The only function of this is to keep the JM4 from rattling so it does not have to be super tight, just snug.

To fold down the JM4-RP2 do the previous 3 steps in reverse order. MAKE SURE to SUPPORT the top of the Rotopax Cans when you remove the 7" Pin and slowly let it fold down as they will be somewhat heavy.



Attach whichever Rotopax Mount you purchased separately to the RP2 in the LOWER holes as shown. There is no need to use the round plate that may have been provided with the Rotopax Mount, just attach it directly to the RP2 with the hardware that came with the Rotopax Mount.



Mount your Rotopax cans.

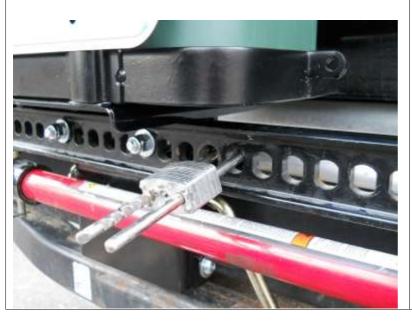
Note: Your license plate will need to be relocated so that it is not blocked by the Rotopax cans.



To install the Jack, place it onto the 3/8" Screws and secure with 5/16" Washers and 3/8" Lock Nuts as shown. You may want to install it off center to better balance the weight. Also note the base plate has been removed to clear the bumper and the "jaw" has been installed pointed up for best ground clearance.



To lock the JM4-RP2 from being able to be opened run a lock around the pin and through the lower lock tab. A wider lock such as the Master No. 160 works perfect here.



To lock the jack onto the JM4 use an extended or open shackle lock on the upper lock tab.

That's it!

And remember....Not all who wander are lost!