

TEAMPRP

LMT TWIN MOTOR CONVERSION KIT
INSTRUCTION MANUAL

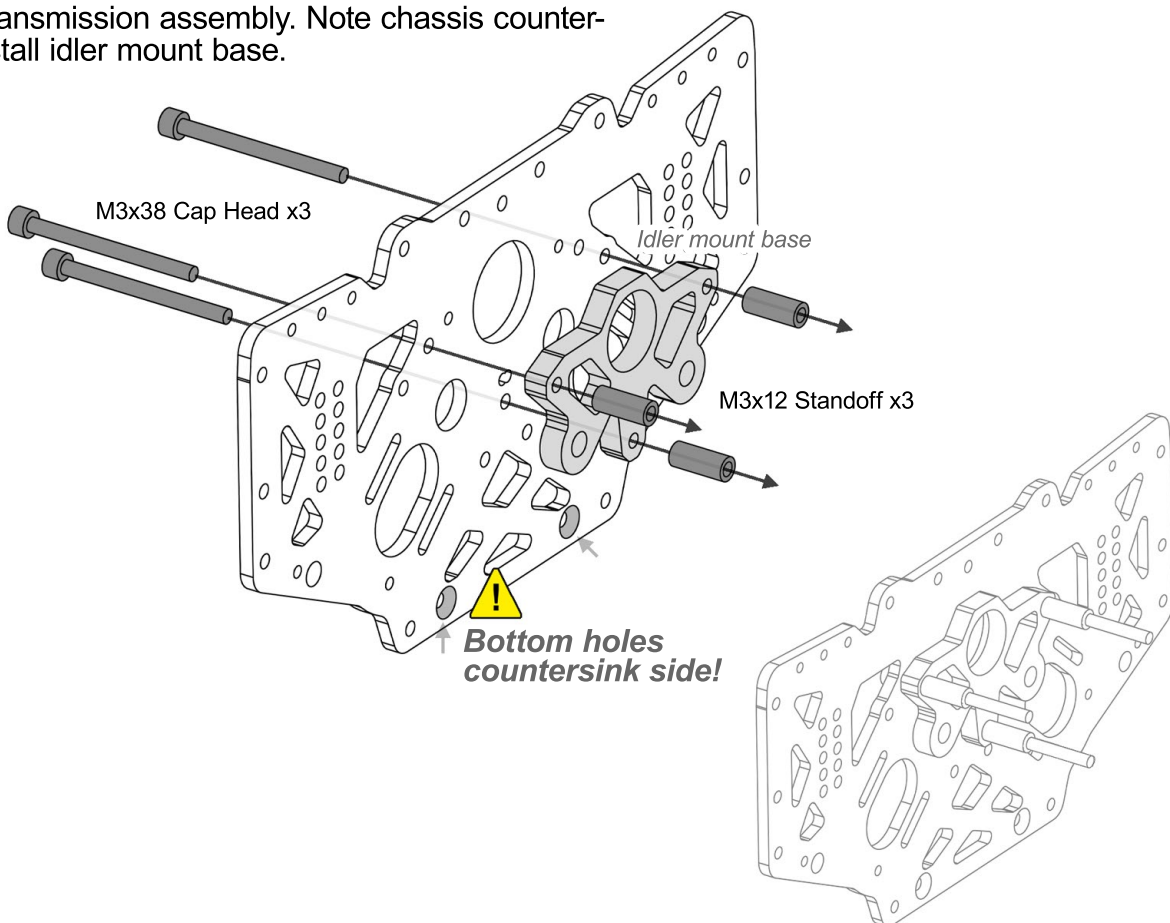
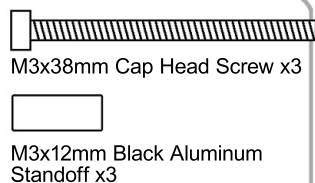


SHREDDER
TRANSMISSION



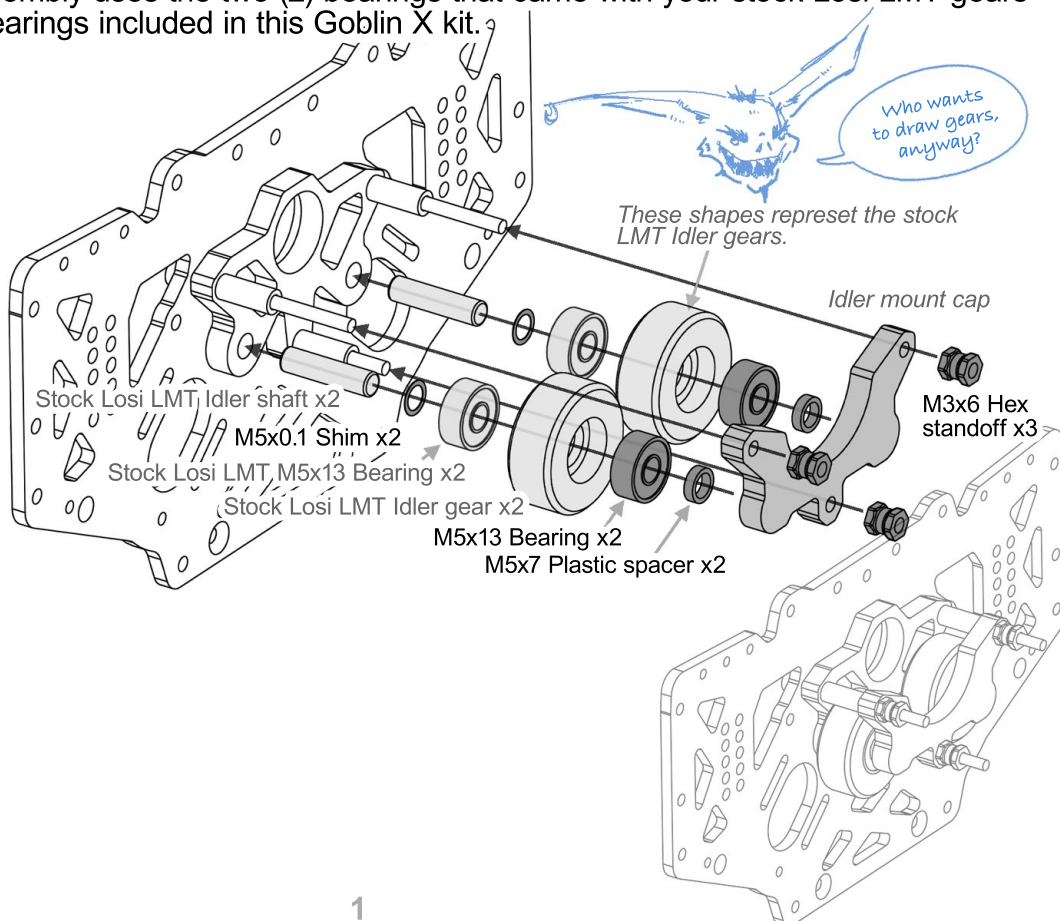
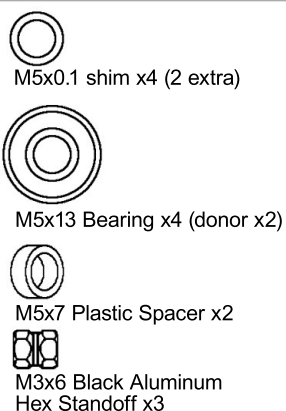
1

Motor-side transmission assembly. Note chassis countersink side! Install idler mount base.





2

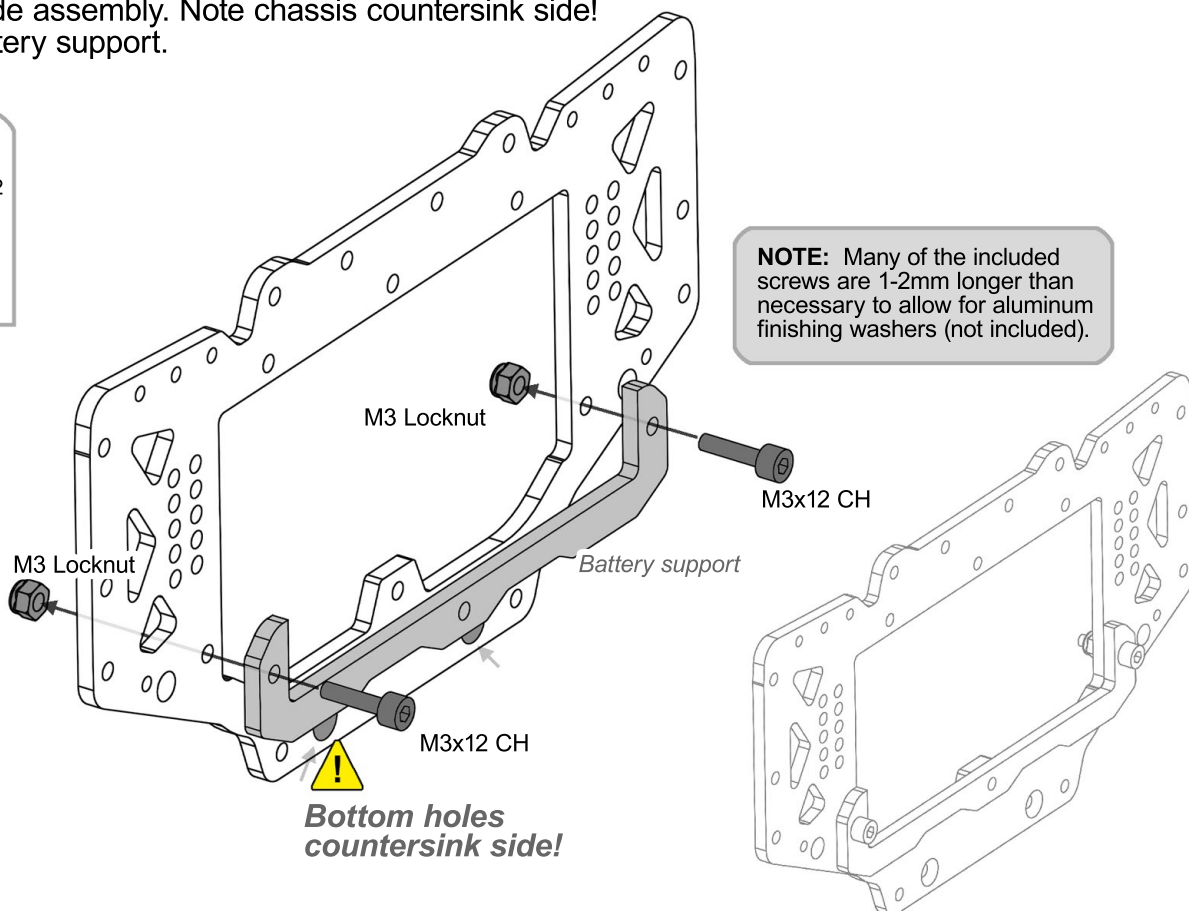
Install idler gear assembly. Requires two (2) stock Losi LMT Idler gears and shafts Losi part #LOS242044. Assembly uses the two (2) bearings that came with your stock Losi LMT gears plus the two (2) bearings included in this Goblin X kit.



3







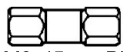
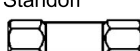
Battery side assembly. Note chassis countersink side!
Install Battery support.

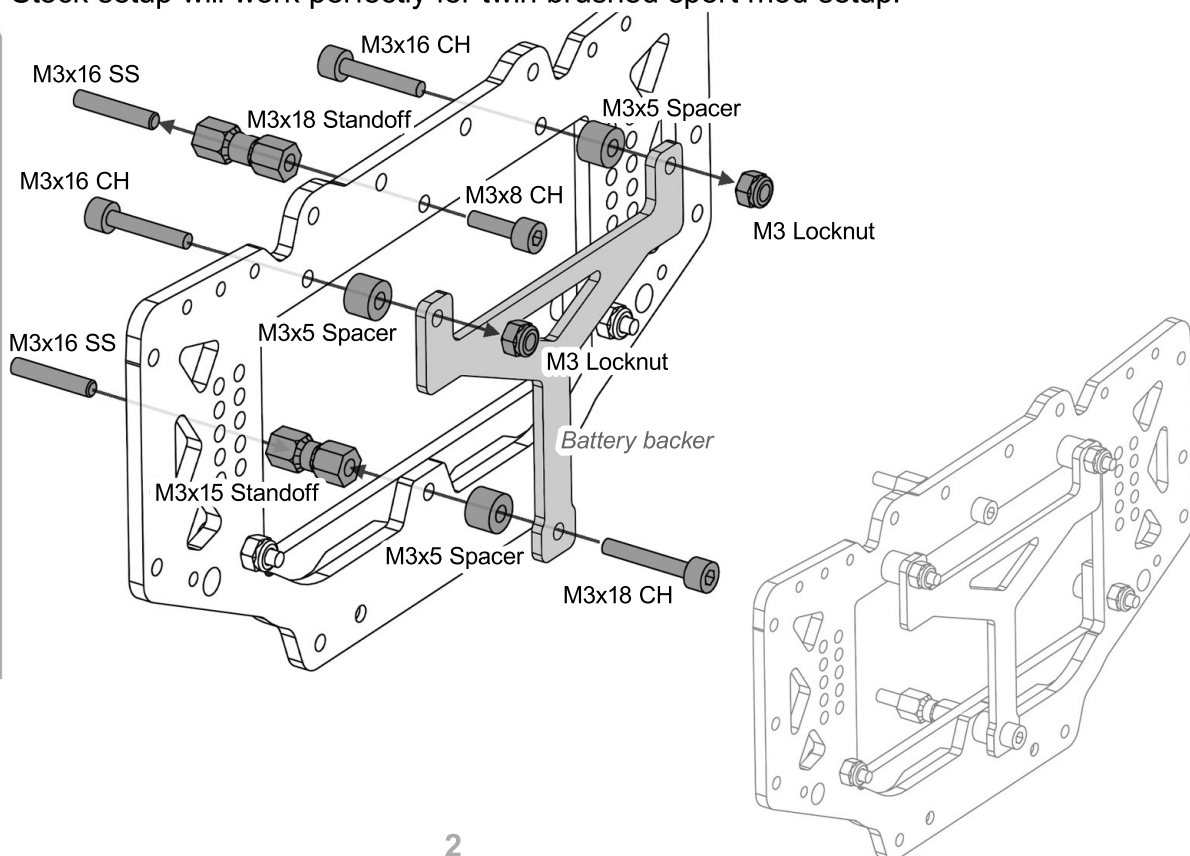
-  M3x12mm Cap Head Screw x2
-  M3 Locknut x2



4

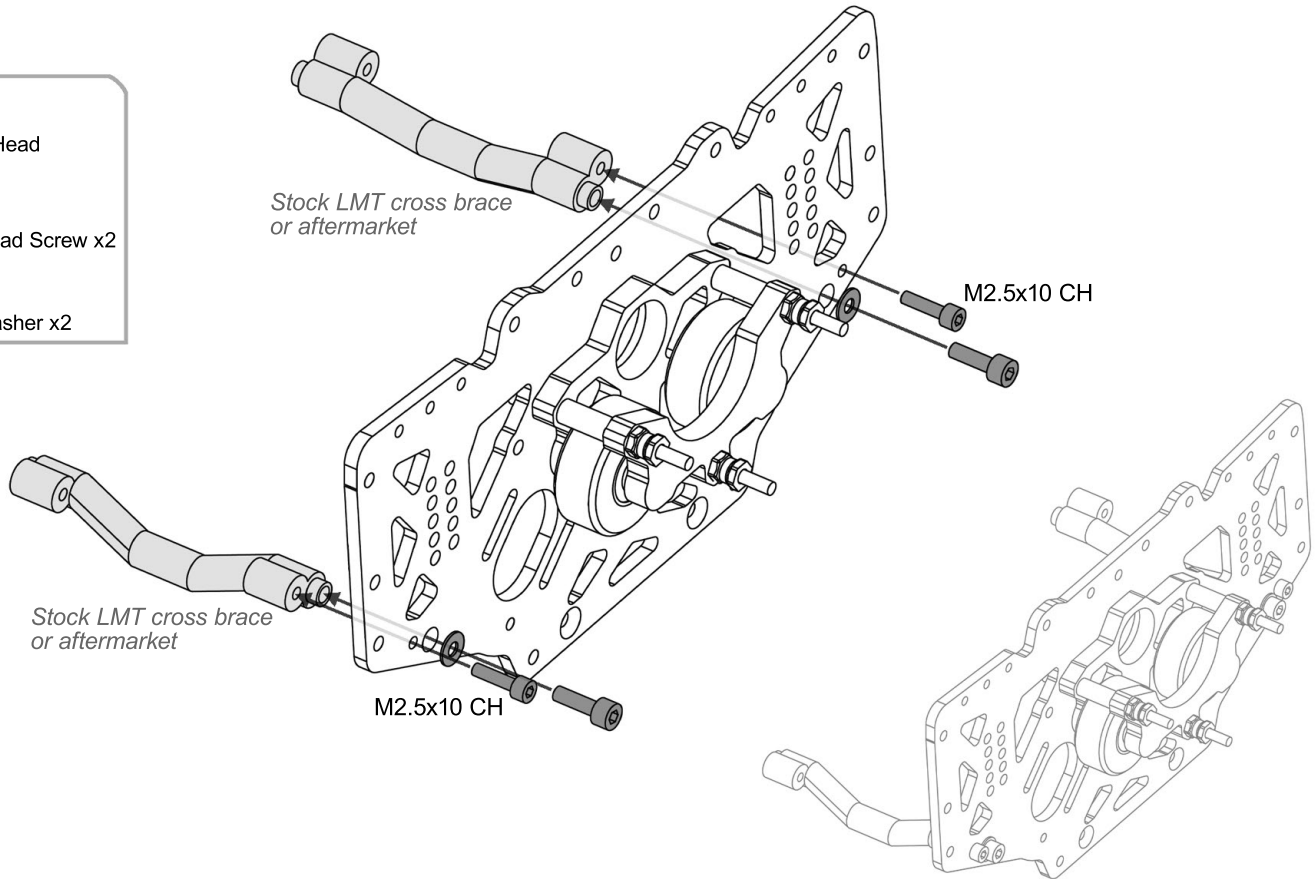
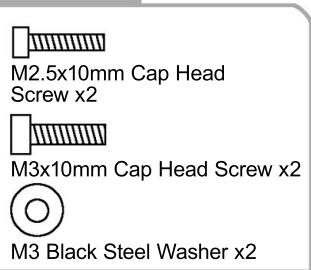
Rotate chassis plate to the back side and install battery backer and battery strap posts/standoffs. Backer plate and standoffs can be adjusted with the use of different spacers and screws. Determine your required custom setup after your motors are installed. Extra screws and spacers sold separately. Stock setup will work perfectly for twin brushed sport mod setup.

-  M3x8mm Cap Head Screw
-  M3x16mm Cap Head Screw x2
-  M3x18mm Cap Head Screw
-  M3x16mm Set Screw x2
-  M3 Locknut x2
-  M3x5mm Plastic Spacer x3
-  M3x15mm Black Aluminum Standoff
-  M3x18mm Black Aluminum Standoff



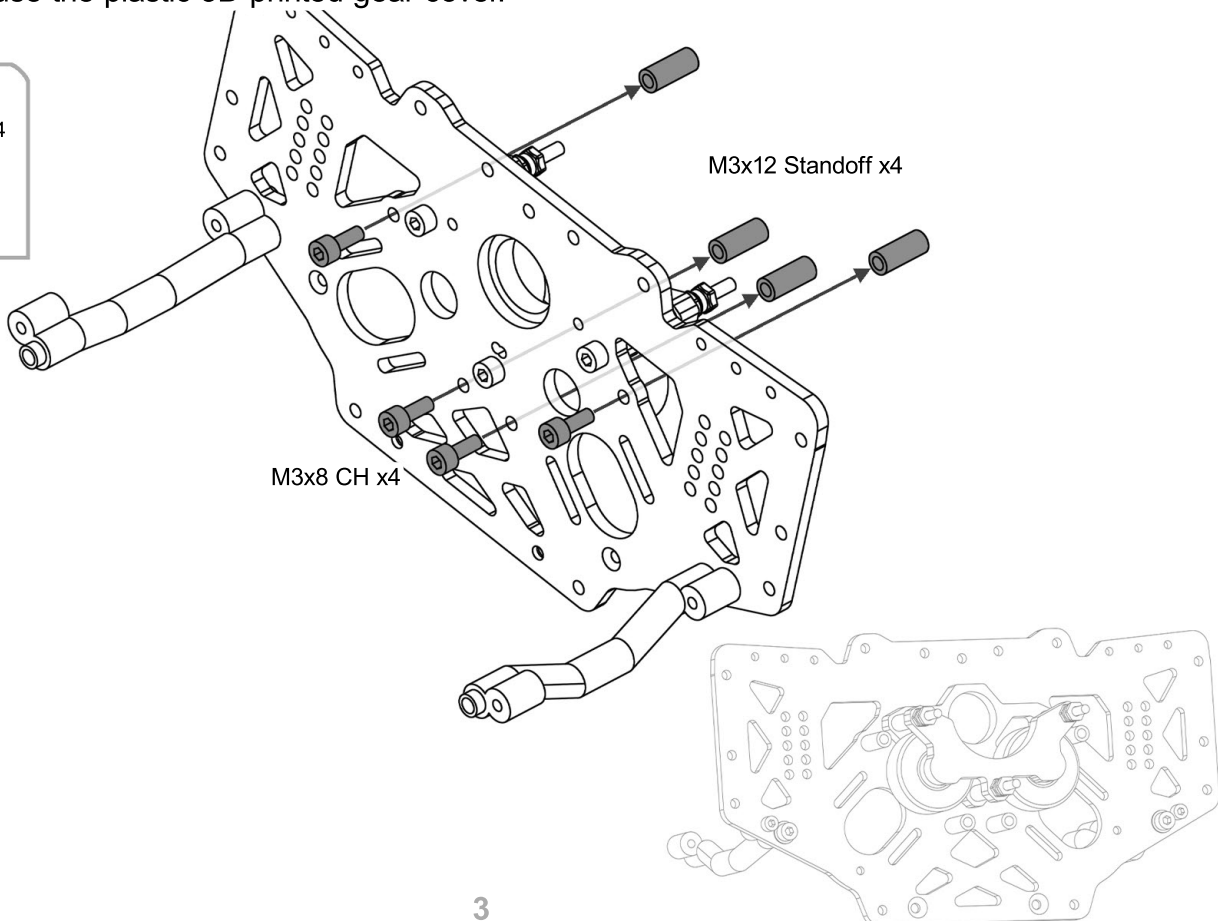
5

Motor side chassis plate cross brace install.



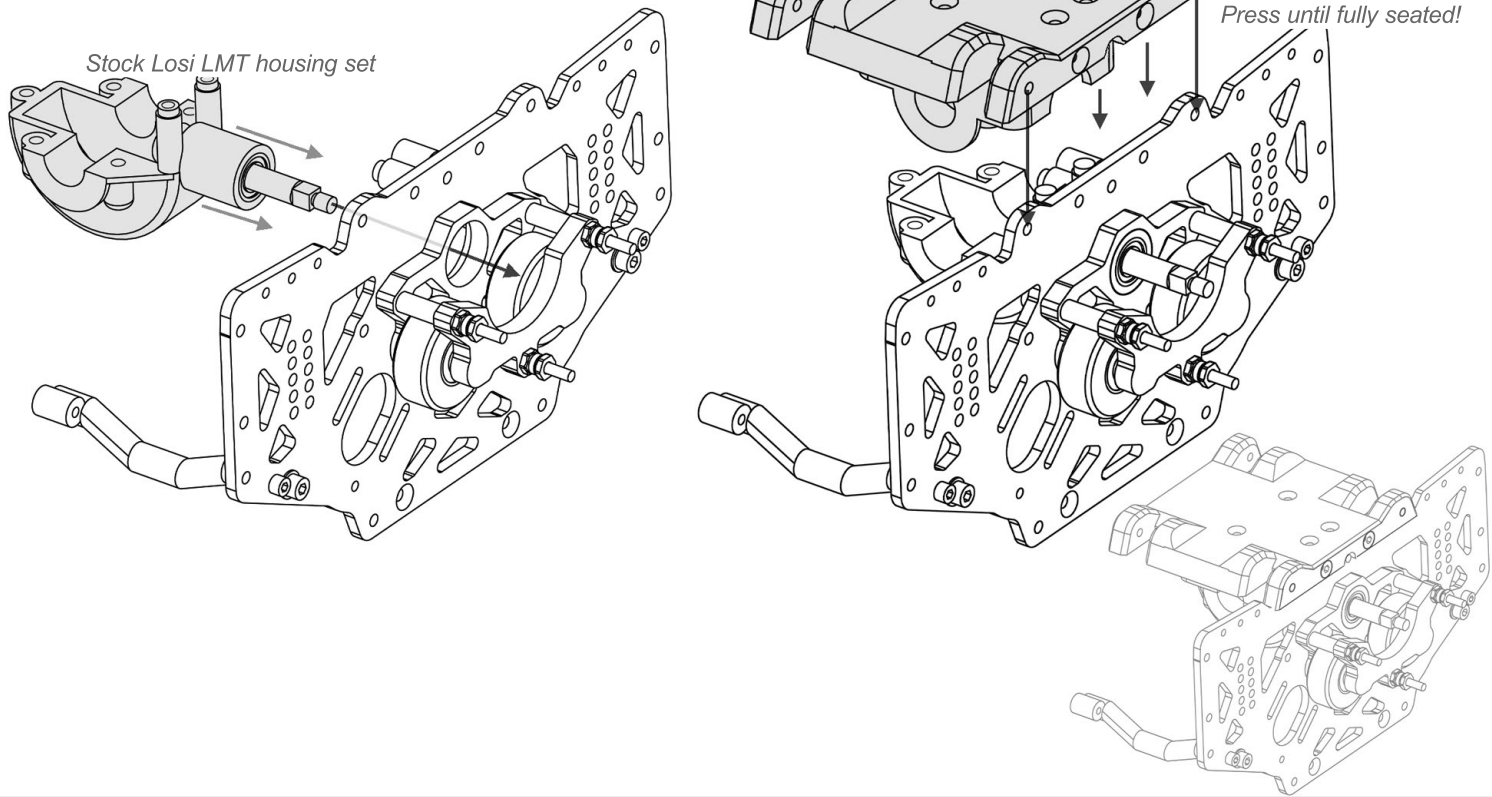
6

OPTIONAL: Attach M3x12mm standoffs x4 if you are going to use the plastic 3D printed gear cover.



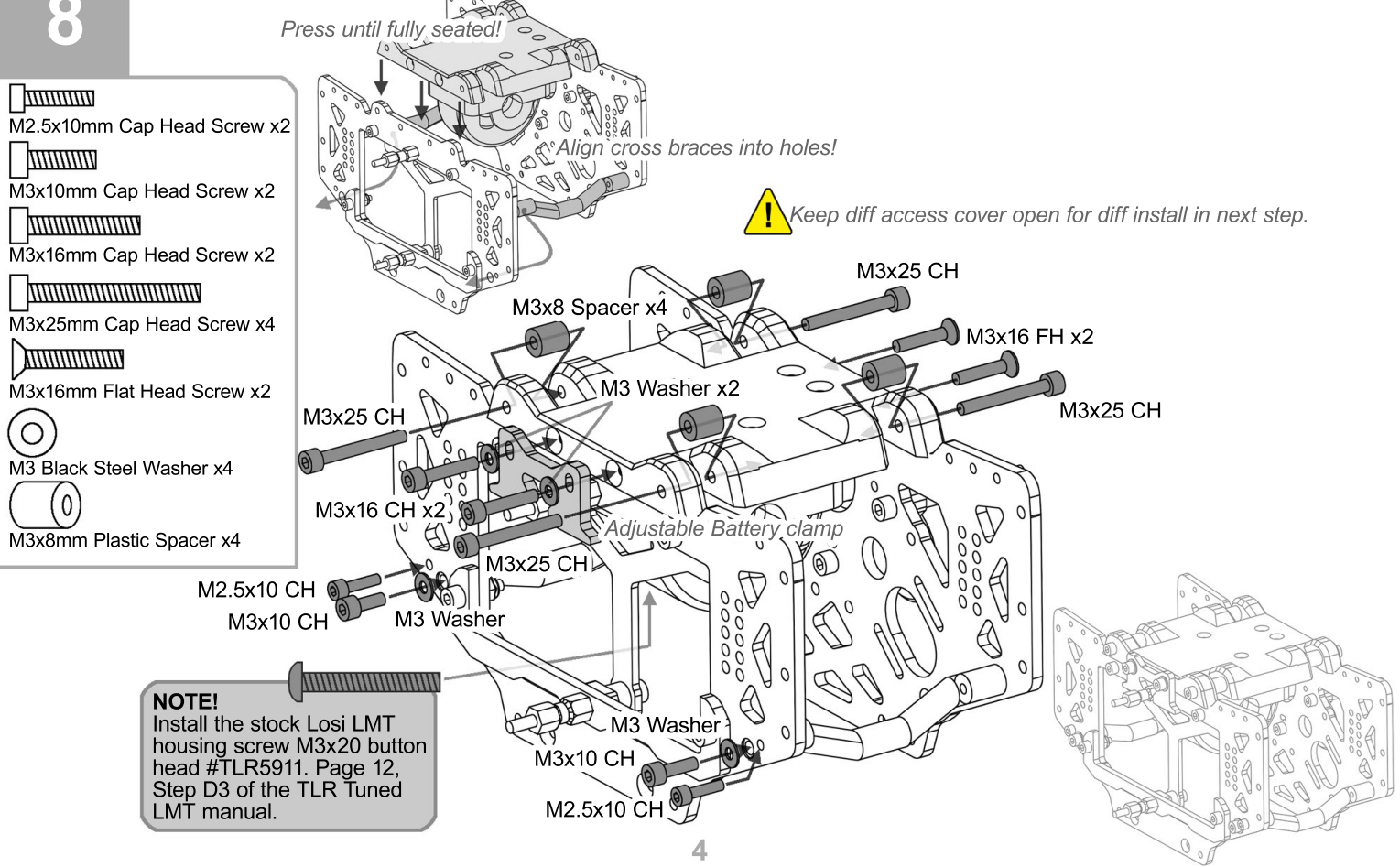
7

Mount Losi LMT gearbox housing set onto motor side chassis plate. Check Losi instructions for #LOS242043 pinion gear assembly.



8

Mount battery side chassis plate and secure Losi LMT gearbox housing to chassis plates.



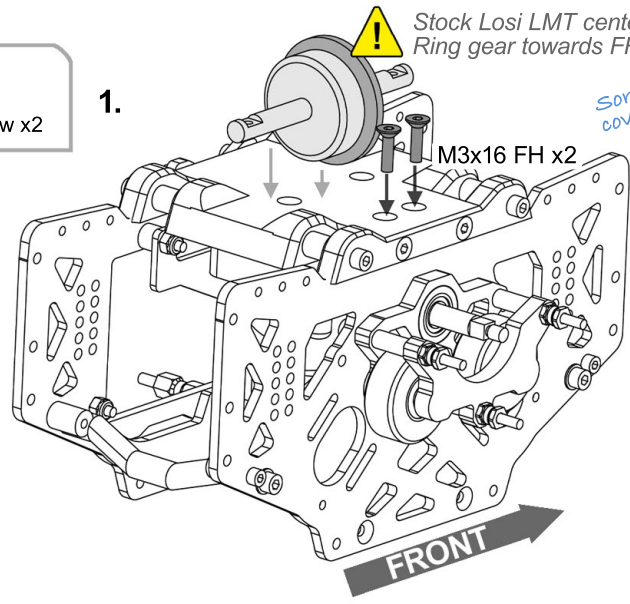
9

1. With the #LOS242032 housing cover removed, install the center diff gear with ring gear towards the front of the truck. 2. See TLR Tuned LMT manual D15 step 2 page 19.

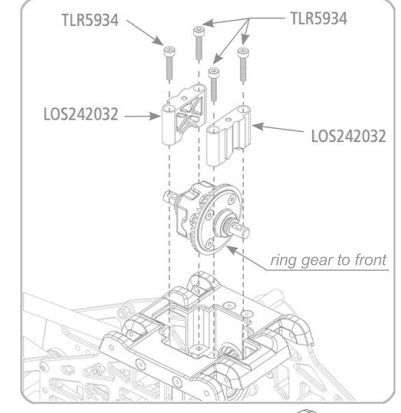


M3x16mm Flat Head Screw x2

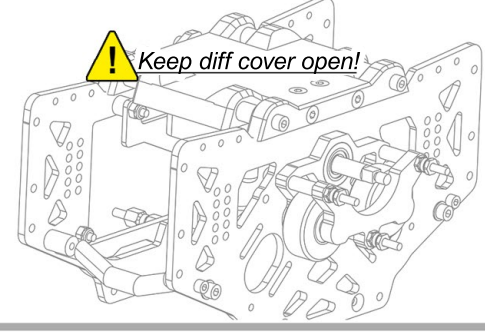
1.



2. TLR Tuned LMT manual D15 step 2 page 19

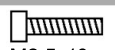


Keep diff cover open!



10

1. Mount the stock Losi LMT cush gear and cush gear cap. 2. Attach electronics tray assembly.



M2.5x10mm Cap Head Screw x4



M2.5 Locknut x4



M3 Locknut x3



M4x12mm Flanged Bearing

1.

Don't forget the e-clip that goes here!

Ok, by now you knew I wasn't going to draw the cush gear either, right?

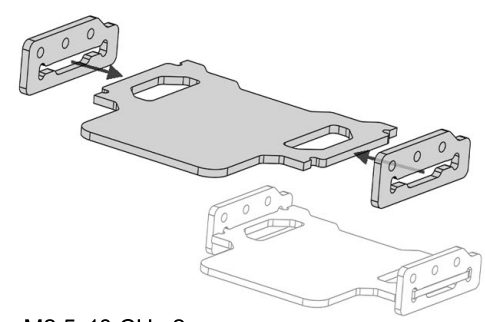
Stock Losi LMT cush gear #LOS224044 & stock e-clips

M4x12 Flanged Bearing

M3 Locknut x3

cush gear cap

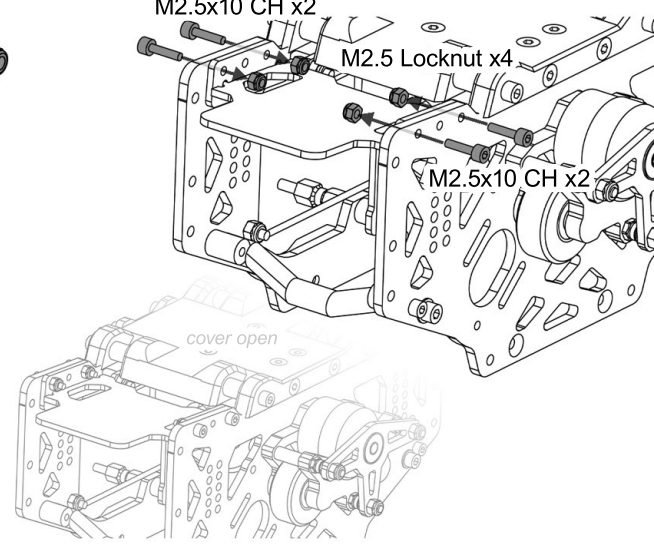
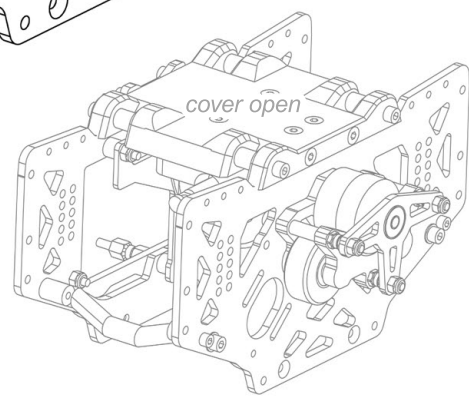
2.



M2.5x10 CH x2

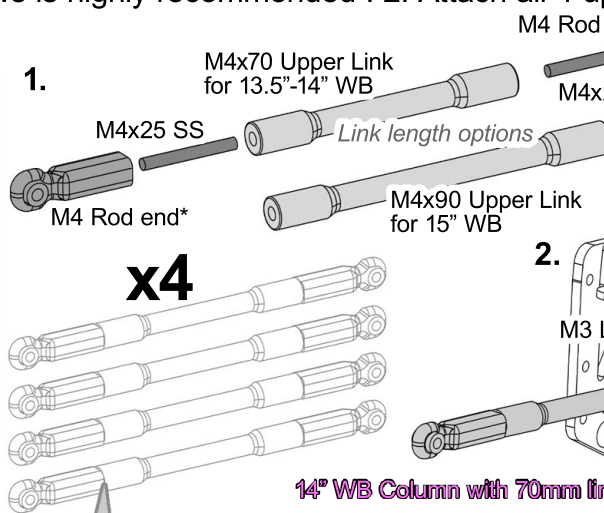
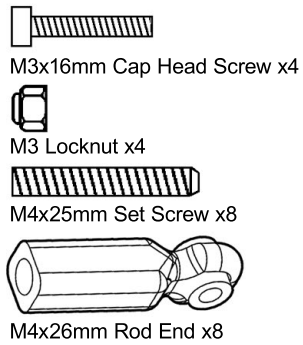
M2.5 Locknut x4

M2.5x10 CH x2



11

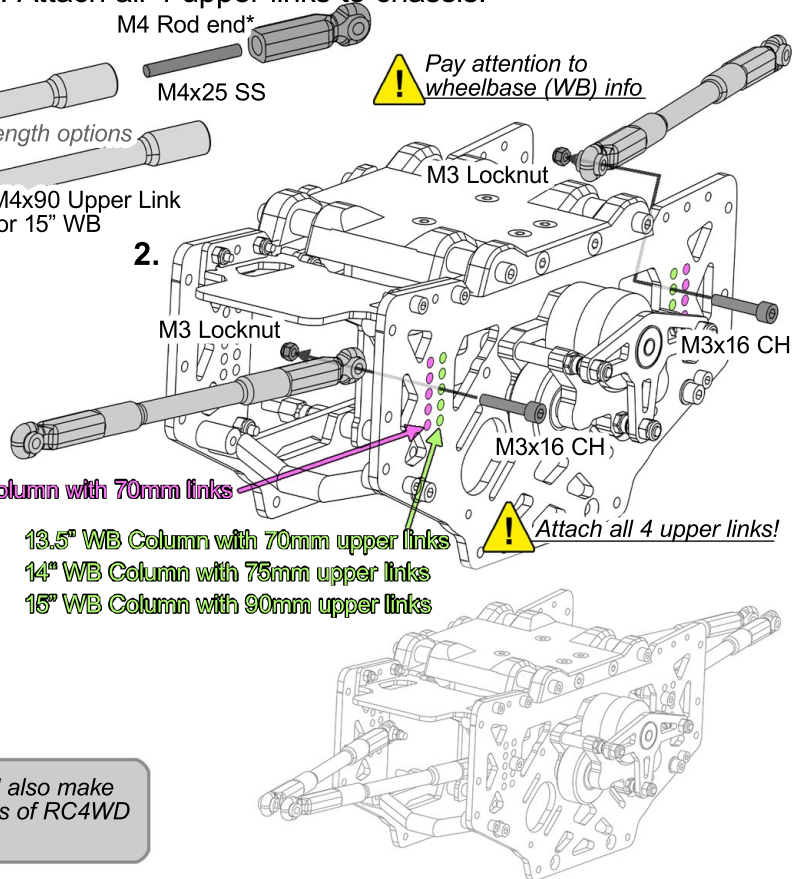
1. Build 4 upper links. RC4WD rod ends are TIGHT! Tapping them or using grease/chapstick on the set screws is highly recommended*. 2. Attach all 4 upper links to chassis.



NOTE: Don't forget you can add M4 nuts or spacers to adjust 4-link lengths. And you may also order 75mm Upper Links for a longer link with a 14" WB or a custom WB build. Just make sure you know your caster will change with axle tilt (clock) and adjust or swap your lower links lengths for your setup choices.

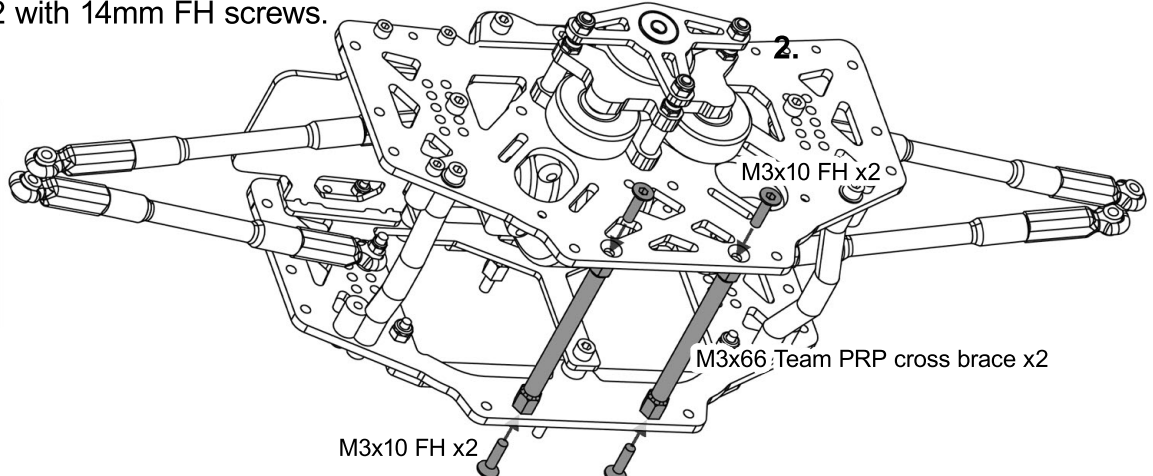
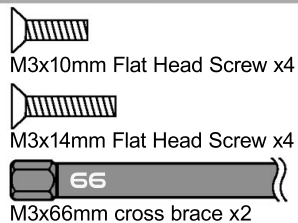
*

RC4WD Rod ends are 26mm from end to eye. Traxxas and RPM also make the same size rod ends and may be used. Or buy some extra sets of RC4WD rod ends in bags of 20pcs from RC4WD or other hobby retailers.

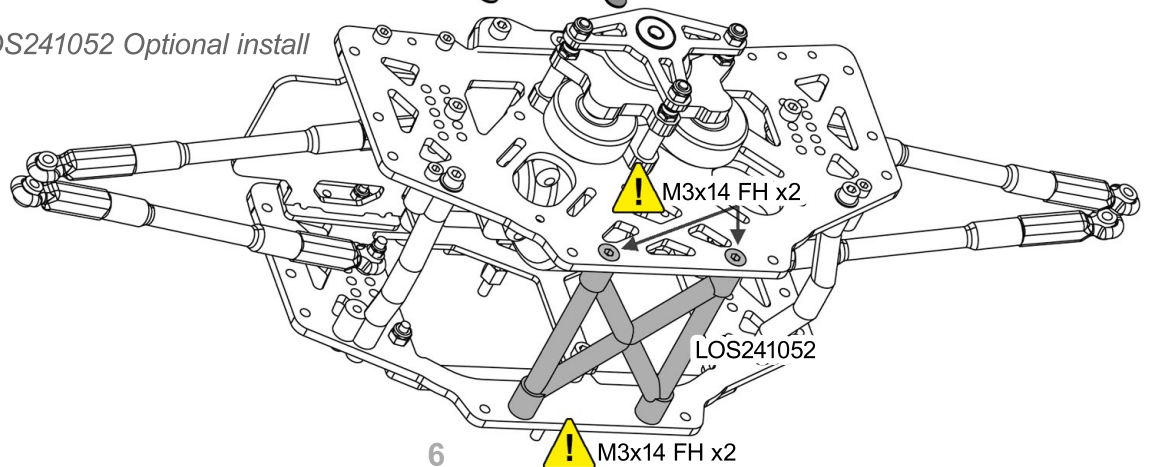


12

Attach two (2) 66mm cross braces with 10mm FH screws **or** the Losi LMT 1.0 wheelie bar brace #LOS241052 with 14mm FH screws.



LOS241052 Optional install



13

Attach the lower links from your **Losi LMT donor kit or custom setup**. Lower links are not included with the Goblin X kit as you generally use the links from the donor kit you are converting from. **See link notes below.**



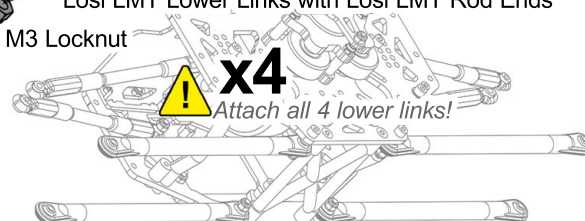
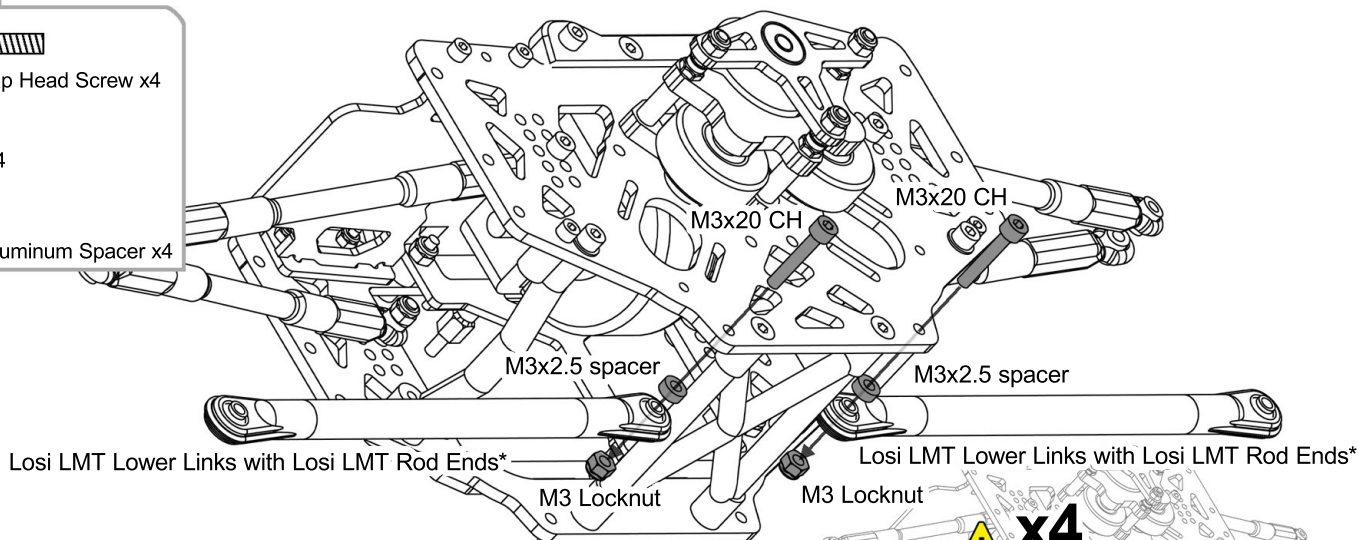
M3x20mm Cap Head Screw x4



M3 Locknut x4



M3x2.5mm Aluminum Spacer x4



! *Lower Link recommendations (must match your upper link WB choice):

13.5" wheelbase: LMT 1.0 RTR Digger trucks lower links, Team PRP 90mm links, Team PRP Ogre short trailing arms.

14" wheelbase: Team PRP Ogre long trailing arms or lower links of around 151mm eye to eye (for ex., 98-100mm link with long rod ends).

15" wheelbase: Team PRP Ogre 15" trailing arms, Losi LMT TLR Tuned trailing arms, Mega Truck lower links or LMT 2.0 lower links.

Actual WB will vary depending on toe settings, ride height and axle clock.

14

OPTIONAL: If you are using it, mount the 3d printed gear cover. You may leave the **gear cover caps off** until you mount motors in a later step.



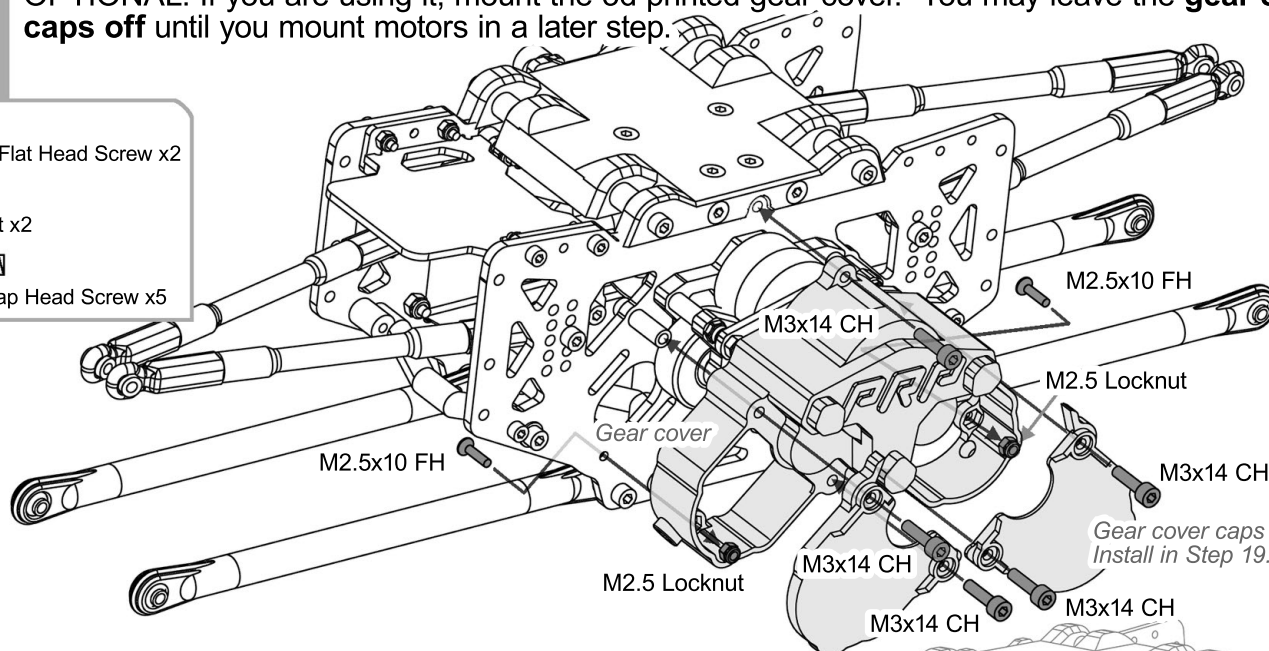
M2.5x10mm Flat Head Screw x2



M2.5 Locknut x2



M3x14mm Cap Head Screw x5

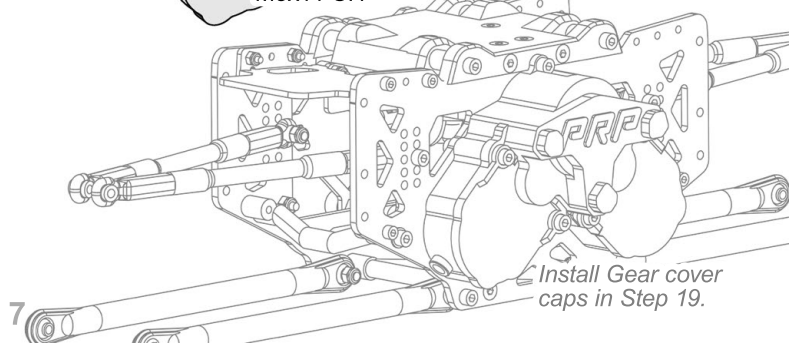


Gear cover caps
Install in Step 19.



NOTE: Gear cover 3D print file is also available on the shop to download and print your own covers.

Scan the code to visit the 3D print files page.

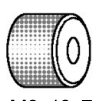


Install Gear cover
caps in Step 19.

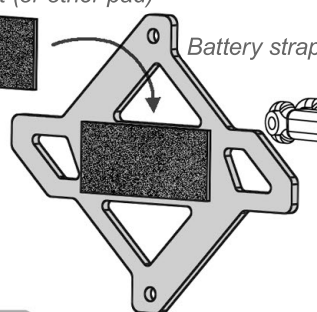
15

Apply adhesive-backed felt, foam or fuzzy side of velcro (**felt included**) to the back side of PRP Logo battery strap. Mount battery strap with thumb nuts.

adhesive-backed felt (or other pad)



M3x10x7mm Anodized Aluminum thumb nut x2

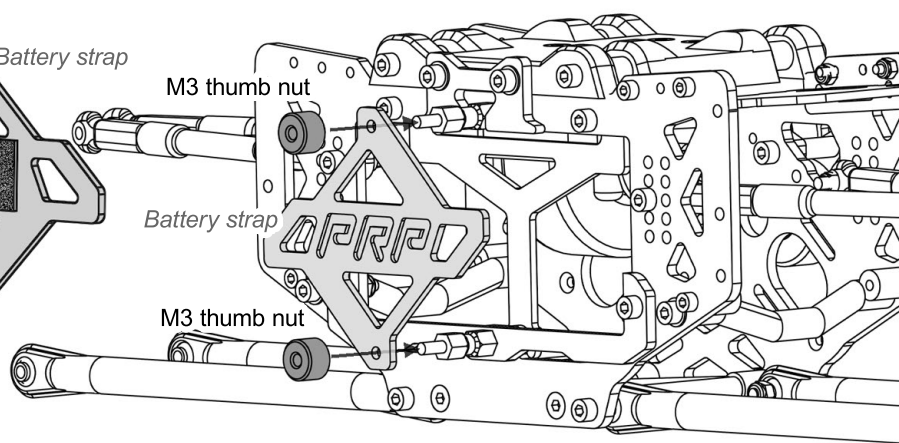


Battery strap

M3 thumb nut

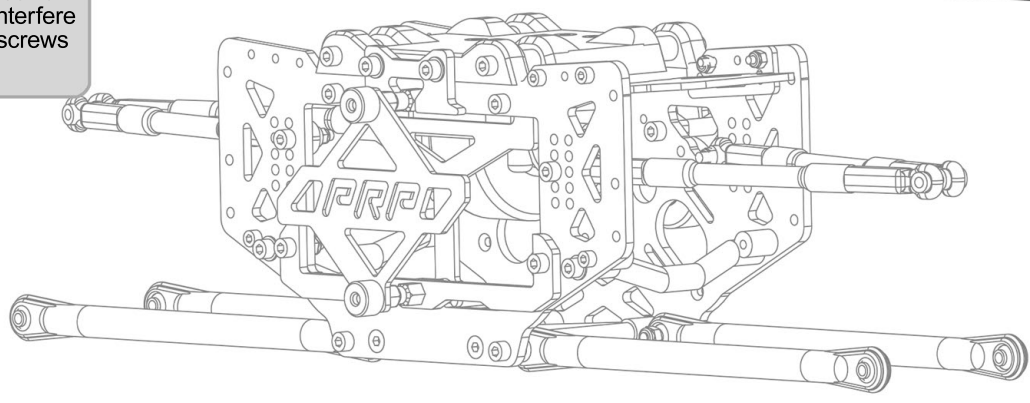
Battery strap

M3 thumb nut



Adjustable battery compartment:

Battery backer plate and strap assembly can be adjusted by using various lengths of spacers and screws to find the exact mounting position required for the battery mounting not to interfere with your motor choice. Spacers and screws sold separately.

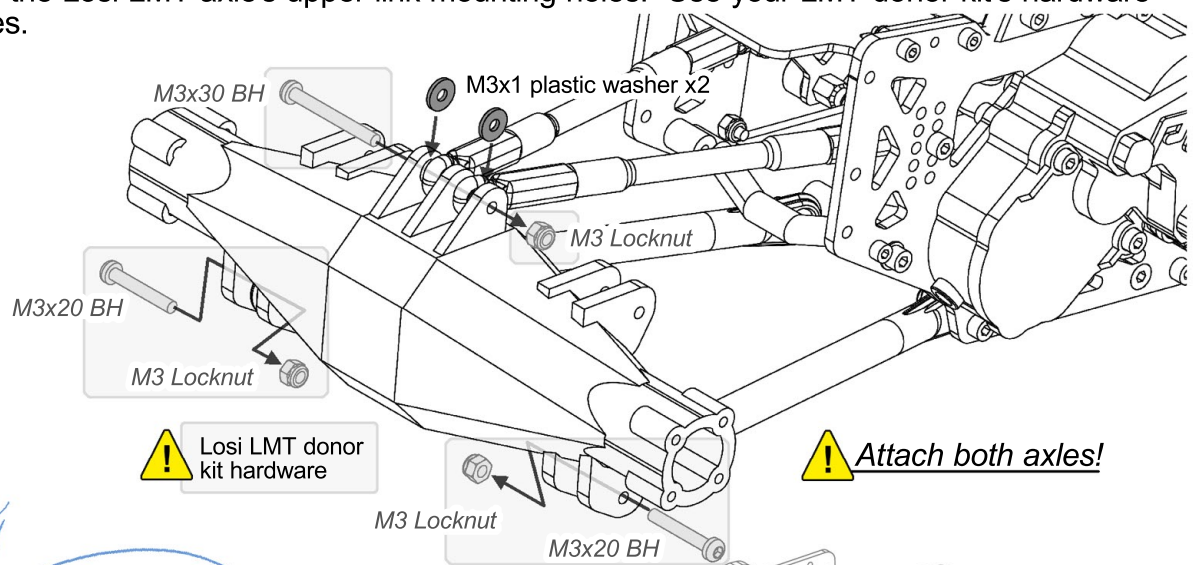


16

Attach 4-links to your Losi LMT Axles. Upper Links require spacers between the RC4WD rod end pivot ball and the Losi LMT axle's upper link mounting holes. Use your LMT donor kit's hardware to attach axles.



M3x8x1mm plastic spacer x4



M3x30 BH

M3x1 plastic washer x2

M3 Locknut

M3x20 BH

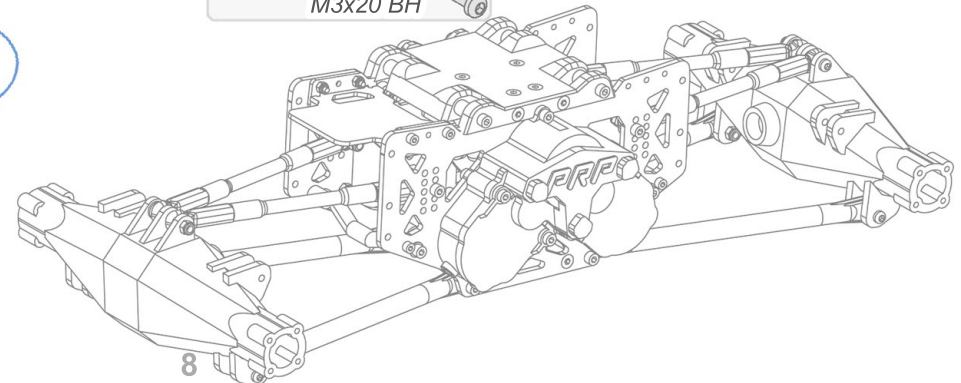
M3 Locknut

! Losi LMT donor kit hardware

M3 Locknut

M3x20 BH


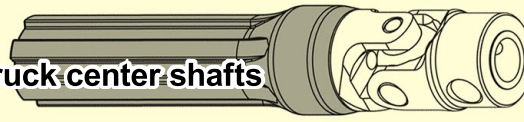
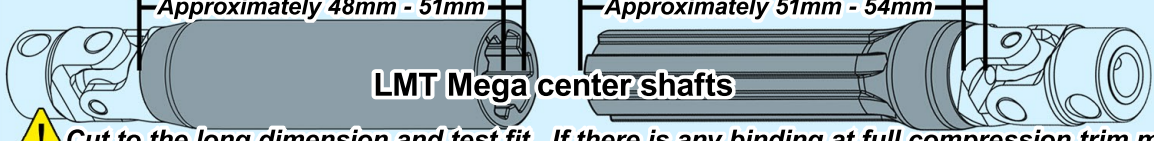
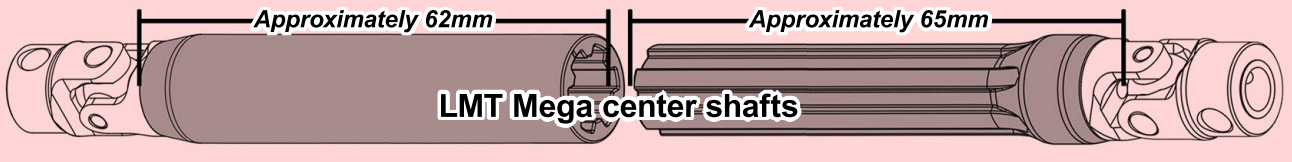
! Attach both axles!



17

For 13.5" Wheelbase builds you may use the stock Losi LMT 1.0 RTR short center drive shafts #LOS242046. For longer WB setups you will need to cut Losi LMT Mega center drive shafts #LOS242057 down to length. See specific trim specifications below. Take care and test fit with full suspension cycle. If you feel you cut too much thankfully replacement plastic drive shafts (#LOS242057) are only \$11.99.

Wheelbase trim specifications


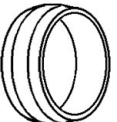
13.5" WB (LMT 1.0 Diggers/ Ogre short arms)	<div style="display: flex; justify-content: space-around;"> <div style="text-align: center;"> <p>No trim keep full length</p>  <p>LMT 1.0 RTR Digger truck center shafts</p> </div> <div style="text-align: center;"> <p>No trim keep full length</p>  </div> </div>
14" WB (Ogre long arms)	<div style="text-align: center;"> <p>Approximately 48mm - 51mm Approximately 51mm - 54mm</p>  <p>LMT Mega center shafts</p> <p>! Cut to the long dimension and test fit. If there is any binding at full compression trim more.</p> </div>
15" WB (LMT 2.0/ TLR/Mega/ Ogre 15")	<div style="text-align: center;"> <p>Approximately 62mm Approximately 65mm</p>  <p>LMT Mega center shafts</p> </div>

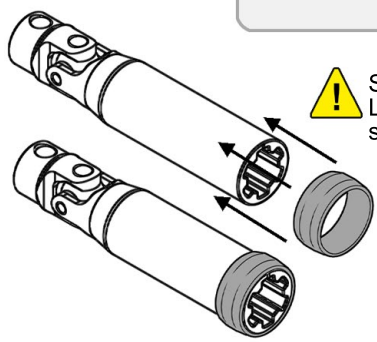
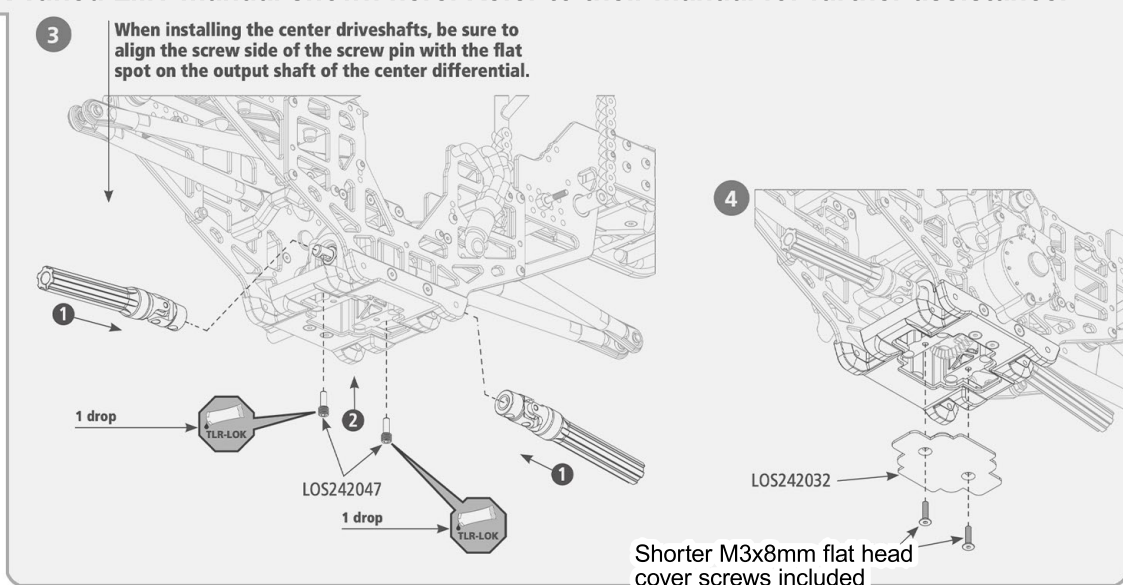
! Finish the trim job:
Be sure to clean up the cut as needed for a smooth interface. The shaft should slide very free throughout the entire length of the shafts. **There is only one position where the shafts mate perfectly free and smooth.**

18

Refer to TLR Tuned LMT Manual. Attach drive shafts to center diff and axles. Mount the center diff cover.

TLR Tuned LMT manual shown here. Refer to their manual for further assistance.







-  M3x8mm Flat Head Screw x2
-  Shaft Support Ring x2

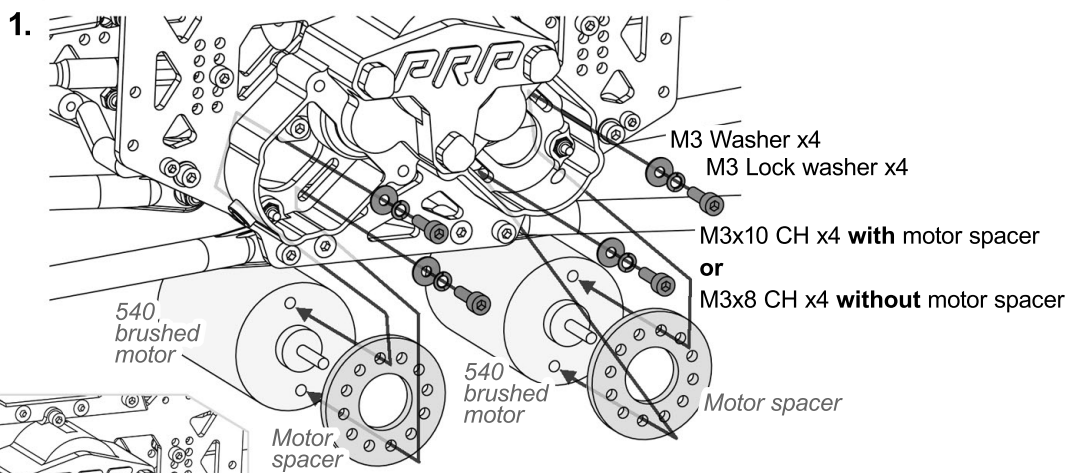


! Support Ring is recommended for 13.5" WB when using the LMT 1.0 short center shafts. Longer shafts do not require support. Glue or slightly crimp ring into place ensuring free shaft movement.

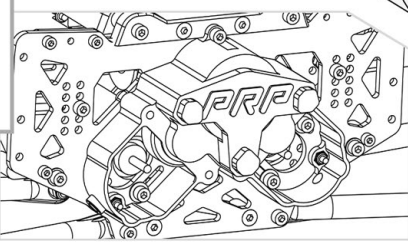
19

Install **brushed** motors with **motor spacers** and **10mm CH screws**. If brushless motors are installed do not use the spacers. Use M3x8mm CH screws without motor spacers.

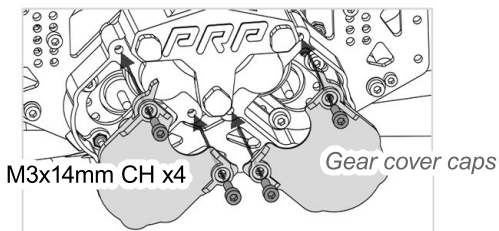
-  M3x8mm Cap Head Screw x4
-  M3x10mm Cap Head Screw x4
-  M3x14mm Cap Head Screw x4
-  M3 Black Steel Washer x4
-  M3 Lock Washer x4
-  M5 Rubber Plug x2



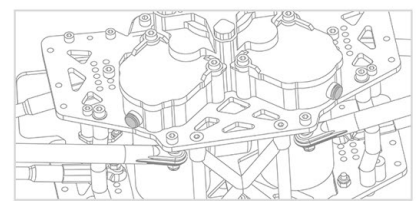
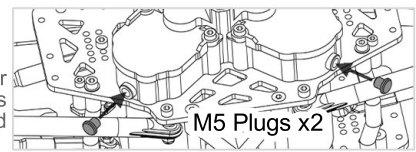
2. Install pinions and set mesh. You're a pro. You don't need drawings of pinions.



3. Mount gear cover caps.

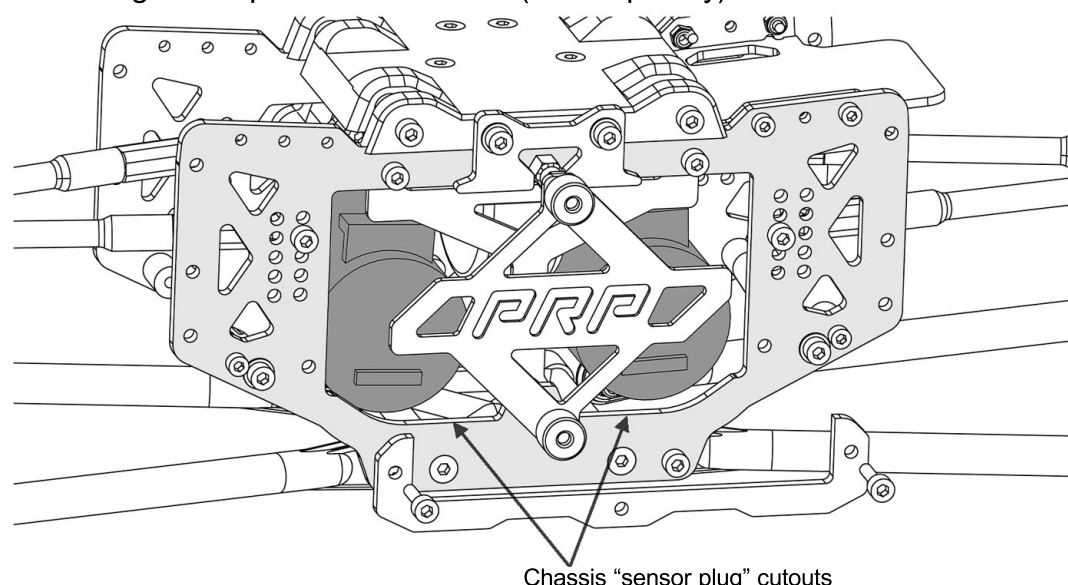


4. Plug the holes!
Use the rubber plugs or you may also tap the holes for M5x6mm button head screws (sold separately).



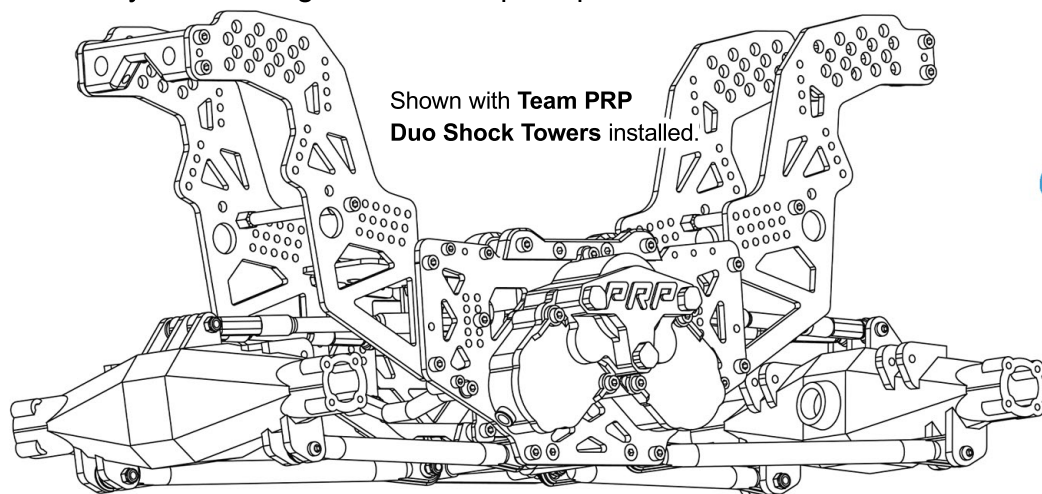
20

The Goblin X chassis features sensed motor chassis cutouts to assist in sensor wire space. If your motor's sensor plug cannot be rotated into the cutout space check to see if you can spin the end caps of your motor to change the angles of the mounting screws which may allow the sensor plugs to align with the cutouts. Do not forget you can move the battery out too if you use different lengths of spacers and screws (sold separately).



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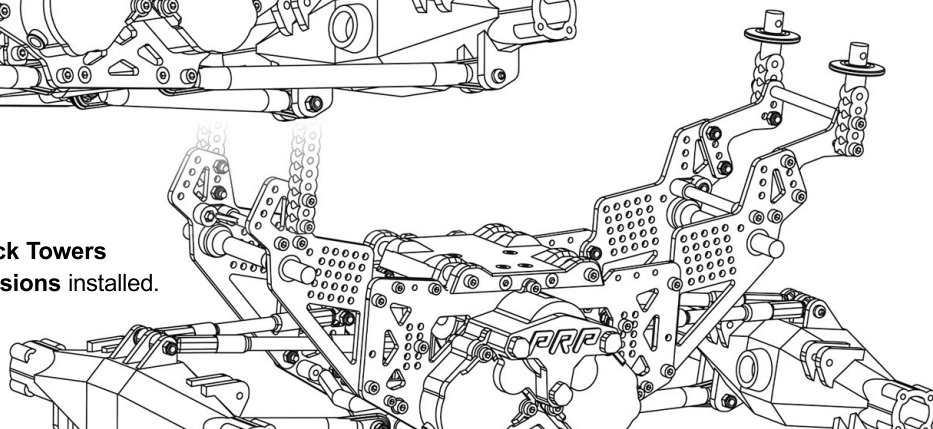
Now simply refer to the TLR Tuned LMT manual (PDF is available online from Team Losi) for instructions on how to mount the outer shock towers, shocks, etc., using the parts and hardware from your donor Losi LMT kit. Use specific parts instructions from the Team PRP support page if you are using Team PRP option parts.



Team PRP Shock Tower Options available on the shop!

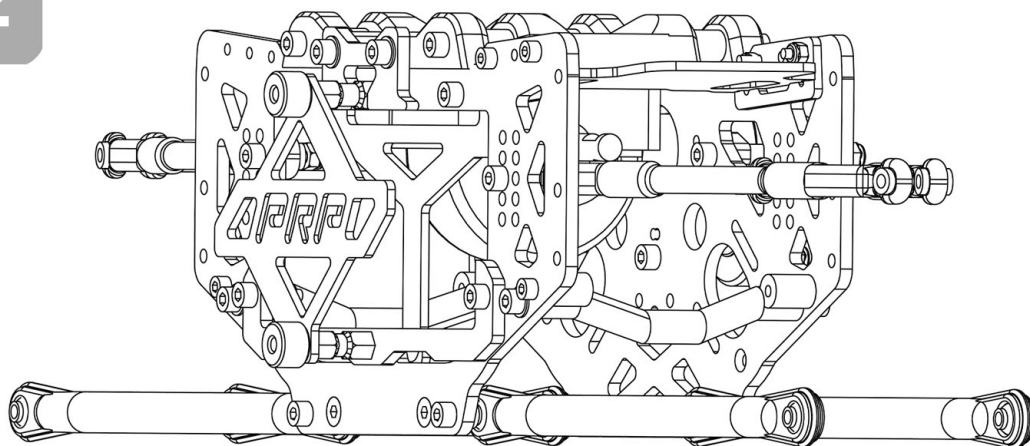


Shown with **Team PRP STL Shock Towers** and **STL Front Body Post Extensions** installed.



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Congratulations on your new Goblin X build! Now get out there and shred the competition!



Available options from Team PRP:

ShreddeR Sport Mod Motors
Duo Shock Towers
STL Shock Towers
Titan Caster Blocks
Steering Limiters
Titan Steering Link
FS Drag Link
Axle weight Mounts
SOACAPs
Servo Spacer
Visit the shop for more!

If you are installing Team PRP option parts please download their instruction sheets from the support page:

teamprp.bigcartel.com/support



Thank you for racing with TeamPRP.
The art of R/C!

