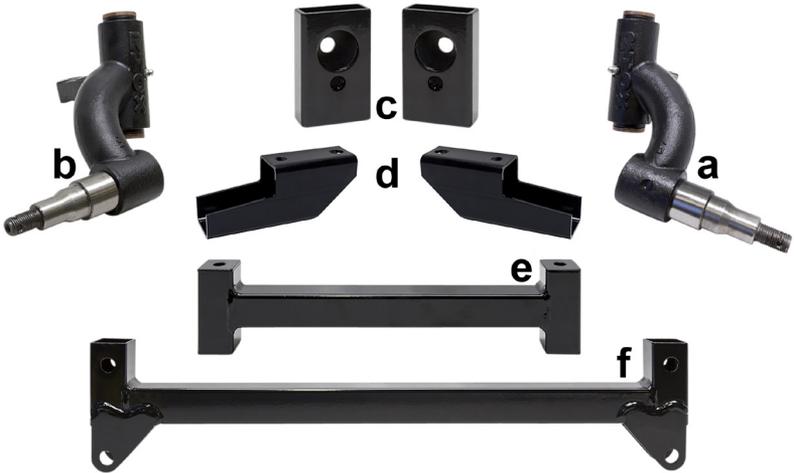




LIFT-313

3" Drop Spindle Lift Kit Yamaha Drive2 Gas EFI, Quietech EFI and Electric AC Drive with Independent Rear Suspension Installation Instructions

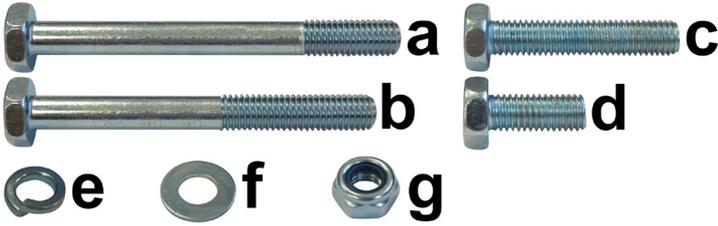


Contents of Kit		QTY
a	Driver Side Spindle	1
b	Passenger Side Spindle	1
c	Motor Mount Brackets (Gas EFI and Quietech EFI Only)	2
d	Front Sub Frame Brackets	2
e	Rear Sub Frame Bracket	1
f	Rear U-Bracket	1
g	Box of Hardware (Contents on Next Page)	1

Caution: Please read through the instructions carefully. Installer is responsible for damage if instructions are not followed properly. Extra installers will be helpful in some parts of the installation. Please refer to all torquing specifications on page 2 for installation.

Note: You must install larger tires and wheels once the cart is lifted. Stock wheels will not work. We recommend a 20" tire and a wheel with a minimum of a 1" offset for use on the RHOK Lift Kit.

LIFT-313 Hardware Kit



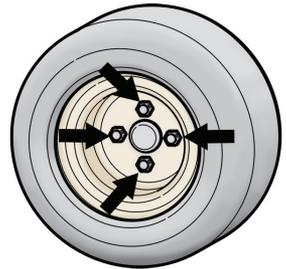
Contents		QTY	Torque Requirements
a	M10-1.25 x 100 Shoulder Hex Head Bolts	2	38.25
b	M10-1.25 x 90 Shoulder Hex Head Bolts	2	38.25
c	M10-1.5 x 50 Hex Head Bolts	2	38.25
d	M10-1.5 x 25 Hex Head Bolts	4	38.25
e	M10 Lock Washers	4	-
f	M10 Flat Washers	14	-
g	M10 Nylock Nuts	4	-

Tools Needed for Installation

- Sockets & Wrenches (12mm, 14mm, 15mm, 17mm, 19mm)
- Flat Head Screwdriver
- Rubber Mallet
- Grease Gun
- Tape Measure
- (2) Small Ratchet Straps
- Safety Glasses

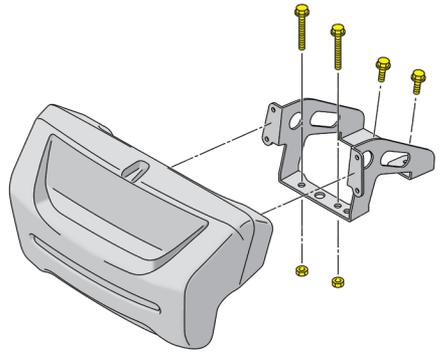
Installation Preparation (Front)

1. Engage parking brake.
2. Turn key OFF.
3. Electric Carts Only: Place Tow/Run Switch in TOW.
4. Chock the back of the rear wheels.
5. Remove the hub caps (if any). Loosen the lug nuts on both of the front wheels but do not remove them.
6. Use a jack to safely lift the front of the cart high enough to accommodate the new tires and wheels. Place (2) jack stands securely under the chassis and remove the jack.
7. Fully remove the (8) front lug nuts, tires and wheels. Discard.

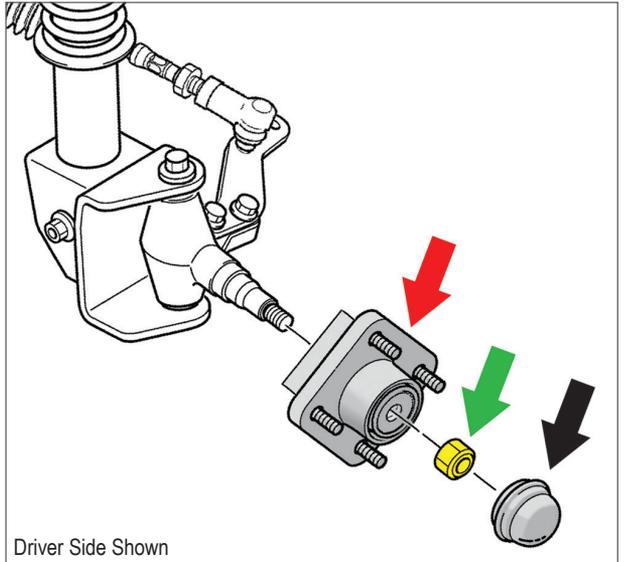


8. Remove the front bumper from chassis. Retain bumper and hardware.

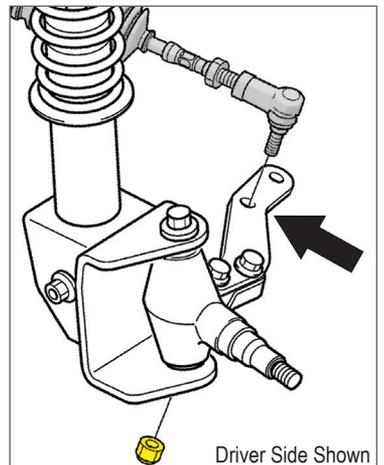
NOTE: Bumper removal is not required for installation but it will provide more room to work.



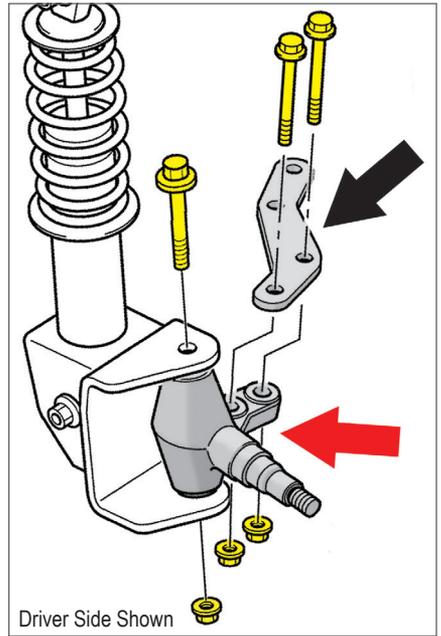
9. Remove dust covers (black arrow), nuts (green arrow) and wheel hubs (red arrow) from both spindles. Retain all components.



10. Disconnect the tie rod ends from the knuckle arms. Retain hardware.



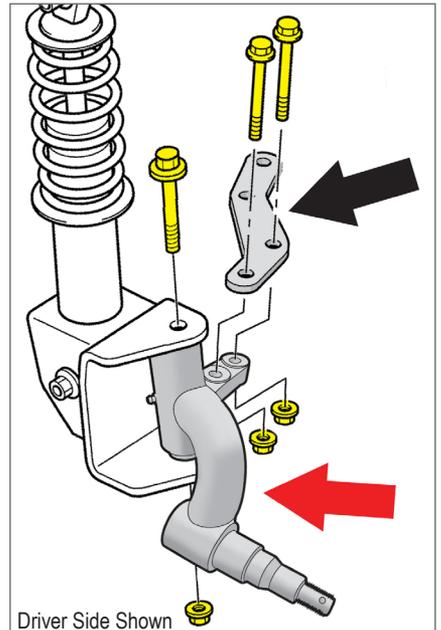
11. Disconnect the knuckle arms from the spindles (black arrow). Retain knuckle arms and hardware.
12. Remove the spindles from the shocks and discard (red arrow). Retain hardware.



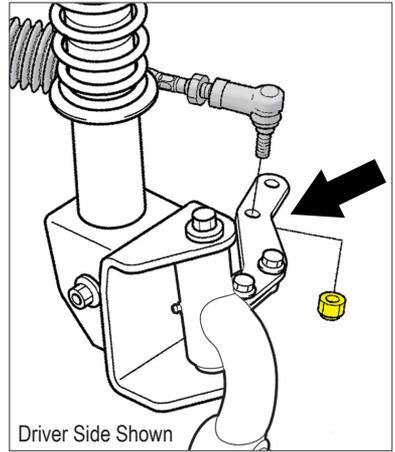
Front Suspension Installation

NOTE: Please refer to page 2 for torquing specifications for included hardware. Please refer to vehicle's maintenance manual for torquing specifications on reused hardware.

1. Install the new spindles (a, b) and original knuckle arms to the shocks using the Original Hardware.
2. Grease the fittings on the spindles using a general purpose automotive grease.



3. Reinstall the tie-rod ends to the knuckle arms using the Original Hardware.
4. Tighten any hardware left loose in this section.
5. Reinstall the hubs that were removed on Page 3 using the Original Hardware. Hand tighten.
6. Reinstall the dust covers.
7. Install the (2) new front tires and wheels. The stock tires and wheels will not work on the newly lifted cart. Fully tighten the lug nuts on both wheels.



NOTE: It is recommended to use at least a 10" wheel with a 1" offset.

8. Once the tires and wheels are fully secure, place the jack under the cart. Remove the jack stands and lower the cart. Remove the chocks behind the rear wheels.

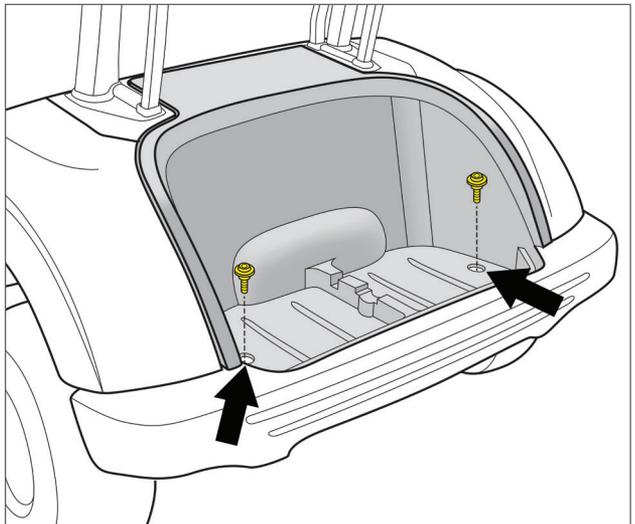
NOTE: The front bumper can remain off until the toe adjustment is made at the end of the installation.

Installation Preparation (Rear)

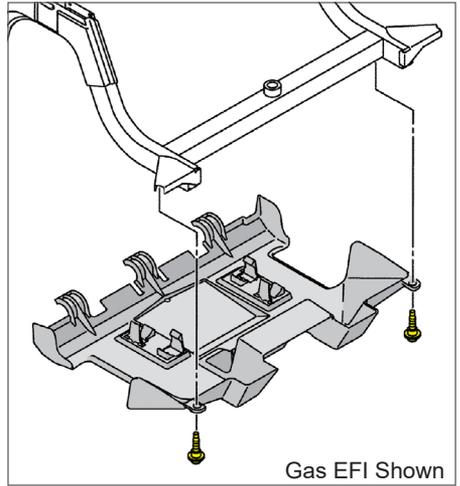
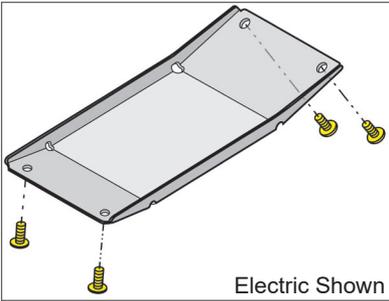
Safety Note: Proper eye and mouth protection should be worn during this section to protect the installer from falling debris when working under the cart.

Note on Images: Some parts may not be shown for visibility purposes.

1. Engage parking brake.
2. Turn key OFF.
3. Electric Carts Only:
Place Tow/Run Switch in TOW.
4. Chock the front of the front wheels.
5. Remove the rear bagwell cover. Retain cover and hardware.
6. Remove the hub caps (if any). Loosen the lug nuts on both rear wheels but do not remove them.



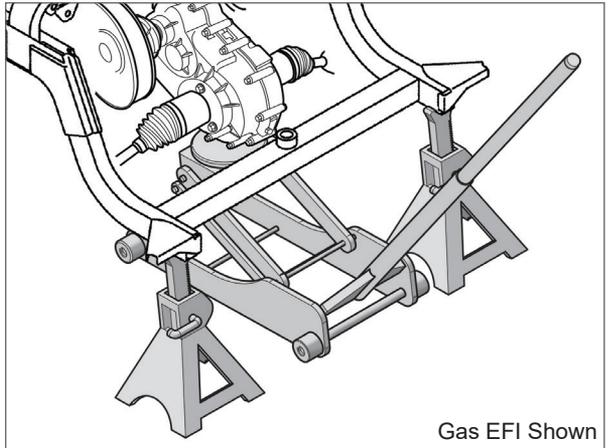
- Remove the rear lower cover from the under side of the cart by removing the bolts. Electric: Retain cover and hardware. Gas EFI: Do not reuse.



- Place a jack securely under the rear axle. Safely lift the rear end of the cart enough to accommodate the additional height of the larger tires and wheels.

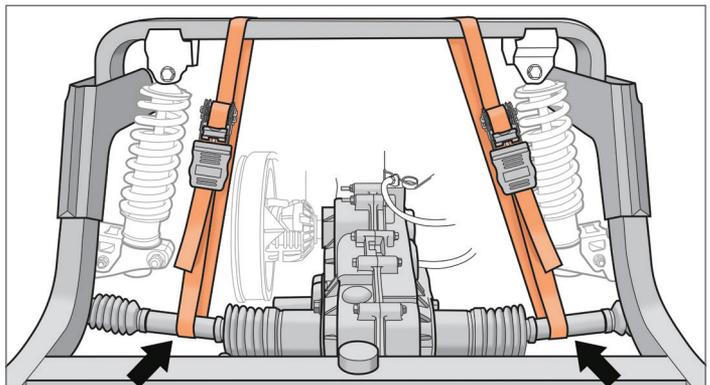
- Place jack stands under the chassis on both sides of the frame to stabilize it. **DO NOT** remove the jack.

- Fully remove the (8) rear lug nuts, tires and wheels. Discard.

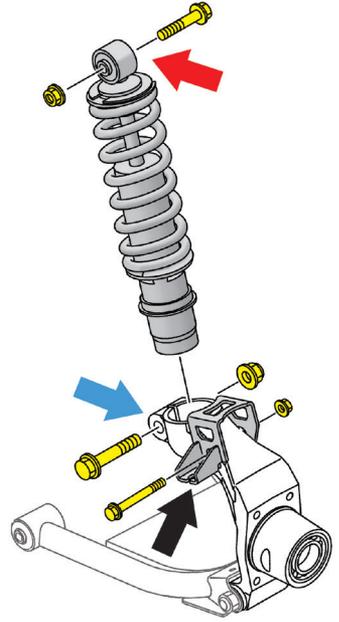


Gas EFI / Quietech EFI Only

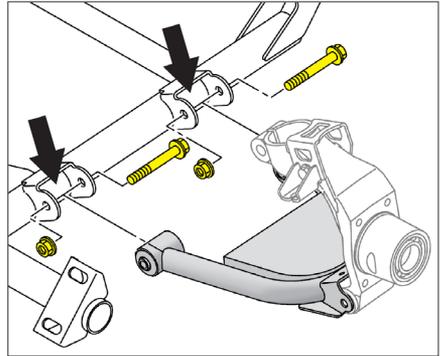
- To avoid damaging the axle joints, secure the hub and axle assemblies to the frame using ratchet straps.



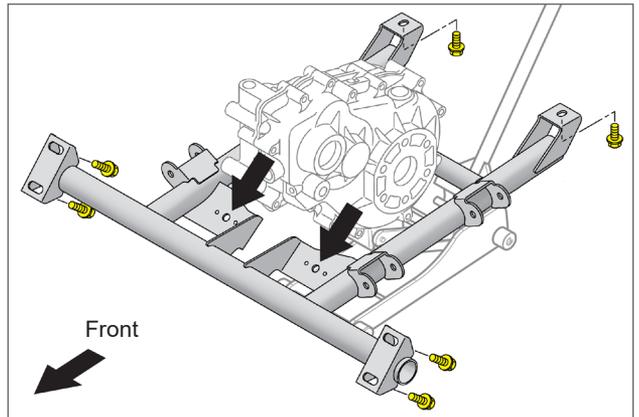
2. Disconnect the rear shocks from the upper shock mount on the chassis (red arrow). Retain hardware.
3. Loosen the hardware on the shock retaining brackets (black arrow). Use a flat screwdriver to rotate the brackets away from the shocks.
4. Disconnect the rear shocks from the lower shock mounting collars (blue arrow). Retain shocks and hardware.



5. Disconnect the A-arms from the sub frame. Retain hardware. The hub assemblies will hang from the straps.



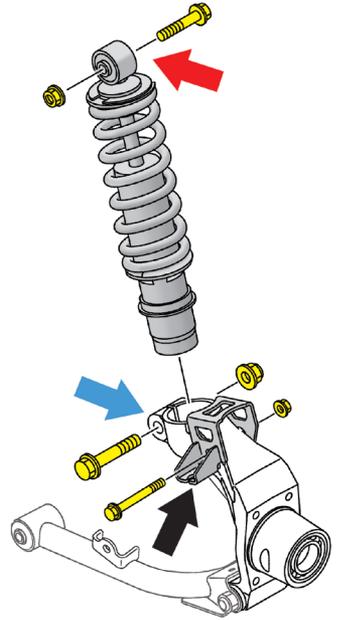
6. With the jack securely under the transmission, lower the sub frame from the chassis by removing the (6) sub frame mounting bolts and (2) motor mounting bolts (black arrows).



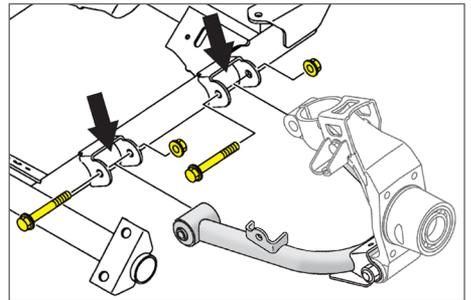
7. Use the jack to slowly lower the transmission and axle assembly to accommodate the height of the new brackets.

Electric Only

1. Disconnect the rear shocks from the upper shock mount on the chassis (red arrow). Retain hardware.
2. Loosen the hardware on the shock retaining brackets (black arrow). Use a flat screwdriver to rotate the brackets away from the shocks.
3. Disconnect the rear shocks from the lower shock mounting collars (blue arrow). Retain shocks and hardware.

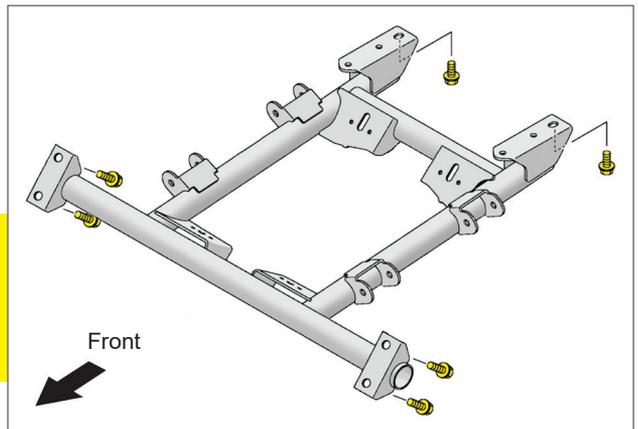


4. Disconnect the A-arms from the sub frame. Retain hardware.
5. Disconnect any wires or cables attached to the motor that could be damaged when lowering the rear suspension.
6. With the jack securely under the axle assembly, remove the (6) bolts mounting the sub frame to the chassis.



7. With the cart in TOW, use the jack to slowly lower the axle assembly and sub frame to accommodate the height of the new brackets.

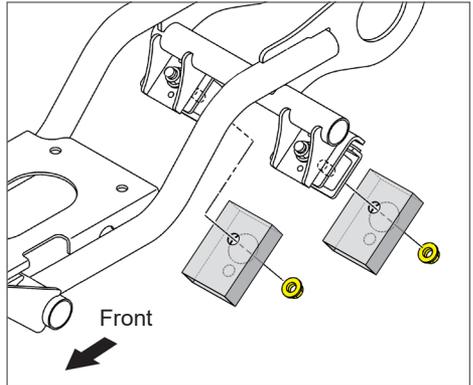
NOTE: The electrical system could be damaged if the cart is NOT in the Tow position and a shock contacts the motor.



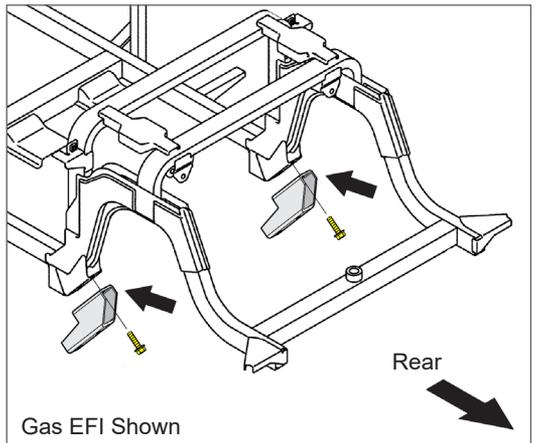
Rear Suspension Installation

1. Gas EFI / Quietech EFI Only: Install the (2) motor mount brackets (c) to the studs on the bottom of the rubber motor dampers using the Original Hardware removed in Step 6, Page 7.

NOTE: The motor mount brackets (c) are not used on Electric carts.

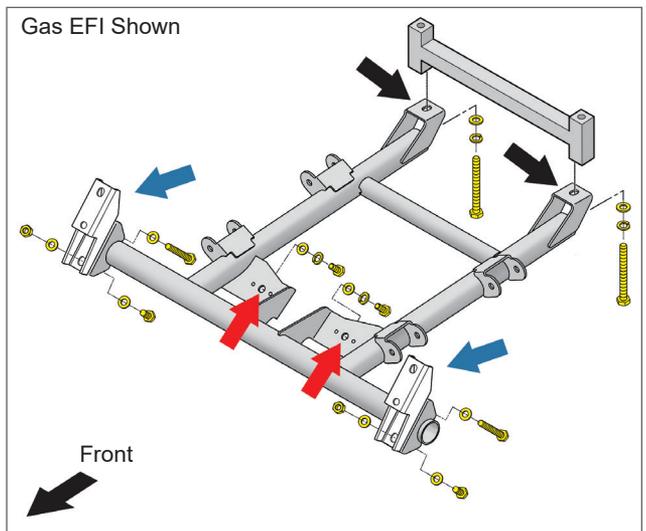


2. Loosely install the front sub frame brackets (d) to the frame where the front most part of the sub frame was removed using the Original Hardware removed in Step 6, Page 7 (Gas EFI) or Step 6, Page 8 (Electric).



3. Loosely install the rear most part of the sub frame to the rear sub frame bracket (e) and to the chassis using (2) M10 x 100 Hex Head Bolts, (2) Lock Washers and (2) Flat Washers (black arrows).

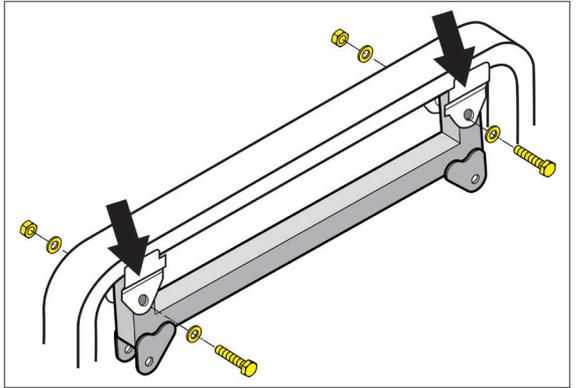
4. Gas EFI / Quietech EFI Only: Loosely install the front of the sub frame to the motor mount brackets (c) using (2) M10 x 25 Hex Head Bolts, (2) Lock Washers and (2) Flat Washers (red arrows).



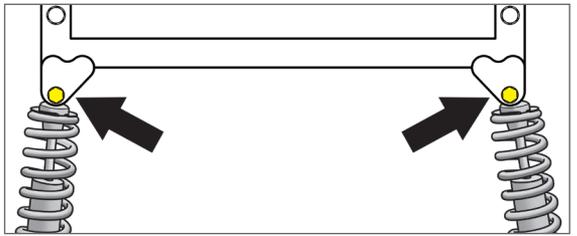
5. Loosely install the front of the sub frame to the front sub frame brackets (d) using (2) M10 x 90 Hex Head Bolts (upper holes), (2) M10 x 25 Hex Head Bolts (lower holes), (6) Flat Washers and (2) Nylock Nuts (blue arrows).

6. Tighten all hardware.

7. Slide the U-bracket (f) into the original shock mounts. Secure the bracket with (2) M10 x 50 Hex Head Bolts, (4) Flat Washers and (2) Nylock Nuts.



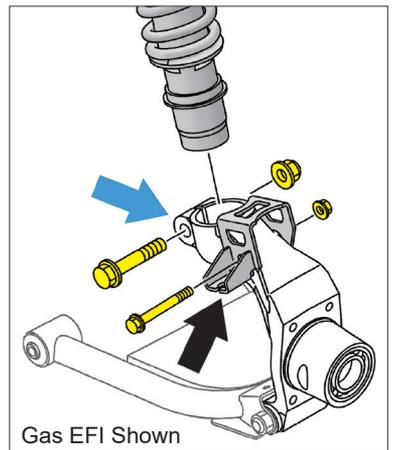
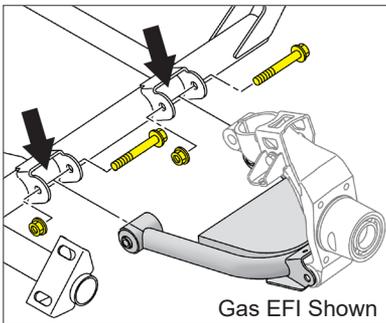
8. Install the upper shocks to the U-bracket using the Original Hardware.



9. Reattach the A-arms to the sub frame using the Original Hardware.

10. Insert the bottom of the shocks into the mounting collars (blue arrow). Fasten the collars with the Original Hardware.

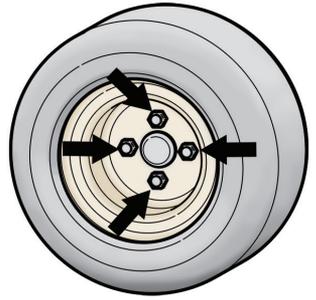
11. Slide the retaining bracket back over the shock and tighten the Original Hardware (black arrow).



12. Gas EFI / Quietech EFI Only: Remove straps from suspension.

13. Electric Only: Reinstall the lower cover removed on Page 6, Step 7 using the Original Hardware.

14. Tighten all hardware.
15. If the cart is not high enough to accommodate the larger tires and wheels, raise the cart to the correct height with the jack.
16. Install the (2) new rear tires and wheels. Fully tighten the lug nuts on both wheels.
17. Once the tires and wheels are fully secure, raise the jack, remove the jack stands and lower the cart. Remove the jack. Remove the chocks behind the front wheels.



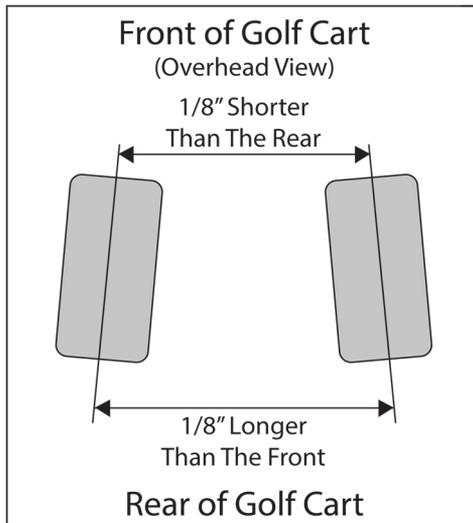
Adjust the Toe

1. Drive forward and back 20-40 feet to check the toe before making adjustments. Only make adjustments if needed.

NOTE: For stability, an 1/8" toe-in is recommended. This will level out when the cart is loaded.

This kit does not include camber adjustment. Yamaha carts are designed to have positive camber from the factory.

2. Calculate the toe of the front tires by measuring the center-to-center distance of the front of the front tires versus the center-to-center distance of the back of the front tires. The front measurement should be 1/8" shorter than the rear.

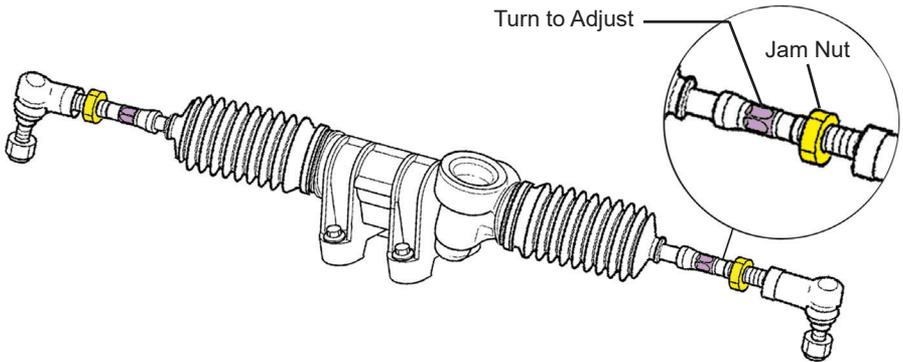


Toe-In Adjustment

- Adjust the toe by loosening the jam nut on the tie rod. Lengthen or shorten the tie rod by turning the hex shaped rod adjustment. Adjustments should be made evenly on both sides.

NOTE: Shortening the tie rods increases the toe, lengthening decreases it.

- Once the desired toe is reached, tighten the jam nuts on the tie rods.



- Reinstall the front bumper with the Original Hardware.

**RUGGED
STARTS
HERE**

This completes the installation of your
RHOX Drop Spindle Lift Kit. Please enjoy safely!

Scan QR code or use the link below to view the installation video.
<https://www.youtube.com/user/golfcartinstructions>

