

#### Tundra 6"-8", Pro +4, Pro+6 Lift Kit

IF your ReadyLIFT<sub>®</sub> product has a damaged or missing part, please contact customer service directly and a new replacement part will be sent to you immediately. For warranty issues, please return to the place of installation and contact ReadyLIFT.

(877) 759-9991

MON-FRI 7AM-4PM PST OR

EMAIL: support@readylift-ami.COM

WEBSITE: ReadyLIFT.COM

\*\*Please retain this document in your vehicle at all times. \*\*

## **Limited Lifetime Warranty**

This unique product warranty proves our commitment to the quality and reliability of every product that ReadyLIFT manufactures. The ReadyLIFT product warranty only extends to the original purchaser of any ReadyLIFT product, if it breaks, we will give you a new part. Warranty does not apply to discontinued parts.

Our Limited Lifetime Warranty excludes the following ReadyLIFT items; bushings, bump stops, ball joints, tie rod ends, heim joints and shock absorbers. These parts are subject to wear and are not considered defective when worn. They are warranted for 12 months from the date of purchase for defects in workmanship.

This product warranty is voided if the vehicle is not aligned after kit installation and proper maintenance is routinely done.

Product purchased directly from ReadyLIFT has a 90 day return policy on uninstalled products from the date of purchase (may be subject to restocking fee). Uninstalled product returns must be in the original Ready-LIFT packaging. Please call **(877) 759-9991** to get an RGA# for any return. Customer is responsible for shipping costs back to ReadyLIFT. Returns without RGA# will be refused. Contact ReadyLIFT directly about any potentially defective parts prior to removal from vehicle.

ReadyLIFT products are **NOT** intended for off-road abuse. Any damage or failure as a result from off-road abuse voids the warranty of the ReadyLIFT product. ReadyLIFT is **NOT** responsible for any subsequent damages to any related vehicle parts due to misuse, abuse, improper installation, or lack of maintenance. Furthermore, ReadyLIFT reserves the right to change, modify or cancel this warranty without prior notice.



READ INSTRUCTIONS THOROUGHLY AND COMPLETELY BEFORE BEGINNING INSTALLATION.

INSTALLATION BY A <u>CERTIFIED PROFESSIONAL MECHANIC</u> IS HIGHLY RECOMMENDED.

READYLIFT® IS NOT RESPONSIBLE FOR ANY DAMAGE OR FAILURE RESULTING FROM IMPROPER INSTALLATION.

#### **Safety Warning**

MISUSE OF THIS PRODUCT COULD LEAD TO INJURY OR DEATH.

Suspension systems or components that enhance the on and off-road performance of your vehicle may cause it to handle differently than it did from the factory. Extreme care must be used to prevent loss of control or vehicle rollover during abrupt maneuvers.

Always operate your vehicle at reduced speeds to ensure your ability to control your vehicle under all driving conditions. Failure to drive safely may result in serious injury or death to driver and passengers.

Driver and passengers must ALWAYS wear your seat belts, avoid quick sharp turns and other sudden maneuvers. ReadyLIFT Suspension does not recommend the combined use of suspension lifts, body lifts, or other lifting devices.

You should never operate your vehicle under the influence of alcohol or drugs.

Constant maintenance is required to keep your vehicle safe. Thoroughly inspect your vehicle before and after every off-road use.

It is the responsibility of the retailer and/or the installer to review all state and local laws, with the end user of this product, related to bumper height laws and the lifting of their vehicle before the purchase and installation of any ReadyLIFT products.

It is the responsibility of the driver/s to check their surrounding area for obstructions, people, and animals before moving the vehicle.

All raised vehicles have increased blind spots; damage, injury and/or death can occur if these instructions are not followed.

#### **Installation Warning**

All steps and procedures described in these instructions were performed while the vehicle was properly supported on a two post vehicle lift with safety jacks.

Use caution during all disassembly and assembly steps to insure suspension components are not over extended causing damage to any vehicle components and parts included in this kit.

Included instructions are guidelines only for recommended procedures and are not meant to be definitive. Installer is responsible to insure a safe and controllable vehicle after performing modifications.

ReadyLIFT Suspension recommends the use of an OE Service Manual for model/year of vehicle when disassembly and assembly of factory and related components.

Unless otherwise specified, tighten all bolts and fasteners to standard torque specifications listed within the OE Service Manual.

Suspension components that use rubber or urethane bushings should be tightened with the vehicle at normal ride height. This will prevent premature wear or failure of the bushing and maintain ride comfort.

Larger tire and wheel combinations may increase leverage on suspension, steering, and related components.

Due to payload options and initial ride height variances, the amount of lift is a base figure. Final ride height dimensions may vary in accordance to original vehicle ride height. Always measure the vehicle ride height prior to beginning installation.

This suspension system was developed using a 35" x 12.5" (6" lift) and 37" x 12.5" (8" lift) tire with 20" x 9" wheel and a offset of +25. If wider tires are used, offset wheels may be necessary and trimming may be required. Factory wheels can be used but are not recommended with tires over 11.5" wide.

The stock spare rim can be run in an emergency - exercise extreme caution under stock spare tire operating conditions. Please note that, if running the spare factory tire, it is done for short distances and a speed not to exceed 45mph or damage to differentials may occur.

# **IMPORTANT NOTE:**

This kit was designed for vehicles with stock lift heights. Measurements need to be assessed before continuing the install. Measure from the center of the wheel to the fender lip edge above, the front cannot exceed 22" (Pro models will measure 24") with stock components. If you measure more than this, stop and verify the parts on the vehicle otherwise over lifting is possible and damage to vehicle can occur.

This kit was not designed to work in conjunction with other kit manufacturer parts like upper control arms, leveling struts, or rear shackles. The upper control arms if replaced need to be based off stock mounting locations, the upper ball joint location is key for proper clearances. Everything must be installed according to the instructions for proper clearances and fitments.

Leveled stance is measured from the cab pinch weld to the ground and not fender edge. The rear fender edge is 1" lower than the front with leveled stance.

#### **VEHICLE HEIGHT MEASURMENTS**

	Driver Before	Driver After	Passenger Before	Passenger After
Front				
Rear				

# **BILL OF MATERIALS**

Front Cross Member	1
Rear Cross Member	1
Skid Plate	1
Front Alignment Plate	4
Rear Alignment Plate	4
Cross Member Nut Plate	1
7/8" x 5.5" Bolt	2
7/8" Washer	4
7/8" Lock Nut	2
M18 x 150mm Bolt	2
M18 Washer	4
M18 Lock Nut	2
3/8" x 1" Bolt	9
3/8" Washer	9
Driver Strut Spacer	1
Pass Strut Spacer	1
Steering Stop	2
Brake Line Bracket	4
Parking Brake Bracket	2
Zip Ties	10
Carrier Bearing Spacer Kit	1
M10 Flange Nut	8
5/16" x 1" Bolt	6
5/16" Washer	12
5/16" Lock Nut	6

Driver Sway Bar Extension	1
Pass Sway Bar Extension	1
7/16" x 1.5" Bolt	4
7/16" Washer	8
7/16" Lock Nut	4
Bump Stop Extension	4
Driver Front Diff Mount	1
Driver Rear Diff Mount	1
Pass Diff Mount	1
Crush tube	4
Bushing	8
Vent Tube and Fitting	1
1/2" x 4" Bolt	4
1/2" Washer	8
1/2" Lock Nut	4
M14 x 60mm Bolt	3
M14 x 25mm Bolt	1
M14 Washer	4
M14 Lock Nut	2
Driver Knuckle	1
Pass Knuckle	1
Rear Block	2
U-bolt	4
Flange Nut	8
Preload Spacer (8" Kit Only)	2

# **AWARNING**

**Before starting installation:** ReadyLIFT Suspension highly recommends that the installation of this product be performed by a professional mechanic with experience working on and installing suspension products. Professional knowledge and skill will typically yield the best installation results. If you need an installer in your area, please contact ReadyLIFT Suspension Customer Service to find one of our "Pro-Grade" Dealers.

#### INSTALLATION BY A PROFESSIONAL IS HIGHLY RECOMMENDED.

- A Factory Service Manual for your specific Year / Make / Model is highly recommended for reference during installation.
- All lifted vehicles may require additional driveline modifications and / or balancing.
- A vehicle alignment is REQUIRED after installation of this product.
- Speedometer / Computer recalibration is required if changing +/- 10% from factory tire diameter.
- A vehicle lift or hoist greatly reduces installation time. Installation time estimates are based on an available vehicle hoist.
- Vehicle must be in excellent operating condition. Repair or replace any and all worn or damaged components prior to installation.

# \*\*\*Parts shown in red for picture clarification only\*\*\*

ReadyLIFT recommends all steps and procedures described in these instructions be performed while the vehicle is properly supported on a two post vehicle lift with safety jacks.

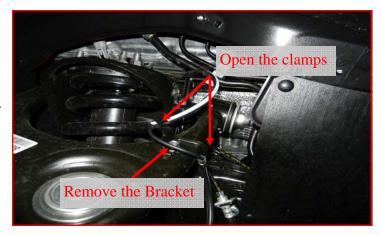
Otherwise, park vehicle on a clean flat surface and block the rear wheels for safety. Engage the parking brake.

Disconnect the vehicle power source at the ground terminal on the battery.

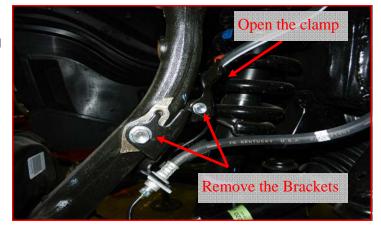
Lock the steering wheel in the straight forward position with the column lock or steering wheel locking device.

Raise the front of the vehicle and support with safety jack stands at each frame rail behind the lower control arms. Remove the front wheels. Remove the front skid plate.

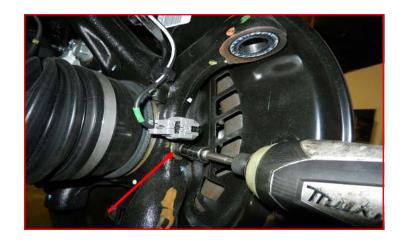
Open the ABS brackets where they pinch over the ABS line. Remove the ABS wire from the brackets. Remove the ABS bracket from the upper control arm and knuckle. Discard the factory brackets.



Remove the brake line brackets from the frame and knuckle.



Remove the ABS sensor from the knuckle.



Remove the brake caliper and hang out of the way using a S hook or suitable strap. DO NOT let the brake caliper hang by the brake hose. Remove the brake rotor.



Remove the safety clip from the upper ball joint, and cotter pins from the tie rod ends, and axle nuts.



Remove the axle nut safety keeper and then remove the axle nut.



Remove the hub mounting bolts. Note: The bolts will not come off the hub.



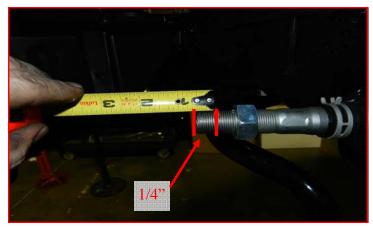
Taking care not to damage the threads on the axle, use an air hammer with a pointed bit in the axle and slowly press the axle through the hub. Make sure to hold onto the hub assembly as it will fall. The backing plate will also come off the knuckle.



Loosen the tie rod jam nut. Remove the tie rod end nut. Strike the tie rod boss with a hammer to dislodge the taper and remove from the knuckle. Remove the outer tie rod end from the inner. The outer will be swapped to the opposite side.



Mark a line 1/4" from the end of the inner tie rod and using a suitable cutting tool, remove outer marked section. Clean any burs from the cutting process. Install the outer tie rod end from the opposite side.



Loosen but do not remove the upper ball joint nut. Strike the ball joint boss with a hammer to dislodge the taper.



Remove the lower ball joint cradle from the knuckle. Remove the knuckle from the vehicle.



Remove the sway bar from the lower control arm and frame.

Remove the lower strut hardware. Loosen the lower control arm cams and let swing out of the way.

Remove the strut from the frame.

Remove the lower control arm from the vehicle. Loosen but do not remove the upper control arm.

Support the differential with an appropriate stand and remove the rear mount.



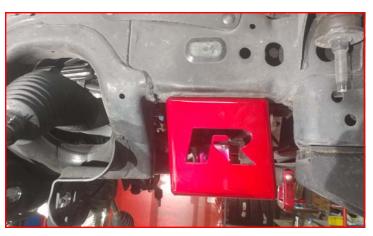
# 2WD: Ignore this step

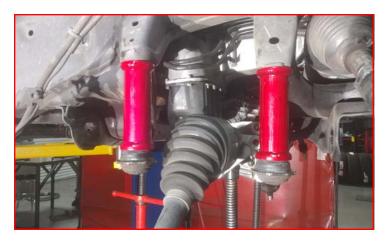
Mark a vertical line from the center of the driver rear control arm pocket cam slot 2 3/4" onto the rear cross member. Mark another vertical line from the same center point out 8 1/2" onto the rear cross member. Use a suitable cutting tool and cut the marked section of cross member out and discard. Sand and paint the bare metal with a quality rust preventative paint.

Install the ReadyLIFT sway bar drops to the frame using the factory hardware. Make sure the offset goes to the front of the vehicle. Torque to 45 ft-lbs.

Remove the bump stops by turning them counter clockwise to unscrew from the frame. Install the Ready-LIFT extensions onto the frame and bump stops on to the extensions with a drop of thread locker. Tighten down until the bump stop extension bottoms out onto the frame rail.







Install the bushing and sleeves into the ReadyLIFT differential mounts. Soapy water mixture will aid in installation. DO NOT use grease or WD40 as it will destroy the urethane.

Remove the differential front mounts from the frame and differential. There may be a small amount of fluid seep from the driver side once the mount is removed. This is completely normal and will stop once the new mount is installed and torqued down.

Install the ReadyLIFT drivers side front mount onto the differential using M14 x 60mm bolts, and washers. Do not tighten at this time.



Install the ReadyLIFT drivers side rear mount onto the differential using M14 x 25mm bolt, and washer. Do not tighten at this time.



Install the ReadyLIFT rear cross member using M18 x 150mm bolts, washers, cam block off plates, and clock nuts. Do not tighten at this time.



Install the ReadyLIFT front cross member using 7/8" x 5.5" bolts, washers, cam block off plates, and clock nuts. Do not tighten at this time.



Install the ReadyLIFT passenger side diff mount to the front and rear cross member using 1/2" x 4" bolts, washers, and c-lock nuts. Do not tighten at this time. Carefully lower the differential down into the driver and passenger side mounts. Install using 1/2" x 4" bolts, washer, and c-lock nuts. Do not tighten at this time.

Install the passenger diff using factory hardware with provided M14 nuts and washers. Reconnect the electrical connectors. Install the vent tube extension. Install the passenger side mount using the factory bolts, M14 c-lock nuts, and washers. Do not tighten at this time.

Install the lower control arms using the factory hardware making sure to install in the factory orientation (front cams facing up and rear cams facing down. The cams are oversized and have to be installed correctly for proper engagement for alignment). Do not tighten at this time.

Notch the lower control arm strut pocket as shown. Radius the back edge following the pocket profile. This is for clearance on the strut body for full droop.









Torque the front cross member bolts to 200 ft-lbs, rear cross member bolts to 150 ft-lbs, 1/2" diff hardware to 95 ft-lbs, and M14 differential hardware to 80 ft-lbs.

Drill out the 3 mounting holes on the back of the rear cross member into the frame using a 3/8" drill bit.

Install the nut plate into the opening of the cut cross member and attach the rear cross member using 3/8" x 1" bolts, and washers. Torque to 30 ft-lbs.

<u>2WD ONLY: Open one of the drain holes in</u> <u>the factory cross member to install the nut</u> <u>plate.</u>



Install the ReadyLIFT skid plate to the cross members using 3/8" x 1" bolts, and washers. Torque to 30 ft-lbs.

\*\*\*If installing the 8" Kit or TRD PRO, refer to supplemental Strut pages at the end of the instructions.\*\*\*

Install the ReadyLIFT strut extensions onto their corresponding struts using M10 flange nuts. D is for driver and P is for passenger. Torque to 30 ft-lbs. Make sure they are installed to the appropriate strut. This is VERY important for clearances and spring rates as the driver and passenger side differ.





Install the completed strut assemblies into their corresponding sides using M10 flange nuts and lower strut mounts using factory hardware. Do not tighten at this time. Strut shown with 8" kit pre-load spacer installed 6" kits will not have this extra spacer. Pro models will have the Bilstein coil over with extension for +4 and billet top hat and extension for the +6.

When the driver side is installed properly, the driver spring lock will be facing the front and pointing to the inside of the vehicle as shown.

When the passenger side is installed properly, the passenger spring lock will be facing the front and to outside of the vehicle as shown.

Remove the dust seals from the factory knuckles and install onto the Readylift knuckles. Install the factory dust shields and hub bearings to the ReadyLIFT knuckles using the factory hardware and a drop of thread locker.









Protect the axle and ball joint boots with a wet rag or other suitable protection from grinding and welding sparks. Clean/grind off the paint/rust on the steering stop on the ball joint cradle. Weld the turn stop extension plates on their corresponding sides (match the contours of the stops) across the top and bottom of the plates.



Install the ReadyLIFT knuckle to the upper ball joint and lower ball joint cradle (while positioning the axle through the dust seal and hub bearing) using the factory hardware. Add a drop of thread locker to the lower mounting hardware.

Torque the upper ball joint nut to 67 ft-lbs, install the factory safety clip, torque the lower cradle hardware to 200 ft-lbs, the hub bearing hardware to 80 ft-lbs, and the axle nut to 275 ft-lbs.

Install the brake rotor and caliper using the factory hardware. Torque to 80 ft-lbs. \*\*\*If installing on 2015 and earlier, use the provided caliper bolt sleeves in the knuckle. Very Important.\*\*\*

Install the front brake line extensions (Z shaped) to the frame using the factory hardware. Gently pull down on the metal brake line and install the bracket to the extension using 5/16" x 1" bolts, washers and c-lock nuts. Install the brake line bracket to the knuckle using the factory hardware.



Run the ABS wire over the upper control arm. Install the ABS sensor and bracket to the knuckle using factory hardware. Turn the knuckle until it hits the turn stop. Using tie wraps, secure the ABS wire along the brake line up to the frame. Torque all brake line hardware to 5 ft-lbs.

Install the outer tie rod end to the knuckle using the factory hardware. Torque to 65 ft-lbs. Install the cotter pin. Install the sway bar links to the lower control arms using the factory hardware. Install the sway bar to the ReadyLIFT extensions using 7/16" x 1 1/2" bolts, washers, and c-lock nuts. Torque all to 55 ft-lbs.



Install the front wheels and lower the vehicle to the ground. Torque the lug nuts to the wheel manufacturer specs.

Jounce the front suspension to settle the vehicle to ride height.

Center the lower control arm cams and torque to 100 ft-lbs (final torque to be done by alignment technician), the lower strut hardware to 125 ft-lbs, and the sway bar end link hardware to 50 ft-lbs.

With the steering wheel centered, rotate the inner tie rod ends until the tires are straight and lock the jam nut. If the steering wheel is not centered properly, the ABS/traction control lights may activate.

Turn the wheels from lock to lock and make sure the brake lines and ABS routing clears all suspension components adequately. Reposition if necessary.

#### **REAR INSTALL**

Block the front wheels, raise the rear of the vehicle and support the frame with jack stands in front of the rear leaf springs.

Remove the rear wheels.

Remove the 3 brake line brackets, and 2 parking brake brackets from the axle.

Gently bend the ABS bracket on the charcoal canister down flat and then remove.

With the axle fully supported, remove and discard the rear shocks.

Slightly loosen but do not remove the driver side u-bolts.

Remove the passenger side u-bolts completely.

Lower the axle just enough to install the lift block. Install the ReadyLIFT block, making sure the tapered end points to the front.

Raise the axle and the block up to the spring while aligning the center pin.



Install the provided u-bolts and nuts. Snug the u-bolt nuts but do not fully tighten at this time. Repeat steps for driver side.

Install the extended shocks using the factory lower hardware and provided upper hardware. Do not tighten at this time. (If TRD PRO model, see supplemental install instructions at the end.)

Install a ReadyLIFT (Z shaped) bracket to the charcoal canister using factory hardware. Do not tighten at this time.



Install the ABS bracket to the Ready-LIFT extension (Z shaped) using 5/16" x 1" bolt, washers, and c-lock nut. Torque all to 5 ft-lbs.



Install the ReadyLIFT brake line extension (Z shaped) to the centered axle mount using factory hardware. Attach the factory brake line bracket to the extension using 5/16" x 1" bolt, washers, and c-lock nuts. Torque to 5 ft-lbs.



Flip the 2 factory clamps to the left and right of the center mount over and install using factory hardware. You may have to gently pull the metal brake lines through the outer clamps to gain adequate clearance. Torque to 5 ft-lbs.

Install the parking brake brackets to the ReadyLIFT extensions (flat brackets) using 5/16" x 1" bolts, washers, and c-lock nuts. Install completed assembly to the axle using factory hardware. Torque all hardware to 5 ft-lbs.



Install the rear wheels and lower vehicle to the ground. Torque the lug nuts to the wheel manufacturers specs.

Install the appropriate carrier bearing spacer between the carrier bearing housing and frame. 6" kit use the .5" spacer and 8" kit use the .75" spacer. The 6mm spacer is for fine tuning typically used for 2WD applications. Never stack the .5" and .75" together. Torque hardware to 35 ft-lbs.



Tighten the upper shock hardware but do not over tighten as you are just setting about 1/4 crush on the rubber bushings (see picture for proper crush). Torque the lower shock hardware to 45 ft-lbs, and ubolts to 110 ft-lbs. Have a reputable alignment shop set the alignment to the provided alignment specs on the last page of the instruction booklet.



# 8" Lift Supplemental Strut Instructions:

\*\*\*Caution, the spring is under extreme pressure and can cause bodily injury and/or death if handled improperly.\*\*\*

Mark the orientation of the strut hat to the spring and strut body. (VERY IM-PORTANT!)

Using a spring compressor, relieve the tension on the strut hat and remove from the strut assembly

Remove the rubber isolator from the strut hat and install to the ReadyLIFT preload spacer, then install the preload spacer between the strut hat and coil spring. Install the strut hat in the same orientation as removed (VERY IMPORTANT for clearances) using the factory hardware. Torque to 30 ft-lbs.

Remove the strut from the spring compressor. Repeat for both struts. Continue installation as normal for the rest of the front.





# TRD PRO +4:

Install the ReadyLIFT strut extensions onto their corresponding struts using factory hardware. D and P cut into the top plate of the spacer, D is for driver and P is for passenger. Torque to 30 ft-lbs.

# TRD PRO +6:

\*\*\*\*Caution, the spring is under extreme pressure and can cause bodily injury and or death if handled improperly.\*\*\*

Install ReadyLIFT replacement billet top hats. Mark the spring location to shock body.

Using a spring compressor, relieve the tension on the strut hat and remove from the strut assembly. Remove the rubber isolator from the strut hat and install to the ReadyLIFT billet top hat replacement.



Remove the rubber bushing from the factory top hat. The inside bushing is glued in place and requires separation. Install in the same order as removed from the factory parts. Install the strut hat in the same orientation as the factory (mark on the top of the top hat indicates outward same as factory top hat) using the factory hardware. Torque to 30 ft-lbs.



Install the ReadyLIFT strut extensions to their corresponding sides using factory hardware. D and P are cut into the top plate. D is for driver and P for passenger. Continue installation as normal for the rest of the front.



# TRD PRO Shock Extensions:

Remove the shock from the rear of the vehicle saving all hardware. (Boot shown removed)



Remove the boot clamp from the shock and discard.



Remove the boot from the shock and place in a vice or suitable clamp. Drill out the top of the boot washer to 11/16".



Use a suitable cutting tool and remove the tip of the shock to the first thread. Sand the cut to remove any burs.





FAILURE TO PERFORM THE POST INSPECTION CHECKS MAY RESULT IN VEHICLE COMPONENT DAMAGE AND/OR PERSONAL INJURY OR DEATH TO THE DRIVER AND/OR OTHERS.

#### Final Checks & Adjustments

Once the vehicle is lowered to the ground, check all parts which have rubber or urethane components to ensure proper torque. Torque lug nuts to the wheel manufacturer specs. Move vehicle backwards and forwards a short distance to allow suspension components to adjust. Turn the front wheels completely left then right and verify adequate tire, wheel, brake line, and ABS wire clearance. Test and inspect steering, brake and suspension components for tightness and proper operation. Inspect brakes hoses and ABS lines for adequate slack at full extension, adjust as necessary.

RECHECK ALL HARDWARE FOR PROPER TORQUE VALUES AFTER 500 MILES, AND THEN PERIODICALLY AT EACH SERVICE INTERVAL THERAFTER.

#### Vehicle Handling Warning

Increasing the height of your vehicle raises the center of gravity and can affect stability and control. Use caution on turns and when making steering corrections.

Vehicles with larger tires and wheels will handle differently than stock vehicles. Take time to familiarize yourself with the handling of your vehicle.

## Wheel Alignment/Headlamp Adjustment

It is necessary to have a proper and professional wheel alignment performed by a certified alignment technician. Align the vehicle to factory specifications. It is recommended that your vehicle alignment be checked after any off-road driving.

In addition to your vehicle alignment, for your safety and others, it is necessary to check and adjust your vehicle headlamps for proper aim and alignment. If the vehicle is equipped with active or passive safety/collision monitoring and/or avoidance systems including, but not limited to, camera- or radar-based systems, check and adjust your vehicle's systems for proper aim and function.

## RECOMMENDED ALIGNMENT SPECS

	Driver	Passenger	Tolerance	Total / Split
Camber	+0.3	+0.3	+/- 0.5	+0.0
Caster	+2.0	+2.0	+/- 0.5	+0.0
Toe	+.07	+.07	+/-0.05	+.14