

### INSTALLATION INSTRUCTIONS

'GOAT' BUMPER

These instructions cover installation for 67-72 GM Trucks, Suburbans, Blazers, & Panels

Part Number: 67-72 GM GOAT

CARELESS INSTALLATION AND OPERATION OF THIS PRODUCT CAN RESULT IN SERIOUS INJURY OR EQUIPMENT DAMAGE. READ AND UNDERSTAND ALL SAFETY PRECAUTIONS AND OPERATING INSTRUCTIONS BEFORE INSTALLING AND **OPERATING THIS PRODUCT.** 

This guide identifies potential hazards and has important safety messages

WARNING, CAUTION, NOTICE, & Note are signal words that identify the level of hazard. These are outlined below:

MARNING signals a hazard that could cause serious injury or death if you do not follow recommendations.

CAUTION | signals a hazard that may cause minor to moderate injury if you do not follow recommendations.

NOTICE

signals to call attention to important information

**Note:** to emphasize general information worthy of special attention

**CAUTION** 

PLEASE WORK SAFELY

**CAUTION** 

BEFORE DRILLING INTO ANY VEHICLE CHECK THAT THE AREA TO BE DRILLED IS CLEAR OF ANY WATER LINES, FUEL LINES, ELECTRICAL WIRING, OR KEY MECHANICAL EQUIPMENT. ALWAYS USE CAUTION WHEN DRILLING OR CUTTING ON A VEHICLE.

**↑** WARNING

FAILURE TO INSPECT THE AREA TO BE DRILLED MAY RESULT IN VEHICLE DAMAGE, OR PERSONAL INJURY.

**∆**WARNING

WEAR APPROPRIATE PPE WHEN INSTALLING THIS KIT: GLOVES. HEARING PROTECTION, SAFETY GLASSES/GOGGLES.

### Note:

Thank you for your purchase of the **Engineered Vintage 'GOAT' bumper** 

Please read these instructions completely before installation of this kit.

These instructions are intended to convey information on how to best mount this kit onto your truck.

This kit is designed to bolt into 1967-72 GM trucks.

This kit was designed to mount a variety of winch models onto these trucks.

This kit is compatible with Engineered Vintage's Shackle Bracket tow hooks as well as the OEM 69-72 GM tow hooks.

The OEM 67-68 GM tow hooks will not fit on this kit without drilling.

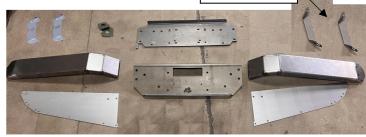


# 'GOAT' Bumper PARTS LIST

### QTY DESCRIPTION

- -1- FRAME BRACKET, DRIVER (LH)
- -1- FRAME BRACKET, PASSENGER (RH)
- -1- CENTER WINCH BASE
- -1- CENTER WINCH FACE
- -2- BUMPER WINGS
- -2- BUMPER WING TOP PLATES
- -2- SPACER PLATES, 1/4" THICK
- -2- OUTER BUMPER BRACE BRACKET
- -2- 8274 WINCH BRACE\* (\*not included unless selected at purchase only used with WARN 8274 winch)







# **HARDWARE LIST:**

ID	Qty	Description	Where Used
Α	6	5/8-11 GR 8 BOLTS, 2" LONG	Use (6) to mount frame brackets to truck frame
В	12	5/8" washers	Use (2) per 5/8" bolt
С	6	5/8" nyloc nuts (or lock washers & nuts)	Use (1) per 5/8" bolt
D	6	½-13 UNC GR 8 BOLTS, 2" LONG	(4) used to mount frame brackets to bottom plate (2) used to mount stock bumper stiffener brace to truck frame
E	4	½-13 UNC GR 8 BOLTS, 1.5" LONG	(2) Used to mount bottom winch plate to bumper face plate (2) used to mount stock bumper stiffener brace to wing reinforcement bracket
F	20	1/2" washers	Use (2) per 1/2" bolt
G	10	1/2" nyloc nuts (or lock washers & nuts)	Use (1) per 1/2" bolt
Н	12	7/16 x 1" CARRIAGE BOLTS	<ul><li>(6) used to mount bumper wings to bumper face plate</li><li>(4) used to mount 8274 bracket between bottom winch plate &amp; bumper face plate</li><li>(2) used to mount center winch face to center winch base</li></ul>
ı	8	7/16" washers	Use (1) per 7/16" bolt (washers are not used on 8274 bracket bolts)
J	12	7/16" nyloc nuts (or lock washers & nuts)	Use (1) per 7/16" bolt
К	20	5/16 BOLTS	<ul><li>(18) used to mount bumper wing tops to bumper wings</li><li>(2) used to mount bumper stiffener bracket inside bumper wings</li></ul>
L	20	5/16" washers	Use (1) per 5/16" bolt
М	20	5/16" nyloc nuts (or lock washers & nuts)	Use (1) per 5/16" bolt

# **Installation prep**

**∆**WARNING

As these trucks are 50+ years old, before installation of this kit the front frame rail ends should be inspected to ensure rigidity and ability to securely hold this winch mount. If there are rust holes or

there is other physical damage to frame then frame should be professionally repaired before installation of this product.

If mounting this kit in a 1967-1971 truck, 2wd truck, and/or truck without factory tow hook holes drilling of the frame may be required. 1972 4x4 trucks came from factory with tow hook holes.

 $\triangle$ WARNING

Drilling operations can cause flying chips. WEAR SAFETY GOGGLES. Flying chips can cause eye injury.

Recommend spraying all bumper hardware, tow hook bolts (if equipped), steering box bolt, and cross-member bracket bolts with penetrating oil or "bolt loosening spray" the night before installation to ease bumper removal from truck. Bumper hardware can be difficult to remove with rust, road grime, etc accumulated over time on truck.

Remove factory tow hooks from truck.

Remove the front bumper from truck.

Remove the outer bumper braces from the bumper (or frame of truck) clean and set aside – the outer bumper braces will be re-used to support the outer bumper ends

Once bumper is removed, it is recommended to clean inner frame of grease and debris with pressure washer and/or degreaser.

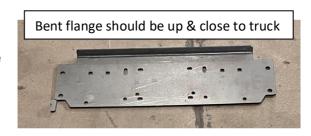
Once stock bumper is removed and frame is clean – you are ready to install the 'GOAT' bumper.

Install the frame brackets on the outside of the truck frame rails using the correct hole pattern as outlined above based on the year of your truck – the frame brackets should be facing in towards each other as shown at right – use the appropriate bolts to attach frame brackets to truck as detailed above – install using a washer on each side of bolt and lock nuts (or lock washers & nuts) - leave all bolts loose until bumper is completely installed on truck



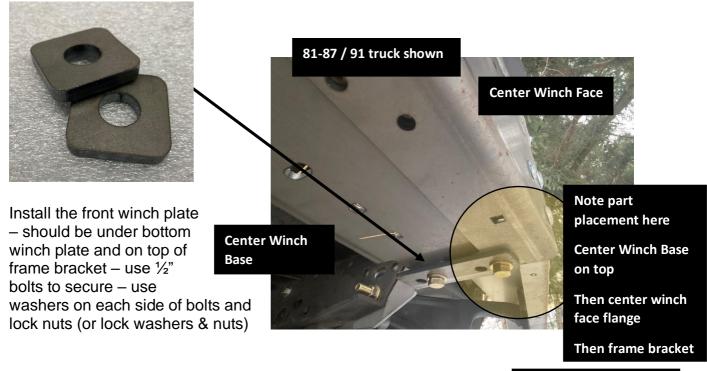
Next, install the Center Winch Base

Place the Center Winch Base plate onto the frame bracket bottom flanges.



Install a spacer plate (one on each side)
between each frame bracket and center w

between each frame bracket and center winch base – use ½" bolts to secure (recommend bolts installed up from bottom for ground clearance)



Once center winch assembly is on truck, it is time to install bumper wings



Bumper wings are installed behind Center Winch Face and attach with (3) 7/16" carriage bolts on each side.

Bumper wings are symmetrical and can be installed on driver or passenger side of truck.



Once wings are bolted to center winch assembly, install bumper wing tops

Bumper wing tops should be installed under the flange on the wings with (9) 5/16" bolts on each side – make sure all bolts are installed before tightening.

Check that hole in center (highlighted) is lined up with frame bracket hole and install 5/16" bolt on each side – install washers and lock nuts as necessary.

Once tops are installed, install stock bumper outer braces on frame (if they were removed) and line up outer holes with outer bumper brace bracket

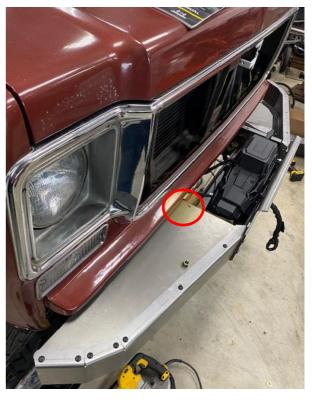
Install outer bumper brace bracket in each bumper wing in appropriate hole that lines up with stock bumper outer brace – this may take some

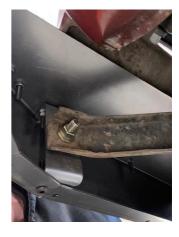


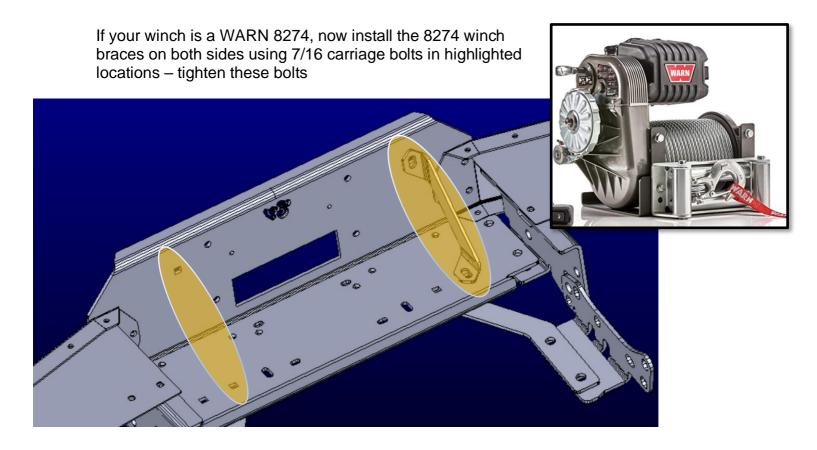
trial & error with bracket to line up. Use a ½" bolt to attach 'GOAT' bumper brace to stock outer bumper brace.

'GOAT' bumper braces can be flipped around and moved to different holes to align. Install a 5/16" bolt in appropriate bottom bumper wing hole to attach bottom of bumper brace









Once these are installed – it is time to tighten all of the hardware.

Check that bumper is level with truck side to side & front to back.

Once bumper is leveled – tighten all hardware, starting with the frame bracket bolts, then winch assembly bolts, then bumper ends, then outer bumper stiffener bolts.

Tighten to these specs:

# **Torque Specs**

Size	•
7/1	6
1/2	

Wrench

1/4" bolts	7	ft-lbs	7/16
5/16" bolts	15	ft-lbs	1/2
3/8" bolts	28	ft-lbs	9/16
7/16" bolts	37	ft-lbs	5/8
1/2" bolts	80	ft-lbs	3/4
5/8" bolts	120	ft-lbs	15/16

Once all bolts are tightened, assembly is complete and winch can be installed per winch manufacturer instructions.





# **Optional accessory installation:**

# 1971-1972 Turn Signal mounts (sold separately)

Remove turn signals from stock bumper

Install stock turn signals in Turn Signal Mounts in desired location on bumper.



Mark location on bumper and drill appropriate size hole in bumper wing top to mount turn signal mount.

Bolt turn signal mount to bumper with supplied hardware

Wire turn signals into stock turn signal wiring harness

Installation of Engineered Vintage Shackle Brackets (sold

separately) or stock GM tow hooks

The holes in the 'GOAT' frame brackets are for installation of stock factory tow hooks OR Engineered Vintage's popular Shackle Bracket Tow Hooks.

### Shackle Bracket PARTS LIST

QTY DESCRIPTION

-2- SHACKLE BRACKET TOW HOOKS

67-72 GM Shackle Bracket Hooks

# 67-72 Shackle Bracket Hardware kit (bagged separately)

ID	Qty	Description	Where Used
Α	6	5/8-11 UNC GR 8 BOLTS, 2" LONG	(6) - Used to secure Shackle bracket to frame bracket
В	12	5/8 washers	Use (2) per bolt
С	6	5/8 lock nuts (or lock washers & nuts)	Use (1) per bolt

## **Shackle Bracket or OEM Tow Hook Installation**

Install the 'GOAT' bumper per normal instructions. Install the Shackle Brackets in holes shown, with provided hardware.



# Installation of HD Triangulation Kit (sold separately)

If you plan to use your 'GOAT' bumper for heavy duty winching with a winch greater than 9K lb pulling capacity, we recommend our optional accessory (sold separately): The HD Triangulation Kit. This kit ties the 'GOAT' bumper into the truck frame in additional places and significantly reinforces the front frame horns of these trucks.

The HD Triangulation Kit consists of (4) additional 1/4" steel brackets

# **HD Triangulation Kit LIST**

### QTY DESCRIPTION

- -1- FRAME BRACKET, DRIVER (LH)
- -1- FRAME BRACKET, PASSENGER (RH)
- -1- STRAP, DRIVER (LH)
- -1- STRAP, PASSENGER (RH)



# **HD Triangulation hardware kit**

(bagged separately)

ID	Qty	Description	Where Used
Α	2	1/2-13 UNC GR 8 BOLTS, 2" LONG	(2) - Used to secure rear of bracket to frame
В	6	1/2-13 UNC GR 8 BOLTS, 1.5" LONG	Used to secure bottom of bracket to bottom of frame C-channel
С	16	1/2" washers	Use (2) per 1/2" bolt
D	8	1/2" nyloc nuts (or lock washers & nuts)	Use (1) per 1/2" bolt
Е	2	7/16 x 1" CARRIAGE BOLTS	Used to secure winch straps to bottom winch plate
F	2	7/16" washers	Use (1) per 7/16" bolt
G	2	7/16" nyloc nuts (or lock washers & nuts)	Use (1) per 7/16" bolt

NOTICE

If your state requires your vehicle to have a front license plate, check out our License Plate Flip kit or license plate mouting bracket (both sold separately) on our website.

### Recommended care:

Regular washing with fresh water and mild car wash detergent followed by rinsing and drying with a soft towel is the best minimum care. Beyond that, any cleaner/wax recommended for automotive finishes will work well to remove minor stains and scuffs and provide protection.

Thank you and check out our other products at:

# Engineered Vintage.com

