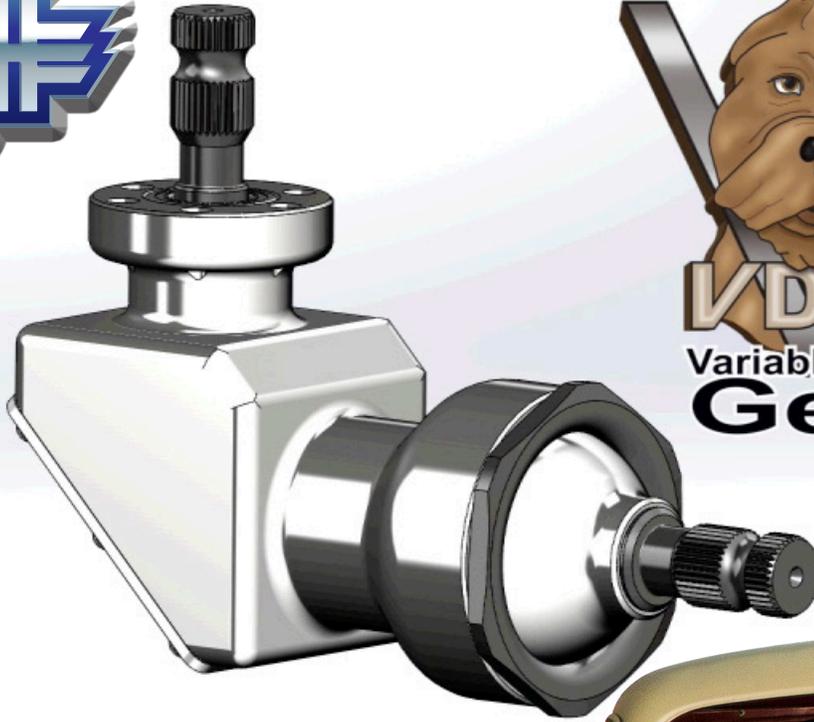




Flaming River Ind.
800 Poertner Dr
Berea, OH 44017
800-648-8022

FR20302 V.D.O.G.



**2018 SEMA
Best New Street Rod Product &
Best New Engineered Product**



Installation Instructions



VDOG Variable Angle Gear

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The VDOG has been torqued and lubricated at the factory. No further lubrication or adjustment is necessary. Dismantling the VDOG in any way will void the warranty

WARRANTY DISCLAIMER: Flaming River's® Limited Warranty

Flaming River® warrants its products to be free from defects in material and workmanship for a period of one (1) year after the date of purchase, except that: All steering columns are warranted for a period of three (3) years from the date of purchase. The Big Switch (part number FR1005) is warranted for a period of three (3) years from the date of purchase, provided that it is not mounted with a steel bracket and provided further that it is adequately protected from environmental conditions. All electrical products other than the Big Switch are warranted for a period of ninety (90) days from the date of purchase. Flaming River's® warranty liability is limited to the replacement of defective products. Flaming River® is not liable for any labor costs associated with any warranty claim, or for any incidental or consequential damages. Improper installation, abuse, racing, and/or modification of the products voids this warranty. No warranty of merchantability or fitness for a particular purpose is made by Flaming River® with respect to any of its products. Warnings and Recommendations It is the customer's responsibility to determine the suitability of a given Flaming River® product for the customer's uses. Likewise, it is the customer's responsibility to install a Flaming River® product. Contact the vehicle manufacturer whenever installing a switch to confirm the appropriateness of using such a switch and the recommended placement of the switch on the vehicle. Use qualified chassis specialists for the installation of all steering related components. Be aware that the installation of certain Flaming River® products may adversely impact a manufacturer's warranty with respect to certain vehicles and other manufactured goods. Flaming River will repair or replace any product found to be defective in material or workmanship. Improper installation, abuse, racing and/or modification VOID WARRANTY. Flaming River® is not responsible for any labor costs associated with any warranty.



Variable Angle Gear

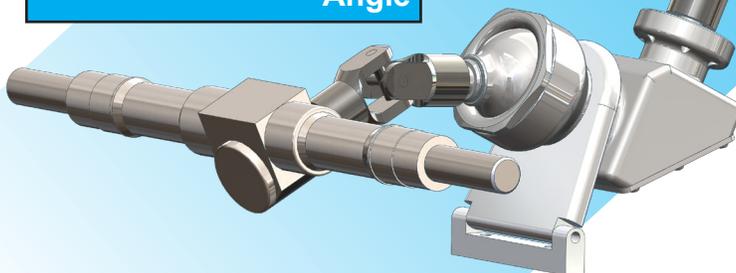
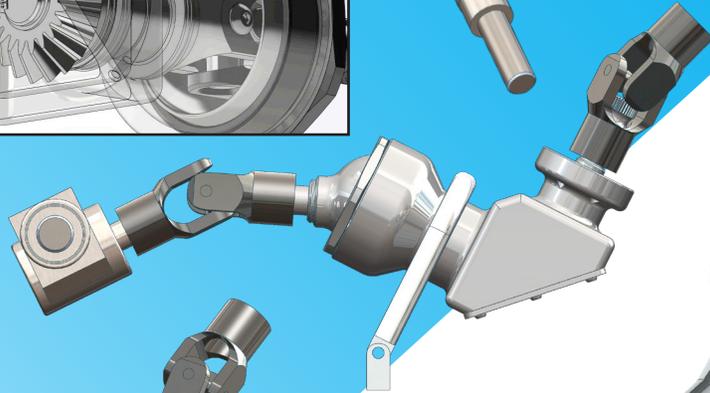
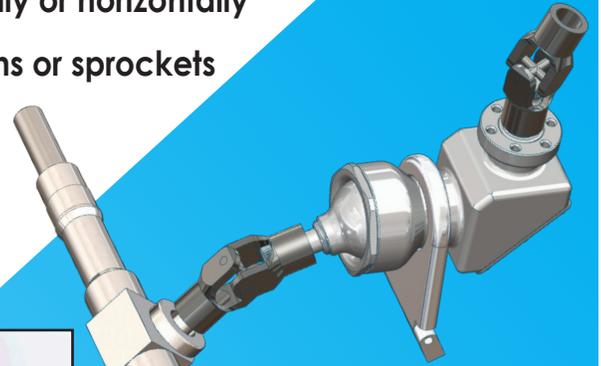
- 90° gear box with a 35° variable angle shaft
- Articulating ball design for maximum adjustability
- 1:1 ratio to maintain rack and pinion or steering box gear ratio.
- Multiple mounting feature – can be mounted vertically or horizontally
- All Gear Drive – No chains or sprockets
- Made in the USA



FR20302



Max. 35°
Angle



Firewall

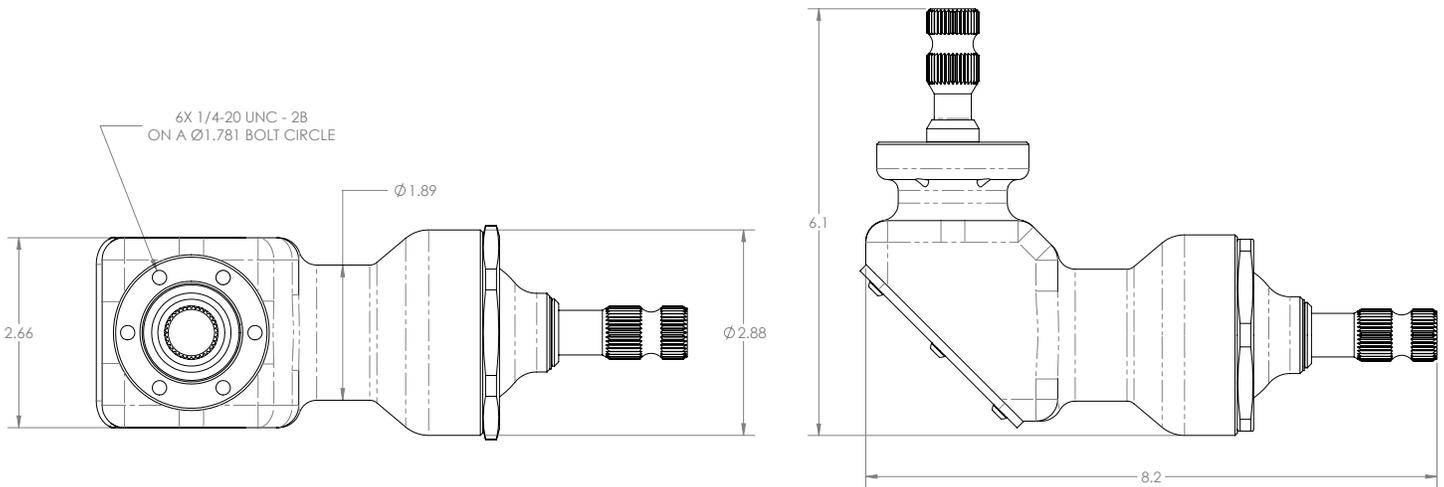
The VDOG™ has an aluminum housing and the output shaft is 3/4-36 for compatibility with universal joints. The unit is gear driven without any chains or sprockets. It can be mounted in horizontal or vertical positions - ideal for Cab-Over vehicles, T-Buckets and specialty builds with big motors and tight firewall clearance.

Designed and built in the USA!



Quality Steering Systems

VDOG Dimensions



Mock up VDOG Mounting Location

Depending on your specific needs, the VDOG can be mounted to the firewall or frame rail. (Be sure it is mounted to a sturdy surface).

3/4"-36 shaft

Mounting Options

Firewall Mounting

Frame Mounting (using bracket
or optional pillow block mount)

Design Mounting Bracket

Fabricate a mounting bracket to fit the VDOG that will secure it in the correct position so that it will line up with your rack or box and the steering column. We added a pillow block mount to the bracket, which will hold the VDOG.

COMING SOON!

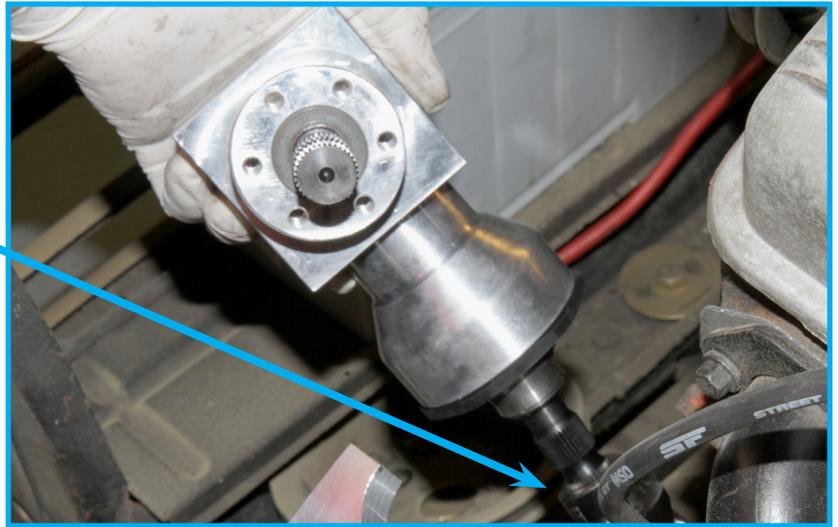
Optional Pillow Block Mount

**1.89" diameter
mounting surface**

3/4"-36 shaft

Test Fit the VDOG

Check the angles and fitment of the VDOG input and output shafts with your u-joints before mounting into position.

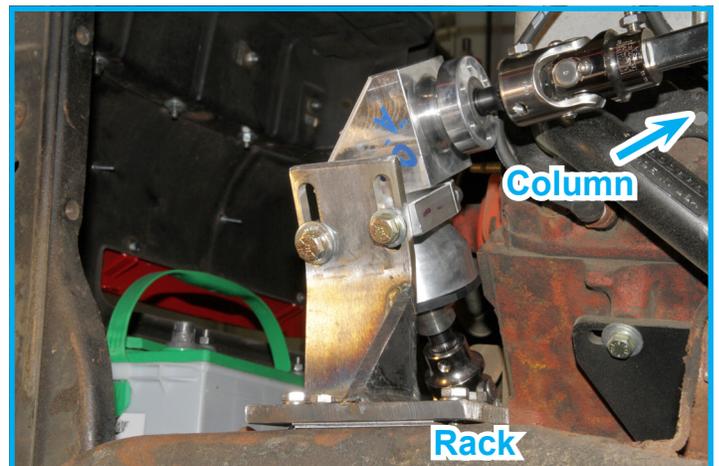


Install the VDOG

1. Secure the VDOG into the mounting bracket. (Fig. 1)
2. Attach the u-joints to the input and output shafts of the VDOG. (Fig. 2)
3. Torque set screws of u-joints. Use a red thread locker on the threads of the set screw, torque set screw to no more than 25 ft lbs., then tighten the lock nuts. (Fig. 3)



VDOG Installed in Vehicle





In order to ensure the best customer experience possible, we've created a Customer Satisfaction Survey to gather important feedback about different facets of our business. We would appreciate it if you could please take a couple of minutes to fill out this survey about your experience.

The results of the survey will be used to improve and gather feedback about customer service, technical and sales support, order processing and fulfillment, manufacturing, and new product development.

Upon completing the survey, you will be issued a discount coupon code to be used on your next online purchase at www.flamingriver.com/survey.



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