

INSTALLATION & USER'S GUIDE

Adventure TorqDrive® Clutch

For Kawasaki Versys 650, Ninja 650, and Z650

Doc ID: 191-2840A Revision: 040819

TABLE OF CONTENTS

OVERVIEW	2
INSTALLATION TIPS	2
TOOLS NEEDED	3
Optional parts	4
INCLUDED PARTS	4
DISASSEMBLE THE CLUTCH	5
CLUTCH PACK INSTALLATION	7
Notes for clutch pack installation	8
BREAK-IN	12
TROUBLESHOOTING	12
Clutch Drag	12
Clutch Slip	12
MAINTENANCE	12
Disk inspection examples	13
NEED ADDITIONAL HELP?	15

OVERVIEW

This guide shows you how to replace your OE (Original Equipment) or "stock" clutch parts with your new Rekluse TorqDrive® clutch parts. The following parts are replaced:

- OE Drive Plates
- OE Friction Disks

INSTALLATION TIPS

Read the separate included Safety
 Information document before operating the vehicle with the product installed.



 Read this entire document before performing any steps.

Pg. 2 Doc ID: 191-2840A Doc Rev: 040819

- If you install this product for a customer or another person, instruct them to read the **Safety Information** document and the **Installation and User Guide** before operating the bike with the product.
- Protect eyes and skin wear safety glasses and work gloves.
- Lay the motorcycle on its left side when replacing the clutch. This makes working on the clutch easier and eliminates the need to drain the oil. Catch any fuel that may drain from the bike.
- Use the torque values listed in the instructions. Otherwise, use the torque specifications found in your OE service manual.
- For optimal clutch performance Rekluse recommends using fresh, clean oil that meets JASO-MA oil rating requirements. Rekluse offers Factory Formulated Oil™ developed specifically for Rekluse products. Rekluse Factory Formulated Oil is a perfect complement to any OEM or aftermarket wet clutch. Visit www.rekluse.com to learn more.

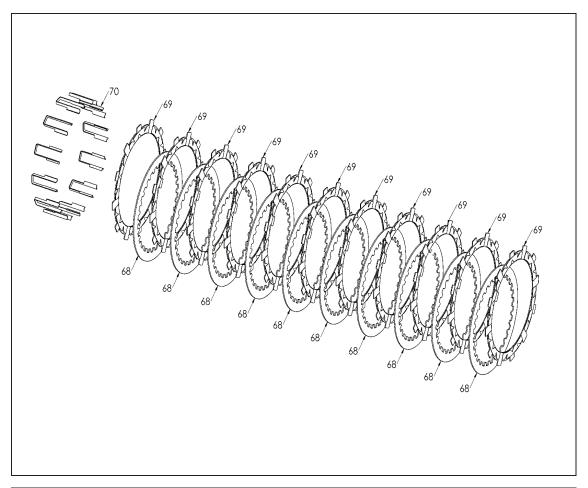
TOOLS NEEDED

	8 mm	10 mm	
Fluid Catch Container	8 mm Socket	10 mm Socket	Torque Wrench
	30 mm		
Metric Hex Key Set	30 mm Socket		

Optional parts

Rekluse recommends installing a new OE clutch cover gasket when reinstalling the clutch cover.

INCLUDED PARTS



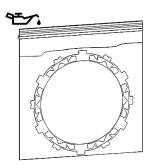
Item	Description	Qty.
68	Steel drive plates	10
69	TorqDrive friction disks	11
70	Basket sleeves	12

Visit www.rekluse.com/support for a full parts fiche illustration and part numbers.

Pg. 4 Doc ID: 191-2840A Doc Rev: 040819

DISASSEMBLE THE CLUTCH

1. Soak the Rekluse friction disks in new oil for at least 5 minutes. Make sure the friction disks are coated on both sides.



- 2. Stand the bike on a suitable bike stand, then drain the oil into a suitable container.
- 3. Use a hex key to remove the rear engine guard.

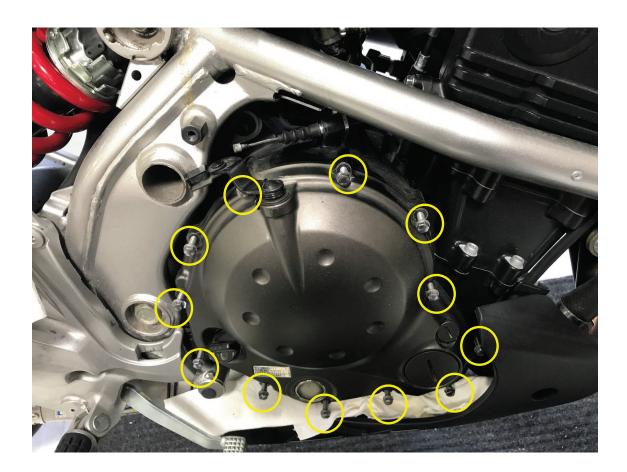


4. Unhook the clutch cable from the clutch actuator arm.





5. Use an 8 mm socket to remove the clutch cover bolts.

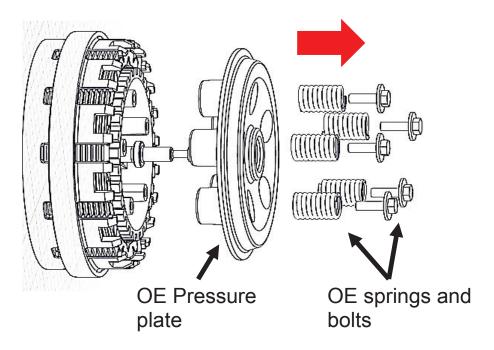


6. Remove the clutch cover and gasket. Set these aside. They will be reused.

Note: Rekluse recommends installing a new OE clutch cover gasket when reinstalling the clutch cover.

Pg. 6 Doc ID: 191-2840A Doc Rev: 040819

7. Remove the OE pressure plate bolts and springs, then remove the pressure plate.



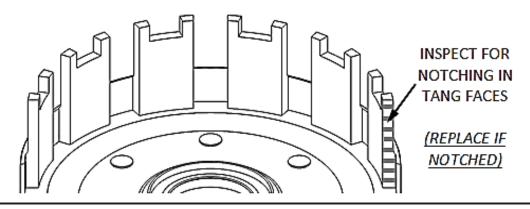
8. Remove the entire OE clutch pack.

CLUTCH PACK INSTALLATION

1. Inspect the clutch basket for spring damper play or notching. Do not install sleeves or use product with a notched basket. Notched basket tang faces or worn spring dampers can cause the sleeves to break.

AWARNING

Failure to inspect the basket and replace if necessary could result in death, serious injury, and/or property damage.



Doc ID: 191-2840A

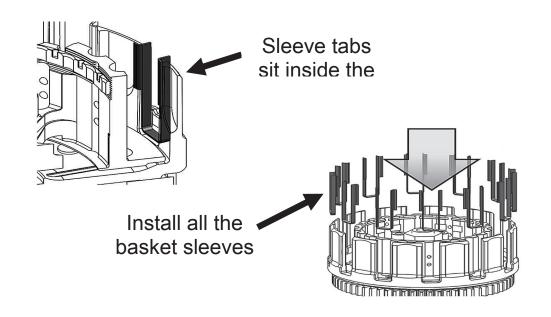
Doc Rev: 040819

Notes for clutch pack installation

- Some friction disks are marked with a small colored dot. This mark is used for processing and can be ignored.
- Some OE basket have "half slots" at the top of the basket tangs. Rekluse products require the entire clutch pack be installed into the MAIN (deeper) basket slots. Do not use the "half slots." See the following picture for reference.



2. Install all of the Rekluse basket sleeves into the basket slots. Make sure the bottom of the sleeve is facing down, and the sleeve tabs sit against the inside of the basket.

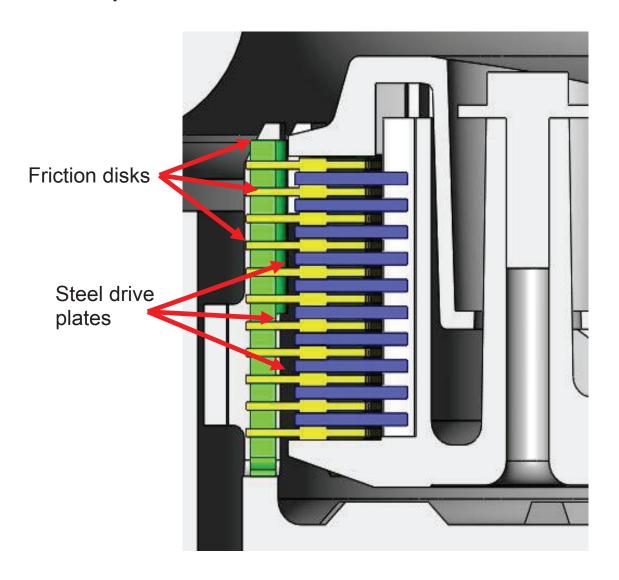


Pg. 8 Doc ID: 191-2840A Doc Rev: 040819

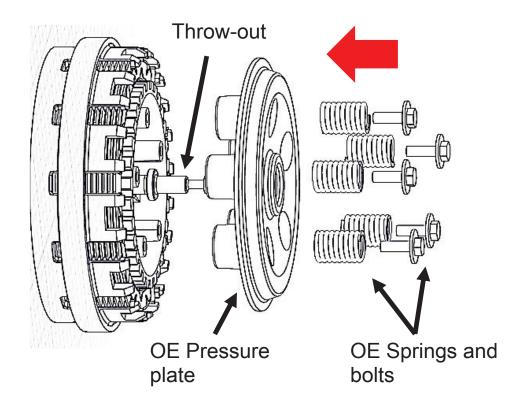
Note: When seated in the basket, the sleeve tops will sit flush with the top of the basket.

- 3. Install a friction disk, then install a steel drive plate.
- 4. Continue alternating friction disks with steel drive plates for the entire clutch pack, ending with a friction disk.

Clutch pack cross section



5. Reinstall the OE pressure plate, then reinstall the pressure plate springs and bolts. *If the throw-out was removed with the pressure plate, reinstall it before reinstalling the pressure plate.*



- 6. Torque pressure plate bolts in small increments in a star pattern to OE specifications.
- 7. Reinstall the OE clutch cover gasket or new OE gasket, then reinstall the clutch cover by lightly tightening the cover bolts in a star pattern.
- 8. Torque the clutch cover bolts in small increments to OE specifications.

Pg. 10 Doc ID: 191-2840A Doc Rev: 040819

9. Reinstall the clutch cable to the clutch actuator arm.





9. Use a hex key to reinstall rear engine guard.



- 10. Add oil according to the OE instructions.
- 11. Check the clutch lever for free play.
- 12. Adjust free play using the threaded cable tension adjuster by the clutch cover, then adjusting the tension with the perch adjuster.

BREAK-IN

- Break-in will occur over the first 1-2 hours of use, depending on the rider. During break-in more clutch drag may occur than normal.
- It is recommended to do an oil change after the first 1000 miles to drain any excess clutch debris that occurred from break-in.

TROUBLESHOOTING

Clutch Drag:

- Cold Drag Only If drag occurs only while the bike is cold, oil is the most likely cause. Be sure to warm up the bike before riding/racing. Use of new or lighter weight oil can help to minimize cold drag.
- Hot and Cold Drag –Check for any warped steel drive plates or frictions in the clutch pack, or other signs of wear caused by extreme heat.

Clutch Slip:

 If clutch slip occurs, inspect the clutch for signs of wear or heat.

MAINTENANCE

To keep your clutch performing at its best, perform regular maintenance on your bike and clutch. Clutch longevity and performance is greatly increased with oil quality and other bike factors that reduce engine heat.

- Inspect all of your clutch parts at regular maintenance intervals for signs wear or excessive heat, and replace components as necessary. Clutch wear is dependent on the riders use.
- Inspect and replace basket sleeves if they appear to be notched from friction disks.

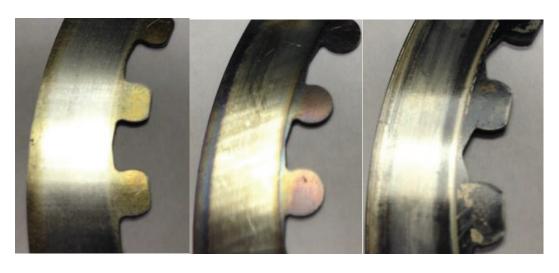
Pg. 12 Doc ID: 191-2840A Doc Rev: 040819

- Keep up with regular oil changes as per the bike manufacturer's recommendations. Clutch performance and longevity depend on oil quality.
- For optimal clutch performance Rekluse recommends using fresh, clean oil that meets JASO-MA oil rating requirements.
- Repeat the break-in procedure anytime you replace the friction disks. Always soak friction disks in new oil for at least 5 minutes before installing.
- Oil recommendations can be viewed under Tech Tips on our website at www.rekluse.com/support/videos/atv-mc-support-videos.

Disk inspection examples

When inspecting the clutch pack, the following pictures can be used as a reference. These are best viewed in color by viewing this install document at www.rekluse.com/support.

Drive Plates — If the clutch pack is getting high amounts of heat, purple, blue, or black color can be seen on the drive plate teeth. See pictures below. Not all drive plates look the same and may look different than pictured.



Normal Heat

High Heat

Excessive Heat

(Blue) (Black)

Friction Disks — Due to the dark color of the friction material, the friction disks will appear almost black as soon as they are put in oil. During inspection, look for glazing of the friction material. Glazing will appear shiny and feel like glass, even after oil is cleaned from the friction disk. Not all friction disks look the same and may look different than pictured.



Normal Friction



Glazed Friction

Pg. 14 Doc ID: 191-2840A Doc Rev: 040819

NEED ADDITIONAL HELP?

Website

www.rekluse.com/support

Frequently asked questions

www.rekluse.com/faq

Support Videos

www.rekluse.com/support/videos

Phone

(208) 426-0659

Technical Support

Contact Technical Support for questions related to product installation, tuning, and performance.

Hours:

Monday thru Friday: 8:00 a.m. - 5:00 p.m.

Mountain Time zone

Email: tech@rekluse.com

Customer Service

Contact Customer Service for additional product information, orders, and returns.

Hours:

Monday thru Friday: 8:00 a.m. - 5:00 p.m.

Mountain Time zone

Email: customerservice@rekluse.com