

# INSTALLATION & USER'S GUIDE

TorqDrive® Clutch Pack BMW F750 & F850

Doc ID: 191-2809009A Revision: 061019

## **TABLE OF CONTENTS**

OVERVIEW	2
INSTALLATION TIPS	3
TOOLS NEEDED	3
INCLUDED PARTS	4
DISASSEMBLE THE CLUTCH	5
CLUTCH PACK INSTALLATION	8
Notes for Installation	8
Install the Clutch Pack	
Install Pressure Plate	10
MAINTENANCE	13
Clutch Wear	13
INSPECT THE CLUTCH PACK	15
NEED ADDITIONAL HELP?	16

## **OVERVIEW**

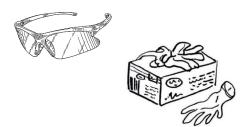
This kit replaces the OE (Original Equipment) clutch pack with a Rekluse TorqDrive® Clutch Pack. The following parts are replaced:

- All OE steel drive plates will be replaced with Rekluse steel drive plates.
- All OE friction disks will be replaced with Rekluse TorqDrive<sup>®</sup> disks.
- The OE pressure plate springs are replaced with Rekluse springs.

Rekluse clutches require good condition OE parts for proper function. Inspection of the basket, pressure plate, & hub are required. If any of these parts are worn, replacement parts will need to be ordered before installation of the product.

## **INSTALLATION TIPS**

- Read this entire document before performing any steps.
- Read the safety information sheet included with your kit.
- Protect eyes and skin wear safety glasses and thin disposable work gloves.
- Set the motorcycle on its side stand. This makes the clutch work easier and eliminates the need to drain the oil.

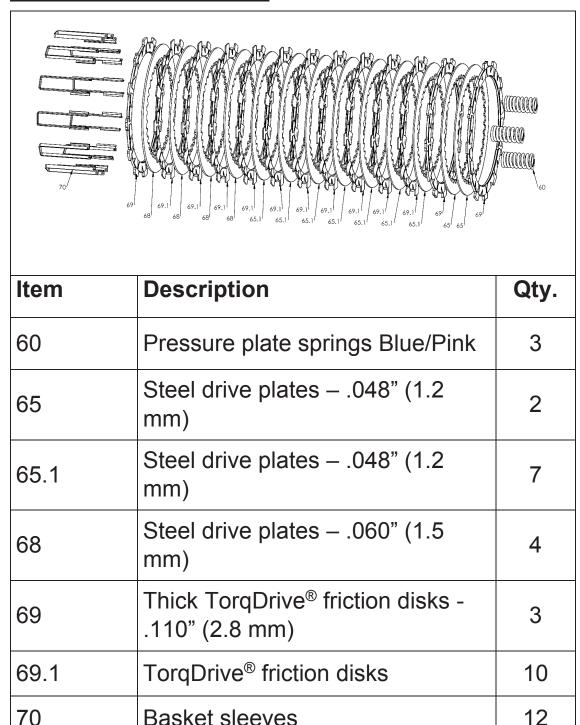


- For optimal clutch performance Rekluse recommends using fresh, clean oil that meets JASO-MA oil rating requirements. Rekluse offers Factory Formulated Oil™ developed specifically for Rekluse products. Rekluse Factory Formulated Oil is a perfect complement to any OEM or aftermarket wet clutch. Visit www.rekluse.com to learn more.
- Use the torque values listed in the instructions.
  Otherwise, use the torque specifications found in your OE service manual.

## **TOOLS NEEDED**

- T40 torx socket
- 10mm socket
- Pick set
- Torque wrench

# **INCLUDED PARTS**



Visit <a href="www.rekluse.com/support">www.rekluse.com/support</a> for a full parts fiche illustration and part numbers.

1

Clutch Cover Gasket

Pg. 4 Doc ID: 191-2809009A Doc Rev: 061019

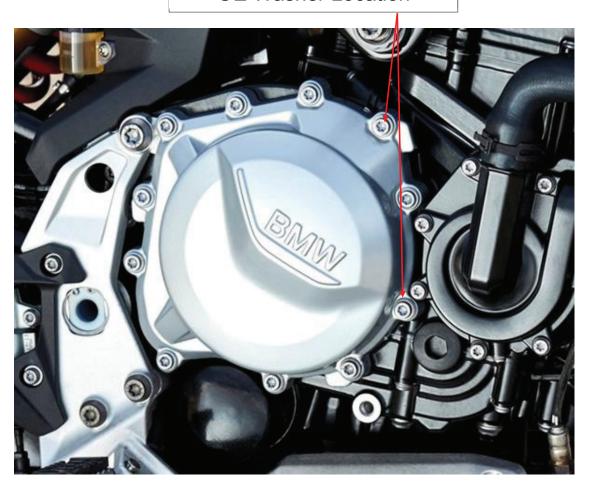
Not Shown

## **DISASSEMBLE THE CLUTCH**

1. With the bike on its side stand, use an T40 torx socket to remove the clutch cover.

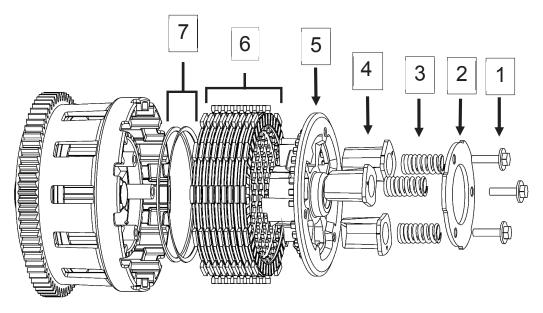
**NOTE:** 2 of the cover bolts require sealing washers and the washers need to be reinstalled in the OE location shown below.

**OE** Washer Location



2.Use a 10mm socket to remove the pressure plate bolts allowing removal of the following OE parts:

**NOTE:** Item 3 & 6 are not reused with the Rekluse clutch pack and can be set aside.



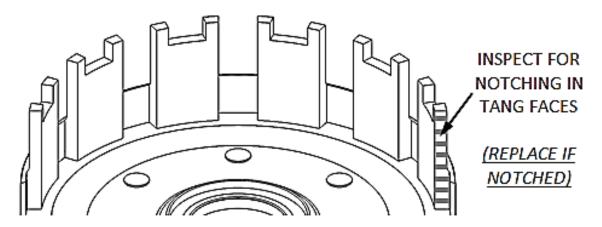
1	Pressure Plate Bolts
2	Spring Retainer Plate
3	Pressure Plate Springs
4	Spring Cups
5	Pressure Plate
6	Clutch Pack
7	Judder Seat & Spring

3.Inspect the clutch basket for notching. Notched basket tang faces can cause the Rekluse basket sleeves to break. Do not use baskets that have been filed, machined, or modified on the tangs. Replace basket if necessary.

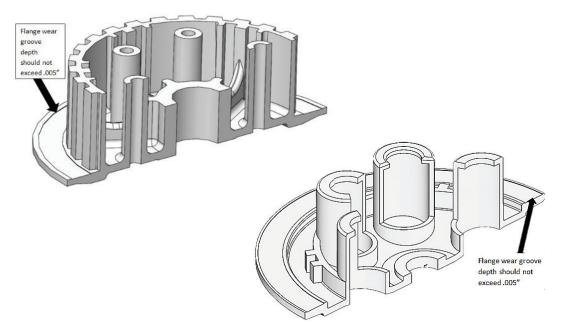
Pg. 6 Doc ID: 191-2809009A Doc Rev: 061019

#### **AWARNING**

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



4.Inspect your OE center hub and pressure plate flanges for excess wear. If wear is visible use a drop gauge to verify that the wear across the flange does not exceed .005" (.12mm).

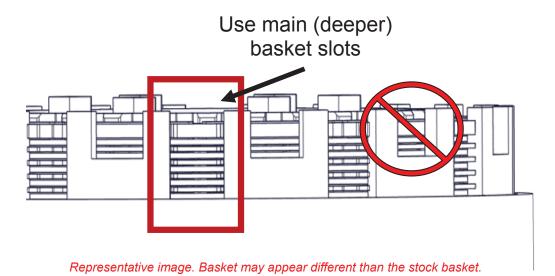


Representative image. Hub & Pressure Plate may appear different than the stock.

## **CLUTCH PACK INSTALLATION**

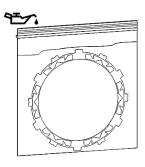
#### **Notes for installation**

- Some friction disks are marked with a small colored dot. This mark is used for processing and can be ignored.
- Some OE baskets 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. Installing the clutch pack into the "half slots" will cause performance issues. See the following picture for reference.



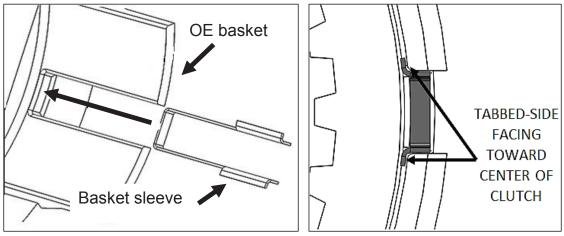
# Install the clutch pack

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



2. Install ALL the Rekluse basket sleeves into the basket slots. Make sure the sleeve tabs sit against the inside of the basket, then push the sleeves down until they contact the bottom of the tang slot. See pictures for reference. Do not install basket sleeves or use product with a notched basket.

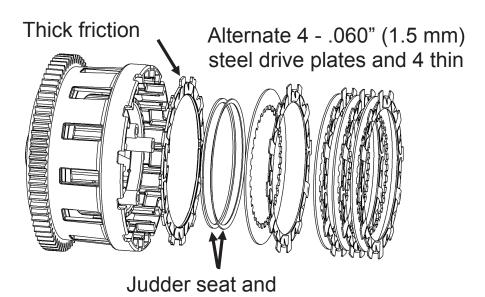
Pg. 8 Doc ID: 191-2809009A Doc Rev: 061019



Representative image. Basket may appear different than the stock basket.

**NOTE:** When seated in the basket slots, the sleeves will sit slightly below flush with the top of the basket tangs. This is normal.

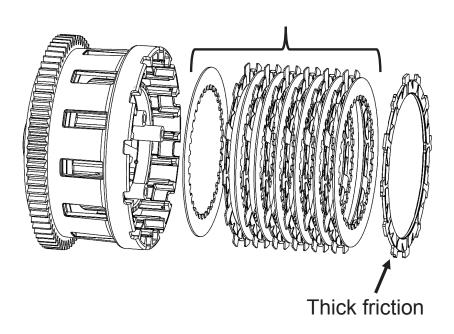
- 3. Install a thick Rekluse friction disk into the clutch basket.
- 4. Reinstall the judder seat, then reinstall the judder spring, **cupped side up**.
- 5. Next, install a .060" (1.5 mm) steel drive plate followed by a thin friction disk.
- 6. Continue to alternate 3 additional .060" (1.5 mm) steel drive plates with 3 additional thin friction disks.



Doc ID: 191-2809009A Doc Rev: 061019 Pg. 9

- 7. Next install a .048" (1.2 mm) steel drive plate.
- 8. Alternate the remaining 6 thin friction disks with the remaining 6 steel drive plates.
- 9. On top of the last steel drive plate, install a thick friction disk.

Alternate a total of 7 - .048" (1.2 mm) steel drive plates with 7 friction disks

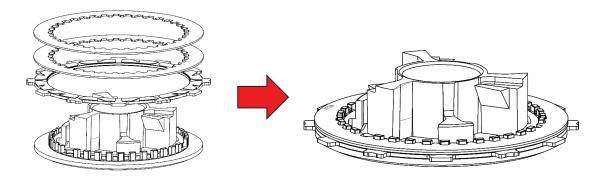


## **INSTALL PRESSURE PLATE**

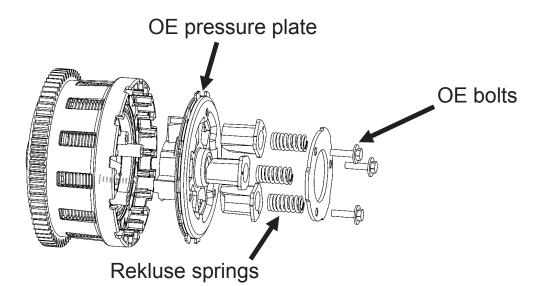
1. Turn the OE pressure plate upside down on a workbench, then install a .110" (2.79mm) Rekluse thick friction disk onto the pressure plate.

Pg. 10 Doc ID: 191-2809009A Doc Rev: 061019

2. Install the remaining 2 - .048" (1.2 mm) steel drive plates stacked on top of each other on top of the friction disk



- 3. Turn the assembled pressure plate right side up, then install it onto the clutch pack.
- 4. Make sure the drive plate teeth stay aligned in the pressure plate teeth during installation. Damage can occur if pressure plate is installed with misaligned drive plates.
- 5. Install the OE spring cups into the OE pressure plate.
- 6. Install the Rekluse pressure plate springs into the OE spring cups, then reinstall the OE spring plate and OE pressure plate bolts.



7. Evenly tighten the bolts, then torque the bolts to 10 N-m (89 in-lbs).

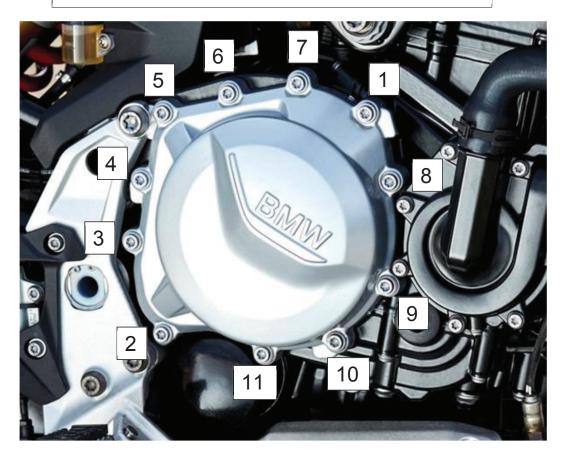
- 8. Verify the case and clutch cover are clean and free from residual silicone sealant and other contaminants.
- 9. Using the supplied gasket reinstall the clutch cover and lightly tightening the cover bolts using the factory sequence below. The cover can crack if not torqued correctly. Tighten bolts in small increments before torquing the cover bolts to 20 N-m (177 in-lbs).

**NOTE:** 2 of the cover bolts require sealing washers and need to be reinstalled in the OE location shown.





#### Torque Sequence



# **MAINTENANCE**

## Clutch wear

Rekluse clutch packs are built using high quality materials but do wear based on the rider's use, type of terrain, and natural wear and tear.

- Clutch longevity and performance is greatly increased with oil quality and other bike factors that reduce engine heat.
- Riding style, such as speed, engine RPM, and terrain can also affect the life of the clutch pack.
- To keep your clutch performing at its best, perform regular maintenance on your bike and clutch based on your riding style.

- 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.
- Keep up with regular oil changes as per the bike manufacturer's recommendations. Clutch performance and longevity depend on oil quality.

#### **Clutch parts**

Inspect all your clutch parts at regular intervals for signs of wear or excessive heat and replace components as necessary.

- Measuring the clutch pack can help determine if the components need replacing. The clutch pack is measured with the entire clutch pack together. Include the friction pad in the measurement. See the Setup Sheet at the back of the manual for clutch pack measurements.
  - Change the oil filter and/or clean the oil screen with every oil change.

#### **Basket:**

 Inspect and replace basket sleeves if they appear to be notched from friction disks. Rekluse recommends replacing them according to the maintenance schedule, if you notice wear, or every time friction disks are replaced.

Pg. 14 Doc ID: 191-2809009A Doc Rev: 061019

## **INSPECT THE CLUTCH PACK**

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 on our website 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 (Blue)

Excessive Heat (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

## **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

REKLUSE

Pg. 16 Doc ID: 191-2809009A Doc Rev: 061019

