

# **HYPERPRO**

## **STEERING DAMPER MOUNTING KIT**

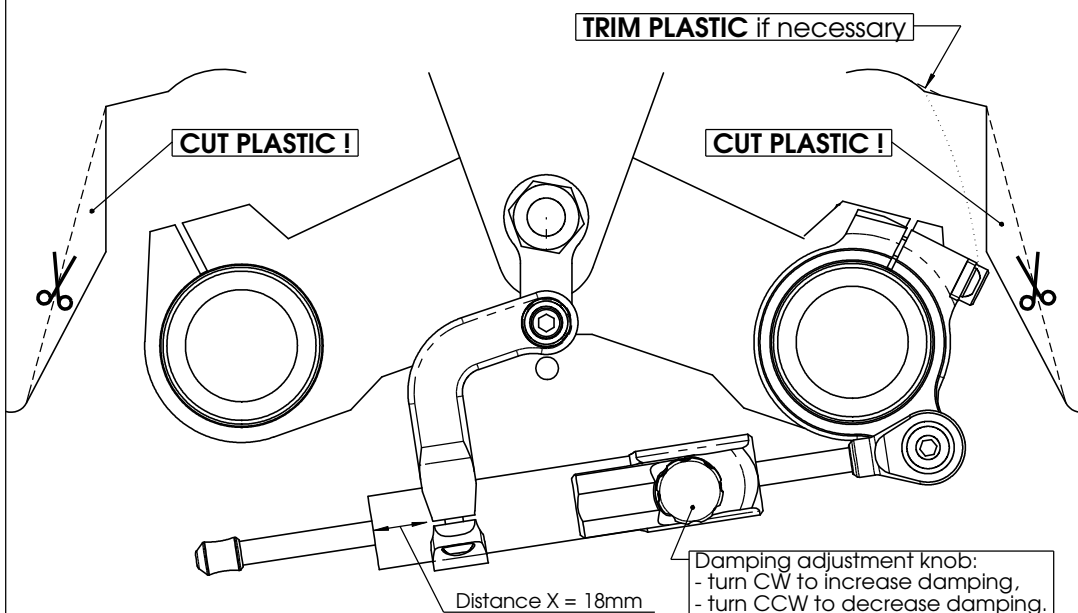
for

**BMW R1200 GS  
Model 2013**

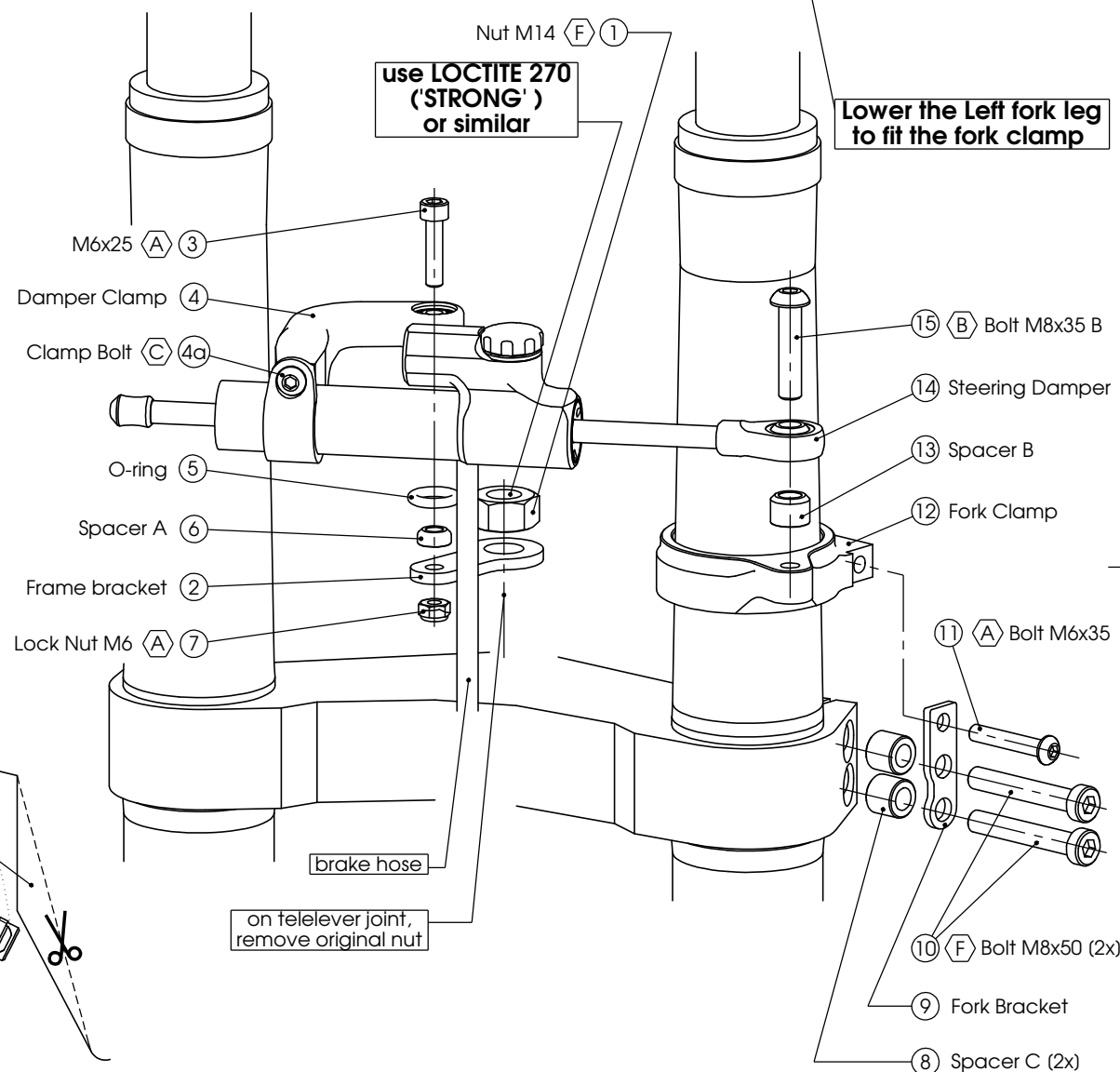
### **MK-BM12-B004 A PART LIST**

SD stroke 75	1	M8x50 Low head 10.9	2
Damper Clamp (MP-DB408600)	1	Lock nut M6	1
Fork Clamp (MP-FOMK92-1)	1	Nut M14x1.5	1
Fork Bracket (MP-FOMK92-2)	1	O-Ring 12x3.5	1
Frame bracket (MP-FRMK31)	1	Spacer A D12d6L5 (MP-SP0022)	1
M6x25	1	Spacer B D14d8L10 (MP-SP0023)	1
M6x35 Button head 10.9	1	Spacer C D14d8L12 (MP-SP081412)	2
M8x35 Button head	1	-	-

ALL IDEAS, DESIGNS ARRANGEMENTS AND PLANS INDICATED OR REPRESENTED BY THIS DRAWING ARE OWNED BY HYPERPRO AND WERE CREATED, EVOLVED AND DEVELOPED FOR USE ON AND IN CONNECTION WITH THE SPECIFIC PROJECT. NONE SUCH IDEAS, DESIGNS, ARRANGEMENTS OR PLANS SHALL BE USED BY OR DISCLOSED TO ANY PERSON, FIRM OR CORPORATION FOR ANY PURPOSE WHATSOEVER WITHOUT THE WRITTEN PERMISSION OF HYPERPRO.



1. Put the bike on its center stand
2. Lift / jack the front of the bike



#### \* TORQUES

A: 5-9Nm / 44-80Lbs.In / 4.0-6.4Lbs.Ft  
B: 14-17Nm / 124-150Lbs.In / 10.3-12.5Lbs.Ft  
C: 6Nm / 53Lbs.In / 4.4Lbs.Ft

D: 8Nm / 70Lbs.In / 5.9Lbs.Ft  
E: 55Nm / 486Lbs.In / 40Lbs.Ft  
F: Factory torque (see owners manual)

# **HYPERPRO**

## **STEERING DAMPER MOUNTING KIT**

for

**BMW R1200 GS  
Model 2013**

### **MK-BM12-B004 A INSTALLATION INSTRUCTIONS**

#### ***In general:***

HYPERPRO can not be held responsible in any way for any form of physical, material, financial or other damage arising from use, assembly or overhaul of HYPERPRO products. HYPERPRO reserves the right to make changes without prior notice.

This product is ONLY TO BE INSTALLED BY A PROFESSIONAL MECHANIC.

This product is only to be used for the motorcycle brand, model and year stated specifically on top of the pages of this manual.

DO NOT attempt to install this product on motorcycles from any different brand, model and/or year than stated on the pages of this manual.

DO NOT use this kit for cars, boats, jet skis, snowmobiles, ATV's, aircraft, hovercrafts or any other vehicle and/or purpose.

HYPERPRO steering dampers are FOR RACE USE ONLY, NOT FOR HIGHWAY USE!

#### ***Before installation:***

- Please read the entire manual carefully before starting the installation!
- Check if you have all the tools required. Good tools are a must.
- Protect your bike at the most important places in and around the work area (e.g. tank, fairing, frame, etc.), with a blanket, towel or similar.

#### ***During installation:***

- Check all operations and parts carefully before, during and after performing each step.
- Clean all surfaces that are required for fitting parts together or for applying self adhesives or loctite, thoroughly with contactcleaner or another degreaser, unless otherwise stated.
- Be carefull not to damage or scratch any part of your bike.
- ALWAYS work relaxed and concentrated!! It is very easy to damage something or make a mistake.

#### ***After installation:***

- Check and make sure that there is no contact between any part of the steering damper kit and any part of the motorcycle. The kit should not hit anything. Steering movement should not be limited by the steering damper. If the steering movement is limited, adjust the position of the tube in the clamp untill steering movent is normal again. Do not forget to tighten the clamp bolt again!
- ALWAYS check the steering movement and feeling before each ride !
- FIRST RIDES: Start with the damper turned fully open (turn adjuster knob fully counter clockwise). Start adjusting in between rides with steps of MAX. 2 CLICKS (0.25 TURN) EACH TIME, untill the damper is working satisfactory for your riding style.
- NEVER USE MAXIMUM SETTING, ALWAYS OPEN AT LEAST 2 CLICKS (0.25 TURN).
- WARNING ! DAMPER HAS AN ACTIVE / SPEEDSENSITIVE DAMPING SYSTEM;
  - Steering with NORMAL MOVEMENT should be FREE !!
  - Steering with FAST MOVEMENT should be CONTROLLED BY DAMPER !!
- HYPERPRO uses a special seal to reduce friction. The seal uses an oil film to work properly. It is normal that some oil can appear on the pistonrod.
- Damper works with oil: DAMPING CAN BE HARDER AT LOWER TEMPERATURES!

#### ***Step 1: put the bike on the center stand***

- Put the bike on its center stand on a level and hard, stabile surface.

#### ***Step 2: lift the front of the bike***

- Place a jack under the engine or prepare to lift the front with by crane.
- Carefully lift the front so the front wheel barely touches the ground.

#### ***Step 3: install frame bracket & damper clamp***

Install the frame bracket and damper clamp using:

- Nut M14x1.5 (1)
- Frame bracket (2)
- Bolt M6x25 (3)
- Damper Clamp (4)
- O-ring (5)
- Spacer A (6)
- Lock nut M6 (7)

Remove the black cap from the front of telelever, exposing the nut. Loosen and remove the original nut. Place the frame bracket (2) over the thread and in the riding direction. Apply strong Loctite on the supplied M14 nut (1) and tighten the nut to factory torque (see workshop manual).

Put the assembly together as shown on page 1: Use the M6x25 bolt (3), O-ring (4), Spacer A (5) and the lock nut (7) to mount the damper clamp (4) to the frame bracket (7). Tighten the lock nut to a torque of approx. 5-9Nm/44-80Lbs.ln/4.0-6.4Lbs.Ft.

#### ***Step 4: install the fork bracket & fork clamp***

Install the fork bracket using:

- Spacer C (8)
- Fork Bracket (9)
- 2x Bolt M8x50 L (10)
- Bolt M6x35 (11)
- Fork clamp (12)

Remove the black cap from the top of the left fork leg, exposing the top nut. Loosen the left fork leg from the top triple clamp. Lower the inner chrome tube and place the fork clamp (12) around the fork leg. Re-install the fork leg to the top triple clamp and tighten the nut to factory torque setting (see workshop manual). Re-install the black cap.

Loosen and remove the 2 clamp bolts from the Left side of the lower triple clamp. Install spacers C (8), fork bracket (9) and bolts M8x50 (10). Slide and rotate the fork clamp (12) into place and fit the M6x35 bolt (11). Tighten the M8 bolts (10) to factory torque (see workshop manual), then tighten the M6 bolt to a torque of approx. 5-9Nm/44-80Lbs.ln/4.0-6.4Lbs.Ft.

#### ***Step 5: install the steering damper***

Install the steering damper using:

- Spacer B (13)
- Steering damper, stroke 75 (14)
- Bolt M8x35 button head (15)

Shove the damper (14), with the end knob first, through the clamp (4) untill the ball-joint can be fitted to the fork bracket (12). Use spacer B (13) and bolt M8x35 (15) to mount the ball-joint to the fork bracket and tighten to a torque of approx. 14-17Nm/124-150Lbs.ln/10.3-12.5Lbs.Ft. Position the damper tube untill the distance "X" stated on page 1 is reached, then tighten the M6 clamp bolt (4A) to a torque of approx. 6Nm/53Lbs.ln/4.4Lbs.Ft.

#### ***Step 6: cut the plastic radiator cover***

- Cut / trim the black plastic lower radiator covers as shown on page 1 to create enough clearance.
- Check if the bike can make it's full steering angle from left to right without any problems.