



**CRUISE
MATE**
MOTORCYCLE
CRUISE ASSIST



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CRUISE-MATE INSTALLATION INSTRUCTIONS FOR MOST 82 UP HARLEY DAVIDSON WITH THROTTLE CABLES

For Use on the following Models:

1982-2013 Baggers/RoadKings, 1982-2016 Softtails/Dynas/RoadKings, 1982-2020 Sportsters

GRIP DISASSEMBLY

1.) Slide Rubber Boot down return cable to expose cable adjuster nut. Loosen throttle return cable jam nut and back off cable adjusting nut to put slack in the cable as shown in Figure 1 below.

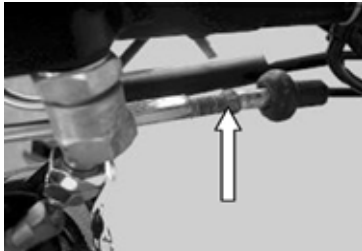


Figure 1

2.) Install a 5/32 shim (cardboard shim or Allen wrench works fine) in brake lever as shown in Figure 2 below. (This step is important to avoid accidentally damaging the front brake light switch).

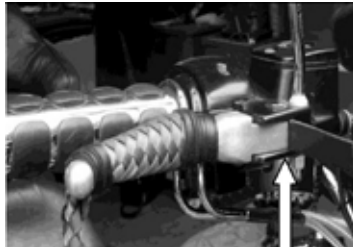


Figure 2

3.) Remove 2 bolts from switch housings and loosen the 2 bolts holding master cylinder housing together. Open switch housing and remove cables from grip as shown in Figure 3 below.

Do not loose the brass ferrules.



Figure 3

4.) Remove star wheel plastic friction shoe from inside lower half of switch housing as shown in Figure 4 below, (Note: The friction shoe will not be reused.)



Figure 4

7.) Remove "C" clip from star wheel stud as shown in Figure 5 below (Note: "C" Clip is not going to be reused).

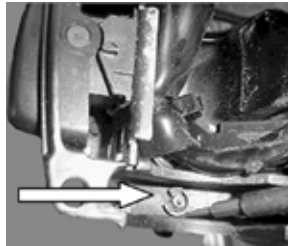


Figure 5

8a.) Remove the star wheel from the switch housing. (Note: The star wheel will not be reused.)

8b.) The following two steps involve drilling and tapping to enlarge the star wheel hole in the housing.

If you're not confident in your ability to drill and tap the hole accurately by hand, we strongly recommend using our Drill & Tap Installation Jig for precise and reliable results.

**ALL 82-95 HARLEY'S NEED TO USE THE INSTALLATION JIG
DO NOT ATTEMPT TO FREEHAND 82-95 CONTROLS**

DRILLING & TAPPING FREE HAND

9a.) You will now enlarge the Star Wheel hole to 21/64".

If you are drilling and tapping the control housing freehand (without an installation jig), it's critical to keep both the 21/64" drill bit and the 3/8-24 tap aligned with the throttle cables—both left/right and front/back. The hole must be threaded perpendicular to the control housing.

To help ensure the tap stays square, check its alignment from two angles: directly from the front and from one side. Use the throttle cables as a visual reference for keeping the drill and tap properly aligned.

Once complete, proceed to Installing Cruise-Mate.

DRILLING & TAPPING USING INSTALLATION JIG

9b.) For all 1996 and later models
Apply a small amount of oil (such as WD-40) around the forward cable end inside the switch housing cavity. While gently pulling downward on the cable, wiggle it slightly—this will help loosen and remove it. The cable is held in place by a small metal retaining ring and simply pushes into the housing.
For all 1982–1995 models:
Apply a small amount of oil (WD-40 or similar) both around the forward cable end inside the switch housing and on the outside of the cable where it threads into the housing. Use a wrench to unscrew the cable from underneath the housing.

10.) Once front cable is removed insert 1/4 X 20 bolt and washer through Jig Block, put Spacer on top of Jig Block and insert bolt through forward cable hole in switch housing where you removed the cable from. Refer to Fig. 6 on the right for proper assembly. Install washer and nut and finger tighten.



Figure 6

11.) Install Alignment Pin in Jig Block (where it says DRILL) and screw Alignment Pin into original thumbscrew hole in lower switch housing then tighten 1/4 jig bolt wrench tight.

12.) Remove the Alignment Pin from Jig Block and install Plastic Bushing in place of Alignment Pin. Using Plastic Bushing as a guide for drill bit, carefully drill thumbscrew/star wheel hole with 21/64-drill bit.,

13.) Remove Plastic Bushing from Jig Block, use that same hole in Jig Block to tap the newly drilled hole with a 3/8-24 tap.

14.) Remove the Installation Jig from the switch housing and clean all metal chips from switch housing.

INSTALLING CRUISE-MATE

15.) Remove the shoulder screw, handle spring, and handle from the Cruise-Mate assembly. Then, carefully unscrew the Cruise-Mate insert from the stainless steel bushing until all pressure is released from the wave spring. (Refer to the Parts List for correct component identification and assembly order.)

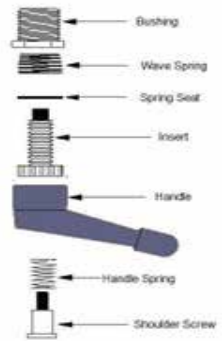
16.) Apply a small amount of Loctite to the 3/8-24 threads on the stainless steel bushing. Important: Do not get any Loctite on the threads of the Cruise-Mate insert. Install the stainless steel bushing into the 3/8-24 threaded hole in the switch housing as shown in Figure 7.

CAUTION: Do not overtighten the stainless steel bushing. Overtightening can strip the threads in the switch housing. The bushing only needs to be tightened until the nut is flush against the bottom of the housing.



Figure 7

PARTS LIST



GRIP REASSEMBLY

17.) Inspect the Bottom of the Throttle Sleeve Before Reinstalling the Grip
Before reinstalling the grip, inspect the very bottom of the throttle sleeve where the Cruise-Mate will be positioned. Look for the following: A raised plastic mold release line on the bottom of the plastic throttle sleeve. On older bikes, check if the original shoe from the star wheel is missing. In such cases, the tip of the star wheel may have been driven into the throttle sleeve, leaving plastic burrs. If you find any raised burrs or build-up: Do not remove the groove or alter the shape of the throttle sleeve. Lightly scrape off any raised plastic using a knife. Smooth the area gently using light sandpaper.

18.) Reinstall Grips and Switch Housing

Reinstall the grips and ensure the throttle cables with brass ferrules are properly seated in the switch housing. Reassemble the switch housing and install the housing screws.

Ensure there is no gap between the switch housing assembly and the master cylinder assembly. Tighten all bolts and screws securely in both the switch housing and master cylinder assembly.

19.) Adjust Return Cable Adjust the return cable by setting the adjusting nut back to its original position. Once adjusted, tighten the adjuster jam nut securely.

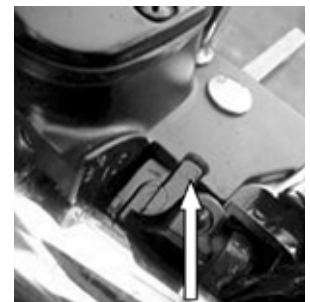


Figure 8

On 96UP models, align the tab on the switch housing with the notch in the brake housing (see Figure 8).

CRUISE-MATE FINALLY ASSEMBLY

20.) Screw CruiseMate Cartridge into switch housing until you feel resistance then stop. Apply a drop of Blue Loctite to threads of Handle Shoulder Screw to ensure Shoulder Screw won't vibrate out, install Handle Spring on Shoulder Screw through small diameter end of spring, ensure the Washer and Wave Spring on the Insert is even on the insert so not to catch on lip of Cruise-Mate Handle and not allow it to seat properly, install CruiseMate Handle, Spring and Shoulder Screw on CruiseMate Cartridge with the Handle in the OFF Position resting against the BACK Cable/Stop Pin. Read Cruise-Mate Adjustment Instructions to fine tune your Cruise-Mate.