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*Thank you for purchasing your new POWER-PUC™ Wheel Lighting Kit.*

**Quick Start Guide.**

Please refer to Detailed Instructions for more, uh...detail.

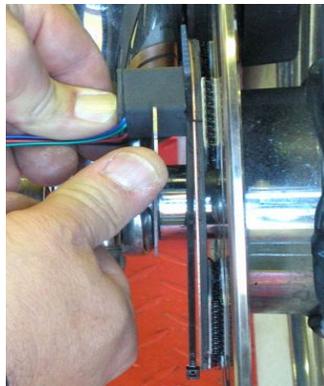
We cannot show all bikes and all fitments, so...

**Photographs are for reference only!! Your installation will probably be different.**

**General Rules**

- 1) **ALWAYS** check your packaging for which side of the wheel your PUC will mount.  
(Special instructions for some GSXRs will be in package)

2) If your PUC covers the rotor, sprocket or pulley bolts, the Velcro attached to the flat surface will act as spacer to keep PUC above bolts. On installations where the PUC will not fit with with the thick Velcro, use just the double-stick tape.



- 3) All Surfaces where double stick will be used **MUST be perfectly clean of dirt & oil.**
- 4) Always disconnect battery before performing electrical work.

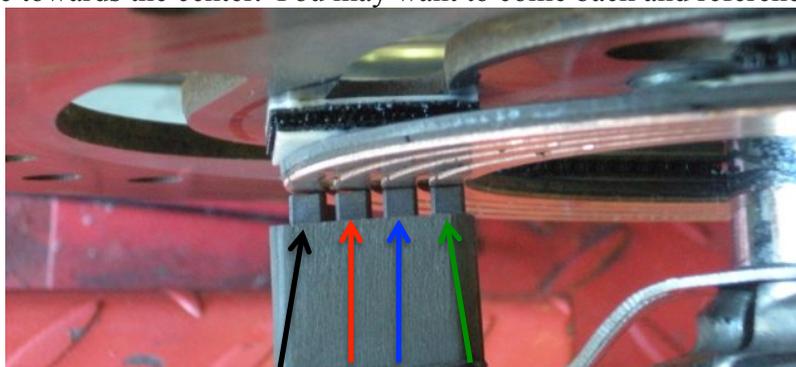
- 5) Jack bike up just enough to spin wheel you are working on.
- 6) Brushes are fragile and will break if given minor force in anything other than their intended direction. In this case, “intended direction” is straight in and out of the housing.
- 7) When complete, all wires, LEDs etc. on the wheels must be thoroughly restrained.

### Getting familiar with the G4 PUC

Below is a picture of the system. The 2 copper colored rings are the “PUCs”. The PUCs are mounted directly on the wheels (...actually rotor, pulley or sprocket) Also shown are the 2 Brush Housings (black) and Universal Mounts (silver).



The order of the wires as they come out of the Brush Holder are Black, Red, Green, Blue. This matches to the PUC...Black (-) is the outermost ring, then Red, Blue and Green as you move towards the center. You may want to come back and reference this later.



Black Red Blue Green

(Picture for illustration only. Brushes shown are extended **MUCH** further than finished installation)

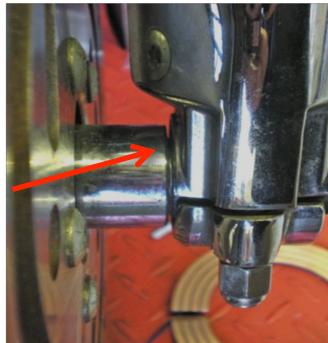
## Installation

### Part 1: Locating the PUC

An industrial grade Velcro with a double-stick backing is usually used to mount your PUC except where space limitations prohibit. Use just the double stick in those instances. Starting with front wheel, clean the rotor with Acetone or some other degreaser that will not leave any type of film behind.



Create a small gap between the wheel spacer and fork in order to install the Universal Mount. Loosen the axle bolts / clamps just a few turns. You can see the small gap we created, below.



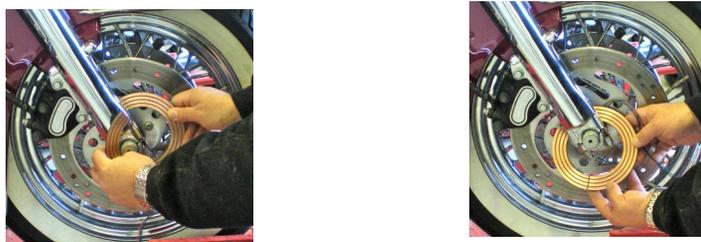
The “U” portion of the universal mount is what will slip into the gap you just created and over the axle. If the “U” is too small, you can remove the inner section by clipping the connectors on the “U”.



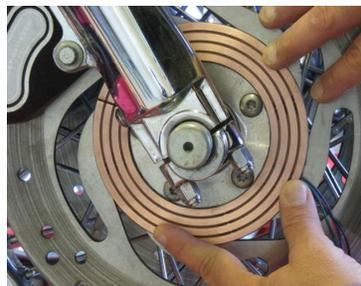
The PUC is split as shown below. There is an interlocking notch on either side of the split.



Take the PUC and “slip” it over the fork like is shown in the lower left picture.  
**DO NOT OVER-BEND THE RING!!**



It's very important that the ring be concentric, or centered, on the wheel within about 1/16". On most bikes there is an existing feature of the wheel that will substantially help you with this. It can be an existing bolt pattern, shoulder of some sort, or other natural feature on the wheel.



If not, draw a circle by using the notches on the Universal Mount to use as a reference.



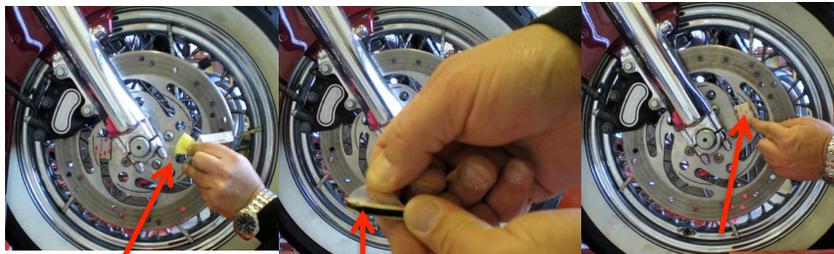
## PART 2: Mounting the PUC

Cut lengths of the included velcro strip into sections that are about 1/8" longer than the width of the PUC.



You will want to space the Velcro sections evenly around the rotor and put them in areas where you will get the most surface contact between the rotor and Velcro pieces.

Clean the entire area again and apply the adhesive promoter. Peel the protective film from the double-stick on one side of the Velcro and apply to the rotor. Press and hold it there for a minute while working all the edges against the rotor. It is best that this is done while the promoter is still wet.



Apply adhesive promoter

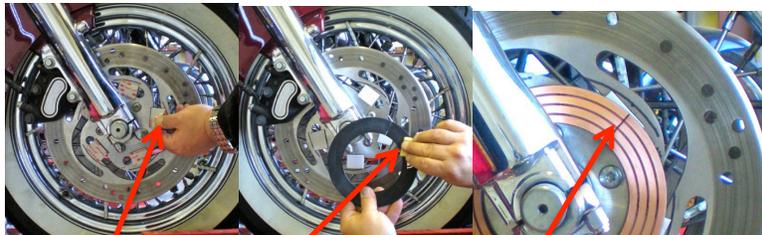
Peel protective film

Work strip onto wheel.

The same process is used for applying the PUC to the Velcro, **EXCEPT...the split in the ring must be in the middle of one of the Velcro sections!!**

This is extremely important as it aligns the edges of the split. Failure to do so WILL (not might) result in damage.

Peel the protective film from the back of the Velcro, clean the back of the PUC and apply the adhesive promoter. Use the natural features mentioned previously, or reference lines you marked to set the PUC on the Velcro. Again, use pressure to make sure it is seated. **DO NOT TRY AND SEPARATE THE VELCRO BY PULLING ON THE PUC!!!** Let the adhesive set.



Remove film

Clean & primer PUC

Split **MUST** be on Velcro

Get the PUC wires out of the way so you will be able to spin the wheel without them getting caught. Tuck them inside and add a piece of tape to hold them there.



### Step 3. Checking concentricity (alignment).

Making sure the PUC is concentric with the wheel is very important. Failure to do so can result in damage to the system.

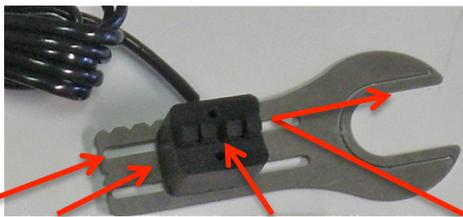
Put the Universal Mounting Bracket on and make sure it's seated against the axle. Pick a tooth on the mount and use it as a guide to check concentricity

If you need to adjust, **CAREFULLY** work your way around the PUC and use your fingertips to separate the Velcro halves while making sure not to separate the Velcro from the rotor or PUC. Do a little at a time to prevent bending the PUC.

### Step 4. Mounting the Brush Housing

The Brush Housing is made so it can be removed from the Universal Mount with 2 screws. When you receive your kit, there will also be a triangular shipping cover over the brushes. You can remove this cover when you are ready for installation. **Do not let the brushes pop out of the housing.**

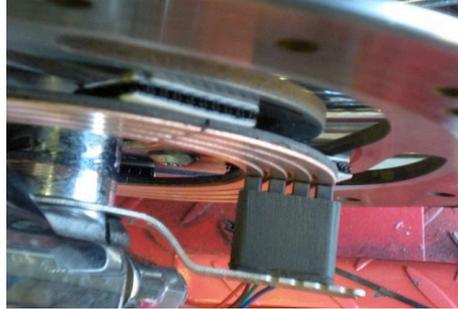
Notice the way the housing is attached to the mount. There is a concave radius on one end that should always be the side that faces the "U" of the mount. This is critical to spacing on some bikes, and critical to wiring on ALL bikes.



Universal Mount      Brush Housing      Brushes      Concave side to face "U"

The Universal mount will need to be bent into a "Z" depending on the required offset to mount the Brush Housing in the correct position. Do this using a vice and make the bends "crisp". (see below picture)

This picture shows the proper alignment. The brush housing is parallel to the PUC and the brushes protrude equally about 1/8" – less is better. Under no circumstances should the distance be greater than 1/8" or you risk breaking the brushes during operation.



Slip the Universal Mount over the axle. Snug the axle bolt / clamps. Each brush must contact ONLY ONE copper ring. Test for this by slowly spinning the wheel while keeping an eye on the contact points. If the brushes are consistently off in one direction, you can adjust the housing with the 2 mounting screws.

If everything checks out, do a final inspection and tightening of all the fasteners you've touched. Trim any excess Velcro with a utility razor, run the wire from the Brush Housing up the brake line, under the tank and to the battery area.

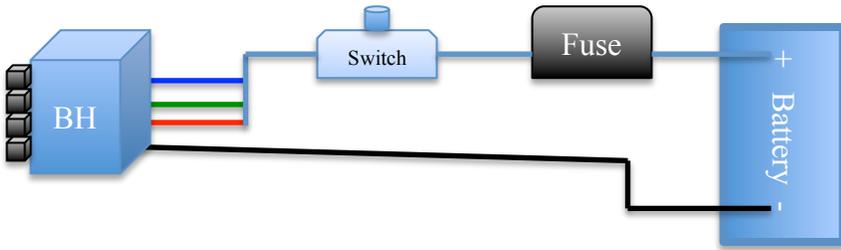


Run wiring up brake line. Fasten with wire ties

Installing the PUC on the rear of the bike follows the same general principles. Depending on the PUC's mounting location, it is sometimes easier / necessary to slide the axle out just enough to insert the PUC through a gap you create. In a few cases we have seen the necessity to file or grind down a rib on the caliper mounting bracket to give clearance for the PUC ring.

### Step 5: Hooking up power wiring:

**If you are only using the button switch**, connect the red, green and blue wires from the Brush Housing (BH) together with one side of the button switch. The other side of the switch should first go to the included fuse, and then to the “+” terminal of the battery. The black wire from the Brush Housing should be connected to the “-” side of the battery.



If you have purchased a remote controller, follow the instructions that are included with the unit. We still recommend installing the Push Button switch between the positive side of battery and positive infeed to the remote.

**IF YOU HAVE ANY QUESTIONS, PLEASE CALL US FOR ASSISTANCE BEFORE PROCEEDING.** 203-425-3214.

**Ride Safe**



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