KICKSTAND WARMUP MODIFICATION

Parts list
1.2m/4ft approx black automotive wire (not too heavy or it wont go into the crimp connector)
1 each 4mm (5/32) male & female bullet crimp connectors (usually red)
1 wire tab joiner (joins a new wire to an existing one without cutting the existing)
1 diode 1N4004 or equiv
heatshrink tubing (prefer black)
pvc electrical tape (prefer black)

Caution
This circuit is to suit a Monster 620ie. The 620ie has a kickstand switch which is open when the stand is down and a neutral switch which is open when the bike is in gear. Both switches connect to common (negative) when closed. If your bike is different this mod will not work.

The wiring diagram in the Owner's Manual is very helpful but be aware that the wire color shown may not be the same as on the bike. If in doubt use a multimeter to confirm.

How It Works
On the unmodified bike the kickstand switch connects one of the engine control unit's many inputs to common (ground or negative) when the stand is up. This allows the engine to run.
This circuit simply connects the kickstand switch and neutral switch in parallel. The diode prevents the neutral light from illuminating when the bike is in gear with the kickstand up.

How to Make It
The diode can be soldered anywhere within in the wire. Just cut and solder. For added ruggedness I soldered mine onto a very small piece (25mmx8mm) of "veroboard" (avail at electronics shop). You could also solder it into a fuse holder, etc. Anything to prevent the wire being tugged and ripping off one of the diode's leads.

At the very least you should insulate all bare wire joints with heatshrink tubing (prefer) or pvc electrical tape. I put a piece of heatshrink over the whole thing. This makes it tougher and gives it more heat resistance.

The bullet connectors are crimped onto the wire with a crimping tool. If you don't have one they are available quite cheaply at electronics or hardware stores. Don't try and do it with pliers- you'll mess it up.

Fitting

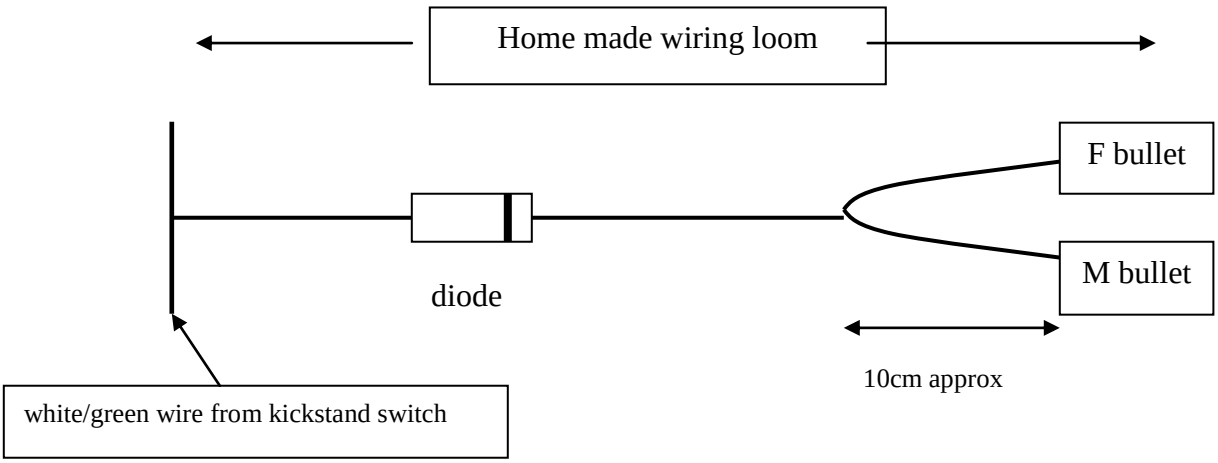
Unplug the existing female bullet connector from the neutral switch at the rear of the gearbox (just in front of the rear suspension spring). Connect it to the male connector on your newly made loom. Plug the new female connector onto the neutral switch.

Route the wire carefully along the RHS of the frame then across the crankcase to the opposite side of the bike (the kickstand side). Your loom joins onto the white/green wire from the kickstand just below the 3 pin weatherproof connector.

You have a number of options here. I used a special joiner that allows a new wire to be joined to an existing wire without cutting. You simply slip the joiner over the existing wire, insert the new wire and squeeze with pliers. If you can't find one you can carefully remove some of the insulation from the kickstand wire and solder the loom onto it.
Whatever you end up doing, finish off by insulating with pvc tape.
Use cable ties to secure your wire to the frame on both sides so fits snugly out of the way.

Testing It

Start your bike in neutral with the kickstand down. If it doesn't start you have probably got the diode in backwards. If the neutral light comes on with the bike in gear and the kickstand up you definitely have the diode reversed.
Now pull in the clutch and put the bike in gear with the kickstand still down. It should stop.



Further Notes on installation on a 2001 900SS

OK here's the full details. Forgive the verbosity but I will be as precise as possible. I'm not sure how the wiring loom is laid out on the Monster but I'm sure

they must use the same weatherproof connectors. Also my machine is a 900 SS which shares the same wiring diagram as the 750s. You will note that the above connects on to the oil light switch and into the cable to the side stand switch. My mods allowed me to connect into the existing loom connectors which then makes the new cable a straight single conductor with the diode in line along its length.

1 - As the above instructions suggest I mounted the diode on a piece of Veroboard with one row of holes and about 25mm long to prevent the connections being pulled out. Solder a 500mm "tail" on each end and the kit is ready for protection and installation.

2 - You will note the diode has a ring at one end this end connects with the neutral light switch so make sure you know which end is which after you cover it in heatshrink.

3 - Cover the diode and 50mm of the attached "tails" with 4.8mm heatshrink and the remaining wire with 2.4mm heatshrink.

4 - Locate the weatherproof connector which has the neutral light switch connection coming from it. Its attached to a lug behind the vertical frame tube on the right hand side of the machine. Take it off the lug and unplug it. The top bit (male) contains the female connector. Looking at the business end of this top half you will see a small red bit of plastic above the metal of the connector. This is a plastic wedge that slides in the plastic body of the connector to prevent the metal female from pulling out of the plug. You can pull this out with your thumbnail - DONT LOOSE IT! Now use a watchmaker type of screwdriver (no more than 1.5mm diameter) to slide in, in the place of the plastic wedge. Move the handle of the screwdriver so that the blade presses on the visible end of the metal female connector at the same time gently pulling the wire at the back (top) of the connector body. It took me three goes to remove it, but once done you can see how it works and it becomes easier.

5 - When the female metal connector is removed you will find a light green soft finned collar around the wire retained by metal tangs which are part of the female connector. Thread the wire from the diode (ring end) down through the soft collar and solder the wire to the female connector (be sparing with the solder). Then reassemble the connector.

6 - Route the wire over to the other side of the machine (between the ECU and the Air Box) and down to the multipin connector on the loom to the sidestand.

7 - The sidestand connector is a three pin component and the three red plastic wedges are all one piece and are released via the red plastic tangs at each side of the fitting.

8 - The loom coming down to the connector has two wires (the middle connector is unused). The connector with the blue/black wire is the one to solder the other tail to. Then reassemble as before.

9 - Then test as per the original instructions.

Any quirks found on different models would be appreciated as I will update these instructions accordingly.

Good Luck

Barry