

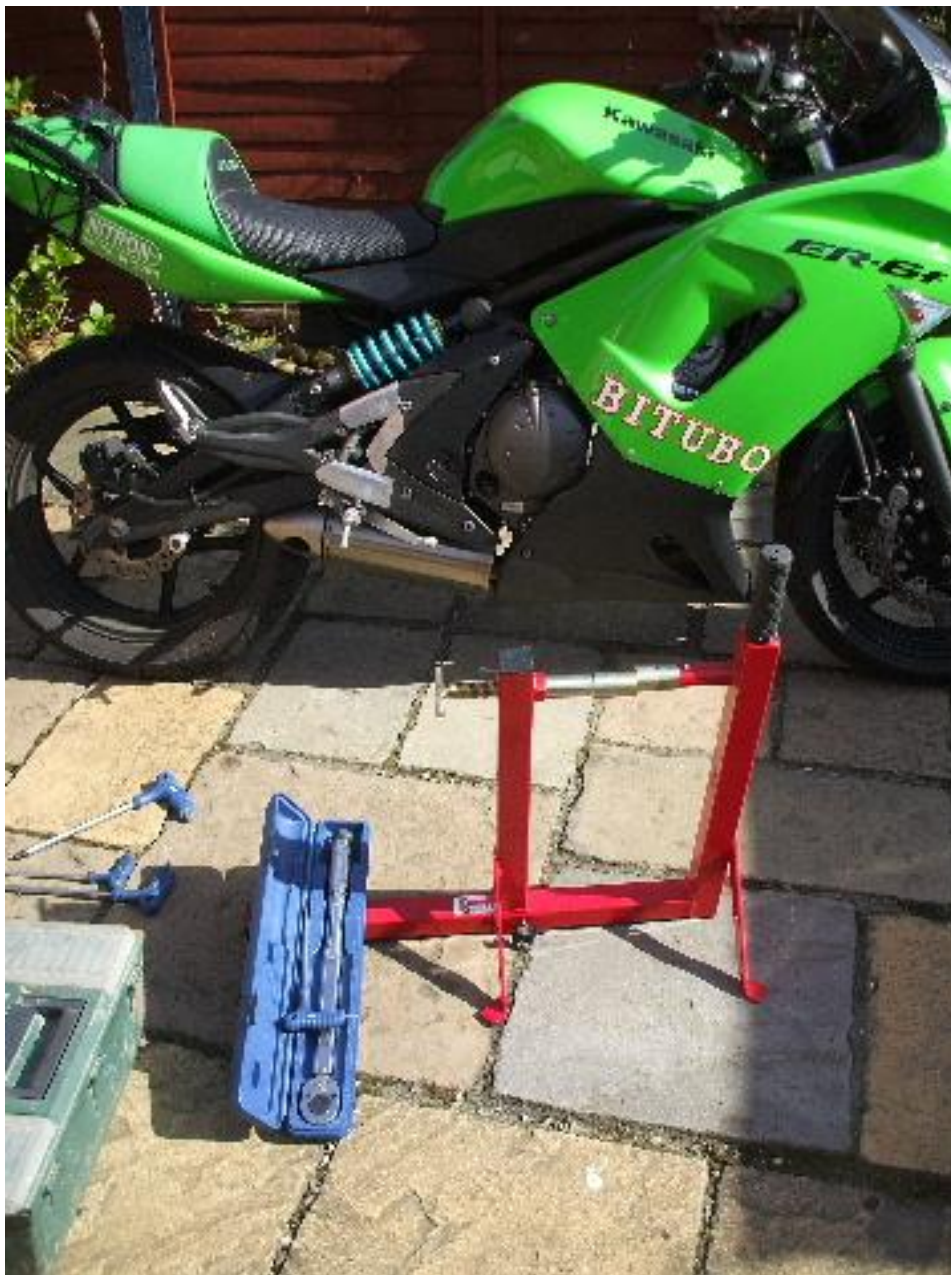
## ER-6 (Ninja 650R) Rear Shock Removal

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Well it's been a while, time for another guide I reckon!

Quite a simple one this time but one that does require a few specialised tools. How you would do this without them I wouldn't like to imagine but the only reason for the difficulty is the lack of a centre-stand. It also allows me to give my take on one or two topics that have come up several times in the past.

First here's all the gear you'll need. Socket set, torque-wrench, abby stand (or something like it), allen-key drivers.



## Kawasaki Ninja 650R (ER-6F) & ER-6N Resource

Take off the plastic frame-covers to reveal the swing-arm nuts, also take off the little plastic cover on the top shock-bolt. The Abby stand comes into play now. The adaptors allow it to fit on both swing-arm nuts, like so:



After that you need to wedge a couple of bits of wood under the rear wheel so that the swing-arm doesn't drop when you remove the shock. Although, having said that, if you were to support the swing-arm on a jack you could probably

lower the arm with the jack to help remove the shock.



OK. The top bolt goes into a captive nut in the frame so I take the nut off the bottom bolt first working across the frame with a couple of extenders on the socket driver.



The picture was actually taken later as I was using the torque-wrench to re-assemble things.

## Kawasaki Ninja 650R (ER-6F) & ER-6N Resource



I was able to put one of my allen-key drivers into the bolt head and bring it up against the stand, so it was fairly straightforward, in the end. I left the bottom bolt in while I tackled the top one.



Techy stuff. The top bolt takes a 17mm socket. Bottom bolt has an 8mm socket head and the nut on the back is 19mm. Torque setting for both ends is: 44 foot-pounds.



Remove the top bolt, slide out the bottom bolt and with a bit of a wiggle..... Out it comes. I found that the bottom wants come out first as there is a bit of room at the top to move it forward. Once you have the bottom clear of the swing arm it's a simple job to bring it out backwards. The eagle-eyed amongst you may have noticed that I have the shock in 'upside down' with the preload collar at the bottom. It was the best way to get proper access to the preload as it was too tight with it the 'proper' way up. Nitron assured me that it would make no difference to their shock as it isn't an emulsion shock. The gas is kept separate from the oil.

Bit more fiddly for me as I have a hugger on there. That's a Pyramid hugger and you will notice that it's held on with a zip-tie because it uses the shock nut to hold it on and if you put the nut on properly, it goes straight through the plastic. Not very clever but understandable. I've actually met the old boy that designed it (I bought it from him !) and he cheerfully admits he knows nothing about motorcycles.....



Here's the reason for the removal. The Nitron shock (unlike rather a lot of others, including the OE) has proper bearings at top and bottom with couple of adaptor bushes on either side. Beneath each bush is an 'O' ring and the ones at the bottom were starting to break up. I e-mailed Nitron and they sent another set free, in a couple of days.

Nitron have been very helpful at all times, can't speak too highly of them. I know that some folk don't like the colour of the spring but I'm sure they'd do you one in a different colour if you asked them. They do their car shocks in red and black, after all. The shock has been on for about 12 months and still looks good. Even though the 'O' rings were breaking up the bearing surfaces were still nice and shiny and the whole thing has survived its first winter in tip-top shape.

Torque Wrenches.



I have two. The one on the right is my venerable Norbar which is about a zillion years old and goes from 6 to 40 foot-pounds. The other one is a more recent addition, a Sealey, and it goes from 20 to 150 foot pounds. The Sealey cost £25 on-line but I got the Norbar in Halfords so long ago I can't remember how much it was. They are both half-inch drives. With the two I can be sure of getting things right. The whole idea of a torque-wrench, of course, is to avoid over-tightening things. With the amount of alloy there is on a bike, a torque wrench can save you a lot of grief from stripped threads. Not that you won't get ANY, of course.....

Have fun!