

**Critical Fitment Warning**

**DRY RUN SCUFFING & CORRECT TENSIONER INSTALLATION.**

If the correct fitment procedures are not followed failures will occur.

The design of some engines is such that the camshaft timing components are the last components to receive oil within the engine. Therefore these components especially can be subject to “ DRY RUN SCUFFING “ and once damage has commenced components will continue to wear prematurely and eventually fail.

As with the assembly of any new engine it is industry practice to use a good quality assembly lube and not leave the engine in a state of prolonged idling. It is strongly recommended that **ALL** timing chain components on these engines be fully lubricated during installation. Failure to do so can see friction burning of the nylon surfaces leading to failure of the components.

All tensioners are to be installed using the correct OEM torque specification. Rattle guns are **NOT** to be used when tightening tensioner bolts as over tensioning will distort the tensioner. Over tightening will cause the tensioner Ram to jam-up inside the body of the tensioner, not allowing the Ram to release fully & freely.

It's critical that after the tensioner bolts have been torque to the correct OEM specifications, the installer ensures that the tensioner Ram has been released and sitting in the correct position when removing the release pin.

**Tensioner Pads Shown Fig ( 1A & 1B ) are New**



Fig 1A



Fig 1B

**Note The Ram Has Not Released Correctly After Pin Has Been Removed. Fig 3A Due To Use Of Rattle Gun**

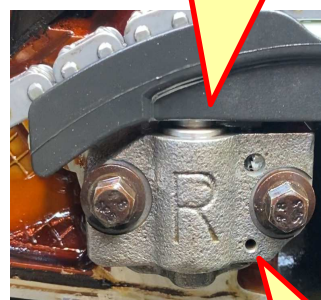


Fig 3A

**Note The Ram Has Fully Released After Pin Has Been Removed Fig 3B After Being Torque Correctly**

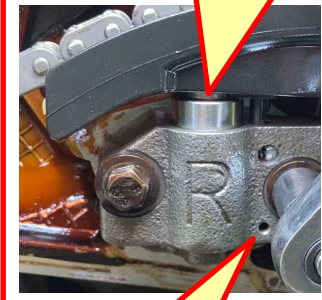


Fig 3B



Fig 2A



Fig 2B

**Tensioner Pad Shown Is Burnt ( Fig 2A ) And After Prolong Burning Has Collapsed And Fallen Away ( Fig 2B )**

**Fig 4A Shows The Release Pin Having Been Pulled From Its Hole**



Fig 4A