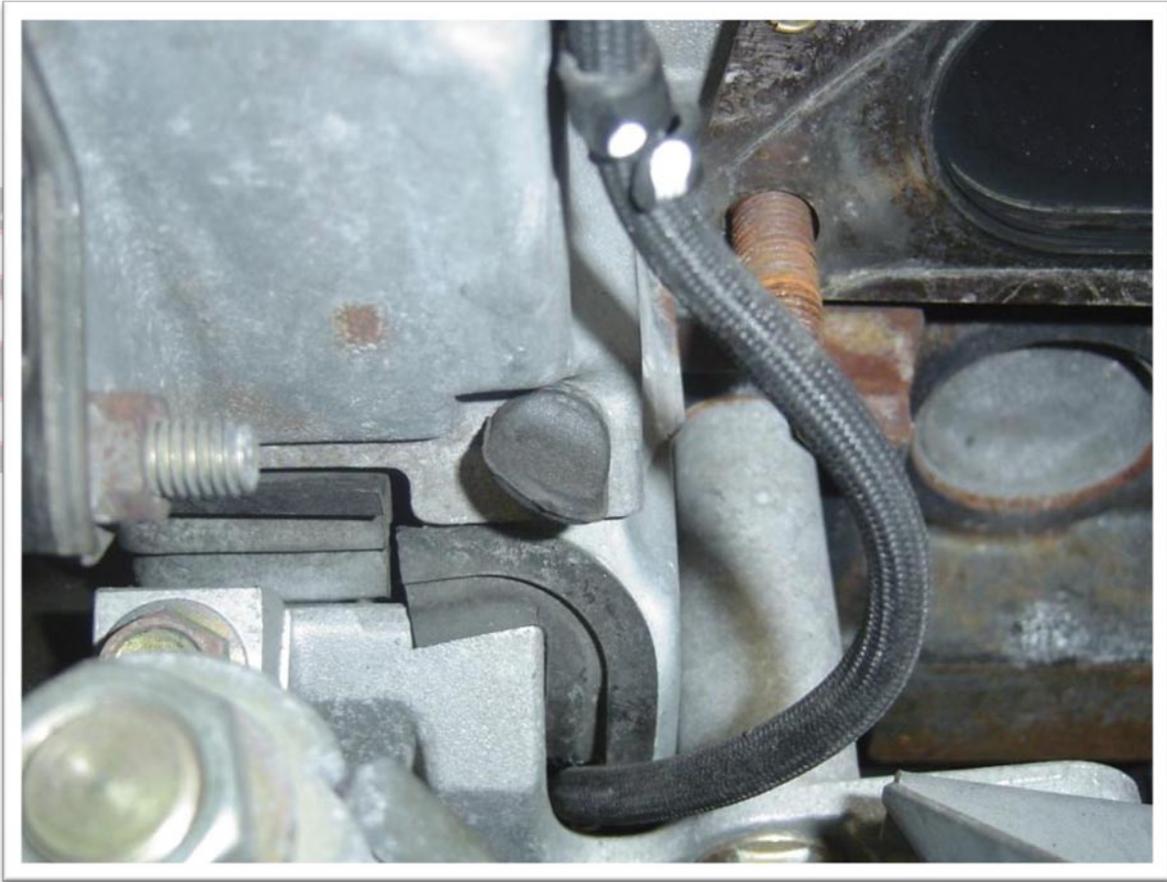


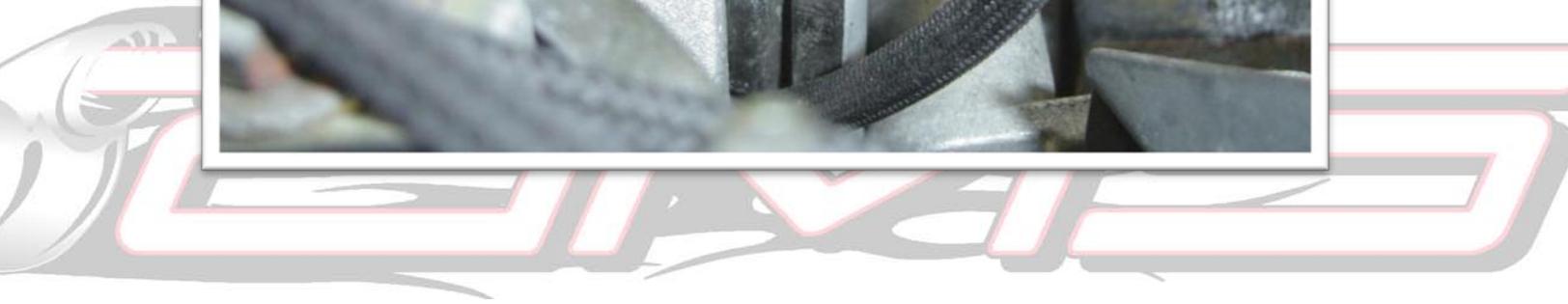
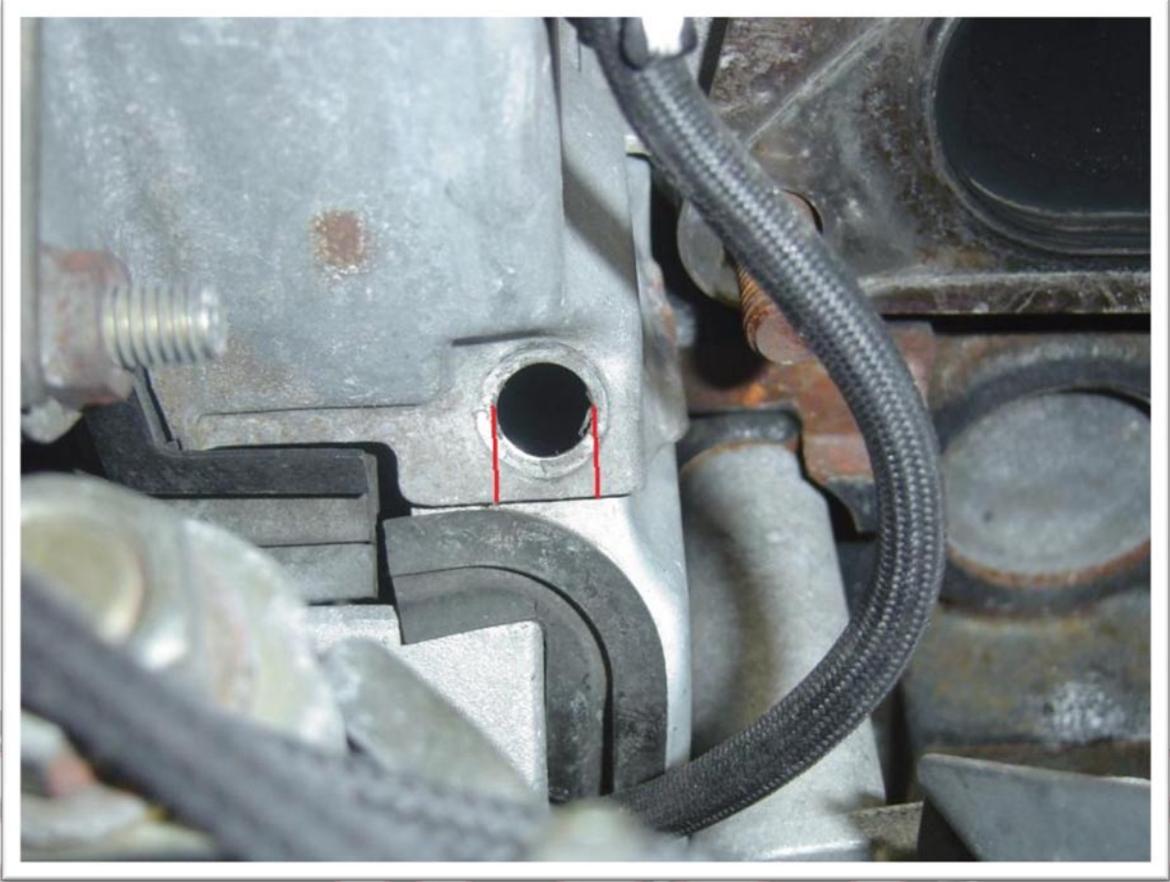
# AMS's WICKED 23rr Install pix

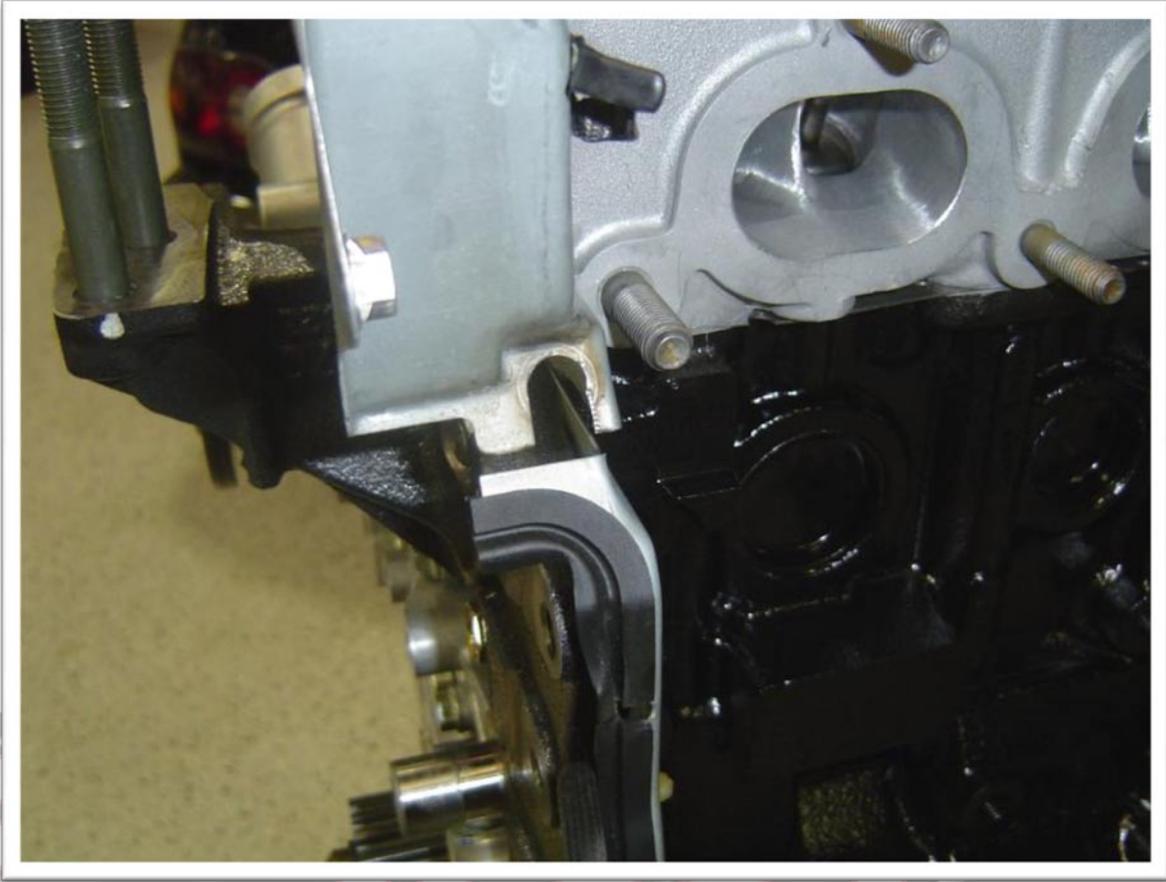
I am doing on a big build on an Evo 9 and took a few minutes to snap some pictures to help others with the install of the AMS 23rr motor.

There are several modifications needed to be made due to the custom AMS spec deck height. Pictures say a thousand words so let's get to the pictures!

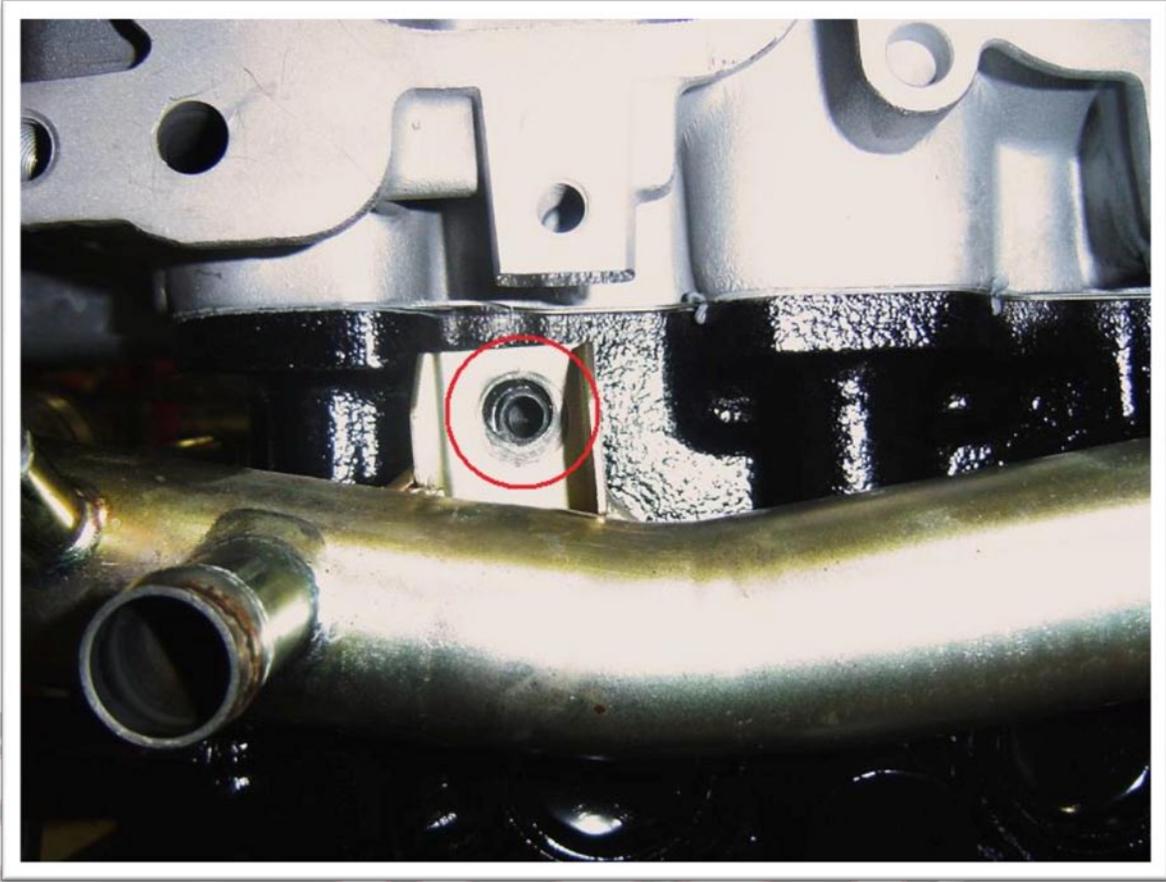
The factory hole in the front cam gear shield used to access the tensioner with the AMS tensioner tool is not in the right spot any more. Trying to use this hole in the future could lead to cross threaded tensioner tools. To avoid this situation, use a pair of tin snips to cut the hole into a slot as shown.



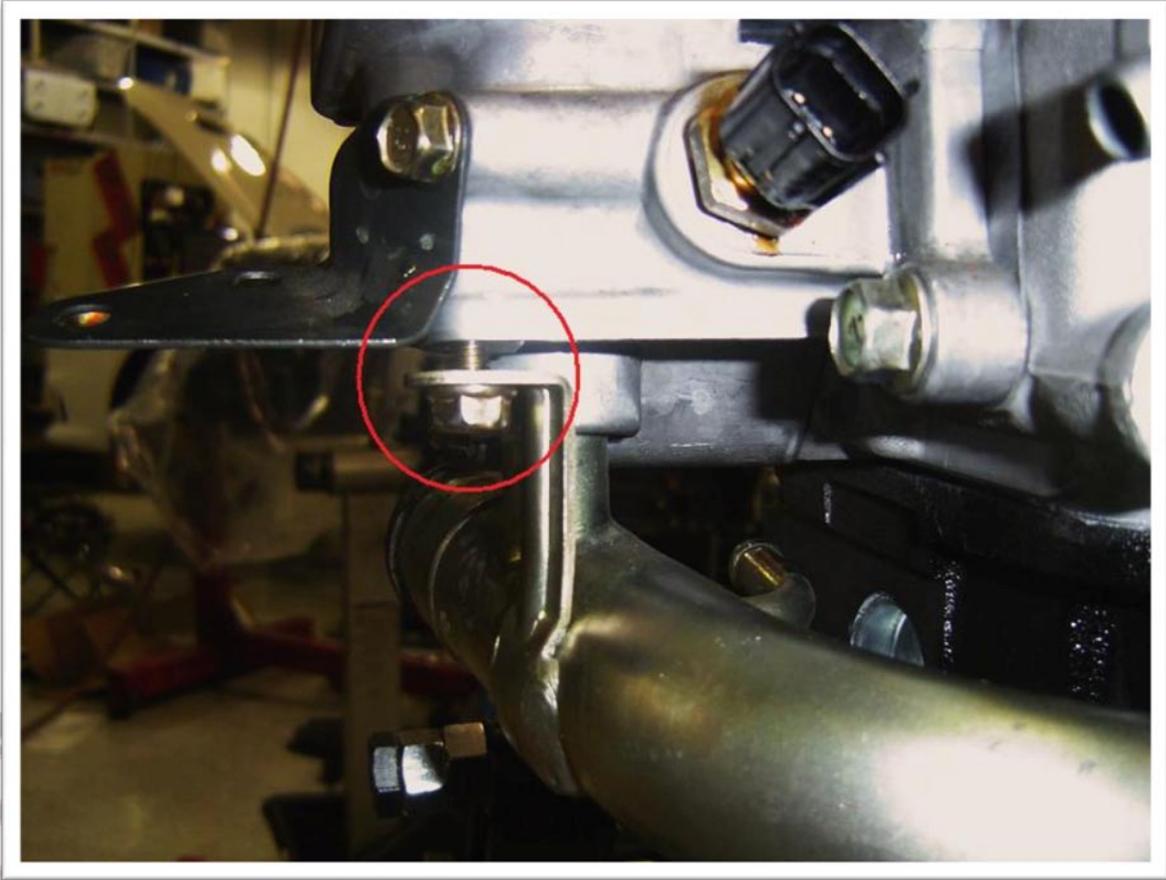




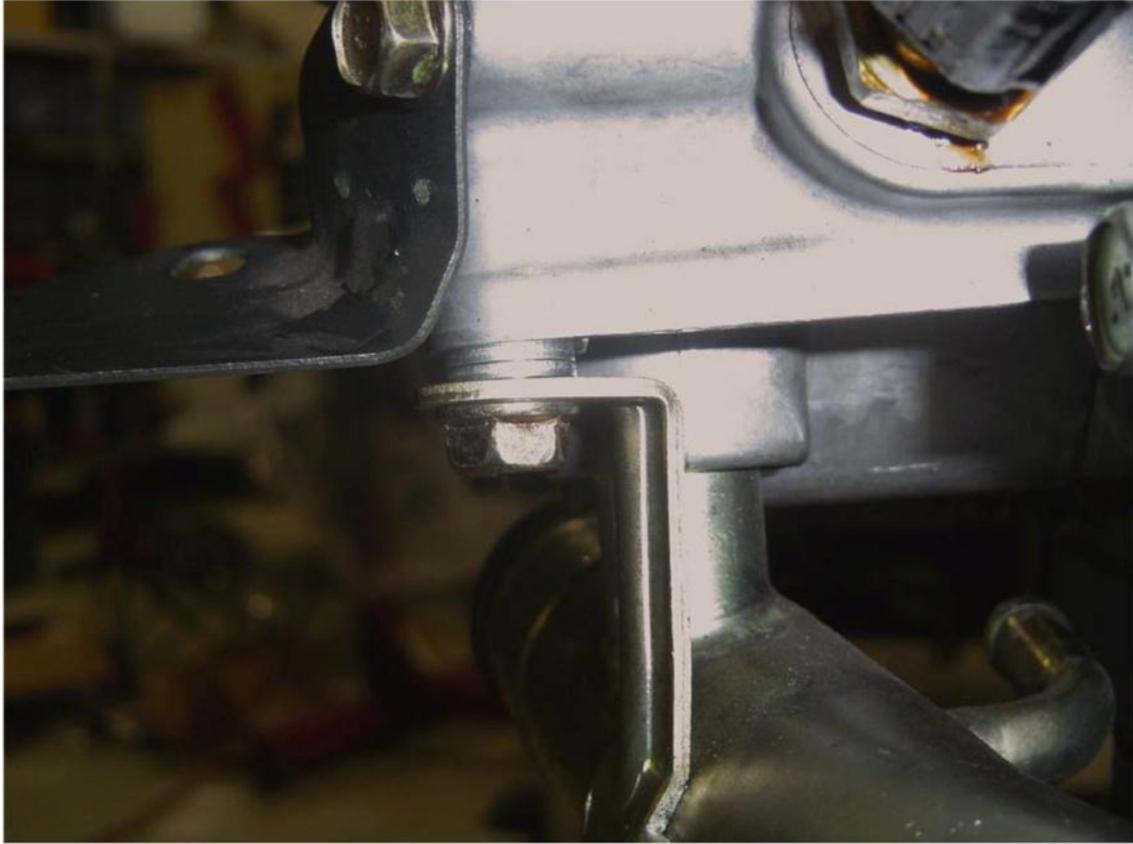
The water pipe running along the back of the block will need a couple of washers to attach it properly to the water outlet. Position the pipe as high up as you can in the back of the block and bolt it to the block.



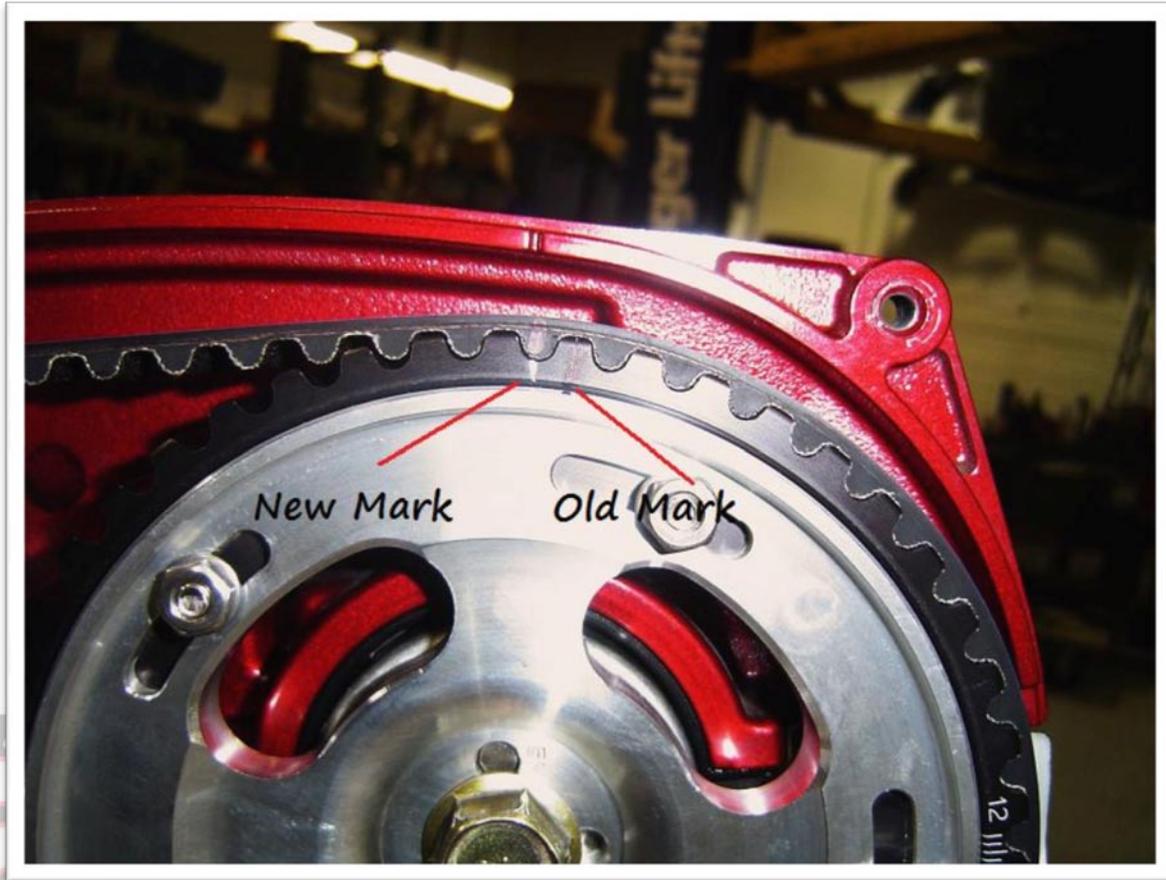
You can see the gap at the water outlet.



Two washers are perfect to fill the gap here.



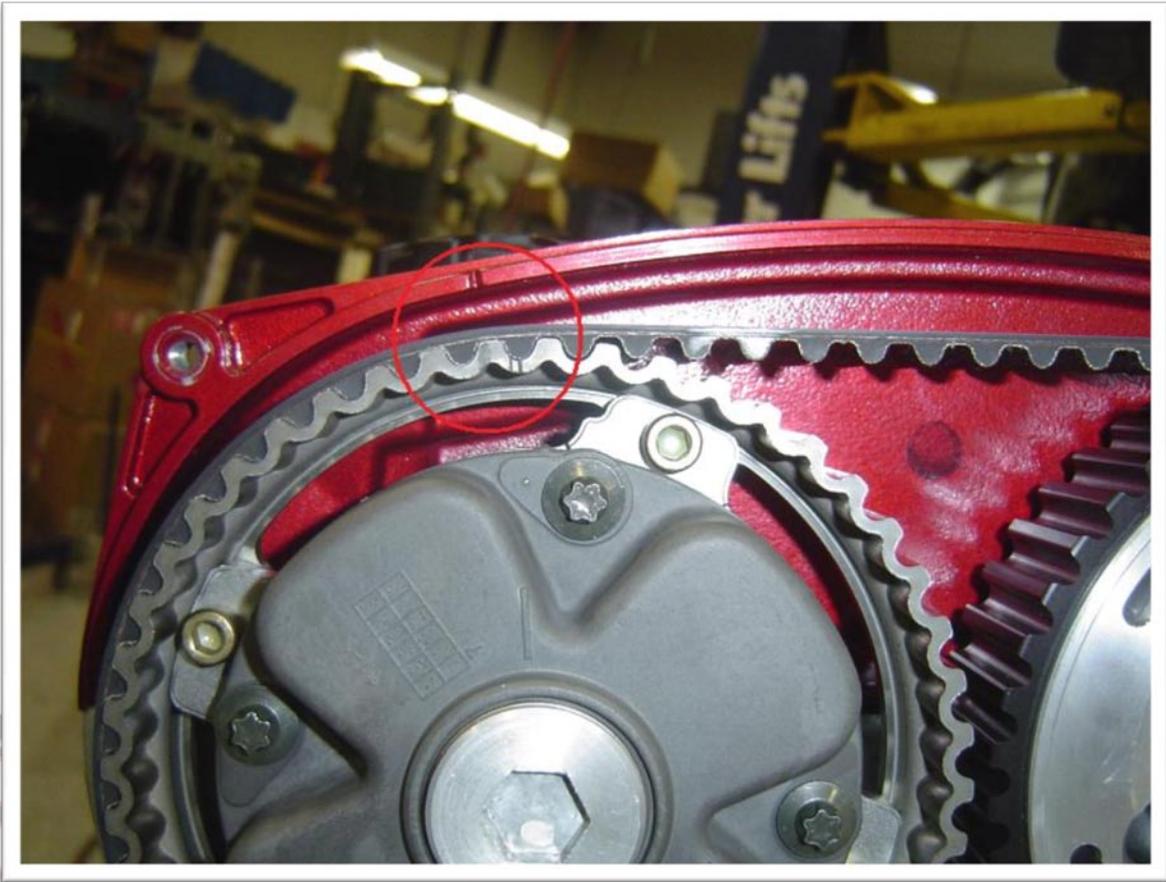
Setting up the cam timing is a little different. The timing marks on the cam gears need to be moved counter clockwise half a tooth.



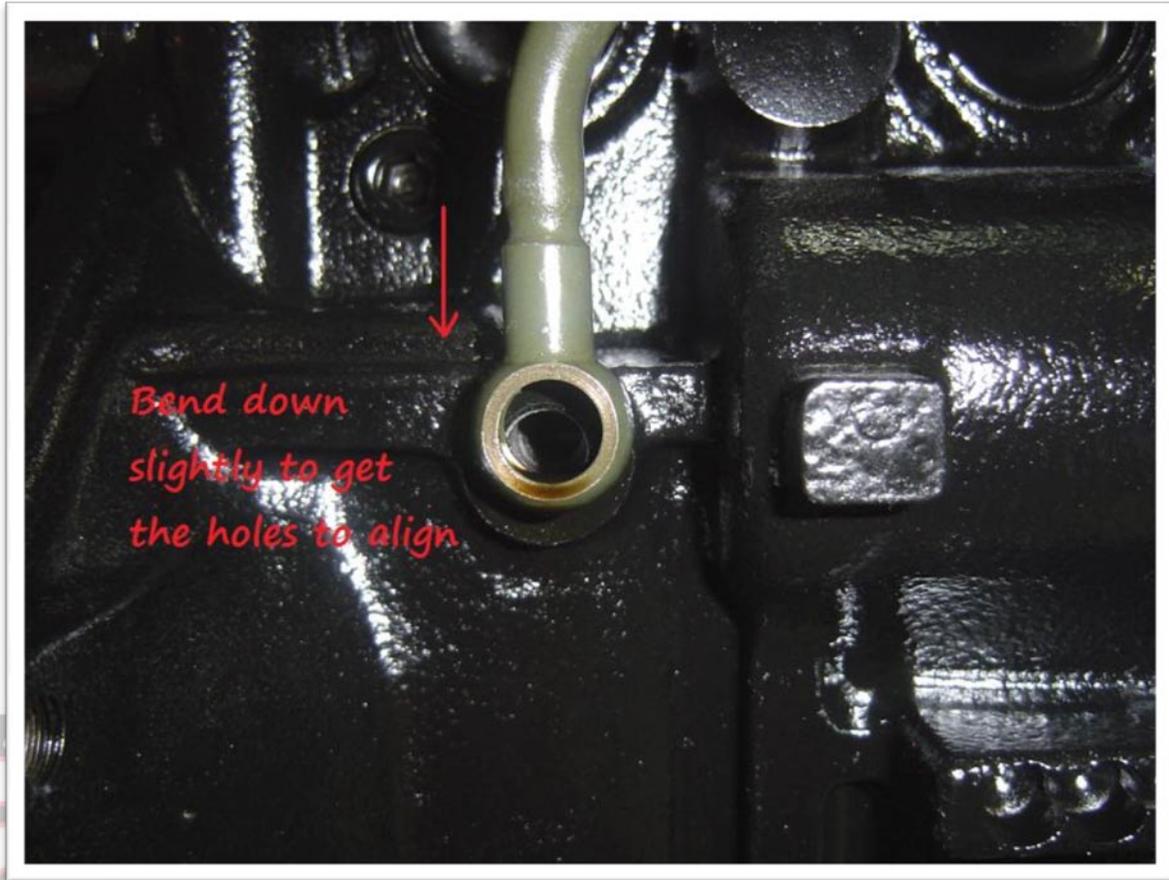
Because the cams are pulled slightly forward due to the custom deck height, you will need to retard the cams 3.75 degrees to get them to "factory" position.



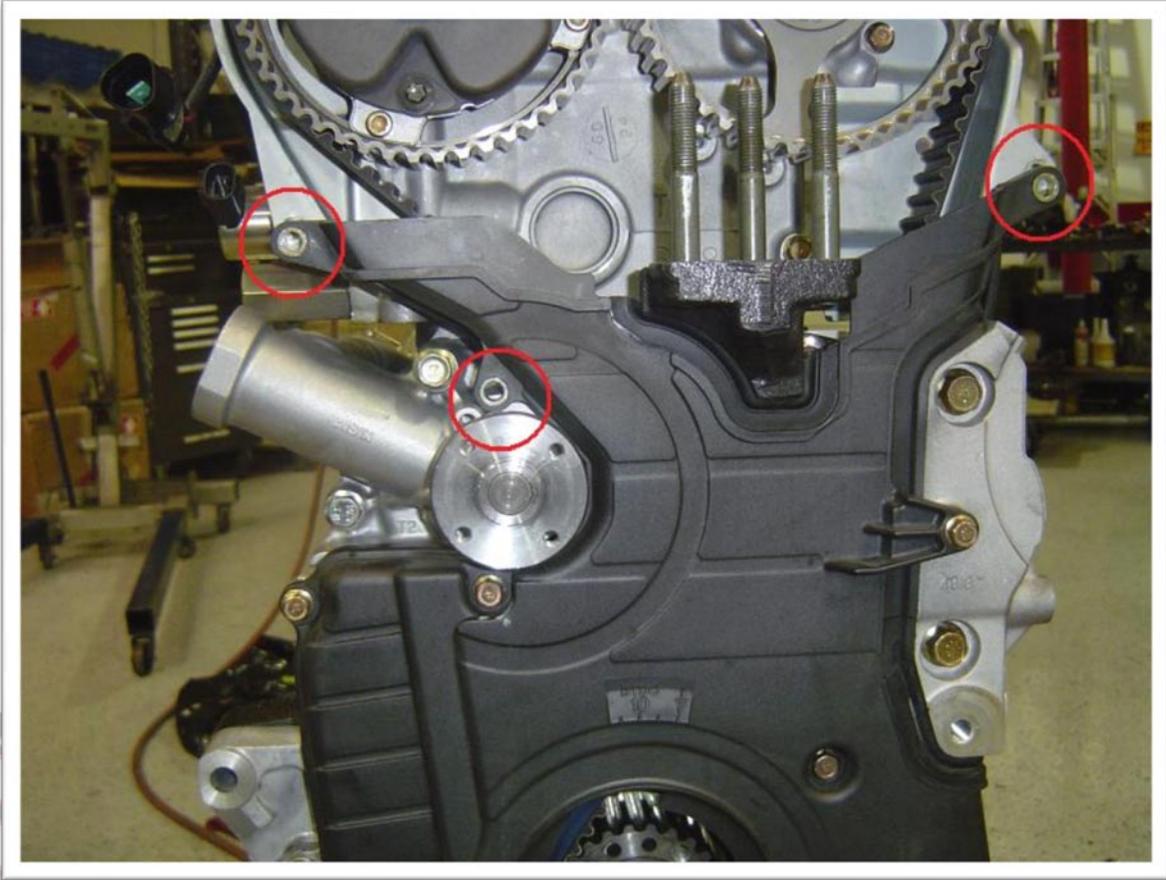
This is what it looks like on a MIVEC cam gear.



On an Evo 9, the MIVEC feed line will need to be bent slightly to get it to line up with the feed hole in the block. A few tweaks and the banjo bolt slips right in.



The lower timing cover upper most holes will no longer line up with the bolt holes in the cam gear shields. The new custom water pump also has no bolt hole for the cover. Bolting on the upper cover holds it all in place so don't worry about the missing bolts. I suppose it would be possible to trim the upper ears down for clearance for bolts and it could then be sandwiched between the upper cover and the cam gear shields. I may try that tomorrow.



On an Evo 9, the alternator bracket also bolts to the water pump. The new custom pump has no provisions for this bolt. This bolt is no longer used.



The water pump pulley gets shimmed out slightly with the spacer supplied with the motor.

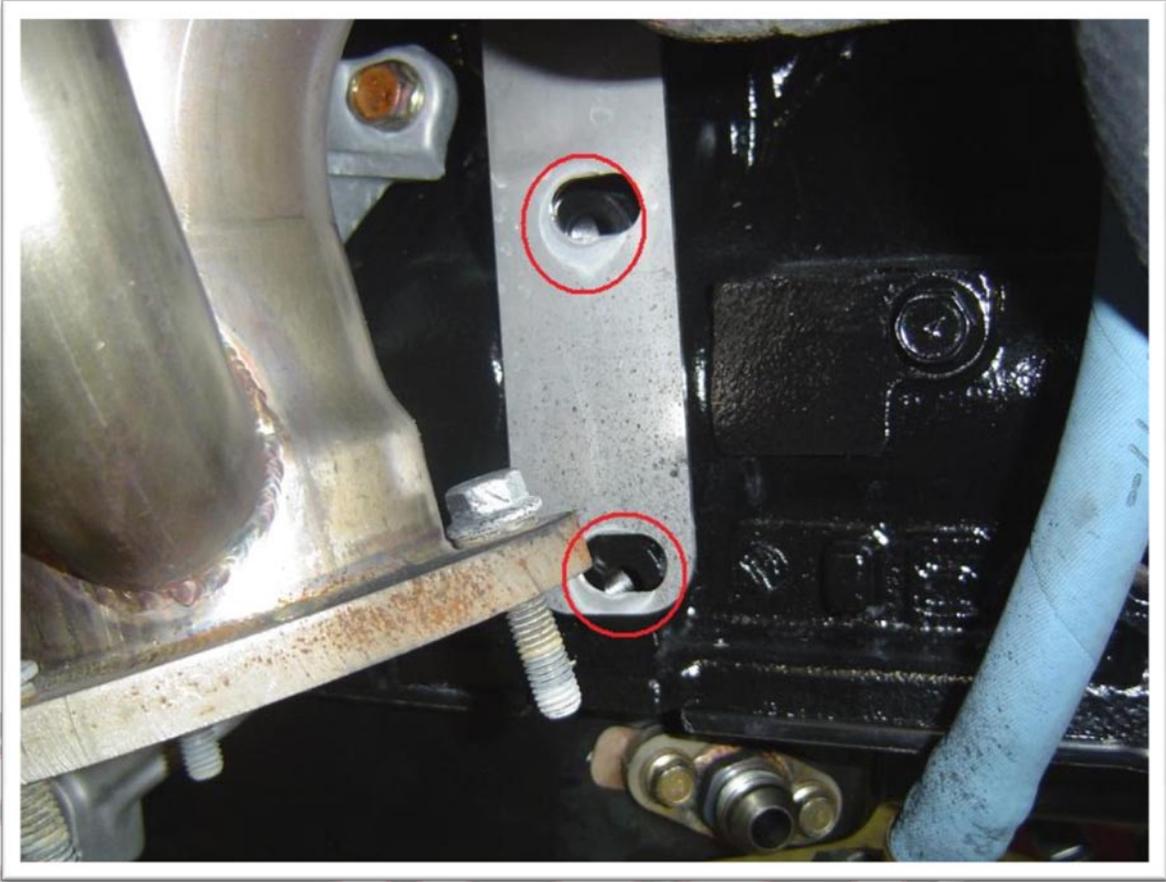




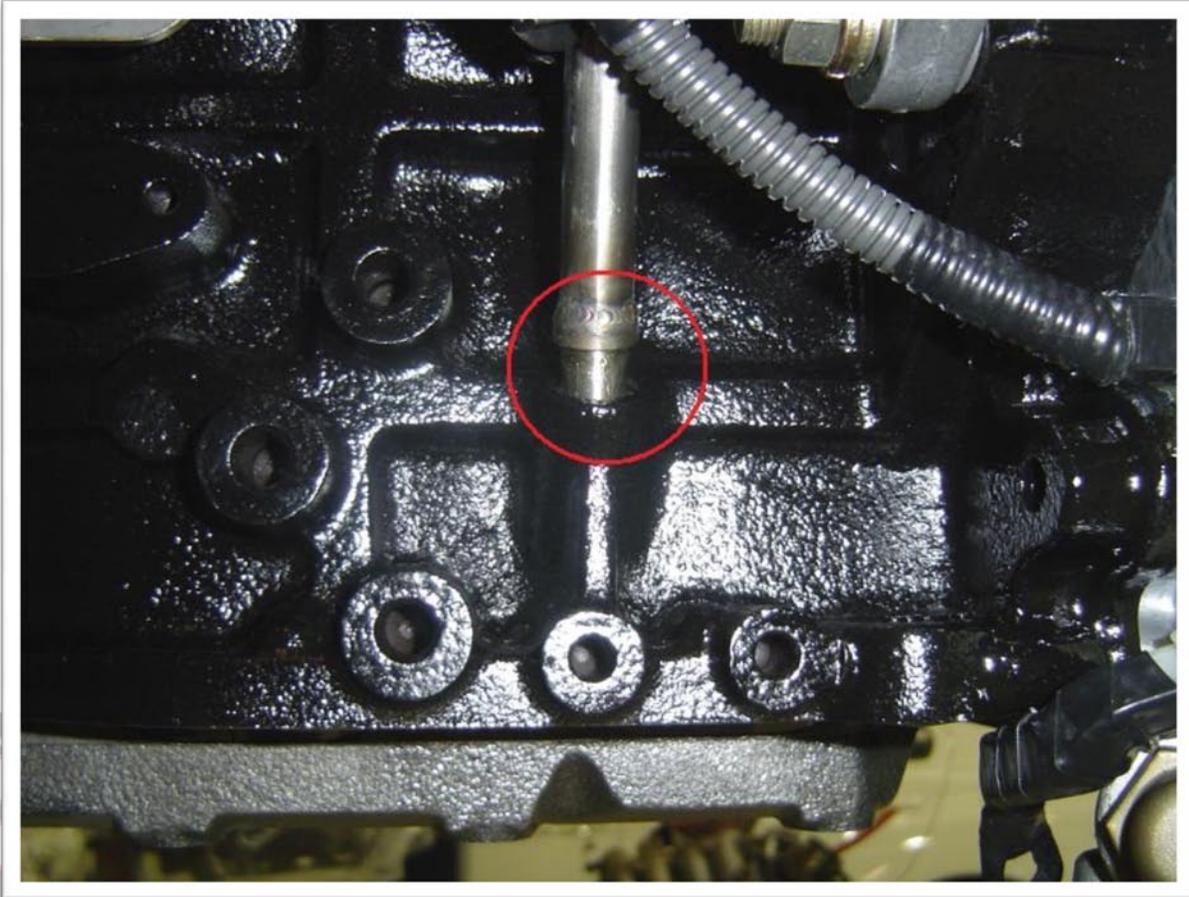
The intake manifold support bracket needs to be shimmed to fit properly. This motor is running the AMS VSR intake (shown in picture). The factory bracket would need to be shimmed similarly.



The turbo support bracket will need to be slotted to bolt to the block.



The dipstick tube will not push completely into the boss in the block. Bending the bracket slightly allows it to fully seat in the block.



After all that work, you are going to want to put the best turbo kit on your wicked new motor. AMS fits that bill perfectly.



The AMS VSR intake manifold is the perfect match for the 23rr motor.

