

## MERCEDES M272/M276 V6 AND M157/M273/M278 V8 M11X1.5 HEAD BOLT THREAD REPAIR KIT

Caution: One or more head bolt holes in these engines are located at an oil passage pocket at the deck surface or near a coolant inlet hole at the front of the engine. It is not recommended to repair these four front holes as the drill and tap may deflect off of the pocket walls or cut into the coolant inlet hole at the right front of the block.

## 17 M11x1.5x44.5mm inserts are supplied in this kit

IMPORTANT! Please read the "UNIVERSAL INSTALLATION GUIDE" provided in the kit in their entirety before proceeding. Details specific to repairing this engine regarding drilling & tapping depths along with insert installation depths are provided below.

## \*\*\*DO NOT RE-USE OLD HEAD BOLTS \*\*\*

The threads on the old head bolts are often stretched out of pitch from torquing, causing them to tighten prematurely in the new inserts.

1. When mounting the drill/tap jig, follow the instructions on pages 3&4 using the TALL spacer provided (1½in. diameter x 2.62in. Long). The recessed end of the tall spacer should be facing upward. If it is necessary to mount the jig to a hole that has just been repaired, make sure to use a new head bolt. Old head bolts may be stretched out of pitch causing them to tighten prematurely in the new insert.

Note: There is a larger diameter alignment pin included in this kit due to the larger hole sizes in the block above the threads. Use the larger alignment pin with the tap bushing to align the jig over the hole being repaired. Once the jig is secured over the hole, remove the alignment pin and tap bushing and replace it with the drill bushing.

- 2. Drill the holes the total depth of the original holes, making sure to remove <u>all</u> factory threads which will be about 4 inches (100mm) deep.
- 3. The inserts are to be installed 1½-1¾ inch (38mm-44mm) deep below the deck surface. To accomplish this, you will need to thread the holes a minimum of 3¼ inches (81mm), deep from the deck surface (see page 4, figure 4 of the Installation Guide).

Note: This kit is universal for many other engines as well since the outside thread size of the insert does not change. Inserts are also available with internal threads of M10x1.25, M10x1.5, M11x1.25, M11x1.5, M11x2.0, M12x1.25, M12x1.5 and 7/16-14