

Installation Instructions

Cloyes *Quick Button*TM Timing Cover

BEFORE YOU BEGIN: READ ALL OF THESE INSTRUCTIONS FIRST !!!

Note: The installation procedures which follow assume that the engine has been disassembled and cleaned as it would be for a normal timing cover change.

YOU WILL NEED:

TOOLS:

5/32" Hex Bit Socket or Hex Wrench
3/16" Hex Bit Socket or Hex Wrench
Inch-Pound Torque Wrench
5/16" Flat Blade Screwdriver

SUPPLIES:

(10) 1/4-20 x 1/2 Socket Head Cap Screws
Front Main Oil Seal

1. **Clean everything!** Make sure that the engine mounting surfaces and timing cover components are as clean as possible. Oil leaks may result unless all surfaces are clean.
2. **Prepare the Engine.** Loosen the oil pan bolts enough so that the new timing cover can be installed without damaging the gasket. Push the camshaft sprocket firmly against the engine block to remove any endplay.
3. **Install the Oil Seal.** Carefully tap the oil seal (not supplied) into the timing cover from the front side. Tap the seal in place until it is flush with the timing cover. Be sure to keep the seal straight in the cover.
4. **Install the Timing Cover.** Mount the Timing Cover over the aligning pins on the engine block. Use a small amount of gasket sealer if desired. Install the ten (10) mounting screws (not supplied). Torque these screws to 160 in-lb (13 ft-lb) using your 3/16" Hex Wrench.
5. **Install the Adapter Plate and *Quick Button*TM Cam Button.** Remove the locking screw from the center of the adapter plate and turn the *Quick Button*TM cam button

counter-clockwise until it is bottomed-out against the adapter plate. Carefully install the O-Ring (supplied) in the groove on the back side of the adapter plate. Install the adapter plate into the access hole in the timing cover with the recessed area of the adapter plate should be towards the top of the engine for proper water pump clearance. Insert the four Button Head Cap Screws to hold the adapter plate in place. Tighten the screws alternately in a criss-cross pattern until the adapter plate is fully seated in the cover. Tighten the screws snugly using the 5/32" Hex Wrench (about 30 in-lbs). Remember that the screws are going into **aluminum**, so please do not over-tighten them.

6. **Adjust the Camshaft Endplay.** Using your screwdriver, turn the **Quick Button™** cam thrust button clockwise until it bottoms against the nose of the camshaft. Now, install the locking screw and tighten, using the 5/32" Hex Wrench, to 120 in-lb (10 ft-lb).

The camshaft endplay is now set to "Zero" lash. Due to the higher thermal expansion rate of the aluminum timing cover compared to the steel cam button assembly, there will be a small amount of endplay with the engine warmed up.

WARNING! This timing cover has been designed to fit behind the Chevrolet short water pump. However, some aftermarket racing pumps may not provide adequate clearance. If the water pump does not provide clearance, the **Quick Button™** cam thrust button may be overloaded. Check for clearance using feeler gauges or paper. It may be necessary to modify the cover, water pump, or both.

WARNING! This timing cover has been designed to accommodate up to a 7-1/2" vibration damper. Some larger dampers, such as the Chevrolet 8" replacement, may interfere with the Adapter Plate screw heads.