

# SPECIAL TOOLS

## INSTRUCTION SHEET

**IMPORTANT** ► **SAVE THIS SHEET FOR FUTURE REFERENCE**

### INSTRUCTIONS FOR TIMING FIXTURES TO ADJUST BREAKER ASSEMBLY (POINTS)

Fixtures are available in sets or individually. Each is designed for use on specific engines. Make sure you always use the correct fixture.

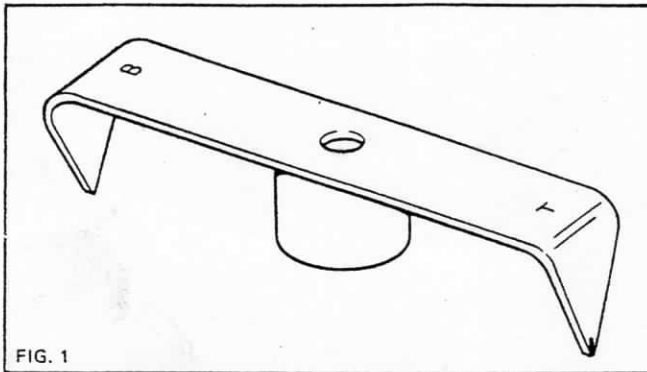


FIG. 1

TIMING FIXTURE SET PART NUMBER 386701 includes the following fixtures:

383603 for ALL 3 & 4 H.P. engines

383602 for ALL 5 thru 20 H.P. (except 1974 and later 9.9 & 15) & 1969 and later 25 H.P.

386636 for ALL 9.9 & 15 H.P. 1974 and later

383601 for ALL 22 thru 40 H.P. thru 1961

378966 for ALL 28, 33 & 40 H.P. 1962 thru 73

386635 for ALL 40 H.P. 1974 and later

1. Remove rewind starter (if located over flywheel). Remove flywheel using flywheel puller (special tool 378103). Remove spark plugs to relieve compression pressure in cylinders.
2. Disconnect all leads from breaker point assemblies. Connect continuity light or meter between armature plate and screw terminal of forward breaker points. See Figure 2.

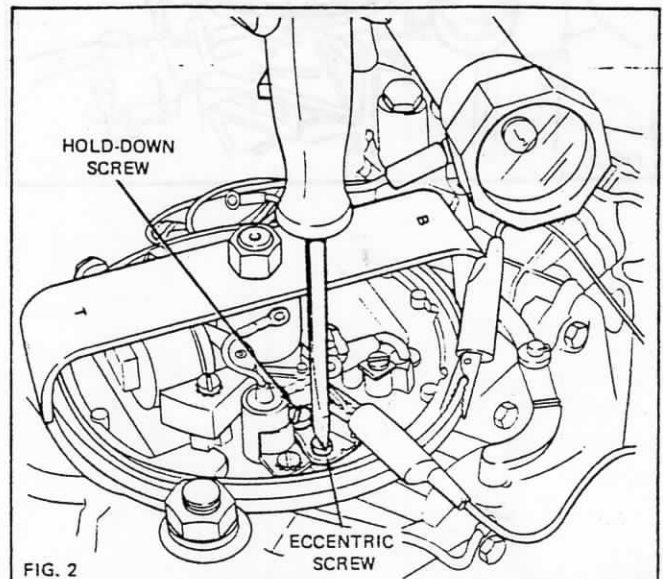
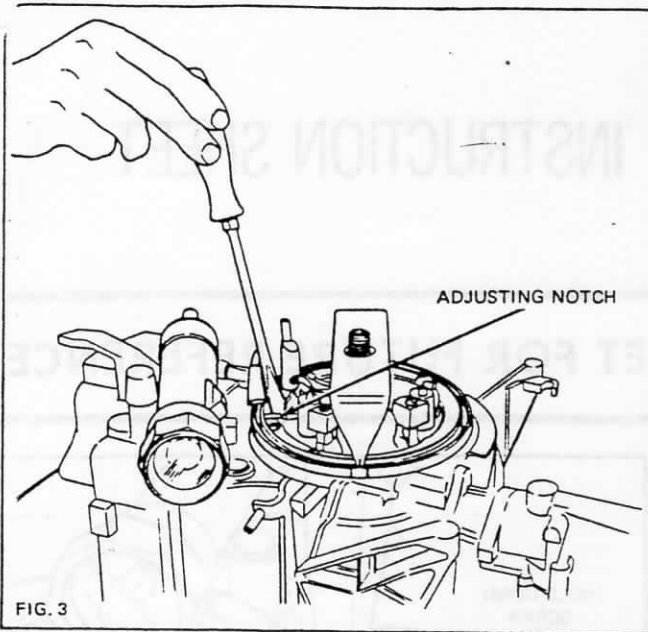


FIG. 2

3. Place gearshift in forward. Advance breaker plate to full throttle position against stop. Select appropriate fixture for engine. Install fixture on crankshaft and rotate the crankshaft clockwise so that the side of fixture marked "T" is aligned with the right hand timing mark on armature plate. See Figure 2.
4. Move the timing fixture slowly until the instant the points open (test light goes out or meter needle rises from zero indicating an open circuit). The points should break open when the timing fixture is midway between the two projections on the armature plate.
5. If timing is not correct, align the timing fixture and the right hand timing mark. Adjust points by loosening hold down screw and turning eccentric screw until the light or meter indicates an open circuit. Hold eccentric screw with a screwdriver while tightening hold-down screw. Some models do not have an eccentric adjusting screw. These



models are adjusted by placing a screwdriver in the notches in breaker base and armature plate and turning as required. See Figure 3. Recheck timing as explained in preceding step 4.

#### NOTE

If points being adjusted are new, set them to break open at the right hand timing mark rather than midway between the two marks. This will allow for seating of the fibre breaker block.

6. Rotate crankshaft clockwise 180° (timing fixture side marked "B" aligned with right hand timing mark). Adjust second set of breaker points as explained in steps 4 and 5.