## **Oil Filter Fitting Instructions**

The external filter unit is of the by-pass type and should be changed at regular intervals, but if the oil becomes dirty for any reason, the filter should be changed and the crankcase drained and refilled with clean engine oil.

- 1. Remove the drain plug from the sump and allow the oil to drain into a suitable container. It is preferable to drain the oil when the engine is warm to ensure that the oil drains away more evenly, carrying with it any sediment and foreign matter that may be present.
- 2. Replace the drain plug when all the oil has been allowed to drain away, ensure that the washer fitted on the plug is in good condition, replace as necessary.
- **3.** Undo first and second cylinder head nuts on the off-side (opposite to manifold) of engine (**fig 1A**).
- 4. Place clamp bracket (3) over the studs (tightening screw to the top).
- 5. Replace cylinder head nuts on studs and tighten to 35lbs/ft.
- Screw filter (2) into canister unit (10) and slide the two halves together then in turn slide this into the clamp (3) ensuring that the inlet hole is uppermost. Tighten the clamp screw to hold the canister secure (fig 1)
- 7. Screw inlet union (7) into the canister inlet hole.
- 8. Screw outlet sleeve (9) onto the canister outlet thread.



- Remove the top bolt on the side timing cover (fig 2A) and replace with the female outlet bolt (6) (fig 3A)
- Remove the screw/bolt from the block (fig 2B) and replace with steel inlet union (8).
- Take the thicker of the two braided pipes (outlet)(4) and screw the end with the tight radius into the female bolt in the side timing cover (fig 3A), the other end is screwed into the sleeve-nut

## fitted on the canister (fig4A).



 Take the remaining pipe (5) and secure one end to the inlet on the canister (fig4B) and the other end to the inlet union fitted into the block (fig3B).



- 13. Unscrew the top bolt on the front timing cover (fig4C) fit the pipe clamp (1) over the oil pipes and refit the bolt to hold the pipes tightly (the pipes should be routed behind the fan belt and should have no tight bends or kinks).
- 14. Refill the engine with clean engine oil to the full mark on the dipstick (approximately 4 imperial pints). Add 1 extra imp pint of oil to allow for the filling of the filter and pipes.
- **15.** Once sure that all fittings and pipes are tight start the engine and check for any sign of leakage at unions or any other part of the filter system.
- 16. When the engine has been allowed to warm, it is advisable to re-check that the cylinder head nuts are tightened to the correct torque of 35lbs/ft.

