

## Procedure:

1. ALL PARTS MUST BE COMPLETELY CLEAN.
2. Lube all bearings on crankshaft with straight 2 cycle oil.
3. Place crank in bottom half crankcase, making sure the mag end of the crank is at the correct end of the crankcase. Tap down slightly to ensure proper seating of bearings, also make sure that all of the retaining rings are in their correct location and that the split in the retaining ring is up (refer to picture on this page) and NOT in line with crankcase split. Place center seal spacer in center of crankshaft, bend separator slightly to ensure a snug fit. Place 2 alignment pins in bottom half of crankcase (they will fit loose, they are only to fill the void).
4. You are now ready to place sealant (Loctite 518 or Loctite 574) on the top half of the crankcase (only needed on mating surface) a LIGHT coat of sealant is all that is needed.
5. Now you are ready to assemble the complete bottom end of the engine. Carefully hold the connecting rods up with one hand and guide them thru the top half of the crankcase as you bring the halves together. Tap down slightly to ensure proper mating.
6. Using blue Loctite 242 or 243 on the 7 - 8mm. crankcase bolts, (4 - 6mm and 3 - 8mm bolts on 3202/3203) start all bolts before tightening. Hand tighten using a criss cross torque pattern. With W137 seal setting tool set the mag end seal. Spin crank in crankcase by hand to make sure it is smooth and free of drag. You are now ready to torque the crankcase bolts to their proper torque setting (228 in/lbs. on 8mm - 96 in/lbs. on 6mm) using once again the criss cross torque, pattern. Spin the crank once again to ensure smooth operation, and no large increase in drag from the first time spun. If drag increases, disassemble case and determine cause.
7. You are now ready to assemble the top end.

