

CYLINDERS AND PISTONS

Removing and Installing Cylinders

32 EN

Special Tools: P 8a Piston ring compressor 82.5 mm (3¼ in.) dia.
P 18 Spacer tubes for holding cylinders to crankcase

Removal

1. Remove cylinder head (23 EN).
2. Remove and number push rods. Remove push rod tubes.
3. Remove and number cylinders I through IV.

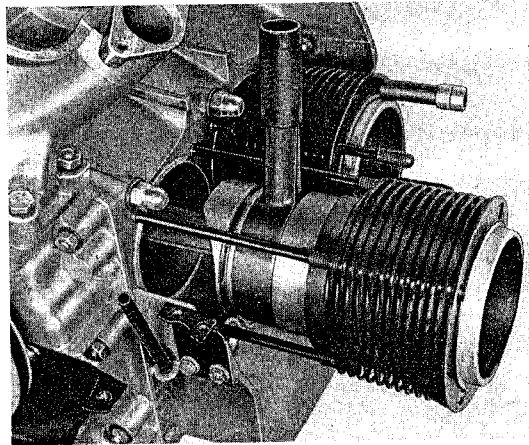


Fig. 165

Installation

The installation is accomplished in the reverse order of removal observing the following points:

1. Check cylinders and pistons for wear and replace cylinder-piston sets if necessary. (See 33 EN for inspection criteria.)
2. Clean crankcase to cylinder and cylinder to cylinder head joints to insure a proper fit. Using a straight edge, check the surface of the crankcase for trueness. After installing cylinders check alignment across the top of the cylinders. Hold cylinders with P 18 spacers.
3. Use new gaskets at cylinder bases.
4. Check pistons and piston rings and install rings in correct arrangement.
5. Offset ring end gaps by 90° in the 1600 engine and 120° in the 1600 S engine so that end gaps are not in line and the oil ring gap is upward (with respect to installed engine).
6. Lightly oil the cylinder bore and push the cylinder over the piston. Install cylinders so that the cooling fins do not touch the crankcase studs. Rotate cylinders or adjust the studs if necessary.
7. Install push rod tubes and cylinder heads. Remember to install duct plates.
8. Tighten cylinder head nuts in the proper sequence to 3 mkg (22 ft. lb.) torque (23 EN).