

- e. Check the respective journal for damage or uneven wear. If the journal is out-of-round or tapered in excess of **0.002 in. (0.05 mm)**, the crankshaft should be replaced with new part.
- f. When a new crankshaft is used as a replacement, select the proper size bearings referring to the selection table.
- g. When the bearing is mounted into the crankcase, the top of the bearing should be extended above the case mounting flange by **0.0027~0.0039 in. (0.068~0.098 mm)**.

Caution :

The shell of the bearing is very thin, therefore, care should be exercised that it is not damaged during installation. Bearing which is deeply scored, having a poor fit or when there is a large foreign object imbedded in the bearing, it should be replaced with a new bearing. Further, repairs of the listed below should not be attempted.

- a. Adjusting with a shim
 - b. Repairing with a scraper
 - c. Use of red or bluing to check the bearing contact.
 - d. Correcting the clearance by filing the connecting rod or the connecting rod cap.
 - e. Applying emery paper on the bearing surface in an attempt to correct the bearing.
4. Measuring the connecting rod bearing
(Method using micrometer and inside dial gauge)
- a. Accurately measure the crank pin diameter with the micrometer.
Take the measurement in both vertical and horizontal direction at the front, center and rear.
 - b. Assemble the bearing into the connecting rod and torque the cap to the specified value, **14.5 ft-lbs (2 kg-m)**, and measure the bearing inside diameter parallel to the rod at the front, center and rear locations.

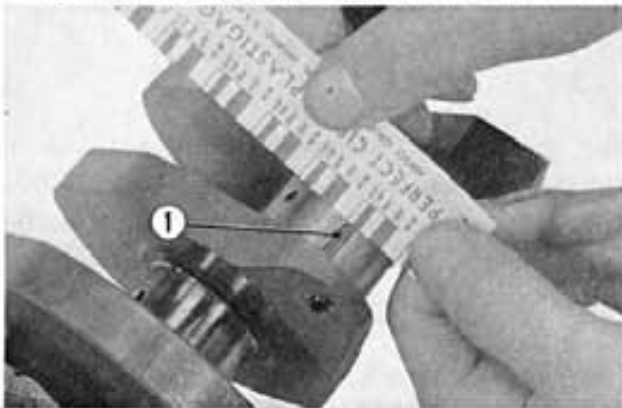


Fig. 3-82 ① Press gauge

(Press gauge method)

- a. Remove the connecting rod cap and clean all oil from the bearing and pin.
- b. Cut the press gauge to width of the bearing and place it on top and parallel to the pin, staying clear of the oil hole.
- c. Assemble the connecting rod on the crankshaft and torque the rod cap to the specified torque, **14.5 ft-lbs (2 kg-m)**.
- d. Disassemble the connecting rod bearing and measure the flattened gauge by comparing it to the scale on the package of the gauge. (Fig. 3-82)

The clearance is taken as the average value between the lowest and the highest readings. The standard bearing clearance is **0.0008~0.0018 in. (0.02~0.046 mm)**.

If the clearance is beyond **0.0032 in. (0.08 mm)**, the bearing should be replaced with new part.

- Numbers (3, 4, 5) are stamped on the side surface of the crank weight, this indicates the crank pin size. (Fig. 3-81)
- The numerical figures stamped on the connecting rod indicates the size of the connecting rod large end. Select the proper size bearing by referring to the table on the next page. The bearings are color coded on the end surface.



Fig. 3-83-1