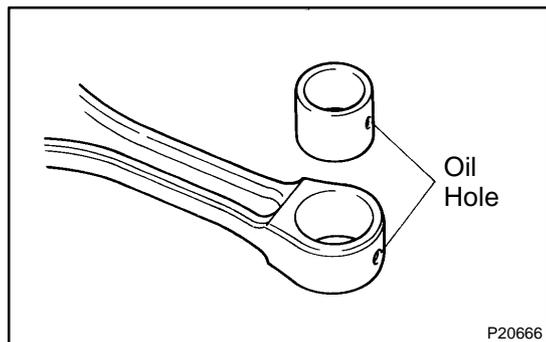


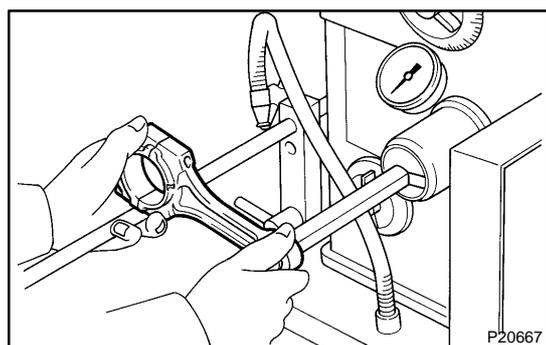
## REPLACEMENT

### 1. REPLACE CONNECTING ROD BUSHINGS

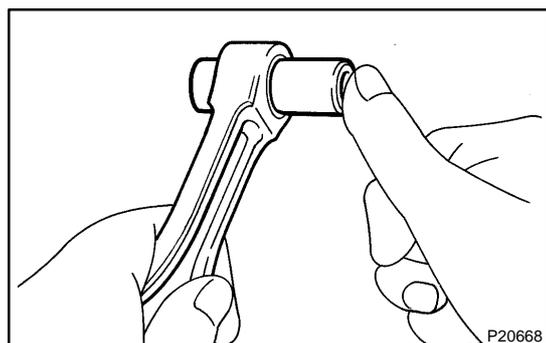
- (a) Using SST and a press, press out the bushing.  
SST 09222-30010



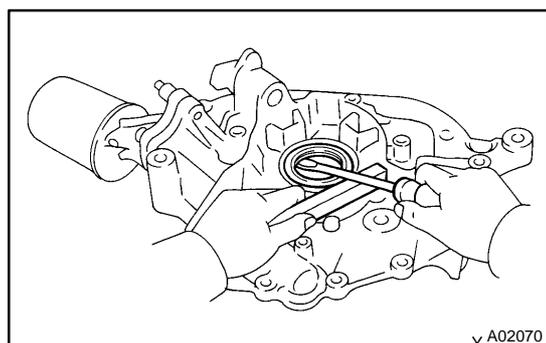
- (b) Align the oil holes of a new bushing and the connecting rod.  
(c) Using SST and a press, press in the bushing.  
SST 09222-30010



- (d) Using a pin hole grinder, hone the bushing to obtain the standard specified clearance (See page [EM-100](#)) between the bushing and piston pin.



- (e) Check the piston pin fit at normal room temperature. Coat the piston pin with engine oil, and push it into the connecting rod with your thumb.

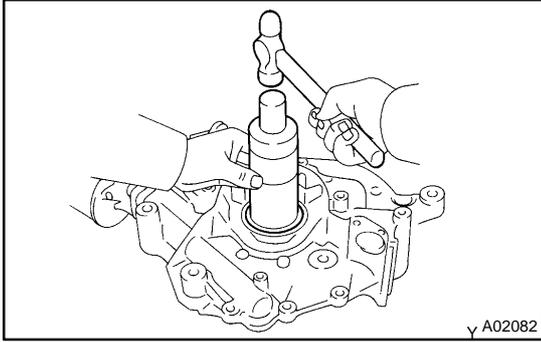


### 2. REPLACE CRANKSHAFT FRONT OIL SEAL

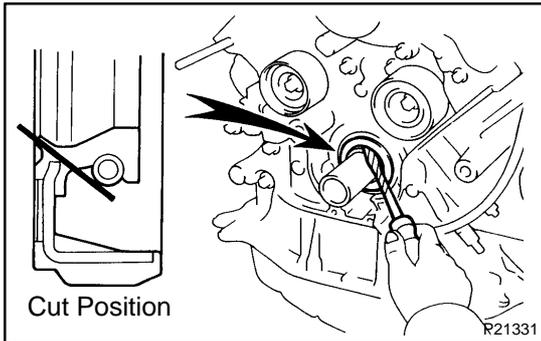
#### HINT:

There are 2 methods ((a) and (b)) to replace the oil seal.

- (a) If oil pump is removed from cylinder block:  
(1) Using a screwdriver, pry out the oil seal.



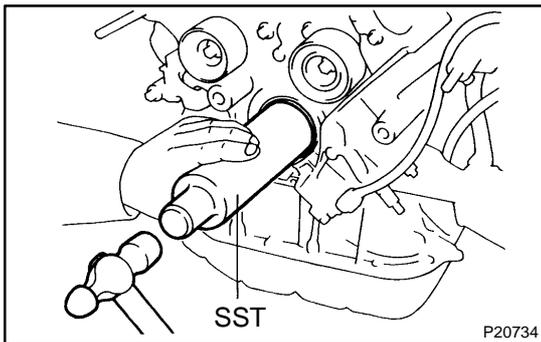
- (2) Using SST and a hammer, tap in a new oil seal until its surface is flush with the oil pump body edge.
- SST 09316-60011 (09316-00011)
- (3) Apply MP grease to the oil seal lip.



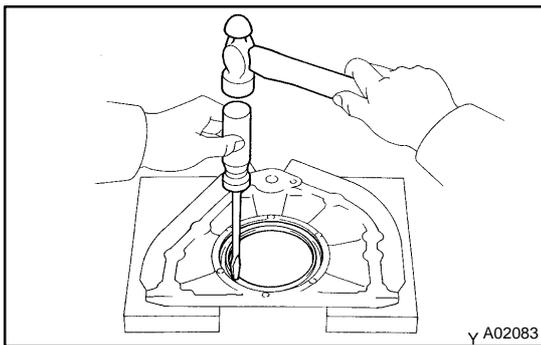
- (b) If oil pump is installed to the cylinder block:
  - (1) Using a knife, cut off the oil seal lip.
  - (2) Using a screwdriver, pry out the oil seal.

**NOTICE:**

**Be careful not to damage the crankshaft. Tape the screwdriver tip.**

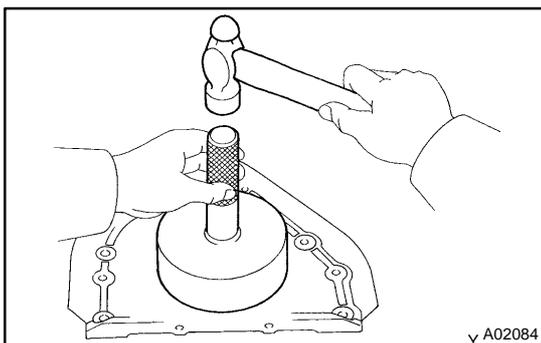


- (3) Apply MP grease to a new oil seal lip.
- (4) Using SST and a hammer, tap in the oil seal until its surface is flush with the oil pump body edge.
- SST 09316-60011 (09316-00011)

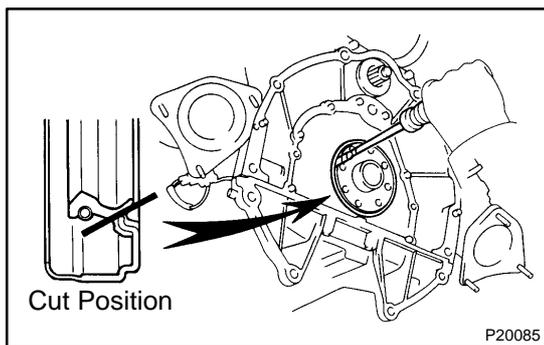
**3. REPLACE CRANKSHAFT REAR OIL SEAL****HINT:**

There are 2 methods ((a) and (b)) to replace the oil seal which.

- (a) If rear oil seal retainer is removed from cylinder block:
  - (1) Using a screwdriver and hammer, tap out the oil seal.



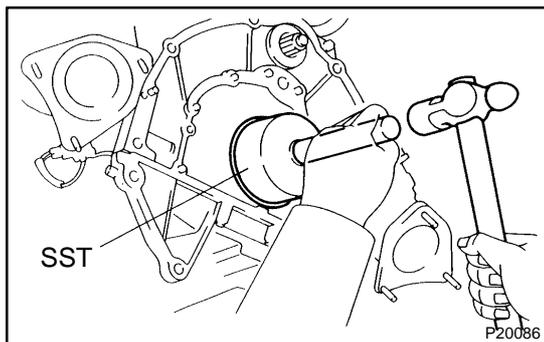
- (2) Using SST and a hammer, tap in a new oil seal until its surface is flush with the rear oil seal retainer edge.
- SST 09223-56010
- (3) Apply MP grease to the oil seal lip.



- (b) If rear oil seal retainer is installed to cylinder block:
- (1) Using a knife, cut off the oil seal lip.
  - (2) Using a screwdriver, pry out the oil seal.

**NOTICE:**

**Be careful not to damage the crankshaft. Tape the screwdriver tip.**



- (3) Apply MP grease to a new oil seal lip.
- (4) Using SST and a hammer, tap in the oil seal until its surface is flush with the rear oil seal retainer edge.

SST 09223-56010