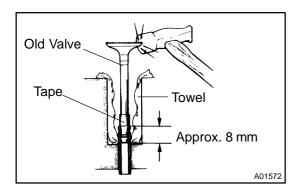
EM0Z3-02



REPLACEMENT

1. REPLACE VALVE GUIDE BUSHINGS

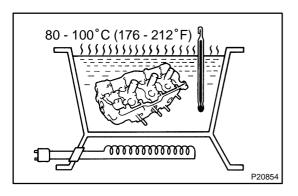
(a) w/ Snap ring: Insert an old valve wrapped with tape into the valve guide bushing, and break off the valve guide bushing by hitting it with a hammer. Remove the snap ring.

HINT:

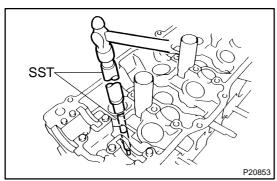
Wrap the tape approx. 8 mm (0.31 in.) from the valve stem end.

NOTICE:

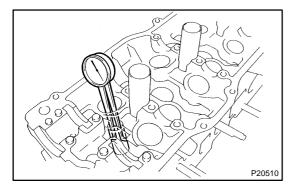
Be careful not to damage the valve lifter hole.



(b) Gradually heat the cylinder head to 80 - 100°C (176 - 212°F).



(c) Using SST and a hammer, tap out the guide bushing. SST 09201-10000 (09201-01060), 09950-70010 (09951-07150)



- (d) Using a caliper gauge, measure the bushing bore diameter of the cylinder head.
- (e) Select a new guide bushing (STD size or O/S 0.05). **Both intake and exhaust**

Bushing bore diameter mm (in.)	Bushing size
10.985 - 11.027 (0.4350 - 0.4341)	Use STD
11.050 - 11.077 (0.4350 - 0.4361)	Use O/S 0.05

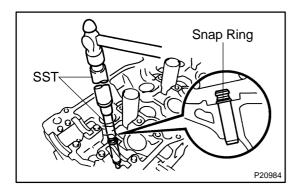
2002 4RUNNER (RM887U)

Author: Date: 859

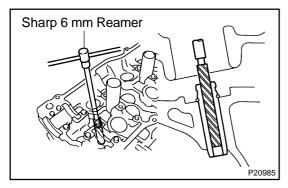
If the bushing bore diameter of the cylinder head is greater than 11.027 mm (0.4341 in.), machine the bushing bore to these dimension:

11.050 - 11.077 mm (0.4350 - 0.4361 in.)

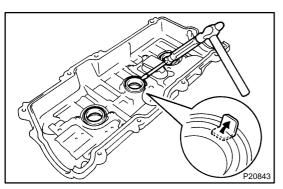
If the bushing bore diameter of the cylinder head is greater than 11.077 mm (0.4361 in.), replace the cylinder head.



- (f) Gradually heat the cylinder head to 80 100°C (176 212°F).
- (g) Using SST and a hammer, tap in a new guide bushing until the snap ring makes contact with the cylinder head.SST 09201-10000 (09201-01060), 09950-70010 (09951-07150)



(h) Using a sharp 6 mm reamer, ream the guide bushing to obtain the standard specified clearance (See page EM-38) between the guide bushing and valve stem.

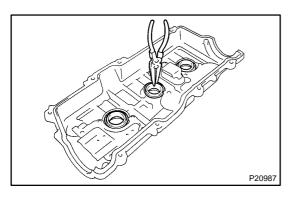


2. REPLACE SPARK PLUG TUBE GASKETS

- (a) Bend up the tab on the ventilation baffle plate which prevents the gasket from the slipping out.
- (b) Using a screwdriver and hammer, tap out the gasket.

NOTICE:

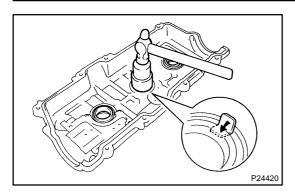
Do not scratch or damage the joint of the cylinder head cover



(c) Using needle-nose pliers, pry out the gasket.

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- (d) Using a 32 mm socket wrench and hammer, tap in a new gasket until its surface is flush with the upper edge of the cylinder head cover.
- (e) Apply a light coat of MP grease to the gasket lip.
- (f) Return the ventilation plate tab to its original position.