

Manual Drivetrains and Axles 9th Edition

Chapter 13

Multiple Choice Quiz B

Name: \_\_\_\_\_ Date: \_\_\_\_\_

1. What is a common cause of chuckle noise in the drive axle during deceleration?

- A. Excessive tire pressure
- B. Worn brake pads
- C. Excessive clearance in the differential
- D. Faulty suspension components

2. Which part must be removed first in bearing retained axle service?

- A. Axle shaft
- B. Retainer nuts/bolts
- C. Slide hammer
- D. Differential cover

3. How is the gear oil level typically checked in a drive axle?

- A. With a dipstick
- B. At the filler plug
- C. Using a pressure gauge
- D. Through a sight glass

4. Why is pinion depth shim selection crucial in drive axle service?

- A. To balance the axle
- B. To adjust bearing preload
- C. To ensure proper gear engagement
- D. To maintain oil flow

5. What does the term "backlash" refer to in the context of drive axles?

- A. The resistance of the axle to movement
- B. The play between gear teeth
- C. The thickness of the axle shaft
- D. The torque applied to the differential

6. What is the result of an incorrect pinion depth in the drive axle?

- A. Reduced fuel efficiency
- B. Increased tire wear
- C. Gear misalignment
- D. Brake failure

7. What does a howling sound in the drive axle typically indicate?

- A. Faulty U-joints
- B. Incorrect adjustment of ring and pinion gears
- C. Overloaded axle
- D. Misaligned wheels

8. What is checked during the adjustment of carrier bearing preload?
- A. Axle shaft alignment
  - B. Differential case positioning
  - C. Gear lubrication level
  - D. Bearing tightness
9. What is the significance of adjusting pinion bearing preload in a drive axle?
- A. To control axle speed
  - B. To ensure proper bearing operation
  - C. To adjust the vehicle's ride height
  - D. To modify the gear ratio
10. How is the drive pinion bearing preload typically measured?
- A. Using a torque wrench
  - B. With a dial indicator
  - C. By gear sound
  - D. Through oil temperature

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Answer Key

1. C

2. B

3. B

4. C

5. B

6. C

7. B

8. D

9. B

10. A