

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

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

1. Which of the following components is NOT directly associated with Variable Valve Timing?
  - A. Intake valve
  - B. Exhaust valve
  - C. EGR valve
  - D. Control valve
  
2. In a DOHC engine with VVT on both camshafts, which component allows the valves to be operated at different points in the combustion cycle?
  - A. Control valve
  - B. Powertrain control module (PCM)
  - C. Camshaft phaser
  - D. Oil control valve (OCV)
  
3. Which camshaft phasing primarily increases low-speed torque in the engine?
  - A. Intake cam phasing
  - B. Exhaust cam phasing
  - C. Both intake and exhaust cam phasing
  - D. Neither intake nor exhaust cam phasing
  
4. What is the main advantage of the "Idle Valve Timing" mode?
  - A. Enhanced engine performance
  - B. Reduced NOx emissions
  - C. Increased fuel efficiency
  - D. Improved idle quality
  
5. For which of the following reasons is the exhaust camshaft retarded?
  - A. Reduce NOx emissions
  - B. Increase engine speed
  - C. Improve fuel efficiency
  - D. Enhance engine cooling
  
6. In which of the following modes is the valve timing changed to trap some of the exhaust gases in the combustion chamber?
  - A. Idle Valve Timing
  - B. Performance Valve Timing
  - C. EGR Function Valve Timing
  - D. None of the above
  
7. Which camshaft phasing is used to achieve an EGR effect without the need for an EGR valve?
  - A. Intake cam phasing
  - B. Exhaust cam phasing
  - C. Both intake and exhaust cam phasing
  - D. Neither intake nor exhaust cam phasing

8. Where is the oil control valve typically located in a standard OHC engine?

- A. Valve cover
- B. Front cover
- C. Oil pan
- D. Filter housing

9. In which valve timing mode is the valve overlap very low to ensure idle quality?

- A. Idle Valve Timing
- B. Performance Valve Timing
- C. EGR Function Valve Timing
- D. None of the above

10. Which of the following is NOT a direct benefit of variable valve timing?

- A. Increased engine power
- B. Improved fuel efficiency
- C. Reduced NOx emissions
- D. Enhanced engine noise suppression

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Chapter 29

Multiple Choice Quiz B

Answer Key

1. C

2. C

3. A

4. D

5. A

6. C

7. B

8. B

9. A

10. D