

Name \_\_\_\_\_

**MULTIPLE CHOICE. Choose the one alternative that best completes the statement or answers the question.**

- 1) Using E85 can result in which of these? 1) \_\_\_\_\_  
A) Increased exhaust emissions  
B) Reduced fuel economy  
C) Increased fuel economy  
D) Decreased exhaust emissions
- 2) Technician A says that the use of premium high-octane gasoline in an engine designed to use regular-grade gasoline will increase engine power. Technician B says that flexible fuel vehicles are designed to operate on gasoline or gasoline-ethanol blends up to 85% ethanol. Which technician is correct? 2) \_\_\_\_\_  
A) Technician A  
B) Technician B  
C) Both technicians  
D) Neither technician
- 3) Which of these procedures used to convert coal-to-liquid fuel, creates a synthetic crude, called syncrude, which is then refined to produce gasoline or diesel fuel? 3) \_\_\_\_\_  
A) Indirect method  
B) Direct method  
C) Cracking  
D) Distillation
- 4) P-series alternative fuel that is patented by Princeton University and is a non-petroleum-based fuel suitable for use in \_\_\_\_\_ vehicles or any vehicle designed to operate on E-85 (85% ethanol, 15% gasoline). 4) \_\_\_\_\_  
A) Flexible fueled  
B) Controlled Fueled  
C) Ethanol  
D) Methanol
- 5) Winter-blend gasoline \_\_\_\_\_. 5) \_\_\_\_\_  
A) Vaporizes more easily than summer-blend gasoline  
B) Has a higher RVP  
C) Can cause engine driveability problems if used during warm weather  
D) All of the above
- 6) Technician A says that gasoline is a complex blend of hydrocarbons. Technician B says that gasoline is blended for seasonal usage to achieve the correct volatility for easy starting and maximum fuel economy. Which technician is correct? 6) \_\_\_\_\_  
A) Technician A  
B) Technician B  
C) Both technicians  
D) Neither technician

- 7) Which method of blending ethanol with gasoline is the most accurate? 7) \_\_\_\_\_
- A) In-line
  - B) Sequential
  - C) Splash
  - D) All of the above
- 8) Which of these is added to a fuel for testing purposes to avoid problems with the variation of gasoline? 8) \_\_\_\_\_
- A) MTBE (methyl tertiary butyl ether)
  - B) Xylene
  - C) Indolene
  - D) TBA (tertiary butyl alcohol)
- 9) Technician A says that in going to high altitudes, engines produce lower power. Technician B says that most engine control systems can compensate the air-fuel mixture for changes in altitude. Which technician is correct? 9) \_\_\_\_\_
- A) Technician A
  - B) Technician B
  - C) Both technicians
  - D) Neither technician
- 10) E85 means that the fuel is made from \_\_\_\_\_. 10) \_\_\_\_\_
- A) 85% gasoline and 15% ethanol
  - B) 85% ethanol and 15% gasoline
  - C) Ethanol that has 15% water
  - D) Pure ethyl alcohol

## Answer Key

Testname: ENGINES9\_12A

1) B

Page Ref: 136

2) B

Page Ref: 131

3) B

Page Ref: 143

4) A

Page Ref: 142

5) D

Page Ref: 128

6) C

Page Ref: 126

7) A

Page Ref: 132

8) C

Page Ref: 131

9) C

Page Ref: 130

10) B

Page Ref: 136