**Mech 9 Chapter 5 Test**

Student : \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

**Section A: True & False- put an F or T depending on whether you believe the statement is true or false. (10M)**

1. Two stroke engines are more fuel efficient than four strokes. \_\_\_

2. The common repair in a small engine is on the carburetor. \_\_\_

3. Gasoline additives improve fuel quality and performance. \_\_\_

4. Volatility is the propensity of a liquid to become vapor. \_\_\_

5. A catalytic converter is intended to reduce emission from an engine. \_\_\_

6. A carburetor should be replaced if there is blue/green sediment present. \_\_\_

7. LPG can be used as a fuel for vehicles. \_\_\_

8. LPG stands for liquefied petroleum gas. \_\_\_

9. LPG contains propane and butane. \_\_\_

10. Octane is the ability of a fuel to resist engine knock or ping. \_\_\_

**Section B: Multiple Choice- select the correct answer. (10M)**

1. As altitude increases, air density

 a) increases

 b) decreases

c) doesn’t change

 d) none of the above

2. Gravity feed fuel systems requires the fuel tank to be

 a) elevated

 b) level

 c) below

 d) separated

3. Nitrogen dioxide is written in chemical form as

 a) NO3

 b) NO4

 c) NO2

d) None of the above

4. The Bernoulli principal is named after:

 a) Henry Bernoulli

 b) Jim Bernoulli

 c) Daniel Bernoulli

 d) Pablo Bernoulli

5. Volatility is:

 a) fuel type

 b) the propensity of liquid to become a vapor

c) engine type

 d) none of the above

6. Daniel Bernoulli is:

 a) Italian

 b) Russian

 c) Swiss

 d) French

7. The most common fuel is:

 a) gasoline

 b) diesel

 c) propane

 d) LGP

8. Cold weather cause gasoline to be:

 a) less volatile

 b) more volatile

 c) no difference in volatility

 d) none of the above

9. The largest component in LPG is:

 a) gasoline

 b) propane

 c) butane

 d) diesel

10. Methane is also called:

 a) wood alcohol

 b) natural gas

 c) propane

 d) none of the above

**Section C: Short Answer- answer the question based on the information from Chapter 5 (22m)**

1. List the four different components of LPG. (4M)

2. Alcohol has the characteristic of absorbing great amounts of what? (1M)

3. A carburetor mixes these two things in an engine. (2M)

4. What is the purpose of a primer system in a small engine? (2M)

5. Most fuel tanks are made from this? (1M)

6. What is the purpose of a fuel filter? (2M)

7. What are the five components of a fuel system? (5M)

8. Fossil fuels are fuels that are derived from things that were previously what? (1M)

9. Gasoline is a complex blend of chemicals; gasoline is a HC which is short for what? (1M)

10. List three (3) gasoline additives. (3M)