

## Heat Engines Objective Questions and Answers Pdf

1. According to Boyle's law

- a. at constant pressure the temperature of a gas varies inversely as its volume
- b. at constant pressure the absolute temperature of a gas varies inversely as its volume
- c. at constant temperature, the pressure of a gas varies inversely as its volume
- d. at constant temperature, the absolute pressure of a gas varies inversely as its volume

Ans: D

2. According to Charle's law

- a. at constant pressure the volume of a gas is proportional to its absolute temperature
- b. at constant temperature, pressure is proportional to temperature
- c. at constant temperature, pressure of a gas is proportional to its volume
- d. at constant volume, the absolute pressure is proportional to the temperature

Ans: A

3. Intake air filters are provided on air compressor for

- a. removing dirt and dust from suction air
- b. reducing temperature of suction air
- c. reducing pressure of suction pressure
- d. removing impurities of air

Ans: A

4. An optical pyrometer works on the principle of

- a. expansion of fluids
- b. change of electrical resistance
- c. thermoelectric effect
- d. monochromatic radiation

Ans: D

5. To avoid moisture troubles, the branch connection from compressed air line are taken from

- a. top side
- b. bottom side
- c. left side
- d. right side

Ans A

6. In automobiles, as the speed of vehicle increases the back pressure

- a. increases
- b. reduces

- c. remains unaffected
- d. depends on other factors

Ans: D

7. A regenerator in a gas turbine
- a. reduces heat loss in exhaust
  - b. permits use of higher compression ratio
  - c. improves thermal efficiency
  - d. permits use of fuels of inferior quality

Ans; C

8. Which one of the following factors will not assist in getting high power output from a compression ignition engine

- a. high compressor ratio
- b. fine atomization of fuel
- c. high charge density
- d. large quantity of excess air

Ans: D

9. Free piston engines find application in

- a. compressed air supply
- b. mining installations
- c. gas turbines
- d. supercharging of diesel engines

Ans: C

10. In a SI engine, advancing of spark timing will

- a. increase knocking tendency
- b. reduce knocking tendency
- c. not have any effect
- d. depends on intensity of spark only

Ans: A