MDCAT Physics Chapter 5 Thermodynamics Online Test

Sr	Questions	Answers Choice
1	Most motorbikes have _____ cylinder/s engine but cars usually have _____ cylinders on the same crankshaft.	A. Four , Six B. One , four C. two , five D. None of these
2	No of spark plugs needed in diesel engine is:	A. Four B. Five C. Six D. None of these
3	A certain engine coverts 20% of available heat energy into work. Then its efficiency will be:	A. 20% B. 80% C. 50% D. None of these
4	Diesel engine coverts _____ of available heat energy into work.	A. 20% to 25% B. 25% to 30% C. 30% to 35% D. 35% to 40%
5	Petrol engine coverts _____ of available heat energy into work.	A. 20% to 25% B. 25% to 30% C. 30% to 35% D. 35% to 40%
6	One degree of thermodynamics scale of temperature is called:	A. Celsius B. Fahrenheit C. Kelvin D. Radian
7	The efficiency of a practical heat engine:	A. Can be 100% B. Can not be 100% C. Is always Zero D. None of these
8	Carnot engine is _____ heat engine.	A. A reversible B. An irreversible C. An ideal D. Both A and C
9	If temperature of the sink is decreased, efficiency of a carnot engine.	A. Remains constant B. Decreases C. Increases D. None of these
10	What will be efficiency of carnot engine when it is operated between the temperatures 47^{o}C and 127 ^{o}C:	A. Reversible B. Irreversible C. Sometimes A and B D. None of these
11	The ratio of output work per cycle to input energy per cycle is called:	A. Entropy B. Internal energy C. Efficiency D. None of these
12	As the working substance of a heat engine completes a cycle, there is no change in:	A. Internal energy B. Pressure C. Volume D. All of these
13	The law of thermodynamics which discusses the condition under which heat energy is converted into and equivalent amount of work is:	A. 1st B. 2nd C. 3rd D. None of these
14	Steam engine is:	A. An optical system B. A thermal system C. A thermodynamic system D. None of these
15	If the temperature difference between hot and cold body is greater the heat engine is:	A. Not efficient B. Less efficient C. More efficient D. NOne of above

16	If C_V denotes molar specific heat at constant volume and Δ T is the change in temperature, then $C_V \Delta T$ gives:	A. Volume B. Pressure C. Energy D. Entropy
17	A process in which no heat enters or leaves the system is called.	A. Adiabatic process B. Isothermal process C. Isochoric process D. None of these
18	The equation PVr = Constant applies to:	A. Isothermal process B. Adiabatic process C. Isobaric process D. None of these
19	A process which is carried at constant temperature and Boyle's law can be applied is called:	A. Adiabatic process B. Isothermal process C. Isochoric process D. None of these
20	The equation W = _____ Δ U represents:	A. Thermal process B. adiabatic process C. Isobaric process D. None of these