

## Physics Fsc Part 1 Chapter 6 Online Test

Sr	Questions	Answers Choice
1	No entropy change is associated with	A. <p>isothermal process</p> B. <p>Adiabatic process</p> C. <p>Isobaric process</p> D. <p>Isochoric process</p>
2	KE of molecules of an ideal gas at absolutely zero will be	A. <p>0</p> B. <p>Infinite</p> C. <p>Very High</p> D. <p>Below zero</p>
3	Efficiency of a Carnot engine is.	A. <p>Infinite</p> B. <p>Ten</p> C. <p>Greater than 1</p> D. <p>Less Than</p>
4	SI unit of entropy is	A. <p>J/Kg</p> B. <p>J/K</p> C. <p>K gms <sup>-1</sup> </p> D. <p>JK</p>
5	Internal energy of a substance, is directly proportional to	A. <p>T</p> B. <p>V</p> C. <p>W</p> D. <p>P</p>
6	No entropy change is associated with	A. <p>isothermal process</p> B. <p>Adiabatic process</p> C. <p>Isobaric process</p> D. <p>Isochoric process</p>
7	Which is not example of diabatic process.	A. <p>Rapid escape of air from burst tyre</p> B. <p>Rapid expansion of air</p> C. <p>Conversion of water&nbsp; into ice in refrigerator</p> D. <p>Cloud formation in the atmosphere</p>
8	What one is not an isothermal change.	A. <p>Melting of solid</p> B. <p>Boiling of liquid</p> C. <p>Bursting of bicycle tyre</p> D. <p>Slow expansion of gas</p>
9	In Carnot engine, each process is.	A. <p>Reversible</p> B. <p>Preferable Reversible</p> C. <p>Irreversible</p> D. <p>Perfectly irreversible</p>
10	What can be calculated from the curve under PV graph.	A. <p>Heat</p> B. <p>Work done</p> C. <p>Temperatures</p> D. <p>Internal energy</p>
11	Pressure of a gas is directly proportional to average.	A. <p>&nbsp;Potential energy</p> <p>&nbsp;</p> B. <p>&nbsp;Rotational energy</p> <p>&nbsp;</p> C. <p>&nbsp; Translation K.E</p> <p>&nbsp;</p> D. <p>Compressed P.E.</p>
12	In reversible cyclic process the change in entropy of system.	A. <p>Remains constant</p> B. <p>Increase</p> C. <p>Decrease</p> D. <p>Becomes zero</p>
13	The change in internal energy is defined as.	A. <p>Q- W</p> B. <p>Q- T</p> C. <p>Q+ P</p> D. <p>Q - P</p>
14	Carnot Cycle is	A. <p>Reversible</p> B. <p>Irreversible</p> C. <p>Both</p>

15	Entropy of a system in reversible process	A. <p>Fluctuates</p> <p>B. Increases</p> <p>C. Is infinite</p> <p>D. Decrease</p>			
16	Adiabatic change occurs when the gas expands or compressed.	A. <p>Rapidly</p> <p>B. Slowly</p> <p>C. Gradually</p> <p>D. Moderately</p>			
17	The efficiency of Carnot engine is always.	A. <p>Greater than real engine</p> <p>B. Less than real engine</p> <p>C. Equal to the real engine</p> <p>D. Both a and b</p>			
18	The sum of all forms of molecular energies of substance is termed as	A. <p>Kinetic energy</p> <p>B. Potential energy</p> <p>C. Internal energy</p> <p>D. Heat energy</p>			
19	Thermodynamics mostly deals with.	A. <p>Measurement of quantity</p> <p>B. Transfer of quantity of heat</p> <p>C. Change of state</p> <p>D. Conversion of heat to other forms of energy</p>			
20	According to kinetic theory of gases, a finite volume of a gas consists of very	A. <p>Large number of molecules</p> <p>B. Small number of molecules</p> <p>C. Both a and b</p> <p>D. Large no of ions</p>			
21	Work done by the system is taken as	A. Positive	B. Negative	C. Undefined	D. None of these
22	What happens to internal energy of an object when its temperature.	A. Decreases	B. Increases	C. Fluctuates	D. Remains Constant
23	Boyle's law states that " The volume of a given mass of a gas is....."	A. Directly proportional to absolute temperature	B. Inversely proportional to absolute temperature	C. Directly proportional to density	D. Inversely proportional to pressure
24	In an isothermal change, internal energy.	A. Decrease	B. Increase	C. Remain same	D. Becomes zero
25	'R' is called	A. Universal constant	B. Universal per molecule constant	C. Universal gas constant	D. All of the above
26	The process in which no heat enters or leaves the system is known as.	A. Isothermal process	B. Adiabatic process	C. Isochoric process	D. Isobaric process
27	Change in entropy is maximum when temperature of source is that.....of sink	A. Greater than	B. Less than	C. Equal to	D. Zero
28	The efficiency of Carnot engine depends upon	A. Sink temperature	B. Source temperature	C. Both a and b	D. The working substance

29	When the system is expanded by adding heat energy, then the work done will be	A. <p>Positive and on the system</p> B. <p>Negative and on the system</p> C. <p>Positive and by the system</p> D. <p>Negative and by the system</p>
30	A system does 600 J of work and at the same time has its internal energy increased by 320 J. How much heat has been supplied.	A. <p>920 J</p> B. <p>280 J</p> C. <p>600 J</p> D. <p>200 J</p>
31	Collision between gas molecules are perfectly C	A. <p>&nbs; Elastic</p> <p>E</p> B. <p>&nbs; Inelastic</p> <p>&nbs;</p> C. <p>&nbs; Neither elastic nor inelastic</p> <p>&nbs;</p> D. <p>&nbs; All of these</p> <p>&nbs;</p>
32	In all natural processes where heat flow from one system to another there is always a net increase in	A. <p>Pressure</p> B. <p>Entropy</p> C. <p>Work</p> D. <p>Volume</p>
33	When hot and cold water are mixed the entropy	A. <p>Decrease</p> B. <p>Increase</p> C. <p>Remains constant</p> D. <p>Zero</p>
34	In an adiabatic process, there is no.	A. <p>&nbs; Change in temperature</p> <p>&nbs;</p> B. <p>&nbs; Exchange of heat</p> <p>&nbs;</p> C. <p>&nbs; Change in internal energy&nbs;&nbs;</p> <p>&nbs;</p> D. <p>Work done</p> <p>&nbs;</p>
35	Internal energy is similar to the	A. <p>Vibrational K.E.</p> B. <p>Gravitational P.E.</p> C. <p>K.E.</p> D. <p>All of these</p>
36	The process which is carried out at constant temperature is called.	A. <p>Adiabatic process</p> B. <p>Isothermal process</p> C. <p>Isochoric process</p> D. <p>Isobaric process</p>
37	$K = R/N_A$ , Where k is called.	A. <p>Rydberg constant</p> B. <p>Boltzmann constant</p> C. <p>Stefan constant</p> D. <p>Planck's constant</p>
38	According to kinetic theory of gases, the size of the molecule is.	A. <p>&nbs; Much smaller than the separation between molecule</p> <p>M</p> B. <p>&nbs; Much larger than the separation between molecules</p> <p>&nbs;</p> C. <p>&nbs; Both a and b</p> <p>&nbs;</p> D. <p>&nbs; Much larger than the separation between atoms</p> <p>&nbs;</p>
39	When two objects are made in thermal contact having same temperature then they are at.	A. <p>Thermal Equilibrium</p> B. <p>Chemical equilibrium</p> C. <p>Mechanical Equilibrium</p> D. <p>Physical Equilibrium</p>
40	A device which converts thermal energy into mechanical energy is called.	A. <p>Turbine</p> B. <p>Heat engine</p> C. <p>Carnot engine</p> D. <p>Refrigerator</p>
41	An addition of 400 J of heat causes the increase in internal energy of system is equal to 300 J, then work done will be	A. <p>100 J</p> B. <p>200 J</p> C. <p>300 J</p> D. <p>400 J</p>
42	First law of thermodynamics is based upon law of conservation of.	A. <p>Mass</p> B. <p>Momentum</p> C. <p>Energy</p> D. <p>Charge</p>

The gas molecule sare in

- B. <p>Random motion</p>
- C. <p>Brownian motion</p>
- D. <p>Circulatory motion</p>