ECAT Pre General Science MCQ's Test For Physics Full Book

Sr	Questions	Answers Choice
1	When two spherical conducting balls at different potentials are joined by a metallic wire, after some time:	A. Both the conductors are at the same potential B. Potential difference across the conductors remain constant C. Potential difference across the conductors becomes zero D. Both (A) and (B) E. Both (A) and (C)
2	The solids are classified as:	A. Metals B. Crystalline C. Amorphous D. Polymeric E. All except (A)
3	Tick the correct pair when M denotes the molecular mass and other symbols carry usual meanings:	A. $N = nN_A$ m = MN_A B. $n = N N_A$, $M = mN_A$ C. $M = N_A/N$, $N_A = m/n$ D. $N = nN_A$, $M = mN_A$
4	A 100 Kg car is moving at the speed of 10 m/sec and comes to rest after covering a distance of 50 m. The amount of work done against the friction is:	A. $+5 \times 10^1$ J B. $+5 \times 10^2$ J C. $+5 \times 10^3$ J D. $+5 \times 10^4$ J
5	The direction of the acceleration is the same as that of	A. speed B. velocity C. both of them D. none of them
6	The number of vibrations in two seconds can be expressed as_____if frequency of vibration is f.	A. f B. 2 f C. 3 f D. 1/2 f
7	An emf is set up in a conductor when it:	A. Is kept in a magnetic field B. Is kept in an electric field C. Moves across a magnetic field D. Both A and B E. None of these
8	A wire of radius r has resistance R. If it is stretched to a wire of r/2 radius, then the resistance becomes	A. 2R B. 4R C. 16R D. Zero

9	Above a certain velocity of a fluid is called	A. turbulent flow B. steady flow C. either of them D. both of them
10	Electromagnetic radiation or photons interact with matter in	A. two distinct ways B. three distinct ways C. four distinct ways D. five distinct ways
11	If we draw a graph between d (along x-axis) and F (along y-axis) and get a straight line horizontal to x-axis, then area under this straight line represents:	A. Power B. Work C. Pressure D. None of these
12	NmA^{-1} is commonly called:	A. Weber B. Apmere C. Guass D. Coulomb E. None of these
13	The analysis of fluid motion becomes simplified by using	A. law of conservation B. law of conservation of energy C. both of them D. none of them
14	Alternating current can not be measured by D.C. ammeter because	A. A.C. can not pass through D.C. Ammeter B. A.C. changes direction C. Average value of current for complete cycle is zero D. D.C. Ammeter will get damaged
15	A particle executes SHM with frequency. The frequency with which its K.E oscillates is	A. f/2 B. 2f C. f D. 4f
16	A hollow insulated conduction sphere is given a positive charge of 10 μC. What will be the electric field at the centre of the sphere if its radius is 2 meters?	A. Zero B. $5\ \mu C\ m^{-2}$ C. $20\ \mu C\ m^{-2}$ D. $8\ \mu C\ m^{-2}$
17	Work-energy principle states that work done on the body by applied force is equal to change in:	A. Potential energy B. Kinetic nergy C. Linear momentum D. None of these
18	The number of isotopes of hydrogen are	A. 2 B. 1 C. 3 D. 4
19	The bob of a simple pendulum is suspended by	A. string B. heavy inextensible string C. light extensible string D. light inextensible string
20	A 100 kg car is moving at a speed of 10 m/sec and comes to rest after covering a distance of 50 m. the amount of work done against friction is:	A. $+5 \times 10^{1}$ J B. $+5 \times 10^{2}$ J C. $+5 \times 10^{3}$ J D. $+5 \times 10^{4}$ J