

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

Sr	Questions	Answers Choice
1	when the deformation produced in the material become permanent, this type of behaviour is called	A. proportionality B. elasticity C. plasticity D. none of them
2	Compton was awarded Nobel prize in physics in	A. 1921 B. 1923 C. 1925 D. 1927
3	Electric flux is:	A. Cross product of two vector B. Dot product of two vectors C. A vector quantity D. A scalar quantity E. Both (B) and (D)
4	The conventional current in a circuit is defined as " current which passes from a point at higher potential to a point at lower potential as if it represent a movement of	A. negative charges B. positive charges C. protons D. electrons
5	In an interference pattern of Young's Double Slit (YDS) experiment	A. Bright fringes are wider than dark fringes B. Dark fringes are wider than bright fringes C. Both dark and bright fringes are of equal width D. Central fringes are wider than the outer fringes
6	Two copper balls of 1 cm and 2 cm in diameter are simultaneously dropped in the same viscous medium. The terminal velocity of bigger ball is:	A. Not affected due to its size B. Twice that of small size ball C. Four times that of small size ball D. 1/4th of that of small size ball
7	The space around the earth within which it exerts a force of attraction on other bodies is known as:	A. Nuclear field B. Conservative field C. Electric field D. Gravitational field
8	The ratio of the gravitational force F_g to the electrostatic force F_e between two electrons at the same distance apart is approximately	A. 9.8 B. 24×10^{19} C. 24×10^{42} D. 24×10^{44}

9	Essential characteristic of equilibrium is	<p>A. Momentum equal to zero</p> <p>B. Acceleration equal to zero</p> <p>C. Kinetic energy equal to zero</p> <p>D. Velocity equal to zero</p>
10	The terminal velocity of a small size spherical body of radius R moving in a fluid varies as	<p>A. R</p> <p>B. R^2</p> <p>C. $1/R$</p> <p>D. $(1/R)^2$</p>
11	Terminal velocity is the maximum velocity attained by a spherical droplet when the drag force _____ the weight of droplet:	<p>A. Is smaller than</p> <p>B. Is greater than</p> <p>C. Becomes equal to</p> <p>D. None of these</p>
12	A flywheel accelerates from rest to an angular velocity of 7 rad/sec in 7 seconds. Its average acceleration will be:	<p>A. 49 rad/sec^2</p> <p>B. 1 rad/sec^2</p> <p>C. 0.16 rev/sec^2</p> <p>D. Both A and C</p> <p>E. Both B and C</p>
13	Referring to above figure, due to change in current in the coil P, the change in magnetic flux:	<p>A. Is associated with coil P</p> <p>B. Is associated with coil S</p> <p>C. Causes an induced current in coil S</p> <p>D. All of these</p> <p>E. None of these</p>
14	Magnetic flux passing through a element whose vector area makes an angle θ with lines of magnetic force is:	<p>A. $BA \cos \theta$</p> <p>B. Zero</p> <p>C. BA</p> <p>D. $BA \sin \theta$</p> <p>E. None of these</p>
15	If electric and gravitational force on an electron in a uniform electric field will be	<p>A. $E = mg/q$</p> <p>B. $E = q/mg$</p> <p>C. $E = g/q$</p> <p>D. $E = qg/m$</p>
16	The SI unit of flux density is	<p>A. Newton/Amp-meter</p> <p>B. Newton-m/Ampere</p> <p>C. Newton-m/Amp^2</p> <p>D. Newton-Amp/meter</p>
17	The total charge of any nucleus is given as	<p>A. Ze^2</p> <p>B. Z^2e</p> <p>C. Z/e</p> <p>D. Ze</p>
18	An axis of rotation	<p>A. Is a straight line</p> <p>B. Is normal to the plane of rotation</p> <p>C. Passes through pivot point O</p> <p>D. All of them</p>
19	A car travels first half distance between two places with a speed of 30 km/h and remaining half with a speed of 50 km/h. The average speed of the car is	<p>A. 37.5 km/h</p> <p>B. 10 km/h</p> <p>C. 42 km/h</p> <p>D. 40 km/h</p>
20	The galvanometer can be made sensitive if the value of the factor C/BAN is	<p>A. constant</p> <p>B. small</p> <p>C. large</p> <p>D. none of these</p>