PPSC Physics Full Book

Sr	Questions	Answers Choice
1	The moment of linear momentum is equal to	A. Implies B. Torque C. Angular momentum D. Couple
2	The rate of change of angular momentum of a body is equal to.	A. Applied force B. Moment of inertial C. Applied torque D. Impulsive force
3	The moment of inertia depends upon	A. Mass of the body and its radius B. Mass of the body and its angular speed C. Mass and angular momentum D. Mass as well as the distribution w.r.t axis of rotation
4	For the angular momentum of a system to remains constant, the external torque should be	A. small B. Large C. Neither small nor large D. zero
5	Angular momentum of a body under a central force is	A. Zero B. Maximum C. Minimum D. Constant
6	One radian is equl to	A. 57.3^{o} B. 67.3^{o} C. 60° D. 87.3^{o}
7	Angular acceleration is produced due to	A. Centripetal force B. Torque C. Force D. Mass
8	The moment of inertia of a body comes in action in	A. Circular motion B. Straight line motion C. Curved path D. zig zag motion
9	A physical quantity not directly involved in rotating motion is.	A. Moment of inertia B. Mass C. Angular velocity D. Torque
10	The gravitational field strength at a point p on the earth's surfae is numerically equal to.	A. The acceleration of free fail at p B. The change in P.E. per unit distance at P C. The change in P.E. per unit distance at P D. The work done in bringing unit mass from infinity to P
11	If a body of mass 'm' was released in a vacuum just above the surface of a planet of mass M and radius R what will be the gravitational acceleration.	A. GmM/R B. GM/R^{2} C. GM/R D. GM/2R
12	Which of the following is a properly of a uniform gravitational field.	A. If acts equally in all directions. B. Its field strength is the same at all points with in it C. the gravitational potential has the same value of all points with in it D. It produces zero force on a stationary test mass placed in it.
13	If a planet of mass double than that of the earth and radius three times greater than the earth a 10 kg mass on its surface will weight.	A. 2.2 N B. 4.4 N C. 6.7 N D. 13.2 N
14	A body of mass 2 kg is suspended from the celling of an elevator moving up with an	A. 9.88 N B. 19.8 N

	acceleration 'g' its apparent weight in the elevator will be.	C. 29.4 N D. 39. 2 N
15	A horizontal force of 15 N accelerates a 4 kg object rom rest along a horizontal surface at a rate of 3 m s-2 At the end of 2 s the objects momentum will be.	A. 12 kg m s-1 B. 24 kg m s-1 C. 30 kg m s-1 D. 45 kg m s-1
16	If the earth stopped rotating the weight of the object at the equator would.	A. Be greater B. Be same as before C. Be less D. Very with altitude
17	What is the period of geostationary satellite.	A. 6 hours B. 12 hours C. 18 hours D. 24 hours
18	The escape velocity	A. Increases with the increase of the mass of the body B. Depends on the type of body used C. Is independent of mass of the body D. Decreases with the increases of the mass of the body
19	The escape velocity from the earth's surface is	A. 1.2 km s-1 B. 1.7 km s-1 C. 10.2 km s-1 D. 11.2 km s-1
20	Planets move around the sun due to.	A. Centrifugal force B. Centripetal force C. Gravitational pull between them D. Frictional force between them
21	Which of the following is the magnitude of the gravitational force and is not the inherent property of the body.	A. Mass B. Weight C. Speed D. Length
22	The spin angular momentum and orbital angular momentum are usually differentiated in terms of.	A. Radius of bodies B. Mass of bodies C. Torques of bodies D. Momentum of bodes
23	A diver leaving the diving board makes a somer sault in the air.	A. This is due to gravitational force B. The moment of inertia is decreased during the turn C. His moment of inertia is increased D. He pushes at the air for making the true
24	In planetary motion	A. Angular speed remains constant B. Angular momentum remains constant C. Linear speed remains constant D. Linear momentum remains constant
25	An astronaut in an earth satellite will observe the sky as	A. Light blue B. Deep blue C. White D. Black
26	The SI unit of angular velocity is.	A. cm s-1 B. rad s-2 C. cm s-2 D. rad s-1
27	A geostationary satellite covers	A. 100 ^{o} of longitude B. 120 ^{o} of longitude C. 130 ^{o} longitude D. 140 ^{o} of longitude
28	Angular moment is conserved due to	A. Variable force B. Constant force C. Central force D. Uniform force
29	Which of the following pair does not have identical dimensions.	A. Energy and torque B. Momentum and impulse C. Mass and moment of inertia D. Energy and work
30	When the lift is moving upward with an acceleration then weight of the object will be.	A. w = ma B. w - ma C. w D. 2 w