Physics ECAT Pre Engineering Chapter 8 Waves

Sr	Questions	Answers Choice
1	The natural frequency of a pendulum which is vibrating freely, depends upon its	A. mass B. length C. material D. all of them
2	In a resonance situation the amplitude of the motion may become extra ordinarily large, if	A. the driving force is large B. the driving force is zero C. the driving force may be feeble D. all of them
3	Which one of the following elasticizes is possessed by fluids:	A. Young's elastic modulus (length) B. Bulk elastic modulus (volume) C. Modulus of rigidity (shape) D. None of these
4	Associated with the motion of a driven harmonic oscillator, there is a very striking phenomenon, know as	A. waves B. beat C. interference D. resonance
5	As the bob of the pendulum moves to and fro which of the force is experienced by the bob	A. its weight B. tension in the string C. viscous drag force by air D. all of them
6	The waves produced in a microwave oven have wavelength.	A. 12 mm B. 12 cm C. 12 m D. 12 mm
7	A weakly damped system has fairly	A. sharp resonance curve B. flat resonance curve C. both of them D. none of them
8	When a body is performing S.H.M., its acceleration is	A. inversely proportional to the displacement B. directly proportional to the applied force C. directly proportional to the amplitude D. directly proportional to the displacement but in opposite direction
9	Two sound waves of slightly different frequencies propagating in the same direction produce beats due to	A. Interference B. Diffraction C. Polarization D. Refraction
10	Laplace formula is derived from	A. Isothermal change B. Adiabatic change C. Isobaric change D. None of these
11	The resonance will be sharp, if the amplitude decreases rapidly at a frequency	A. equal to the resonant frequency B. slight different from the resonant frequency C. greatly different from the resonant frequency D. any one of them
12	The vibratory or oscillatory motion of a body is	A. translatory motion B. back and forth motion about its mean position C. free all motion D. circular motion
13	Transverse waves can be set up:	A. Solids B. Liquids C. Gases D. All of them
14	SI unit of frequency is	A. second B. hertz

		C. revolution D. vibrations/sec
15	Velocity of sound in vacuum (in m/s) is	A. 330 B. 1000 C. 156 D. 0
16	Smaller the damping, the resonance will be	A. more flat B. more sharp C. both of them D. none of them
17	In the formula for finding the speed of waves in the spring, unit of m in SIn units is:	A. kg B. kg-meter C. kg/meter D. Meter/kg
18	When two progressive waves of nearly same frequencies superimpose and give rise to beats, then	A. Frequency of beat changes with time B. Frequency of beat changes with location of observer C. All particles of medium vibrate simple harmonically with frequency equal to the difference between frequencies of component waves D. Amplitude of vibration of particles at any point changes simple harmonically with frequency equal to difference between two component waves
19	Which one is not produced by sound waves in air?	A. Polarization B. Diffraction C. Refraction D. Reflection
20	The waves which propagate out in space due to oscillation of electric and magnetic fields are known as	A. e.m. waves B. mechanical waves C. sound waves D. water waves