Physics ICS Part 1 Chapter 9 Online Test

Sr	Questions	Answers Choice
1	Sound waves can not be	A. Reflected B. Refracted C. Polarized D. Diffracted
2	When newton ring are seen through the transmitted light, then central spot is.	A. Dark B. Blue C. Bright D. Red
3	The centre of Newton's rings will be	A. Dark B. Bright C. Coloured D. Not visible
4	Bending of light around the edges of an obstacle is called.	A. Refraction B. Polarization C. Interference D. Diffraction
5	Fringe spacing in Young's double slit experiment increases due to increase in.	A. Slit separation B. Wave length C. Order of Fringe D. Frequency of source
6	Hygen's principle is used for.	A. Explain polarization B. Locate the wave front C. Find the speed of light D. Find the index of refraction
7	If 'N' is number of lines rule don the grating having length 'L' then grating element 'd' is given by.	A. N/L B. 2N/L C. L/N D. N/2L
8	A ray of light is a line	A. Parallel to wave front B. Normal to wave front C. Anti-parallel to wave D. Any one of these
9	The property of bending of light around obstacles is	A. Interference B. Diffraction C. Polarization D. Superposition
10	Huygen's proposed, light energy travels in space from source in	A. 1578 B. 1678 C. 1778 D. 1868
11	Angle between ray of light and wave front is	A. 0° B. 60° C. 90° D. 120°
12	The distance between two consecutive wave front is equal to	A. One wave length B. Two wave length C. Half wave length D. Three wave length
13	Which one of the following can not be polarized.	A. Ultra violet rays B. Radio waves C. T.V. Waves D. Sound waves
14	The light energy travels in space as waves was firstly proposed by	A. Maxwell B. Young C. Einsten D. Hydrogen
15	The fringe spacing in a double slit experiment can be increased by decreasing.	A. Wavelength of light B. Width of slits C. Slit separation D. Distance between the slits and the

16	Example of thin film is.	A. Soap burble B. convex lens C. Concave lens D. Glass plate
17	Fringe spacing is inversely proportional to.	A. Wave length B. Slit separation C. Distance between the slit and screen D. Frequency of light
18	The distinguish between transverse and longitudinal wave_____ is used.	A. Refraction B. Interference C. Diffraction D. polarization
19	Interplaner distance can be determined by	A. Newton's rings B. Bragg's law C. Diffraction pattern D. Interferometer
20	Newton's rings are formed due to phenomenon of.	A. Interference B. Dispersion C. Diffraction D. Polarization
21	Bright fringes are also called as	A. Minima B. Maxima C. Wave front D. Ray of light
22	In case of point source the shape of wave front is.	A. Plane B. spherical C. Circular D. Eliptical
23	Young in 1801 performed experiment for the first time about	A. Interference B. Diffraction C. Polarization D. Particle nature of light
24	The centre of Newton's fringe is dark due to.	A. Destructive interference B. Diffraction C. Constructive interference D. Polarization
25	Dark fringes are also called as	A. Minima B. Maxima C. Wave front D. Ray of light
26	A typical diffraction grating has certain number of lines per centimeter whose range is.	A. 40 to 50 B. 400 to 5000 C. 400 to 500 D. 4000 to 5000
27	The wavelength of X-rays is of the order of.	A. 10^{-8} m B. 10^{-10} m C. 10^{-5} m D. 10^{-4} m
28	In blue light is used as compare to red light then fringe spacing.	A. Increase B. Decreases C. Remain same D. Becomes zero
29	A ray of light shows the direction of propagation of light It is line which is.	A. Normal to the wave front B. Parallax to the wave front C. Opposite to the wave front D. Equal to the wave front
30	X-ray diffraction has been very useful in determining the structure of	A. Hemoglobin B. Stars C. Galaxies D. Stones
31	Sodium chloride in a flame gives	A. Green light B. White light C. Red light D. Yellow light
32	In young's double slit experiment for the interference the central region will be	A. Dark B. Bright C. Coloured D. None of these
		A. Secondary wavelet

33	According to Hygen's principle, each point on a wave front acts as a source of.	A. Secondary wavelet B. New wave front C. Sound D. Primary wavelet
34	The process of confining the beam of light to vibrate in one plane is called.	A. Interference B. Diffraction C. Polarization D. Total internal refraction
35	In red light is used as compare to blue light then fringe spacing.	A. Decreases B. Remain same C. Increases D. Becomes zero
36	Michelson's interferometer can be used ot find the	A. Velocity of light B. Wavelength of light C. Velocity of sound D. Wavelength of sound
37	According to Huygen's principle the points on primary wave front can be considered as	A. Secondary wavelets B. Ray of light C. Source of light D. None of these
38	Intensity of light depend on	A. Wave length B. Amplitude C. Velocity D. Frequency
39	The Bragg's equation is given by	
40	the locus of all pint in the same wave of vibration is called.	A. Wave front B. Diffraction C. Interference D. Polarization
41	The blue colour of sky is due to	A. diffraction B. Reflection C. Polarization D. Scattering
42	When one mirror of a Michelson interferometer is moved a distance of 0.5 mm, 2000 fringes and observed, The wavelength of light used is.	A. 5000 m B. 50000 A^o C. 500 cm D. 2000 A^o
43	The phenomenon of polarization of light reveals that sun light is	A. Longitudinal waves B. Transverse wave C. Electromagnetic waves D. Monochromatic wave
44	Light entering rom air glass does not change in its.	A. Frequency B. Wavelength C. Velocity D. Direction
45	An oil film on water surface shows colour due to.	A. Diffraction B. Interference C. Polarization D. Dispersion
46	Soap film is sunlight appears coloured due to.	A. Dispersion of light B. Diffraction of light C. Scattering of light D. Interference fo light
47	Which phenomenon of light proves that light waves are transverse in nature.	A. Refraction B. Reflection C. Diffraction D. Polarization
48	Which is nooptically active	A. Sugar B. Tartaric acid C. Water D. Sodium chloride
49	The fringe spacing increases if we use.	A. Yellow light B. Green lgiht C. Blue light D. Red light
50	Which of the following is evidence of wave nature of light	A. Interference B. Diffraction C. Polarization D. All of these
51	Oil film floating on water exhibits colours due to	A. Interference B. Diffraction C. Polarization

		C. Polarization
		D. All of these
52	Standard metal according to Michelson's interferometer is equivalent to	A. 1553163.5 wave meter
		B. 3 x 108meter
		C. 15503000 meter
		D. None of these
53	Light waves emitted from a source spread in	A. Specific direction
		B. All direction
		C. Upward direction
		D. None of these
54	In case of point source the shape of wave front is	A. Circular
		B. Spherical
		C. Elliptical
		D. Square