

ECAT Physics Chapter 20 Atomic Spectra

Sr	Questions	Answers Choice
1	Coulomb multiplied by volt by volt gives the unit called:	A. farad B. Ohm C. Second D. joule E. Watt
2	Energy required by an electron revolving in certain orbit to jump to an excited state is called:	A. Ionization energy B. Ionization potential C. Excitation energy D. Excitation potential E. None of these
3	Photons must have energy equal to	A. ev B. En C. hf D. None of these
4	The holes created in the L and M shells are occupied by transitions of:	A. Electrons from lower states B. Electrons from higher state C. Positrons from higher states D. Electrons from K shell E. Both (A) and (B)
5	Static electricity is produced by the transfer of:	A. Electrons B. Protons C. One fluid D. Two fluid E. None of these
6	The electric field lines start from:	A. Positive charge B. Negative charge C. Either A and B D. Neutron E. An atom
7	Atoms of hydrogen gas can be excited by passing electric current through it when the gas is filled into the discharge tube at a pressure which is	A. Less than atmospheric pressure B. Much less than atmospheric pressure C. Greater than atmospheric pressure D. Much greater than atmospheric pressure E. Both C and D
8	The lasing or active medium in He-Ne laser discharge tube is:	A. Nitrogen B. Helium C. Hydrogen D. Neon E. None of these
9	X-rays can penetrate in a solid matte through a distance of several:	A. Kilo metres B. Metres C. Centimeters D. A few angstroms E. One micrometer
10	Braking radiation causes:	A. Continuous spectrum B. Line Spectrum C. Band spectrum D. Discrete spectrum E. All of these
11	The first series which was identified in the spectrum of hydrogen is called:	A. Lyman series B. Balmer series C. Paschen series D. Brackett series E. Pfund series
12	The value of the metastable state for Neon is	A. 20.66eV B. 20.61eV C. 19.23eV D. 18.70eV
13	If the distance between two charaes is doubled.the force between them will become:	A. Double B. Half C. ...

		<p>C. One third D. One fourth</p>
14	Tick the series which lie/s in. the infra-red region.	<p>A. Pfund series B. Brackett series C. Paschen series D. All of these E. None of these</p>
15	X-rays produced in a tube operating at 10^5 V. The speed of X-rays produced is	<p>A. 3×10^8 m/s B. 3.1×10^8 m/s C. 2.8×10^8 m/s D. 1.88×10^8 m/s</p>
16	The transitions of electrons in the hydrogen atom result in the emission of spectral lines in the:	<p>A. Ultra red region B. Visible region C. Ultraviolet region D. Any of these E. None of these</p>
17	X-rays are also known as	<p>A. Roentgen rays B. Maxwell rays C. Plank range D. Einstein rays</p>
18	Lyman series in the spectrum of hydrogen exists in the :	<p>A. Infra-red region B. Visible region C. Ultraviolet region D. Both(A) and (B) E. None of these</p>
19	The photocopying process is called:	<p>A. Geography B. Sonography C. Xerography D. Zerography E. None of these</p>
20	The range of wavelengths of colours in the visible colours is	<p>A. 140 nm to 456 nm B. 10 nm to 56 nm C. 410 nm to 656 nm D. 910 nm to 956 nm E. None of these</p>