

## Physics ECAT Pre Engineering Chapter 18 Electronics Physics

Sr	Questions	Answers Choice
1	Whenever a covalent bond breaks, it creates:	A. An electron B. A hole C. An electron-hole pair D. A positron E. All of these
2	Electric intensity at a place due to a charged conductor is a	A. Scalar quantity B. Vector quantity C. Semi vector and semi scalar D. Dimensionless quantity E. Both A and D are true
3	Depletion region contains:	A. Protons B. Positive ions C. Negative ions D. Both (B) and (C) E. Both (A) and (C)
4	By placing a dielectric in between the charges, the electrostatic force between them	A. Is always reduced B. Is always increased C. Is not affected D. Is increased one million times E. None of these
5	In an N-type silicon, which of the following statement is true	A. Electrons are majority carriers and trivalent atoms are the dopants B. Electrons are minority carriers and pentavalent atoms are the dopants C. Holes are minority carriers and pentavalent atoms are the dopants D. Holes are majority carriers and trivalent atoms are the dopants
6	The electric field lines start from	A. Positive charge B. Negative charge C. Either A or B D. Neutron E. An atom
7	To display a digit of EIGHT, the number of ON LED'S are:	A. Two B. Three C. Five D. Seven E. Eight
8	Crystal of germanium or silicon in its pure form at absolute zero acts as:	A. A conductor B. A semiconductor C. an insulator D. Both (A) and (C) E. Both (A) and (B)
9	Op-amp has been discussed as comparator of:	A. Distances B. Voltages C. Velocities D. Magnetic fields E. Both (A) and (C)
10	Electric field lines emerge from the charges in	A. One dimension B. Two dimensions C. Three dimensions D. Four dimensions E. None of these
11	The SI unit of charge is	A. Ampere B. Watt C. Coulomb D. Volt E. Joule
12	In a transistor, collector current is controlled by	A. Collector voltage B. Base current C. Collector resistance D. All of the above
		A. Ionic bond

13	All the valence electrons present in a crystal of silicon are bound in their orbits by	B. covalent bond C. Molecular bond D. Both (A) and (B) E. Both (B) and (C)
14	Improper biasing of a transistor circuit produces	A. Heavy loading of emitter current B. Distortion in the output signal C. Excessive heat at collector terminal D. Faulty location of load line
15	In full wave rectification, simultaneous action is that:	A. Two diodes conduct and two do not. B. One diode conduct and three do not. C. Three diodes conduct and one does not. D. All the four diodes conduct E. None of these
16	Michael Faraday is known by his work on	A. Nuclear strong force B. Gravitational force C. Nuclear weak force D. Electric force E. None of these
17	A hole in p-type may be due to:	A. Trivalent impurity B. Breaking of some covalent bond C. Pentavalent impurity D. Germanium E. Either (A) or (B)
18	A digital system deals with quantities which has discrete values:	A. Two in number B. One in number C. Three in number D. Four in number E. None of these
19	The number of LED'S needed to display all the digits is:	A. Four B. Five C. Nine D. Six E. Seven
20	The values 1 and 0 are designated as:	A. Continuous values B. Binary values C. Boolean values D. Decimal values E. Either (B) and (C)