

## Physics ECAT Pre Engineering Chapter 17 Physics of Solid Online Test

Sr	Questions	Answers Choice
1	Semi-conductor elements have atoms with	<ul><li>A. 2 valence electrons</li><li>B. 3 valence electrons</li><li>C. 4 valence electrons</li><li>D. 5 valence electrons</li></ul>
2	Amorphous solids:	A. Have definite melting points B. Are called glassy solids C. Have no definite melting point D. Both (B) and (C) E. Both (A) and (C)
3	When a large number of atoms are brought close to one another to form a solid, each energy level of an isolated atom splits into sub-levels, called	A. energy bands B. energy shells C. states D. all of them
4	There is a regular arrangement of molecules in a	A. amorphous solids B. polymeric solids C. crystalline solids D. none of them
5	The greatest stress that a material can endure without losing the proportionality between stress and strain is called	A. plastic line B. breaking point C. proportional limit D. none of them
6	The force which maintain the strict long-range order between atoms of a crystalline solid is the:	A. Nuclear force B. Cohesive force C. Adhesive force D. Coulomb force E. None of these
7	Recently a complex crystalline structure known as Yetrium Barium Copper Oxide have been reported to become superconductor at	A. 125 K B. 25 K C. 263 K D. 163 K
8	The word amorphous means:	A. Without any structure B. With definite structure C. Regular arrangement of molecules D. Both (B) and (C) E. None of these
9	The crystalline structure of NaCl is	A. rectangular B. hexagonal C. tetrahedral D. cubical
10	The bands below the valence band are	A. completely filled and play active part in conduction process B. completely filled and plays no part in conduction process C. completely filled and play active part in conduction process D. not completely filled and play no part in conduction process
11	The pattern of NaCl particles have a shape which is :	A. Cubic B. Body centred cubic C. Simple cubic D. face centred E. Both (A) and (C)
12	The critical temperature of tin is	A. 1.18 K B. 4.2 K C. 3.72 K D. 7.2 K
13	Arsenic, antimony and phosphorus are the elements from	A. third group B. fourth group C. fifth group D. none of them
		A. parallel

14	Within each domain, the magnetic field of all the spinning electrons are	B. antiparallel C. perpendicular D. all of them
15	Each atom in a metal crystal vibrates about a fixed point with an amplitude that:	A. Decrease the rise in temprature B. Is not affected by rise in temprature C. Increase with rise in temprature D. Both (B) and (C) E. None of these
16	Which of the following theory completely explain the three types of materials	A. Bohr model of electron distribution     B. Rutherford atomic model     C. Pauli's exclusion principle     D. energy band theory
17	The arrangement or molecules or atoms in a crystalline solid can be studied by using:	A. Chemical methods B. Neutrons C. X-ray techniques D. Copper atoms E. Both (A) and (B)
18	A unit cell is smallest basic structure which is:	A. One dimensional B. Two dimensional C. Three dimensional D. Four dimensional E. None of these
19	Examples of polymeric substances are:	A. Plastic B. Synthetic rubbers C. Zirconia D. All of these E. Both (A) and (B)
20	The materials in which there are plenty of free electrons for electrical conduction are known as	A. conductors B. insulators C. semi-conductors D. all of them