Answer all the questions. (choose the right option) $1 \times 10 = 10$

1. The set of real numbers with respect to usual multiplication is a
i) group   ii) commutative group   iii) non-commutative group
iv) semigroup with identity.

2. If H_1 and H_2 is a subgroup of a group $(G, \circ)$ then which one is true?
i) $H_1 \cup H_2$ is a subgroup of G ii) $H_1 \cap H_2$ is a empty set.
iii) $H_1 \cap H_2$ is a subgroup of G iv) None of these.

3. The set of complex numbers with respect to usual addition and multiplication is a
i) ring   ii) commutative ring with identity   iii) Field
iv) not a field.

choose which one is not correct.

4. If $S = \{ (1,2), (1, 0), (3,4) \}$ then which one of the following is correct.
i) S is linearly independent   ii) S is a basis of R^2.
iii) S is linearly dependent   iv) None of these.

5. which one is the full form of RAM.
i) Random assessment mechanism   ii) Random Algorithm
memory   iii) Random access memory   iv) None of these.

6. In Assembly language program is written
i) in binary   ii) with mnemonics   iii) in decimal
iv) none of these.

7. which one of the following is not a high level languages?
i) COLOB   ii) Fortran   iii) BASIC   iv) Pascal.

8. If $(1001)_2 \times (1101)_2 = (P)_{10}$ then the value of P is,
i) 110   ii) 114   iii) 117   iv) 120.

9. $(FE01)_{16}$ in octal form will be
i) $(176\,001)_8$ ii) $(173\,001)_8$ iii) $(177001)_8$ iv) $(179001)_8$

10. If two events A and B are independent then $P(B/A)$ is equal to,
i) 1   ii) 0   iii) $P(A)$ iv) $P(B)$.