

## Acids, Bases, and Salts – Class X – Paper Set 1

1. What happens to blue litmus paper when it is dipped in an acidic solution?
  - (a) It turns red
  - (b) It turns green
  - (c) It turns blue
  - (d) No color change
2. Which gas is usually released when an acid reacts with a metal?
  - (a) Oxygen
  - (b) Carbon dioxide
  - (c) Nitrogen
  - (d) Hydrogen
3. What will be the pH value of a solution that turns red litmus blue?
  - (a) Less than 7
  - (b) Exactly 7
  - (c) More than 7
  - (d) Cannot be determined
4. Which of the following is used to neutralize stomach acid?
  - (a) Antibiotic
  - (b) Antacid
  - (c) Analgesic
  - (d) Antiseptic
5. A bee sting leaves an acid that causes pain and irritation. Which substance can be applied for relief?

- (a) Vinegar
  - (b) Baking soda
  - (c) Lemon juice
  - (d) Salt water
6. What is the chemical name of baking soda?
- (a) Sodium carbonate
  - (b) Sodium chloride
  - (c) Sodium bicarbonate
  - (d) Sodium hydroxide
7. Which of these is an example of a strong acid?
- (a) Acetic acid
  - (b) Hydrochloric acid
  - (c) Citric acid
  - (d) Carbonic acid
8. What does pH measure in a solution?
- (a) Concentration of oxygen ions
  - (b) Concentration of water molecules
  - (c) Concentration of hydrogen ions
  - (d) Concentration of sodium ions
9. What type of reaction occurs when an acid reacts with a base?
- (a) Decomposition
  - (b) Displacement
  - (c) Combination

(d) Neutralization

10. What is the nature of the salt formed from the reaction between a strong acid and a strong base?

(a) Acidic

(b) Basic

(c) Neutral

(d) Depends on the reactants

**Answers for Paper Set 1:**

1. (a), 2. (d), 3. (c), 4. (b), 5. (b), 6. (c), 7. (b), 8. (c), 9. (d), 10. (c)