# Acids and Bases

AP Chemistry · Vocabulary in context

| Word | Example |
|---|---|
| **acid** /ˈæsɪd/ | Lemon juice is an **acid**. |
| **base** /beɪs/ | Sodium hydroxide is a **base**. |
| **conjugate base** /ˈkɒndʒuːgeɪt beɪs/ | Cl− is the **conjugate base** of HCl.<br>Cl− HCl |
| **conjugate acid** /ˈkɒndʒuːgeɪt ˈæsɪd/ | NH4+ is the **conjugate acid** of NH3.<br>NH4+ NH3 |
| **autoionization** /ˌɔːtəʊˌaɪənaɪˈzeɪʃn/ | The **autoionization** of water makes $H_3O^+$ and $OH^-$.<br>$H_3O^+$ $OH^-$ |
| **hydronium ion** /haɪˈdrəʊnɪəm ˈaɪɒn/ | A **hydronium ion** is $H_3O^+$.<br>$H_3O^+$ |
| **ion-product constant of water** /ˈaɪɒn ˈprɒdʌkt ˈkɒnstənt ɒv ˈwɔːtə/ | The **ion-product constant of water** is $1.0 \times 10^{-14}$ at 25 °C.<br>25 °C $1.0 \times 10^{-14}$ |
| **neutral** /ˈnjuːtrəl/ | A **neutral** atom has the same number of protons and electrons. |
| **strong acid** /strɒŋ ˈæsɪd/ | Hydrochloric acid is a **strong acid**. |
| **strong base** /strɒŋ beɪs/ | Sodium hydroxide is a **strong base**. |
| **weak acid** /wiːk ˈæsɪd/ | Vinegar contains a **weak acid**. |
| **percent ionization** | The **percent ionization** of a weak acid is small. |
| **buffer** /ˈbʌfə/ | A **buffer** keeps the pH nearly the same.<br>pH |
| **titration curve** /taɪˈtreɪʃn kɜːv/ | The **titration curve** rises sharply at the end point. |



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| **equivalence point** /ɪˈkwɪvələns pɔɪnt/ | At the **equivalence point**, the acid and base have exactly reacted. |
| **acid-base indicator** /ˈæsɪd beɪs ˈɪndɪkeɪtə/ | An **acid-base indicator** changes colour with pH.<br>pH |
| **polyprotic acid** | A **polyprotic acid** can give more than one $H^+$.<br>$H^+$ |
| **carboxylic acid** /ˌkɑːbəkˈsɪlɪk ˈæsɪd/ | Ethanoic acid is a **carboxylic acid**. |
| **Buffer capacity** /ˈbʌfə kəˈpæsɪti/ | **Buffer capacity** is how much acid or base a buffer can absorb. |
| **pH** /piː eɪtʃ/ | Pure water has a **pH** of 7.<br>7 |