

Some Strong Acids and Some Weak Acids

Acid	Formula	K_a of acid	Conjugate base	Formula
Hydronium ion	H_3O^+	5.53×10^1	water	H_2O
Hydrogen sulfate ion	HSO_4^-	1.23×10^{-2}	sulfate ion	SO_4^{2-}
Phosphoric acid	H_3PO_4	7.52×10^{-3}	dihydrogen phosphate ion	H_2PO_4^-
Formic acid	HCOOH	1.82×10^{-4}	formate ion	HCOO^-
Benzoic acid	$\text{C}_6\text{H}_5\text{COOH}$	6.46×10^{-5}	benzoate ion	$\text{C}_6\text{H}_5\text{COO}^-$
Acetic acid	CH_3COOH	1.75×10^{-5}	acetate ion	CH_3COO^-
Carbonic acid	H_2CO_3	4.30×10^{-7}	hydrogen carbonate ion	HCO_3^-
Dihydrogen phosphate ion	H_2PO_4^-	6.31×10^{-8}	monohydrogen phosphate ion	HPO_4^{2-}
Hypochlorous acid	HOCl	2.95×10^{-9}	hypochlorite ion	ClO^-
Ammonium ion	NH_4^+	5.75×10^{-10}	ammonia	NH_3
Hydrogen carbonate ion	HCO_3^-	4.68×10^{-11}	carbonate ion	CO_3^{2-}
Monohydrogen phosphate ion	HPO_4^{2-}	4.47×10^{-13}	phosphate ion	PO_4^{3-}
Water	H_2O	1.81×10^{-16}	hydroxide ion	OH^-
Conjugate acid	Formula	K_a of acid	Base	Formula

Increasing acid strength ↑

Increasing base strength ↓