bookdown+: Authoring Articles, Mails, Guitar Chords, Chemical Molecular Formulae and Equations with R bookdown

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2.1　Chemical formulae

H_2O, Sb_2O_3

H^+, CrO_4^{2-}, $[AgCl_2]^-$, Y^99^+, Y^{99+}

$Fe^{II}Fe^{III}2O_4$, $2\,H_2O$, $2\,H_2O$, $0.5\,H_2O$, $\frac{1}{2}\,H_2O$, $(_{1/2})H_2O$, $n\,H_2O$

$^{227}_{90}Th^+$, $^2 27\ _9 0\,Th^+$, $^{0}_{-1}n^-$, $^{0}_{-}1\,n^-$

H^3HO, H^3HO

$(NH_4)_2S$, $[\{(X_2)_3\}_2]^{3+}$

$H_2(aq)$, $CO_3^2-_{(aq)}$, $NaOH(aq,\infty)$

$OCO^{\cdot -}$, $NO^{(2\,\cdot)-}$

NO_x, \sffamily\bfseries\ce{NO_x}, Fe^{n+}, \sffamily\bfseries\ce{Fe^n+}

\ce{\mu-Cl}, \ce{[Pt(\eta^2-C2H4)Cl3]-}

$KCr(SO_4)_2 \cdot 12\,H_2O$, $KCr(SO_4)_{2.12}H_2O$, $KCr(SO_4)_2 * 12\,H_2O$

C_6H_5-CHO, A−B=C≡D, \sffamily\bfseries\ce{A-B=C#D}

A−B=C≡D, A╌B═C, A≡B≡C≡D, A···B····C, A→B←C

2.2 Chemical equations

$\mathrm{A} \longrightarrow \mathrm{B}$

$\mathrm{A} \longleftarrow \mathrm{B}$

$\mathrm{A} \longleftrightarrow \mathrm{B}$

$\mathrm{A} \longleftarrow -> \mathrm{B}$

$\mathrm{A} \rightleftharpoons \mathrm{B}$

$\mathrm{A} \rightharpoonup\!\!\!\!\!\!\rightharpoondown \mathrm{B}$

$\mathrm{A} \rightharpoondown\!\!\!\!\!\!\rightharpoonup \mathrm{B}$

$\mathrm{A} \xrightarrow{\mathrm{H_2O}} \mathrm{B}$

$\mathrm{A} \xrightarrow[textbelow]{textabove} \mathrm{B}$

$\mathrm{A} \xrightarrow[x_i]{x} \mathrm{B}$

$\mathrm{A} \xrightarrow{x} \mathrm{B}$

$\mathrm{A} + \mathrm{B}$

$\mathrm{A}-\mathrm{B}$

$\mathrm{A} = \mathrm{B}$

$\mathrm{A} \pm B$

$\mathrm{SO_4^{2-}} + \mathrm{Ba^{2+}} \longrightarrow \mathrm{BaSO_4}\downarrow$

$\mathrm{A}\downarrow\mathrm{B}\downarrow \longrightarrow \mathrm{B}\uparrow\mathrm{B}\uparrow$

$\mathrm{CH_4} + 2\left(\mathrm{O_2} + \frac{79}{2}\,\mathrm{N_2}\right)$

$\mathrm{xNa(NH_4)HPO_4} \xrightarrow{\Delta} \left(\mathrm{NaPO_3}\right)_{\mathrm{x}} + \mathrm{xNH_3}\uparrow + \mathrm{xH_2O}$

$\mathrm{CO_2} + \mathrm{C} \longrightarrow 2\,\mathrm{CO}$

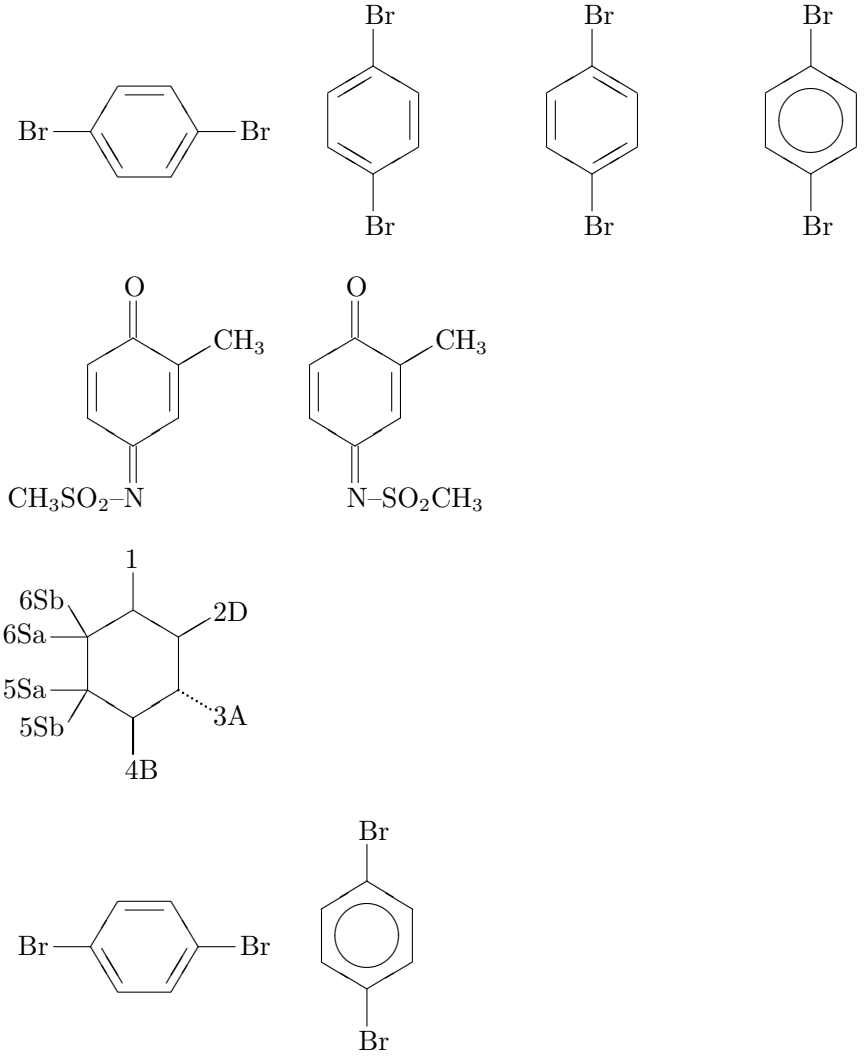
$\mathrm{Hg^{2+}} \xrightarrow{I-} \mathrm{HgI_2} \xrightarrow{I-} \mathrm{[Hg^{II}I_4]^{2-}}$

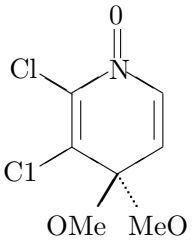
$$\mathrm{Zn^{2+}} \xrightarrow[+2\,\mathrm{H^+}]{+2\,\mathrm{OH^-}} \mathrm{Zn(OH)_2}\downarrow \underset{+2\,\mathrm{H^+}}{\overset{+2\,\mathrm{OH^-}}{\rightleftharpoons}} \mathrm{[Zn(OH)_4]^{2-}}$$

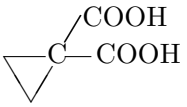
$$K = \frac{[\mathrm{Hg^{2+}}][\mathrm{Hg}]}{[\mathrm{Hg_2^{2+}}]}$$

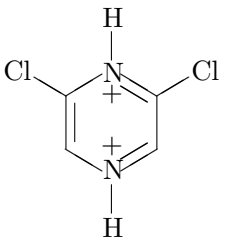
$$K = \frac{[Hg^2+][Hg]}{[Hg2^2+]}$$

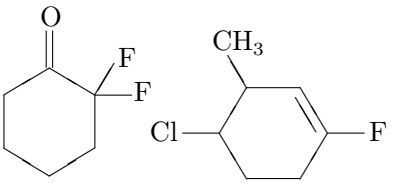
2.3 Structural formulae

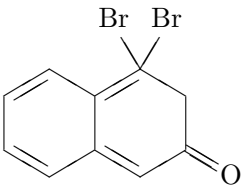


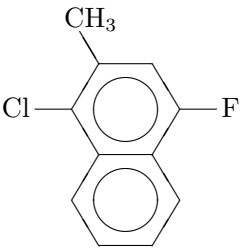

0
Cl
N
Cl
OMe
MeO

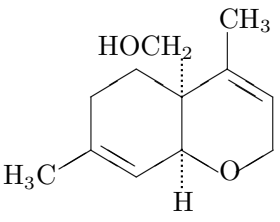

COOH
C
COOH

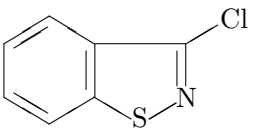

H
Cl
N
Cl
N
H

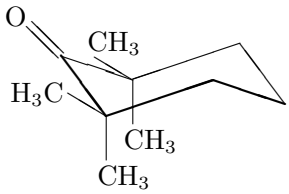

O
F
F
CH3
Cl
F

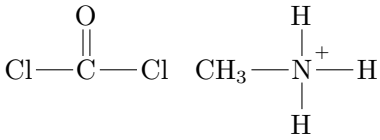

Br
Br
O

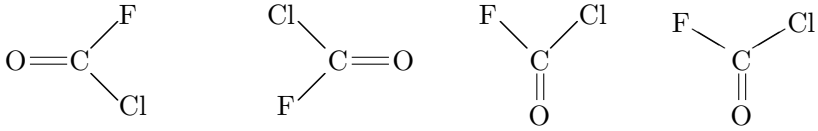

CH3
Cl
F

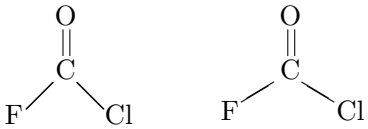

HOCH2
CH3
H3C
O
H

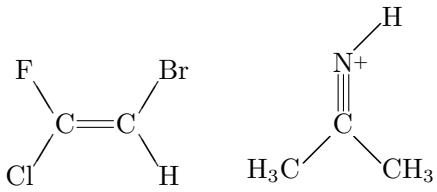

Cl
N
S


O
CH3
H3C
CH3
CH3


O
Cl C Cl
H
CH3 N+ H
H


F
O C
Cl
Cl
C O
F
F Cl
C
O
F Cl
C
O


O
C
F Cl
O
C
F Cl


F
Br
C C
Cl
H
H
N+
C
H3C
CH3

参考文献