Practice Balancing Equations

1. \[ \_\text{Pt}(s) + \_\text{F}_2(g) \rightarrow \_\text{PtF}_6(s) \]
2. \[ \_\text{Pt}(s) + \_\text{F}_3(g) \rightarrow \_\text{PtF}_5(s) \]
3. \[ \_\text{Fe}(s) + \_\text{O}_2(g) \rightarrow \_\text{Fe}_2\text{O}_3(s) \]
4. \[ \_\text{CaO}(s) + \_\text{C}(s) \rightarrow \_\text{CaC}_2(s) + \_\text{CO}_2(g) \]
5. \[ \_\text{FeO}(s) + \_\text{O}_2(g) \rightarrow \_\text{Fe}_2\text{O}_3(s) \]
6. \[ \_\text{KClO}_3(s) \rightarrow \_\text{KCl}(s) + \_\text{O}_2(g) \]
7. \[ \_\text{Cr}(s) + \_\text{S}_8(s) \rightarrow \_\text{Cr}_2\text{S}_3(s) \]
8. \[ \_\text{Na}_2\text{SiF}_4(s) + \_\text{Na}(s) \rightarrow \_\text{Si}(s) + \_\text{NaF}(s) \]
9. \[ \_\text{Eu}(s) + \_\text{HF}(g) \rightarrow \_\text{EuF}_3(s) + \_\text{H}_2(g) \]
10. \[ \_\text{MoS}_2(s) + \_\text{O}_2(g) \rightarrow \_\text{MoO}_3(s) + \_\text{SO}_2(g) \]
11. \[ \_\text{PCl}_3(l) + \_\text{H}_2\text{O}(l) \rightarrow \_\text{H}_2\text{PO}_4(aq) + \_\text{HCl}(g) \]
12. \[ \_\text{KO}_2(s) + \_\text{H}_2\text{O}(l) \rightarrow \_\text{KOH}(aq) + \_\text{O}_2(g) + \_\text{H}_2\text{O}_2(aq) \]
13. \[ \_\text{C}_4\text{H}_10(g) + \_\text{O}_2(g) \rightarrow \_\text{CO}_2(g) + \_\text{H}_2\text{O}(g) \]
14. \[ \_\text{C}_3\text{H}_7\text{OH}(l) + \_\text{O}_2(g) \rightarrow \_\text{CO}_2(g) + \_\text{H}_2\text{O}(g) \]
15. \[ \_\text{C}_{12}\text{H}_{22}\text{O}_{11}(s) + \_\text{O}_2(g) \rightarrow \_\text{CO}_2(g) + \_\text{H}_2\text{O}(g) \]
16. \[ \_\text{TiO}_2(s) + \_\text{Br}_2(l) \rightarrow \_\text{TiF}_4(s) + \_\text{Br}_2(l) + \_\text{O}_2(g) \]
17. \[ \_\text{C}_3\text{H}_5(\text{NO}_3)_3(l) \rightarrow \_\text{CO}_2(g) + \_\text{H}_2\text{O}(g) + \_\text{N}_2(g) + \_\text{O}_2(g) \]
18. \[ \_\text{SCl}_3(l) + \_\text{NaF}(s) \rightarrow \_\text{SF}_4(g) + \_\text{S}_2\text{Cl}_2(l) + \_\text{NaCl}(s) \]
19. \[ \_\text{Ca}_3(\text{PO}_4)_2(s) + \_\text{SiO}_2(s) + \_\text{C}(s) \rightarrow \_\text{CaSiO}_3(s) + \_\text{P}_4(s) + \_\text{CO}(g) \]
20. \[ \_\text{NH}_3(g) + \_\text{O}_2(g) \rightarrow \_\text{NO}_2(g) + \_\text{H}_2\text{O}(g) \]

Answers: 1. 1, 3, 1 2. 2, 5, 2 3. 4, 3, 2 4. 2, 5, 2, 1 5. 4, 1, 2 6. 2, 2, 3 7. 16, 3, 8 8. 1, 4, 1, 6 9. 2, 6, 2, 3 10. 2, 7, 2, 4 11. 1, 4, 1, 5 12. 2, 2, 2, 1, 1 13. 2, 13, 8, 10 14. 2, 9, 6, 8 15. 1, 12, 12, 11 16. 3, 4, 3, 2, 3 17. 4, 12, 10, 6, 1 18. 3, 4, 1, 1, 4 19. 2, 6, 10, 6, 1 10 20. 4, 5, 4, 6