25 Algebraic Equations for Bingo (Set 2)

1. $\sqrt{x-1} = x - 3 \rightarrow x = 5$
2. $\sqrt{x+2} = x \rightarrow x = 2$
3. $x^2 - 3x - 28 = 0 \rightarrow x = 7, -4$
4. $(x-5)(x+2) = 0 \rightarrow x = -2, 5$
5. $\frac{2x-3}{x+1} = 3 \rightarrow x = -6$
6. $x^2 = 36 \rightarrow x = \pm 6$
7. $(x+3)^2 = 49 \rightarrow x = -3 \pm 7 \rightarrow x = 4, -10$
8. $x^2 + 10x + 25 = 0 \rightarrow x = -5$
9. $\frac{x+3}{x-1} = 3 \rightarrow x = 3$
10. $\frac{2}{x} + \frac{1}{4} = \frac{3}{2} \rightarrow x = \frac{8}{5}$
11. $x(x+3) = 28 \rightarrow x = 4, -7$
12. $(x-4)^2 = 25 \rightarrow x = 4 \pm 5 \rightarrow x = 9, -1$
13. $\frac{x^2-9}{x-3} = 9 \rightarrow x = 6$
14. $x^3 + 3x = 0 \rightarrow x(x^2+3) = 0 \rightarrow x = 0$
15. $\frac{3x-2}{x} = 6 \rightarrow x = -\frac{2}{3}$

16. $\frac{x+5}{x-1} = 2 \rightarrow x = 7$
17. $5(x+1)^2 = 45 \rightarrow x+1 = \pm 3 \rightarrow x = 2, -4$
18. $x^2 - x - 6 = 0 \rightarrow x = 3, -2$
19. $\frac{x+5}{3} + \frac{x-1}{2} = 5 \rightarrow x = \frac{23}{5}$
20. $x^2 = x + 5 \rightarrow x^2 - x - 5 = 0 \rightarrow x = \frac{1 \pm \sqrt{21}}{2}$
21. $(x+2)(x-3) = 5 \rightarrow x^2 - x - 11 = 0 \rightarrow x = \frac{1 \pm \sqrt{45}}{2}$
22. $\frac{4x+1}{4} = \frac{5}{6} \rightarrow x = \frac{7}{12}$
23. $\frac{1}{x+1} = \frac{4}{x+6} \rightarrow x = \frac{2}{3}$
24. $x^2 + 4x = 0 \rightarrow x = 0, -4$
25. $x^3 + 2x^2 - x - 2 = 0 \rightarrow$ Factor by grouping: $(x+2)(x-1)(x+1) \Rightarrow x = -2, -1, 1$