AC Method

1. $g^2 + 8g + 16$
2. $d^2 + 12d + 32$
3. $m^2 - 9m + 20$
4. $f^2 - 5f + 6$
5. $t^2 - 11t + 28$
6. $g^2 + 7g + 12$
7. $d^2 + 13d + 22$
8. $m^2 - 10m + 24$
9. $f^2 - 10f + 21$
10. $t^2 - 13t + 30$
11. $k^2 - 12k + 36$
12. $c^2 - c - 72$
13. $x^2 - x - 42$
14. $g^2 + 4g - 21$
15. $d^2 + 20d - 21$
16. $m^2 - 11m - 60$
17. $f^2 + 3f - 40$
18. $k^2 - k - 72$
19. $x^2 - x - 42$
20. $g^2 + 13g - 30$
21. $d^2 + 5d - 36$
22. $m^2 + 7m - 60$

AC Method

23. $6d^2 - 19d + 15$
24. $3m^2 + 7m + 2$
25. $3f^2 - 10f + 8$
26. $4t^2 + 7t + 3$
27. $6k^2 + 7k - 5$
28. $8y^2 - 13y - 6$
29. $5x^2 - 22x + 8$
30. $2g^2 + 11g + 14$
31. $3d^2 - 14d + 15$
32. $15m^2 + 26m + 7$
33. $3t^2 + 17t + 10$
34. $7k^2 + 9k + 2$
35. $3y^2 - 7y - 20$
36. $7x^2 - 2x - 9$

Factoring By Grouping

37. $6mn - 9m - 4n + 6$
38. $2e^2 f - 12ef + 3e - 18$
39. $xz + xw + yz + yw$
40. $2c^2 d + 9c + 6cd + 3c^2$
41. $3j - 5j^2 - 6k + 10jk$
42. $3b^2 - 9b - bt + 3t$
43. $2ac + ad + 6bc + 3bd$

Difference of Squares

44. $4r^2 - 9$
45. $225p^2 - 529y^2$
46. $625m^2 - 1$
47. $324h^2 - 289f^2$
48. $4 - 169j^2$
49. $256d^2 - 25w^2$
50. $49 - 361y^2$
51. $x^2 - y^2$
52. $4w^2 - x^2y^2z^2$
53. $225y^2 - 64h^2$

Perfect Squares

54. $25t^2 + 30t + 9$
55. $225p^2 - 690py + 529y^2$
56. $625m^2 + 50m + 1$
57. $16h^2 - 56hf + 49f^2$
58. $4 - 52j + 169j^2$
59. $a^2 - 24a + 144$
60. $49 - 266y + 361y^2$
61. $x^2 - 2xy + y^2$
62. $25w^2 + 70w + 49$
63. $81h^2 + 378hq + 441q^2$

Combination Factoring

64. $10x^3 + 25x^2$
65. $2ax + 6xc + ba + 3bc$
66. $a^2 - 2ab + a - 2b$
67. $64x^2 - 80x + 25$
68. $625x^4 - 81y^4$
69. $48z^4 - 3x^4$
70. $484p^2 - 220p + 25$
71. $3x^3 - 27x$
72. $2l^3 - 13l^2 - 24l$
73. $12x^2 - 40x + 12$
74. $16x^2 + 40xy + 25y^2$
75. $x^2 + 14x + 33$
76. $2x^2 + 5x + 2$
77. $15x^2 - 13x + 2$
78. $16 - m^4$
79. $81p^4 - 16g^4$
80. $4x^3 + 20x^2 - 9x - 45$
81. $18h^4 + 12h^3 - 30h^2$
82. $1250 - 722a^2$
83. $3x^3 - 27x$
84. $2j^3 - 13j^2 - 24j$
85. $18x^3 - 27x^2 - 50x + 75$

Solving

86. $y^2 + 13y + 40 = 0$
87. $p^2 = 5p + 24$
88. $m^2 + 36m = 0$
89. $49m^3 - 126m^2 + 81m = 0$
90. $l^2 - 13l + 36 = 0$
91. $g(g - 5) = 0$
92. $(3x - 4)(4x + 7) = 0$
93. $7(x + 2)(x - 3) = 0$
94. $3f(2f - 5)(3f + 1) = 0$
95. $(2m + 3)(m + 4) = 3m + 6$
96. $(3w + 2)(w + 3) = w + 14$
97. $(g - 1)(g - 1) = 36$
98. $\frac{t^2}{12} - \frac{2}{3}t - 4 = 0$