

Factoring
Trinomials: $x^2 + bx + c$
Worksheet

$$\begin{aligned} &\text{Factoring } x^2 + bx + c \\ &x^2 + bx + c = (x + \underline{\quad})(x + \underline{\quad}) \\ &\text{where } \underline{\quad} \cdot \underline{\quad} = c \\ &\text{and } \underline{\quad} + \underline{\quad} = b \end{aligned}$$

Name: _____

Factor the following. Don't forget to factor out the GCF if necessary.

1. $x^2 - 2x - 15$	2. $x^2 + 7x + 6$	3. $y^2 - 6y + 9$
4. $a^2 - 11a + 24$	5. $b^2 - 4b - 12$	6. $x^2 - 7x + 10$
7. $p^2 - 7p + 8$	8. $x^2 + 9x + 18$	9. $x^2 + 16x - 36$
10. $w^2 - w - 20$	11. $x^2 + 10x - 16$	12. $m^2 - 19m + 48$
13. $x^2 + 12x - 28$	14. $x^2 - 8xy - 20y^2$	15. $u^2 - 10uv + 16v^2$
16. $x^2 + 13xy + 30y^2$	17. $-x^2 - 9x + 36$	18. $a^3 + 2a^2 - 8a$
19. $-2x^2 - 6x + 8$	20. $3x^3 - 6x^2 + 3x$	21. $-x^3 + 10x^2 + 24x$