

Name _____ Date _____ Pd _____

11.1 Solving Quadratic Equations by Completing the Square DAY TWO CYU

Use when you get it right all by yourself

S Use when you did it all by yourself, but made a silly mistake

H Use when you could do it alone with a little help from teacher or peer

G Use when you completed the problem in a group

X Use when a question was attempted but wrong (get help)

N Use when a question was not even attempted

CONCEPTS	BASIC	INTERMEDIATE	ADVANCED
Solving quadratics using completing the square method	10 - 13	14 - 17	18 - 21
Finding the perfect "c" in order to complete the square	1 - 9		
Factoring quadratics: perfect square binomials	1 - 9		

Add the proper constant to each binomial so that the resulting trinomial is a perfect square trinomial. Then factor the trinomial.

1. $x^2 + 16x + \square$

2. $y^2 + 2y + \square$

3. $z^2 - 12z + \square$

4. $x^2 - 8x + \square$

5. $p^2 + 9p + \square$

6. $n^2 + 5n + \square$

7. $x^2 + x + \square$

8. $y^2 - y + \square$

9. $m^2 - 14 + \square$

Solve each equation by completing the square. These equations have real number solutions.

10. $x^2 + 8x = -15$

11. $y^2 + 6y = -8$

12. $x^2 + 6x + 2 = 0$

13. $x^2 - 2x - 2 = 0$

14. $3p^2 - 12p + 2 = 0$

15. $2x^2 + 14x - 1 = 0$

16. $4y^2 - 2 = 12y$

17. $3x^2 - 4x = 4$

Solve each equation by completing the square. Answers may be non-real.

18. $y^2 + 2y + 2 = 0$

19. $x^2 + 4x + 6 = 0$

20. $y^2 + 6y - 8 = 0$

21. $2a^2 + 8a = -12$

CYU Reflection: How far can you go: basic, intermediate, or advanced?

Rate your mastery level!

How confident are you with the skills this CYU covered? Circle the score you would give yourself.

