

Skills Maintenance #4
 Quadratic Equations

Name _____
 Pd _____ Date _____

Solve by factoring OR the quadratic formula

EXAMPLE:	$x^2 + 10x = 24$
$x^2 + 10x - 24 = 0$	$1x^2 + 10x - 24 = 0$
$(x+12)(x-2) = 0$	$\begin{matrix} \uparrow & \uparrow & \uparrow \\ a & b & c \end{matrix}$
$x+12 = 0$ or	$x = \frac{-b \pm \sqrt{b^2 - 4ac}}{2a}$
$x-2 = 0$	$x = \frac{-10 \pm \sqrt{10^2 - 4(1)(-24)}}{2(1)}$
$x = -12$ or $x = 2$	$x = \frac{-10 \pm \sqrt{196}}{2} = \frac{-10 \pm 14}{2}$
$\{-12, 2\}$	$x = \frac{4}{2}$ or $x = \frac{-24}{2}; \{-12, 2\}$

Score:
Answers
1.
2.
3.
4.
5.
6.
7.
8.
9.
10.

1. $x^2 + x - 20 = 0$

2. $x^2 - x = 72$

3. $x^2 + 6x + 9 = 0$

4. $x^2 - 5x - 24 = 0$

5. $3x^2 - 7x - 6 = 0$

6. $2x^2 + x - 15 = 0$

7. $5x^2 - 7 = 0$

8. $x^2 - 5x = 5$

9. $3x^2 + 2x - 1 = 0$

10. $x^2 - 5x = -3$