Today's Plan:

Learning Target (standard): I will factor trinomials by splitting the middle.

Students will: Complete practice problems over previous concepts at the boards, put up homework problems on the board and make necessary corrections to their own work and review polynomials.

Teacher will: Provide practice problems over previous concepts, check homework problems for accuracy and provide students feedback, describe and provide examples of review problems.

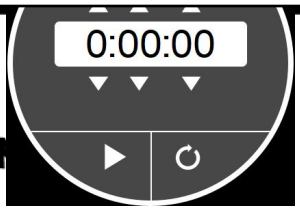
Assessment: Board work, homework check and homework assignment

Differentiation: Students will work at the board, go over and correct homework at their seats and actively engage in review problems.

NAME _____ #106

4(2) - 10
8 - 10 (-2)

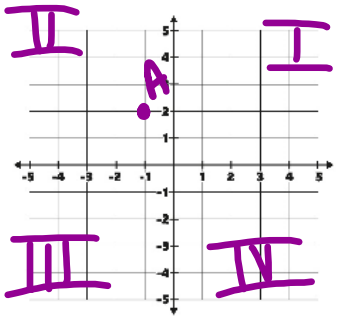
BELL RINGER



1.) Evaluate the expression for the given value of x.
4x - 10; x = 2

2.) Solve $-2x < 6$. $x > -3$
Write the solution in set and interval form.
$\{x \mid x > -3\}$ $(-3, \infty)$

3.) Plot the point on a coordinate plane.
A(-1, 2) Which quadrant is it in?
QII



Simplify.

$$-2\left(x^3-3x^2+5x-6\right)-3x^2\left(-2x+3x-4\right)$$

$-2x^3+6x^2-10x+12+6x^3-9x^3+12x^2$

$-5x^3+18x^2-10x+12$

Simplify.

$$\left(4x^2-6x+8\right)\div\left(-2x^2\right)$$

$\frac{4x^2}{-2x^2}\ \frac{-6x}{-2x^2}\ \frac{8}{-2x^2}$

$-2+\frac{3}{x}-\frac{4}{x^2}$

Simplify.

$$(3x^2 - 4x + 2)(2x - 5)$$

$$6x^3 - 15x^2 - 8x^2 + 20x + 4x - 10$$

$$6x^3 - 23x^2 + 24x - 10$$

Factor.

$$y^2 + 11y + 24$$

$$y^2 + 8y + 3y + 24$$

$$y \quad \quad 3$$

$$y(y+8) + 3(y+8)$$

$$(y+8)(y+3)$$

$$24$$

$$8 + 3 = 11$$

Factor.

$u^2 - 12u + 32$

32

$-8 + -4 = -12$

$u^2 - 8u - 4u + 32$

u -4

$u(u-8) - 4(u-8)$

$(u-8)(u-4)$

Factor.

$k^2 - 2k - 48$

48

$6 - 8 = -2$

$k^2 + 6k - 8k - 48$

k -8

$k(k+6) - 8(k+6)$

$(k+6)(k-8)$

Factor.

$$m^2+3m-18$$

18

6 −3 = 3

$m^2+6m-3m-18$

m -3

$m(m+6)-3(m+6)$

$(m+6)(m-3)$

Factor.

$$3t^2-14t+8$$

24

−12 + −2 = −14

$3t^2-12t-2t+8$

$3t$ -2

$3t(t-4)-2(t-4)$

$(t-4)(3t-2)$

Completely Factor.

$$-4n^4+40n^3-100n^2$$

$-4n^2$ $-4n^2$ $-4n^2$

$$-4n^2(n^2-10n+25)$$

25

$-5+-5=-10$

$$n^2-5n-5n+25$$

n -5

$$n(n-5)-5(n-5)$$

$$(n-5)(n-5)$$

$$-4n^2(n-5)^2$$

Completely Factor.

$$5a^3b^2+3a^4b-2a^2b^3$$

$$3a^4b+5a^3b^2-2a^2b^3$$

a^2b a^2b a^2b

$$a^2b(3a^2+5ab-2b^2)$$

6

$6-1=5$

$$3a^2+6ab-ab-2b^2$$

$3a$ $-b$

$$3a(a+2b)-b(a+2b)$$

$$a^2b(a+2b)(3a-b)$$

Completely Factor.

$a^4 - b^4$

$(a^2+b^2)(a^2-b^2)$

$(a^2+b^2)(a+b)(a-b)$

Assignment:

Polynomial & Factoring Review

#2-24 even