

Name: _____

Date: _____

UNIT 1

LESSON 3

AIM: HOW DO WE DIVIDE POLYNOMIALS? (DAY 2)

Do Now: - Use the long division to determine the quotient:

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

$$1) \frac{2x^3 - 4x^2 + 2}{2x - 2}$$

$$2) \frac{x^5 - 1}{x - 1}$$

*Don't forget to fill in the _____ terms if needed!

PRACTICE: Simplify

3) $(x^3 - 27) \div (x - 3)$

4) $(x^3 - 8) \div (x - 2)$

5) $(x^4 + 18x^3 + 71x^2 - 258x - 1512) \div (x - 4)$

6) $(x+3)(x-3) - (x+4)(x-4)$