

Starter

6 FEB 2018

Find the GCF for the two numbers.

1) 32; 34

32 = 1, 2, 4, 8, 16, 32
 34 = 1, 2, 17, 34
 2

2) 65; 45

65 = 1, 5, 13, 65
 45 = 1, 3, 5, 9, 15, 45
 5

The examples above are what type of polynomial? _____

Greatest Common Factor (GCF): the largest monomial that divides evenly into each term of the polynomial

Find the GCF of the following pairs of monomials:

1. 12 and 28

4

2. $18x^2$ and $42x^3$

1, 2, 3, 6, 9
 1, 2, 3, 6, 14, 42

3. $42x^2y$ and $28xy^4$

$14xy$

1, 2, 4, 7, 14, 28
 6, 7
 $6x^2$

x^2
 x^2
 $x \cdot x$

Find the GCF of the following polynomials and rewrite the expression in factored form

<p>4. $8x + 12y$</p> <p>$4(2x + 3y)$</p>	<p>5. $14y^2 - 21y$</p> <p>$7y(2y - 3)$</p>	<p>6. $14m^2 + 35m - 21$</p> <p>$7(2m^2 + 5m - 3)$</p>
<p>1, 2, 4, 8 1, 2, 3, 4, 6, 12 $4 \cdot 2x = 8x$ $4 \cdot 3y = 12y$</p>	<p>1, 2, 7, 14 1, 3, 7, 21 $7y \cdot 2y = 14y^2$ $7y \cdot 3 = 21y$</p>	<p>1, 2, 7, 14 1, 5, 7, 35 2, 1, 3, 7, 21</p>

10. $21x^3y^2 - 14x^2y - 28x^2y^2$

10. _____

$7x^2y(3xy - 2 - 4y)$

$7x^2y \cdot 3xy = 21x^3y^2$
 $7x^2y \cdot 2 = 14x^2y$
 $7x^2y \cdot 4y = 28x^2y^2$