Vocabulary: Dividing Exponential Expressions

dictionary2

**Vocabulary**

* Base – a number or expression raised to an exponent.
  + For example, in the expression 53, 5 is the base.
* Exponent – a number, written to the right of and just above a number or expression, that indicates how many times the number or expression is multiplied by itself.
  + For example, in the expression 53, 3 is the exponent.
  + The expression 53 equals 5 • 5 • 5, or 125.
  + *Power* is another name for exponent.
    - For example, 65 is read “6 to the fifth power.”
  + The exponents 2 and 3 have special names – 2 is “squared” and 3 is “cubed.”
    - For example, 42 is read “four squared.”
    - For example, 43 is read “four cubed.”
  + A negative exponent means to divide by that many factors.
    - For example, 5–3 means  = .
  + A number raised the zero power equals 1.
    - For example, 50 = 1.
* Expression – a combination of one or more numbers, one or more variables, and one or more arithmetic operations.
  + For example, *x* – 2, 8*m*, *r* ÷ 6, 7, 3*x* + 4, 9*x*3*y*2, (2 + ()2 – 0.3), and  are all expressions.