

Writing Variable Expressions

A) Writing Expressions

1) Variable - a letter representing a value that can change.

2) Variable Expression - contains a variable

EX $7h$; $4w + 2$; $\frac{x+9}{3}$

B) Evaluating Expressions

1) When you substitute a number for a variable, you evaluate the expression.

EX Evaluate the expression $4h + 3$ for $h = 2$

1st - substitute 2 for $h \rightarrow 4(2) + 3$

2nd - solve $\rightarrow 8 + 3 = 11 \rightarrow$ so 11 is the answer

2) Translating words to variable expressions:

a) take words and change them to numbers

b) take numbers and change them to words

EX - P. 106 word phrase

variable expression

a number plus negative 3 $\rightarrow n + (-3)$

six less than a number $\rightarrow x - 6$

variable expression

word phrase

$k + 8$ \rightarrow the quotient of k and 8

$15 - b$ \rightarrow fifteen minus a number

3) Variable expressions with more than one operation

a) use order of operations

EX Evaluate $1.5 + 2n$ for $n = 12$

$1.5 + 2(12) =$

$1.5 + 24 = \boxed{25.5}$