

Domain and Range of a Function

Name _____
Date _____

1. Please convert the equation to a Function

Equation	Function
$2x + 3y = 63$	$y = 21 - .67x$
$y - 5x = 17$	$y = 17 + 5x$
$64 + y = 3x$	$y = 3x - 64$
$2y + 3x = 12$	$y = 6 - 1.5x$

Equation	Function
$6x + 3y = 9$	$y = 3 - 2x$
$18 = y - x$	$y = 18 + x$
$12x = y - 32$	$y = 12x + 32$
$10y - 39x = x + 6$	$4x + .6$

2. You have \$40 to spend on your evening with a friend at the Carnival. You want to buy some ride tickets (y) and also some food tickets (x). The ride tickets are \$4 each. The food tickets are \$6 each. What is the domain and the range of the tickets you could purchase?

x	y
0	10.0
1	8.5
2	7.0
3	5.5
4	4.0
5	2.5
6	1.0

Domain	Range
0, 2, 4, 6	10, 7, 4, 1

$4x + 6y = 40$
 $x = 10 - 1.5y$

3. Find the Domain and the Range of the function represented in this graph.

Domain	Range
-2, 1, 4, 7	-2, 0, 2, 6

4. Find the Domain and Range of the the function represented by this table.

hats (x)	4	3	2	1	Domain	Range
belts (y)	10	8	6	4	1, 2, 3, 4	4, 6, 8, 10

5. You have exactly one hour to play games on your computer. You want to play some chess (x) and a chess game lasts 20 minutes. You also want to play some backgammon (y), and a backgammon game lasts 10 minutes. Write a function to represents the number of each game that you could play. Then determine the domain and range.

x	y
0	6.0
1	4.0
2	2.0
3	0.0

$20x + 10y = 60$
 $10y = 60 - 20x$
 $y = 6 - 2x$

function	domain	range
$y = 6 - 2x$	0, 1, 2, 3	6, 4, 2, 0