Name: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ Period: \_\_\_\_\_\_\_\_\_\_ Number: \_\_\_\_\_\_\_\_\_

# 4.3a Notes – Writing Equations from a Context

I went to a water park and when I got inside, I wanted to rent an inner tube for the day. They told me I had to pay $\_\_\_\_\_\_\_\_\_\_ up front, then $1.50 for every hour. I know that after 6 hours, the TOTAL cost for the tube was $15. Can you make a table, graph, and equation to represent what happened to me today?

|  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| |  |  | | --- | --- | | x | y | |  |  | |  |  | |  |  | |  |  | |  |  | |  |  | |  |  |   Initial Value ( ): \_\_\_\_\_\_\_\_\_  Slope: \_\_\_\_\_\_\_\_\_\_\_\_\_\_  Equation: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ | http://mathbits.com/MathBits/StudentResources/GraphPaper/14by14%20axes.jpg |

Ex #1: I wanted to buy some bacon-flavored chapstick online. They were $1.50 each, and then no matter how many I bought, the shipping was always $\_\_\_\_\_\_\_. Make a table from this info, and then write an equation.

|  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| |  |  | | --- | --- | | x | y | |  |  | |  |  | |  |  | |  |  | |  |  | |  |  | |  |  | | Initial Value: \_\_\_\_\_\_\_\_\_  Slope: \_\_\_\_\_\_\_\_\_\_\_\_\_\_  Equation: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_  What does the slope represent? |
|  |  |

What does the initial value represent?

Ex #2: My family wanted to rent a cabin up in Park City. The cabin we rented (cause I’m supes rich) cost us $\_\_\_\_\_\_\_\_\_\_ up front plus $475 per night after that. Make a table for renting it for 6 days and then make an equation from it.

|  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| |  |  | | --- | --- | | x | y | |  |  | |  |  | |  |  | |  |  | |  |  | |  |  | |  |  | | Initial Value: \_\_\_\_\_\_\_\_\_  Slope: \_\_\_\_\_\_\_\_\_\_\_\_\_\_  Equation: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_  What does the initial value represent? |
|  |  |

What does the slope represent?

|  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| Ex #3: Make an equation from this table.   |  |  | | --- | --- | | **x** | **y** | |  |  | |  |  | |  |  | |  |  |   Equation: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ | Ex #4: Make an equation from this table.   |  |  | | --- | --- | | **x** | **y** | |  |  | |  |  | |  |  | |  |  |   Equation: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ |