## Warmup $9 /(\sqrt[2]{25})+1$

Draw a graph to match each story. For both graphs, your x-axis should be "Time" and your y -axis should be "Distance from home."

1) "Tom's house was at the top of a hill. He left his house, and walked down the hill."
2) "Tom was at the store. He ran all the way to the bottom of the hill. He then walked slowly up the hill to his house."
3) One thing I think I have learned well so far this year is...
4) One thing I wish my teacher knew is...
"Tom's house was at the top of a hill. He left his house, and walked down the hill."

"Tom was at the store. He ran all the way to the bottom of the hill. He then walked slowly up the hill to his house."


Time

## Trends in the graphs?

For all questions, assume the $y$-axis is "Distance from home."

- On this type of graph, what does a horizontal line mean?

The person is stopped.

- If one section of the graph is steeper than another, what does that mean?

The person is going faster.

- If the graph is decreasing, what does that mean?

The person is getting closer to home.

- If the graph touches the x-axis, what dops that mean?

The person is at home.
Distance
from
Home

## HOWEVER:

All of this changes if the $y$-axis was labeled differently! Let's look at some examples.

## How would this graph look?

Tom left his house, running at a fast, constant speed.



## Different y-axis labels

"Tom went out for a walk with some friends. He suddenly realized he left his wallet behind. He ran home to get it and then had to run to catch up with the others."


## Draw a graph:

You leave home, walking at a slow constant rate. After a few blocks, you see a scary lion. You turn around and run straight home.


Time

## Draw a graph:

You leave home, walking at a slow constant rate. After a few blocks, you see a scary lion. You turn around and run straight home.


## Draw a graph:

You leave home, walking at a slow constant rate. After a few blocks, you see a scary lion. You turn around and run straight home.


Here are five pictures of a dog taken at equal intervals of time.


Diego and Lin drew different graphs to represent this situation:


Both Diego and Lin used "time" as the independent variable (x-axis). Discuss with your group: what do you think they each used for the dependent variable? (y-axis)

## UNIT 1 TEST

You may retake individual tasks. You must write which tasks you are retaking on your retake form.

Not in gradebook yet; they will be very soon!

The deadline to retake the FIRST quiz is coming up!!!

If you did better on the test than the quiz, you could probably do very well on the retake. Corrections/extra practice are due ON MONDAY!!!

## ALEKS

Our old logins are gone. You now will log in through Clever.

All you need to do is go to the Clever Portal, find "McGraw-Hill," and click on it.

YOU WILL HAVE TO RETAKE THE PLACEMENT TEST! (I am as frustrated about this as you are)

Rewards for students who did their placement test on time last week.

## NOT DUE THIS MONDAY, BUT NEXT MONDAY:

Finish the placement test AND do 30 minutes of topics

There will always be 30 minutes due Sunday night at midnight.
You will not have any time in class to do it. (Except for PLT)
I can see whether you are actually doing topics or not, so don't just log on to ALEKS and let your computer sit there for 30 minutes. It won't count.

Every week, a homework grade will be put in for ALEKS, based on how many minutes you did. If you did 25 minutes out of your 30, you will get a $25 / 30$ score (which is an $83 \%$ )

At the end of the 9 weeks, I will put in an "ALEKS progress score". This will be based on how much PROGRESS you made from the beginning of the 9 weeks to the end. The more topics you master each week, the better your progress grade will be.

You may do more than 30 minutes to get extra practice/help your progress grade, but these extra minutes will NOT count towards the future. This is because I want ALEKS to become a consistent habit.

You may "make up" ALEKS minutes that you forgot to do, but they will be worth $50 \%$.

## Game: "Guess My Rule"

- I am thinking of a rule in my head.
- I will call on somebody to give me an input.
- I will use my rule to figure out the output, then tell you.
- Your job is to figure out the rule I am thinking of. When you think you know it, raise your hand.


## Play "Guess My Rule" in pairs

- Let me know if you have nobody to join with!
- Take turns thinking of rules. You may make the rule whatever you want, but you may not use a calculator!!!

