# Day 1 - Monday, April 20, 2020

English: Students can read the passage and answer on loose leaf paper, or in google classroom.

\*Remember to be reading for at least twenty minutes a day! While you are reading, identify new words that you may have not known the meaning of before!\*

Day 1 Math: Understanding Inequality Symbols - NEW SKILL!!!!!

#### PLEASE READ NOTES AND STUDY BEFORE ANSWERING QUESTIONS.

#### INEQUALITY SYMBOLS & VOCABULARY Less than < \*IS UNDER \*IS FEWER Greater than \*IS OVER \*IS MORE THAN \*EXCEEDS > Less than or equal to \*IS NOT MORE THAN \*IS AT MOST ≤ \*MAXIMUM VALUE \*IS NOT GREATER THAN \*DOES NOT EXCEED Greater than or equal $to^{*|S|}$ NOT UNDER \*IS AT LEAST ≥ \*MINIMUM VALUE \*IS NOT LESS THAN Not equal ±

What is an inequality?

A mathematical expression that states two quantities are not equal or may be equal.

- How do we show an inequality in math?
  - By using one of these symbols in place of an "=" sign.

#### <u>Symbols</u>

- > Greater Than
- ≥ Greater Than or Equal To
  < Less Than</p>
  ≤ Less Than or Equal To

# Inequality KEY WORDS

- at least means greater than or equal to
- no more than means less than or equal to
- more than means greater than
- · less than means less than

#### PRACTICE TIME!

Write each number sentence as an equation / inequality.	Answers
Ex) x is less than or equal to -91.	$_{\rm Ex.}$ $\rm x \leq -91$
1) 57 is greater than x.	1.
2) x is less than or equal to -24.	
3) 6 is greater than x.	2
4) -99 is less than x.	3
5) x is less than or equal to -15.	4
6) x is less than or equal to -99.	5
7) -38 is greater than x.	6
8) x is greater than 98.	7
9) 7 is greater than x.	8
10) x is greater than or equal to -93.	9
•	10.

#### Day 1 History: Westward Expansion

#### **Westward Expansion**

Between 1801 and 1861 new territories were claimed for America. These new territories changed the **political map of the United States**. After the Revolutionary War, the Mississippi River was the western boundary of the new nation. The lands between the Appalachian Mountains and the Mississippi were the **new frontier**. Thousands of settlers called **pioneers** made the dangerous journey over the mountains in hopes of finding good farmland and a prosperous future for their families. By 1800, the settlers were now looking west across the Mississippi to the territories beyond.

During Thomas Jefferson's presidency, the United States purchased a huge area of land from France. This territory was called Louisiana and included over 800,000 square miles of land stretching from the Mississippi River west to the Rocky Mountains and from Canada south to the busy seaport of New Orleans. The Louisiana Purchase doubled the size of the United States over night! To find out more about this new land, President Jefferson hired Meriwether Lewis and William Clark to lead an expedition exploring the Louisiana Purchase from the Mississippi River to the Pacific Ocean. Over two years later, Lewis and Clark returned with carefully drawn maps and a detailed report of the land and its plants, animals, and people.

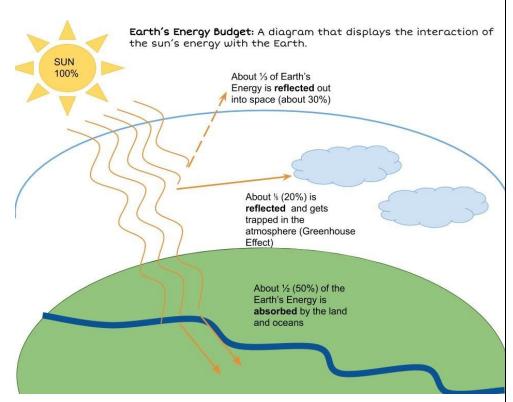
- 1. How did the United States acquire The Louisiana Purchase territory?
- 2. What country did the United States acquire this territory from?

3. Give two facts about this territory.

#### Day 1 Science:

Although the sun releases a tremendous amount of energy, the Earth receives only a small portion each day. This small portion, however, is responsible for powering the motion of the atmosphere, the oceans, and many other processes that take place at the Earth's surface. As the sun's energy enters our atmosphere, about one third of it is **reflected** back out into space by gases in our atmosphere. About one half of the energy that ends up striking the Earth is absorbed by the Earth's surface.

This **reflection** and **absorption** of the sun's energy is important! The amount of incoming solar



radiation has to be in close balance with the amount of energy that leaves the atmosphere. If this balance is disrupted, or interrupted, the Earth would heat up or cool down too much. Either of these situations could make life on Earth very unpleasant.

- 1. What is the Earth's Energy Budget?
- 2. Define reflection.
- 3. Define absorption.
- 4. List the fractions and percentages of how much of the sun's energy is:
  - a. Reflected out into space-
  - b. Trapped in the Earth's atmosphere-
  - c. Absorbed by Earth's lands and oceans-

#### Day 2, Tuesday, April 21st

English: Students can read the passage and answer on loose leaf paper, or in google classroom.

# Tornado Warning!

Sarah stared out the window with amazement. The clouds seemed to be moving more quickly than the car. She looked between mom and dad's seats and through the front dashboard. The sky glowed an eerie greenish grey color. The radio was tuned to a local weather station where a lady with a squawking voice quickly reported the tornado warning for Lincoln County. That was her county. Thoughts flashed through Sarah's head. Would they be ok? Would her house survive? Would her dog, Ralphie, be safe until they got home? How fast would the windmill be churning? What about John and Carrie down the street? Just as Sarah was about to bombard her dad with the questions flooding her head, he changed the channel to the country western station. Sarah's dad began belting out the words, completely out of tune, making up silly words for the verses he didn't know. Giggles overcame Sarah's tornado of questions, and she joined in the fun by making animal noises to rhythm of the song.

#### Show What You Know

#### TVV

- I. Why did Sarah's dad change the radio channel?
- 2. Aside from the tornado warning on the radio, what evidence did the author give to explain that the weather was taking a turn for the worst?
- 3. What can you infer about Sarah based on her feelings in the story?
- 4. Using context clues, write a synonym for the word "belting".

\*Remember to be reading for at least twenty minutes a day! While you are reading, identify new words that you may have not known the meaning of before!\*

Day 2 Math: Understanding Inequality Symbols - NEW SKILL - Part 2

#### PRACTICE TIME!

Write each number sentence as an equation/inequality.

11)	x is greater than 87.	
	x is greater than 49.	11
13)	x is equal to -58.	12
14)	-48 is equal to x.	13
15)	x is less than or equal to -77.	14
16)	x is less than -26.	15
17)	x is greater than or equal to 14.	16
18)	45 is greater than or equal to x.	17
19)	-87 is less than x.	18
20)	x is less than 60.	19
		20

#### Day 2 History: Westward Expansion

**During the presidency of James Monroe**, another major territorial expansion took place. Just south of the state of Georgia was the Spanish territory of **Florida**. President Monroe was concerned when Indians living in Florida had crossed the border into Georgia and attacked U.S. citizens. Spain was not keeping the peace along the border as it had promised. President Monroe told Spain they could either send soldiers to keep order in their territory or they could give the territory to the United States. Because of problems with its colonies in South America, the King of Spain agreed to give Florida to the United States. In 1819, **the Florida Treaty** was signed.

As the exploration of the Louisiana Purchase continued, more and more Americans began to settle in the southwestern territory owned by Mexico called the **Republic of Texas**. Before long, the American settlers, who far outnumbered those from Mexico, fought for and won their independence from Mexico. The Republic of Texas remained independent until 1845 when it became **Texas**, the 28<sup>th</sup> state to join the United States of America.

#### Florida:

- 1. How did the United States acquire this territory?
- 2. What country did the United States acquire this territory from?
- 3. Give two facts about this territory.

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- 1. How did the United States acquire this territory?
- 2. What country did the United States acquire this territory from?
- 3. Give two facts about this territory.

#### Day 2 Science

When the Earth has excess carbon dioxide (CO2), water vapor, and other gases in its atmosphere, a disruptive **Greenhouse Effect** can result. Although these gases do not interfere with the solar radiation entering the earth, they do interfere with the heat radiation trying to leave the Earth's atmosphere. Instead of letting heat waves escape, these extra gases absorb the heat waves and reflect them down to reradiate the Earth's atmosphere and surface. This could eventually change Earth's climate for the worse.

More Information and helpful website: <a href="https://climatekids.nasa.gov/greenhouse-effect/">https://climatekids.nasa.gov/greenhouse-effect/</a>

Watch this video on the <u>Greenhouse Effect and how it contributes to global warming.</u>

Write down 2 things that humans can do to lower the amount of greenhouse gases in the atmosphere.

1.

2.

English: Students can read the passage and answer on loose leaf paper, or in google classroom.

# A Bad Case of Stage Fright

From the stage, Luke could see hundreds of people out in the audience. That's when his nerves got the best of him, and he forgot every line he had learned over the past few months of practice. Earlier that morning, Luke had told his mom how nervous he was, and that he worried he would freeze up while on stage. She reassured him that he could do anything he put his mind to, including acting in this play! He thought back to that conversation and looked to his play director for some encouragement. She nodded her head in his direction, when suddenly he snapped out of the trance he was in. All of his lines came flooding back to his memory, and he began belting out his lines, one after the other. When he left the stage, the crowd roared their approval with applause and cheers. Even though it was a rough start to the performance, now Luke couldn't wait to get back on stage!

# Show What You Know

7777

- I. How does Luke feel at the end of the story?
- 2. What is the theme of the story?
- 3. Was Luke anxious for his part in the play before he got up on stage? Provide evidence to support your answer.
- 4. When Luke "snapped out of the trance," what did he do?

\*Remember to be reading for at least twenty minutes a day! While you are reading, identify new words that you may have not known the meaning of before!\*

#### Day 3 Math: Understanding and Representing Inequalities

#### PLEASE READ NOTES AND STUDY BEFORE ANSWERING QUESTIONS.

Symbols and Meaning	5
>	This symbol means "greater than"
<	This symbol means "less than"
2	This symbol means "greater than or equal to"
≤	This symbol means "less than or equal to"

In an inequality, does the order of the elements matter?

Yes, the order does matter!

For example,  $\times > 5$  is NOT the same relationship as  $5 > \times$ .

However,  $\times > 5$  is the same relationship as  $5 < \times$ .

#### PRACTICE TIME!

Write the written expression for each inequality.

1. 6 > n

2. b≥-7	 		
3. k≤2_			
_			

#### Write the inequality that has the same relationship as the expression given.

EXAMPLE:  $y \ge -1$  has the same relationship as  $\underline{-1 \le y}$ 

"y is greater than or equal to negative one, therefore negative one is less than or equal to y"

- 1. n > 9
- 2. m < 2
- 3. -6≥ f \_\_\_\_\_
- 4. -5 ≤ h \_\_\_\_\_

#### Day 3 History: Westward Expansion

The next U.S. territorial expansion involved the **Oregon Territory**. This land included present day Oregon, Washington, Idaho, and portions of Montana and Wyoming. For years the United States and Great Britain had shared ownership of this territory. As more and more American settlers arrived in covered wagons, the United States informed Great Britain that joint ownership would no longer be considered. Diplomatic discussions began, and in 1846, a treaty was signed that gave ownership of the territory to the United States.

Soon after the U.S. offered Texas statehood, relations with Mexico worsened. Four months later, fighting along the Rio Grande River led to war with Mexico. During the nearly two years of war that followed, American settlers in the territory of California revolted against Mexican rule. A treaty was finally signed and American troops took possession of California and the vast southwest territory.

#### Oregon:

- 1. How did the United States acquire this territory?
- 2. What country did the United States acquire this territory from?
- 3. Give two facts about this territory.

#### California:

1. How did the United States acquire this territory?

- 2. What country did the United States acquire this territory from?
- 3. Give two facts about this territory.

Day 3 Science: Atmosphere, Air Pressure, and Gravity

Earth is covered by a blanket of air called the **atmosphere**. The atmosphere begins at the Earth's surface and extends over 600 miles into space. Let's investigate the properties of air and the structure and dynamics of the Earth's atmosphere! Air is a mixture of gaseous elements and compounds. These include nitrogen, oxygen, water, argon, and carbon dioxide. Surprisingly, the element nitrogen makes up the largest proportion of Earth's air.

Although air appears invisible to us, it has mass and takes up space like other types of matter. Because of this, air exerts pressure. The air surrounding the Earth is held in place by **gravity**. Gravity pulls the air toward the Earth's surface giving the air its weight. **Air pressure** is the weight of a column of air pushing down on a portion of the Earth's surface.

As you move up into the atmosphere the air pressure decreases (Air pressure decreases as altitude increases.) This is because at higher altitudes there is less air pushing down from above. Air pressure is similar to what happens when a clerk fills a bag of groceries at the supermarket. Let's say that she puts your loaf of bread on the bottom, then she adds your chocolate cake, and on top she places a jar of spaghetti sauce. When you arrive home, you will probably find that the bread has been flattened by the weight of the cake and sauce, the cake has a few minor dents from the jar of sauce, and the jar of sauce is undamaged. Items closer to the bottom of the bag feel the weight of all of the items above them. When an item is placed higher in the bag, there is less weight pressing down on it from other items. The air in our atmosphere works the same way. Air near the surface of the Earth is under greater pressure because of the weight of the air above it.

Activity: Draw an image to represent atmosphere, air pressure and gravity. And answer the question below.

Atmosphere	Air Pressure	Gravity

What element makes up a majority of the Earth's atmosphere?

# Day 4, Thursday, April 23rd

English: Students can read the passage and answer on loose leaf paper, or in google classroom.

# Skiing the Slopes

It was a bitterly cold and fiercely windy day, but that didn't matter to John. There was nothing that was going to stop him from going skiing today. He had just gotten a whole new set of winter weather gear for Christmas. The news channel showed pictures of vehicles stuck in snow drifts and barren roads with no cars. As he ate his oatmeal, John smiled and thought "I'll be the only one on the slopes. The lift lines will be short!" Finishing off his last bite of oatmeal and popping a vitamin in his mouth, he headed out the door to catch his ride to the mountain. The engine of Charlie's Jeep purred as he waited outside in the deep snow. Charlie could see the tracks of the large tires that had driven through the snow with ease. Charlie and John made it to the mountain easily in Charlie's jeep, stopping occasionally to help cars that were stuck. As the boys reached the lift lines, the sun popped out from behind the peak. The boys skied until their legs could no longer hold up their bodies. When John returned home, he collapsed on the couch. When mom asked how his day was, he muttered "awesomely insane" before drifting off to sleep.

# Show What You Know

#### 7777

- I. Find one fact and one opinion in the story.
- 2. What is the main idea of this story?
- 3. Write two statements from the text that supports the main idea.
- 4. What advantage did the boys have over other people who wanted to go skiing?

\*Remember to be reading for at least twenty minutes a day! While you are reading, identify new words that you may have not known the meaning of before!\*

Day 4 Math: Graphing and Representing Inequalities- NEW SKILL!!! Please read notes first.

#### Video links for graphing inequalities

https://www.youtube.com/watch?v=8g6uJmFoFOw

https://www.youtube.com/watch?v=Rbg6PQCN2Cs

# **Inequalities Graphing Symbols**

# Greater Than (The open circle indicates that this is NOT Equal to the numeral graphed) Greater Than or Equal To (The closed circle indicates that this is Equal to the numeral graphed.) Less Than (The open circle indicates that this is NOT Equal to the numeral graphed.) Less Than or Equal To (The closed circle indicates that this is Equal to the numeral graphed.)

#### Algebraic Inequality

- These are inequalities that contain a variable.
  - Ex: a > 9 or  $17 \le y$
- A value of the variable that makes the inequality true is a solution of the inequality.
- An inequality may have more than one solution. Together, all of the solutions are called the solution set.

# Algebraic Inequality

- We can graph these solutions on a number line.
  - -If we graph a > 9 it will look like this:



#### Algebraic Inequalities Cont...

What does it look like when we graph  $17 \le y$ ?



What is the difference in the two graphs of these inequalities?

# Graphs of inequalities

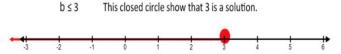
 You can graph the solutions of an inequality on a number line. If the variable is "greater than" or "less than" a number, then that number is indicated with an open circle.

a > 5 This open circle shows that 5 is not a solution.



#### Graphs of inequalities

 If the variable is "greater than or equal to" or "less than or equal to" a number, that number is indicated with a closed circle.

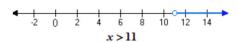


# Graphs of inequalities

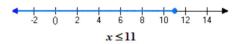
- a > 9 means that a can be any value greater than
   9.
- But can *a* be 9?
- No because 9 is not greater than 9. Therefore when we graph this we use an open whole on our arrow like this:
- The open whole shows that we are leaving 9 out of our solution because it is not larger than 9.

#### **Graphing Inequalities**

Inequalities using the < or > symbols are represented on a number line with an open circle on the number and a shaded line over the solution set.

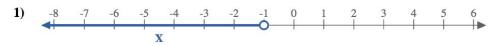


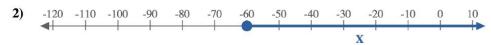
Inequalities using the  $\le$  or  $\ge$  symbols are represented on a number line with a closed circle on the number and shaded line in the direction of the solution set.



#### PRACTICE TIME!

Practice- Write an inequality to express the number line.



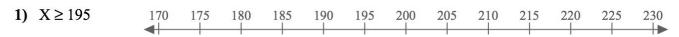




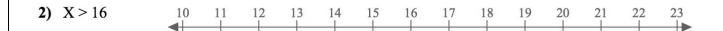


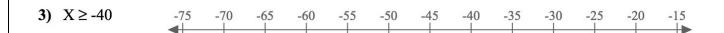
- 1.\_\_\_\_\_ 3.\_\_\_\_
- 2. \_\_\_\_\_\_ 4. \_\_\_\_\_

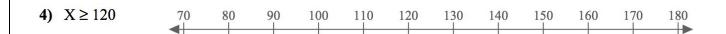
# Use the numberline to express the inequality. Ex) $X \ge 9$ 4 5 6 7 8 9 10



X









Day 4 History



Directions: Color the map above with the directions listed below. You MUST use the correct colors.

- 1. Color the territory of California brown (1853)
- 2. Color the original thirteen colonies red (1787)
- 3. Color the Florida Territory blue (1819)
- 4. Color Republic of Texas yellow (1848)
- 5. Color Proclamation of 1763 green
- 6. Color Oregon Territory orange (1846)
- 7. Color Louisiana Purchase black (1803)

#### Day 4 Science

Earth's atmosphere is made up of layers that have distinct characteristics. These layers are the **troposphere**, the **stratosphere**, the **mesosphere**, and the **thermosphere**. Let's find out where these layers are located in relation to the Earth's surface and how they are affected by temperature.

The **troposphere** is the lowest layer of the atmosphere that lies next to the Earth's surface. Most of the air that makes up the atmosphere is found in the troposphere. It extends to about 14 kilometers above the Earth and is where virtually all weather takes place. As you move up into the troposphere the temperature decreases (Temperature decreases as altitude increases in the lowest layer of the atmosphere). At the top of this layer the air temperature is about - 60°C.

The **stratosphere** begins at the top of the troposphere and extends to about 50 kilometers above the surface of the Earth. As you move up into the stratosphere the air temperature actually increases. This occurs because of ozone. Ozone is a gas that absorbs solar radiation and releases it as heat.

The <b>mesosphere</b> begins at about 50 kilometers above the Earth's surface and extends to 80 kilometers. As you move up into the mesosphere, the air temperature decreases. Temperatures at the top of this layer can drop to -90°C. Interestingly, this layer also protects the Earth. Meteoroids entering Earth's atmosphere usually burn up in the mesosphere.
The <b>thermosphere</b> is the outermost layer of the Earth's atmosphere. It begins at 80 kilometers above the Earth and extends outward into space. The higher you move in this layer, the higher the temperature. Temperatures in the thermosphere can reach 1,800°C! The beautiful colors of the aurora borealis or northern lights occur in this atmospheric layer. This is also where the space shuttle orbits the Earth!
Activity: Sketch a diagram of the layers of the atmosphere. Label each one and include characteristics for each.

Day 5, Friday, April 24th

English: Students can read the passage and answer on loose leaf paper, or in google classroom.

# The boy left his house in a hurry. He ran through the street, down the alley and finally found the path leading to the river. His fishing pole was in hand and his hat was strapped tightly to his head protecting his face from the hot sun. Breathing heavily from the sprint, he reached the dock and sat on the old log that he had placed on the path last week. He cast his line into the river and watched the bobber settle nicely in the center of a calm section of water just off the dock. Baml Before he could even sit back and relax, his bobber disappeared under the water. He yanked the rod back and reeled in a monster catfish. He thought to himself, "Wow! What a great day of fishing this is going to be." As he pulled the fish out of the water, he reached for his net. In his rush out the door, he

knew he had forgotten something! The fish flopped off the hook and swam deep into the river.

Race to the Fish

# Show What You Know

#### 7777

- I. Had the boy been to this fishing spot before? Provide evidence.
- 2. Why did the boy think he was going to have a great day of fishing?
- 3. How do you think the boy feels at the end of the story?
- 4. What happened that caused the boy to know he had caught a fish?

\*Remember to be reading for at least twenty minutes a day! While you are reading, identify new words that you may have not known the meaning of before!\*

Day 5 Math: Graphing and Representing Inequalities in the Real World

#### Writing Inequalities

#### Write an inequality for each situation:

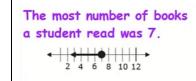
• There are at least 25 students in the auditorium.

Number of students ≥ 25

"At least" means greater than or equal to.

 No more than 150 people can occupy the room.

Room capacity ≤ 150 "No more than" means less than or equal to.

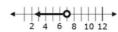


Mary spent more than \$7 at the mall.

The boys ran 7 miles or more.

2 4 6 8 10 12

The teacher lived less than 7 miles from the school



#### **PRACTICE TIME!**

Write an inequality to match the situations. Then graph the inequality on a number line.

1. The roller coaster at Busch Gardens requires you to be at least 42 inches tall to ride it.

Inequality:

Number line:

2. The elevator has a maximum weight limit of 1200 pounds

Inequality:

Number line:

3. The amusement park allows all children five or younger to enter for free

Inequality:

Number line:

4. English teachers require you to read for at least an hour each day

Inequality:

Number line:

5. Sarah slept more than 8 hours last night

Inequality:

Number line:

#### **Day 5 History: Westward Expansion**

In addition to geographic and economic factors, a long-held belief also influenced American westward expansion. This belief, called **Manifest Destiny**, was held by many Americans in the 1840s. It was the belief that the United States would benefit from expansion and had the right to expand its people and government across the North American continent.

Belief in the right of "Manifest Destiny"—the idea that expansion was for the good of the country and was the right of the country

American Progress by John Gast



Write four observations from the image above.

- 1.
- 2.
- 3.
- 4.

What is manifest density?

#### **Day 5 Science: Factors that Affect the Weather**

We have learned that virtually all of Earth's weather takes place in the lowest level of the atmosphere called the troposphere. This is due in part to the amount of heat, water, and air pressure found at this level. **Thermal energy, water vapor, and air pressure** determine the weather conditions on Earth.

Let's investigate how these three factors determine the weather. We know that the **unequal heating** of the Earth's surface by the sun causes a rising and falling air pattern called convection. Convection distributes heat energy in the troposphere as warm air rises and cooler air falls.

In addition to rising and falling, air also moves horizontally. This horizontal movement is caused by **differences in air pressure**. Air tends to move from areas of high pressure to areas of low pressure. This horizontal movement of air due to air pressure is called **wind**.

These vertical and horizontal movements of air are connected. This is true because differences in air pressure are caused by the unequal heating of the Earth's surface. When an area of the Earth is heated by the sun, the air above it heats up, too. As air heats up, it expands, becomes less dense, and rises. Cooler, heavier air nearby will then move horizontally (wind) under the heated air causing it to rise even more. The greater the pressure differences are between two locations on Earth, the faster the winds.

Added to this moving mix of heat and pressure is **water vapor**. The amount of water vapor or moisture in the air is called **humidity**. As the bodies of water on Earth are heated by the sun, water molecules escape into the air in the form of water vapor (evaporation). This water vapor rises with the heated air in a convection current into the troposphere. As this humid air rises into the cooler regions of the troposphere, the water vapor cools down and changes into minute, condensed water particles. As more and more of these condensed water particles join together, a cloud is formed.

Activity: Watch this video and explain in 3-5 complete sentences what was happening.			
Convection Experiment			

# Day 6, Monday, April 27th

#### **English: Summarizing**

Remember, when summarizing, you are giving a QUICK explanation of what you have read or seen. When you are summarizing you should use your own words, and you should be focusing on the main idea.

Here is a quick video on how to summarize: <a href="https://youtu.be/dsB73dRuGcE?t=10">https://youtu.be/dsB73dRuGcE?t=10</a>

For today, think about a movie or TV show that you have recently watched. Or a book that you have read. I am interested in it, but am not sure whether it is something I would like. Write a short summary, about 4-5 sentences, telling me about the TV show, movie, or book. Your summary can be handwritten on paper, or if you have access to google classroom, please type it there.

Day 6 Math- Solve One-Step Inequalities-NEW SKILL!!! Please read notes first.

Videos to watch:

https://www.youtube.com/watch?v=nif2PKA9bXA Review on graphing inequalities and solving (watch up to 6 mins and 24 secs) -You are only required to know how to add and subtract inequalities

https://youtu.be/ueLMm5x1xoE How to solve one step inequalities

To solve inequalities you must do the inverse (opposite) operation to both sides of the inequality symbol.

#### Solving Single-Step Inequalities by Addition

#### Example:

Solve x - 6 > 14

Solution:

x - 6 > 14

x - 6 + 6 > 14 + 6

x > 20

#### Solving Single-Step Inequalities by Subtraction

Example:

Solve x + 7 < 15

Solution:

x + 7 < 15

x + 7 - 7 < 15 - 7

*x* < 8

# Solving Inequalities by using Addition and Subtraction

#### Treat them the same way as equations

x + 3 > -5

 $m-4 \ge -2$ 



#### Give it a try

$$w - 8 \ge -3$$
  
 $w - 8 \ge -3$ 

$$\begin{array}{c} w - 8 \ge -3 \\ + 8 \\ \hline w \ge 5 \end{array}$$

$$c + 6 \le -1$$

$$c + 6 \le -1$$

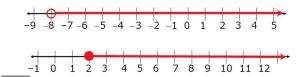
$$-6$$

$$c \le -7$$

#### Treat them the same way as equations

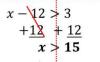
$$x + 3 > -5$$
  
 $x + 3 > -5$   
 $-3$   $-3$ 

$$m - 4 \ge -2$$
 $m - 4 \ge -2$ 
 $+ 4 + 4$ 



#### **EXAMPLE 1:**

Add 12 to both sides of equal sign
Add 3 and 12



**GRAPH:** 



#### TRY ON YOUR OWN:

1. 
$$t \to 5 < 7$$
  
  $+\frac{5}{5} + \frac{5}{2}$   
  $t < 12$ 

2.  $-11 \le b - 9 + 9 + 9 + 9 + 9 = -2 \le b$ 

Open dot, arrow points left

Closed dot, arrow points right  $-4 - 2 \quad 0$ 

#### PRACTICE TIME!

1. 
$$y + -9 \ge 5$$



2.  $8 \ge 2 + y$ 

3.

$$-2 \ge -1 + x$$

$$-5 < x + 2$$



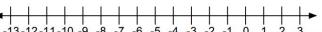


5.

$$-9 > -7 + y$$

6.

$$6 + y < -2$$





#### **History: Westward Expansion Geographic Factors**

What **geographic and economic factors** persuaded the settlers to move westward?

There were a number of **geographic factors** that led to western migration in the United States. During the early 1800s, **population growth** was a problem as the eastern states became more and more crowded. In addition, farmlands that were once fertile were being overworked and large plantations in the south were crowding out small farmers. If Americans were willing to leave their homes and move westward, **huge areas of fertile land were available at very cheap prices**. Fertile land is necessary for growing large amounts of crops. As a matter of fact, in the early 1800s, a farmer could buy 2 ½ acres of land in the western territories for only \$1.25!

Another *geographic factor* that influenced westward migration was the availability of **rivers** and man made waterways called **canals**. A canal is a man made waterway connecting two bodies of water to allow boats to travel. These waterways helped to make transportation cheaper and faster. Rivers provided an important means of transportation and communication between the eastern and western territories. Great rivers like the Ohio and the Mississippi became important migration routes for people and supplies. In addition, the newly invented **steamboat** became the main form of river transportation. Trips that once took months now took only days. Canals were built by the early settlers and connected the east to the western territories. By the early 1800s there were hundreds of miles of canals in the United States. One of the most famous was the Erie Canal located in the state of New York. It was 363 miles long and was the longest canal in the world! An additional geographic factor influencing western migration was the growing knowledge of **overland** trails. Two of these trails, or *migration routes*, were the Oregon Trail and the Santa Fe Trail. The Oregon Trail began in Missouri and ended in the Oregon Territory. Thousands of American pioneers loaded up farm wagons and Prairie Schooners with all their belongings and set out on a dangerous six month, 2,000 mile journey. They encountered treacherous river crossings, terrifying storms, jagged mountain ranges, Indians, and diseases such as cholera on their way to the fertile soil of the Oregon Territory. The Santa Fe Trail also began in Missouri. The 1,200 mile trail that ended in New Mexico took about 8 weeks to travel. This journey was also a test of strength and endurance as the pioneers faced shortages of food and water, dangerous weather conditions, Indian raids, and bandits.

#### 1. What were the three geographic factors for westward expansion?

- 2. Explain what was happening to the population during the 1800's.
- 3. Why did people in the US want to leave their small farms for the west? What was available?
- 4. What are the two benefits of canals? What is the largest canal in the US?
- 5. Compare and contrast the Oregon Trail and the Santa Fe Trail with complete sentences.

#### Day 6 Science

Clouds are found at various levels within the troposphere and are important indicators of atmospheric conditions. Three major types of clouds are **cumulus**, **stratus**, **cumulonimbus**, and **cirrus**.

First, let's talk about **cumulus** clouds. These clouds are fair weather clouds and are formed within two kilometers of the Earth's surface. They are fluffy and white with flat bottoms and look like big cotton balls in the sky. They are always changing shape and have very large spaces of clear blue sky between them. Precipitation does not usually fall from cumulus clouds.

Another kind of cumulus cloud is called a **cumulonimbus**. This kind of cloud is formed by cumulus clouds that join together. This type of cloud keeps growing until it becomes so full of moisture, it turns dark and heavy. Cumulonimbus clouds are foul weather clouds and often bring thunderstorms with heavy rains, thunder, and lightning.

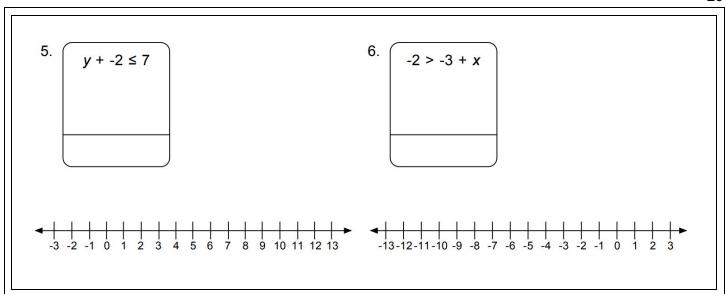
Another foul weather cloud is the **stratus**. Like cumulus clouds, stratus clouds form nearer to the Earth's surface. They are smooth, gray clouds that cover the whole sky like a blanket. This kind of cloud can stretch for hundreds of miles and can produce drizzle, rain, or snow.

Another fair weather cloud is the **cirrus** cloud. Cirrus clouds are feathery and look like commas or wisps of hair high in the sky. They form higher in the troposphere and are made from tiny ice crystals instead of water droplets like other clouds. No precipitation falls from cirrus clouds. Even though they are fair weather clouds, they often indicate that stormy weather is on the way.

Activity: Draw an image for each type of cloud. Next, go outside and see if you can identify any of the clouds!

	24
Day 7, Tuesday, April 28th	
English: Summarizing	
Can you complete these summarizing challenges? Rea Then, create a fun hashtag that also summarizes the peach paragraph, and the hashtag. Or, please complete	aragraph. Write the summary underneath
Summarize this paragraph in twelve words or less.	Summary:
If you didn't have bones, you would be more like a beanbag than a person. Your bones have two main purposes. First, they give your body structure so you can stand and move. Second, they protect soft organs like your heart and your lungs. When you grow up, your body will have 20b bones to do these jobs.	Hashtag:
Summarize this paragraph in twelve words or less.	Summary:
You probably know that seahorses are not really horses. In fact, a seahorse is a type of fish. Unlike most other fish, seahorses are not good swimmers. Instead of swimming, they spend most of their time anchored to sea grass or coral by their tails. From this position, they can use their long snouts to suck up plankton and other small bits of food.	Hashtag:
Summarize this paragraph 1	Summary:
	24

	25
<del></del>	
Hashtag:	
Day 7 Math	
Here's another video to help with solving and graphing inequalities. <a href="https://www.youtube.com/watch?v=smX2wkIUPvQ">https://www.youtube.com/watch?v=smX2wkIUPvQ</a>	
PRACTICE TIME!	
FRACTICE TIME:	
1. $x + 8 > -3$ 2. $-6 < x + -1$	
-15 -14 -13 -12 -11 -10 -9 -8 -7 -6 -5 -4 -3 -13-12-11-10 -9 -8 -7 -6 -5 -4 -3 -2 -1 0 1 2 3	
3. $y + -5 \ge -4$ 4. $-2 + x \le -3$	
-4 -3 -2 -1 0 1 2 3 4 5 6 7 8 9 10 11 12 -13-12-11-10 -9 -8 -7 -6 -5 -4 -3 -2 -1 0 1 2 3	•



#### Day 7 History

There were also a number of **economic factors** that led to western migration in the United States. New territories in the West made more land available for **agriculture**. Farmers of all types began to leave the rocky soil of the Northeast and the overworked soil of the South in search of rich farmland in the new territories. Farmland was easy to get and very cheap. Some land was even free. If a farmer built a house and cleared the brush, he could claim the land as his! As word spread, more men and women left their homes to take advantage of this rich interior land of the growing nation.

In addition to cheap and plentiful farmland, the **availability of timberland** was also an economic factor that influenced westward movement. As more and more settlers moved west, they needed timber for their homes, businesses, and towns. As a result, commercial logging companies began to prosper in the Northwest Territories where forests of towering trees covered the land. The harvesting of timber was called **logging**. It quickly became the top manufacturing industry in the west.

Another economic factor that influenced westward expansion was the **discovery of gold** in California. In 1847 during the construction of a sawmill, gold nuggets were found in a nearby river bed. By 1849 the **California Gold Rush** had begun and gold fever spread quickly across the continent. More than 80,000 "forty-niners" charged west in search of riches and new lives.

Slaves seeking freedom also ventured into the western territories in search of a better life. The growth of trade on major rivers, such as the Ohio and Mississippi, provided opportunities for escape. **Runaway slaves** posed as free men or hid themselves on steamboats as they traveled west.

- 1. How did westward expansion impact slavery?
- 2. How might logging impact the environment? Explain.
- 3. Do you think everyone found gold who was looking for it? Explain.

#### **Day 7 Science: Precipitation**

**Precipitation** is any form of water that falls from the atmosphere to the Earth's surface. There are several different kinds of precipitation. They include rain, snow, sleet, and hail.

When the condensed water particles that make up a cloud become too large and heavy to be suspended in the air, they fall to the ground as precipitation. **Rain** is the most common form of precipitation. It falls in the form of liquid drops of water.

Sometimes the water particles in clouds freeze high in the atmosphere and form ice crystals. These ice crystals attach to each other and become heavier. Before long, they weigh too much, and fall to the ground as **snow**.

If raindrops fall through air that is below freezing, they will freeze into tiny particles of ice. These small ice particles are called **sleet**.

Another kind of precipitation formed by ice particles is called **hail**. Hail is formed when raindrops are frozen inside a storm cloud. The winds produced by the storm cause the frozen ice crystals to rise and fall, melt and freeze, over and over again. This melting and freezing causes layers of ice to form around the original tiny ice particles. After many layers of ice have formed, they become too heavy and fall to the ground. Hailstones can range from the size of a pea to the size of a golf ball or larger! In 1928, a hailstone that measured 5 ½ inches across fell in Nebraska! Ouch!

**Activity:** Think of a nursery rhyme tune such as *Row Row Row Your Boat, Mary Had a Little Lamb, London Bridge is Falling Down*, etc.) and create a song about precipitation. You can write down the song, record yourself singing it and email it to your science teacher, or submit in Google Classroom.

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# Day 8, Wednesday, April 29th

English: Plot Structure
Watch this story on youtube: <a href="https://youtu.be/Clpw7PG7m1Q">https://youtu.be/Clpw7PG7m1Q</a> "The Dot" by Peter H. Reynolds (If you do not have access to watch this video, answer these questions about the story of Cinderella. Place Cinderella's name where you see the name Vashti)
Answer the questions below or on google classroom:
What is one word you would use to describe Vashti in the beginning of the story?
What is one word you would use to describe Vashti at the end of the story?
What caused Vashti to change from the beginning of the story to the end of the story?
What is the theme of this story? (Lesson learned)
Was this an internal (inside Vashti's head) or external (a problem with Vashti and something or someone else) conflict? Explain.
Day 8 Math
PRACTICE TIME!

1. -6 < x + 9

2. 8 < 5 + x

47 46 45 44 42 42 44 40 0 8 7 6 5

-5 -4 -3 -2 -1 0 1 2 3 4 5 6 7 8 9 10 11

3. (-3 > x + -5)

-3 > x + -5

 $4. \qquad 4 + x < 4$ 



12 12 11 10 0 9 7 6 5 4 2 2 1 0 1 2 2

5.  $y + -9 \ge -5$ 

6.

 $-6+y\geq 6$ 





**History-Inventions** 

One important invention was the **cotton gin,** a machine invented by **Eli Whitney**. During the early 1800s, southern planters were desperate to make cotton a profitable crop. The production of cotton was slow work because the sticky green seeds of the cotton plant had to be removed by hand. The cotton gin quickly removed the seeds from the cotton plant. It increased the production of cotton but it also increased the need for slaves to grow and pick the cotton. Cotton soon became the most important crop in the South. By 1845 the United States was producing most of the world's cotton.

Another important invention was the **reaper**, a horse-pulled machine that cut wheat. **Jo Anderson**, a slave, and **Cyrus McCormick** worked to invent the reaper. McCormick, who was an entrepreneur, brought the reaper to market. Before the invention of the reaper, farmers had to cut their crops by hand. The reaper could cut five times more wheat as a farmer could cut by hand. This machine helped farmers raise more wheat with fewer workers. It greatly increased the productivity of the American farmer.

Activity: Answer the following questions in complete sentences.

- 1. How did the cotton gin impact life during this time period?
- 2. How did the reaper impact life during this time period?
- 3. What is the impact of the cotton gin and reaper on westward expansion? Would farmers want to west? Why or why not?

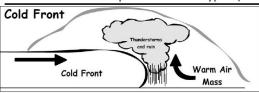
#### Science: Read the paragraphs and answer the questions below the notes page.

Weather maps are important for understanding and predicting weather. They show much useful information about descriptive air measurements, observations, and boundaries between air masses called **fronts**.

As the air in the atmosphere is heated at the equator and cooled at the poles, it forms air masses. An air mass is a huge body of air that has similar temperatures, air pressures, and humidity throughout. Some air masses can be cold and wet while others can be hot and dry. Sometimes two air masses of different temperatures, air pressures, and humidity collide. When this happens a **front** is formed.

#### Weather Fronts: Introduction

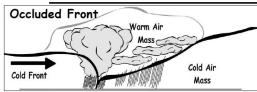
Instructions: Read through the Weather Front descriptions. Then complete the "What Type" questions at bottom of page.



A Cold Front moves faster than a warm air mass. The warm humid air is pushed up and results in a short period of heavy rain and possibly violent thunderstorms.

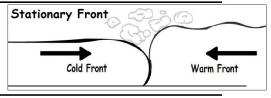
A Warm Front moves slower than a cold air mass. The warm raises steadily above the cooler air mass and causes gentle rain showers for longer periods of time.





An Occluded Front is a combination of two fronts that form when a cold front catches up and overtakes a warm front. The result is a mix of rain showers and thunderstorms.

A Stationary Front is the boundary between two air masses when neither is moving. Clear skies to partly cloudy skies may result, with occasional light rain.



What Type?

Cold Front

Warm Front Occluded Front Stationary Front

- 1- What type of front produces gentle rain showers?
- 2- What type of front involves 3 different air masses?
- 3- What type of front may have clear skies? \_\_\_
- 4- What type of front creates violent thunderstorms?
- 5- What type of front is stalled or still?
- 6- What type of front has rain showers and thunderstorms?

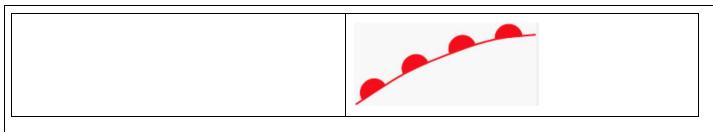
#### **Cold Front Weather**

**Warm Front Weather** 

If the warm air is humid, clouds will form and heavy rain, thunderstorms, or snow may result. If the warm air is dry, a cold front will only bring cloudy skies. Clear skies and cooler temperatures usually follow cold fronts.

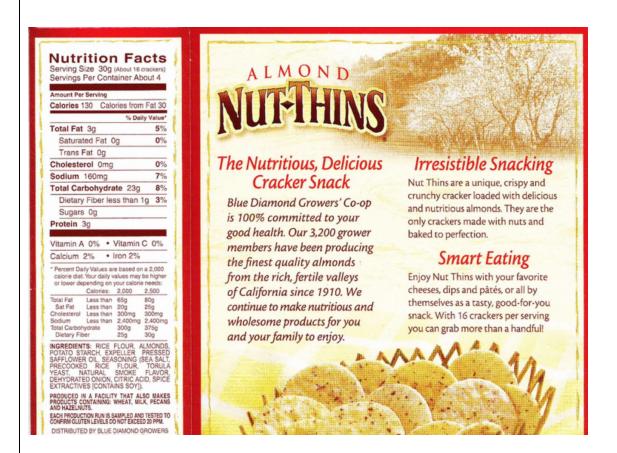
If the warm air is humid, it will produce light rain. Scattered clouds will result if the warm air mass is dry. Warm and humid conditions often follow a warm front.





# Day 9, Thursday, April 30th

**English** 



In the chart below identify three facts and three opinions that you found in the advertisement above.

Then prove you're accurate by providing an explanation for why you chose your facts and opinions. Please complete below or on google classroom.

Example from Advertisement	Fact or Opinion?	Explanation

Math Day 9

#### PRACTICE TIME!

1) Which option best shows X > -16



- B. <del>-19 -18 -17 -16 -15 -14 -13</del> -13 -14 -13
- C. ◆ 19 -18 -17 -16 -15 -14 -13

2) Which option best shows  $X \ge -11$ 



3) Which option best shows  $X \le -18$ 



-20 -19 -18 -17 -16

4) Which option best shows X > -19

-22 -21 -20 -19 -18 -17 -16

5) Which option best shows X < -15

6) Which option best shows  $X \le 13$ 

D. 4 1 12 13 14 15 16

7) Which option best shows X > -18

8) Which option best shows X < -6

-9 -8 -7 -6 -5 -4 -3

#### **History: Inventions**

As the country expanded, new and better methods of transportation were needed. During the early 1800s, travel on the major rivers in America was mainly done on beautiful sailing ships called *sloops*. This changed, however, after the **steamboat** was improved by another entrepreneur, **Robert Fulton**. The larger, faster steamboats soon connected Southern plantations and farms with the industries of the Northern states and the expanding Western territories.

Just as the steamboat provided faster water transportation, the invention of the **steam locomotive** provided faster land transportation. Moving at speeds of up to 12 miles per hour, the steam locomotive traveled more quickly than canal boats and horse-drawn wagons. Within a few years it became the leading form of long-distance transportation. By the mid-1800s, steam locomotives carried freight and passengers across the country connecting the eastern states with the western territories.

Activity: Answer the following questions in complete sentences.

- 1. What was the impact of the steamboat on people's daily life?
- 2. What was the impact of the steam locomotive on people's daily life?
- 3. How did the steam boat and steam locomotive impact westward expansion?

#### Science Day 9

In addition to cold and warm fronts, weather maps also show areas of high and low pressure. Cold air masses are **areas of high air pressure** due to the dense, heavy, cold air that forms them. Warm air masses consist of less dense, lighter, warm air and are thus **areas of low air pressure**. On a weather map, areas of high pressure are marked with an  $\boldsymbol{H}$  and areas of low pressure are marked with an  $\boldsymbol{L}$ .

Some weather maps also have curved lines called isobars and isotherms (the curved lines showing areas of equal air pressure and temperature are key features of weather maps). Isobars connect areas on the map that are experiencing the same air pressure. Isotherms connect areas with the same temperature.

Activity: Come up with a mnemonic or memory tip (which is just a silly phrase or saying to help remember a piece of information) about high pressure and low pressure.

Example of a mnemonic:

To remember the order of the planets from the sun: My Very Excellent Mother Just Served Us Nachos

Be as creative as you can!

# Day 10, Friday, May 1st

#### **English: Context Clues**

Look at the sentences below. Determine the meaning of the underlined words in the sentences by using context clues within the sentences. Remember to closely read the entire sentence and to look at all of the words in the sentences around it to help identify the meaning of the underlined words. Be careful, some of these words have multiple definitions, so be sure to say the right one! Please complete below or on google classroom.

1. Mr. Smith is so **affable**. He actually reminds me of Mrs. Luna. Do you remember how kind she was to us?

What was the meaning of the word? What were the words in the sentence that helped you determine the meaning of the word?

2. The detective searched the crime scene. This detective was known to be incredible at his job, but he still could not find a **trace** of evidence! It was as if the burglar hadn't been there at all.

What was the meaning of the word? What were the words in the sentence that helped you determine the meaning of the word?

3. Jamal is a professional antique collector. He takes great pride in his work, and he only accepts the absolute best. When he is hunting for his next antique, he only accepts antiques that are in **mint** condition.

What was the meaning of the word? What were the words in the sentence that helped you determine the meaning of the word?

4. Our teacher always lets us vote on the book we are going to be reading together as a class. The vote is never **unanimous** because it is so hard for us to decide on the same book!

What was the meaning of the word? What were the words in the sentence that helped you determine the meaning of the word?

5. My little sister is so **oblivious** to what is happening in the world. She hasn't even heard of Tiktok, the CoronaVirus, or VSCO girls. It's like she doesn't pay attention to anything!

What was the meaning of the word? What were the words in the sentence that helped you determine the meaning of the word?

#### Math

#### PRACTICE TIME!

1. Joey is a member of the football team. He works out at least 4 hours each week to stay in shape. Write an inequality to represent this situation and graph the solution.

Algebraic Inequality:



2. Solve the one-step linear inequality.

$$3 + x < 5$$

A. 
$$x < 8$$

B. 
$$x < 2$$

C. 
$$x > 8$$

D. 
$$x>2$$

3. Identify two inequality statements that represent the graph below.



n < 15	n > 15	n ≤15	n≥15
15 < n	15 > n	15 ≤ n	15≥n

4. Select all of the numerical values that would make the inequality statement true.

$$a - 8 < -12$$

4	-3	-7
-5	0	-4

5. What is the solution to  $10 \le p-4$ ?

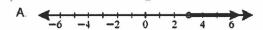
A. 
$$6 \ge p$$

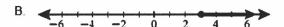
B. 
$$14 \ge p$$

C. 
$$14 \le p$$

D. 
$$6 \le p$$

6. Which number line represents all solutions to the inequality  $x \le 3$ ?

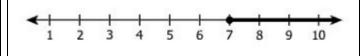




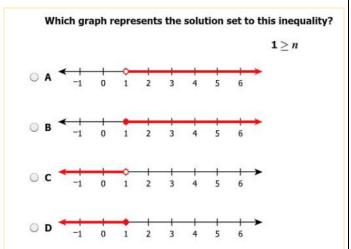




Which number sentence can be used to represent all the values of *n* shown on this graph?



- $\bigcirc$  A n > 7
- $\bigcirc$  B  $n \ge 7$
- C n < 7
- D n ≤ 7



#### **History: Inventors and Entrepreneurs**

During the early 1800s the United States grew and changed. Many of the changes were due to the **inventors** and **entrepreneurs** of the time. An *inventor* is the first person to think of or make something. An *entrepreneur* is someone who brings a new or improved good or service to market with the hope of earning a profit. Many new inventions were having an effect on the way people were able to live, work and travel.

Activity: Create an invention that we could use today! Answer the following questions in complete sentences to help guide on your creation.

What is the problem you are trying to fix? Why does it need to be fixed?

Who is the invention for?

What is your invention? (Name) What does your invention do?

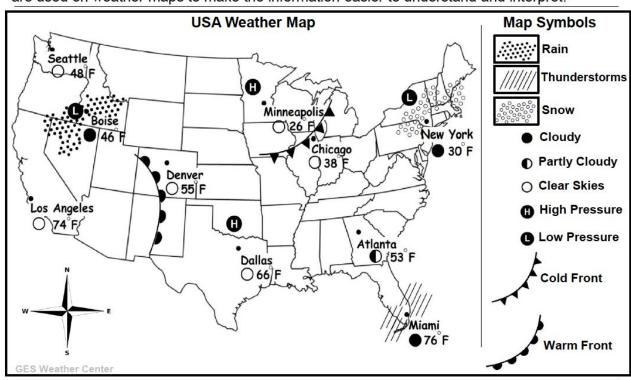
Draw an image of your invention.

#### **Science Day 10: Weather Map**

# Weather Maps I: Weather Conditions Name\_

Read the information below. Then use the weather map and symbols to complete the "Which City" at the bottom of the page.

Weather Maps are a tool used by meteorologists to forecast the weather. Using symbols, colors, and numbers, weather maps show important information that a meteorologist can use to make a weather prediction. A current weather map can show current temperatures, cloud cover, rain or snow showers, High and Low pressures and weather fronts. Different symbols are used on weather maps to make the information easier to understand and interpret.



Complete the "Which City " questions below:  Atlanta – Boise – Chicago – Dallas – Denver – Los Angeles – Miami – Minneapolis – New Yo	rk – Seattle
1 - Which city is having <i>Thunderstorms</i> ?	
2 - Which city is currently having Snow?	
3 - Which city has the highest temperature on the map?	_
4 - Which city has the lowest temperature on the map?	
5 - Which city has Partly Cloudy skies?	
6 - Which two cities are closest to High Pressure?	
7 - Which city is very close to a Warm Front?	
8 - Which city has cloudy skies and Rain?	
Geo-Earth Sciences Geology, Geography, and Georestry by Guelf Underderine, Attivities, and Life	GES - Activity