Kingsborough Community College
2001 Oriental Blvd.
Brooklyn, New York 11235

TASC HSE51/ GED (Testing and Placement)
Lesson # 2

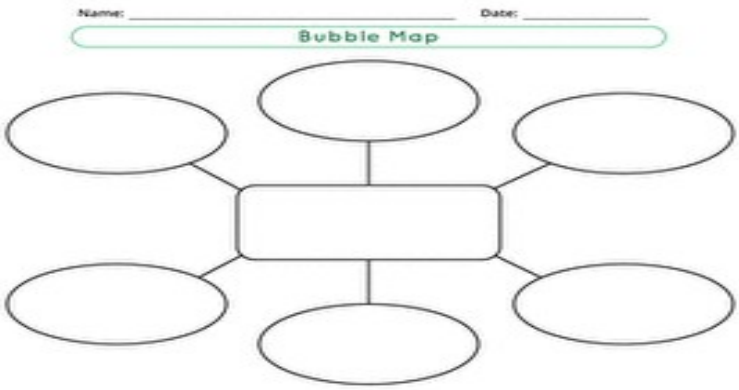
Subject: Reading/Writing
Topic: Unpack your Writing Prompt (146, 152 – 157)

Writing prompt is a topic in which writers begin to jot ideas; that later will form a complete paragraph, or good piece of writing.

Steps to follow when wring an Essay are the five (5) Steps of Writing.

- Pre-writing – Brainstorm the topic, and write brief words or phrases
- Draft – Write what you know about the topic, and begin writing simple sentences (1st copy)
- Proofreading – Begin to write your first paragraph. Check your work, make sure that the writing flows, that it is clear, check spelling, grammar, add or omit information
  Check the order of your writing (does it follow a sequence)
  Introduction (Thesis Statement)
  Supporting Details (evidence in favor or against)
  Closure – Wrap up of your topic in general/argument
- Revising your work – re-read your work again. Have someone check your work and correct mistakes if any.
- Publishing – Final copy with no errors

Example: Brainstorm Bubble Map



Note: Use the five "W's" (what, when, where, who and why?) This helps with the beginning of your first draft.

Remember to write all what you know. Keep it real, facts, and to the point. Always stay focus on the topic.

Thesis Statement – states a brief summary of your topic/explanation (Expository/Facts- essay)
(Persuasive/Opinion/Argument)
(Descriptive – use of senses)

Supporting Details – Is where the writer provides sufficient details, proof/evidence, explaining the main idea (argument/opinion)

Hints:

If you are asked to read and write two types of essays and both are different, it indicates that you are about to write an essay comparing both and writing the difference between both. In this case you must include transitional words. It will make your writing smoother and build coherent relation with the text. This way it does not jump or break your ideas.

Transitional words are:

Subject: Science (Life Science)

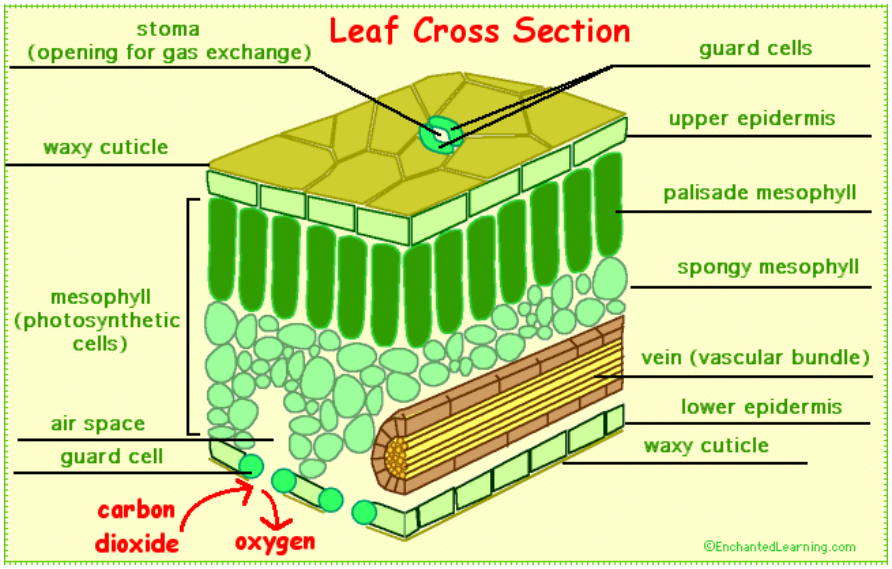
Pages (518 - 521)

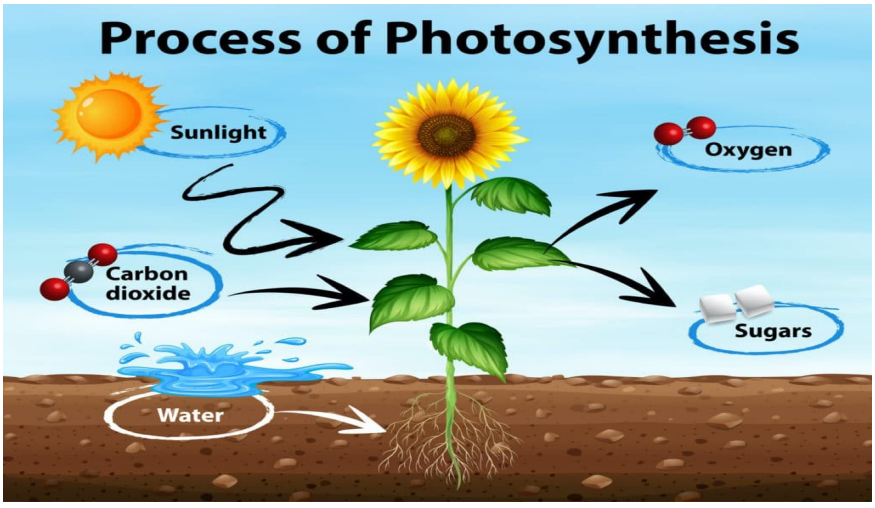
Topic: Cell Process (Plant Cell/Photosynthesis & Respiration)

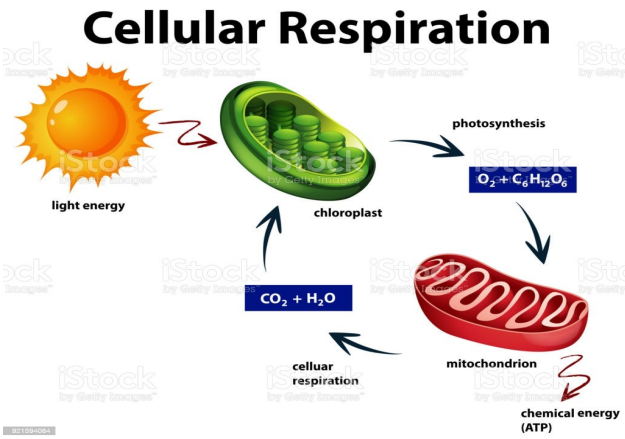
Background information – Is the process in which plants and chlorophyll (green pigmentation found in plants) that traps the lights energy and sugar begins to produce. Photosynthesis only occurs in cells with chloroplasts.

Example: carrots, onions garlic, beets, potatoes, etc.

Light – Electron – A chemical reaction occurs. From that reaction Carbon with Hydrogen ions from water (NAPDPH + H) The energetic carbohydrates that contain glucose from carbon dioxide. Sugar leaves plants from the stomata. Oxygen begins to break and H is produced when water splits. Sugar is created in the form of glucose and stores energy.







Importance of Photosynthesis

- Produce food
- Uses carbon dioxide to release energy
- Humans and organisms need oxygen to stay alive
- 90% of the oxygen entering the atmosphere in the result of photosynthesis

Respiration – Is a series of chemical reactions that breakdown molecules (group of atoms bonded together) and releases energy.
There are two types:

- Aerobic – goes into the mitochondria (gives energy)
- Anaerobic – enables the production of energy when there is a lack of oxygen supply in the body

Example: alcohol (fermentation)
lactic acid (converts glucose into energy)
When we lack this in our body we will suffer from:

- muscle pain
- fatigue
- breathing problems

Importance of Respiration

- Food contain energy used by cells
- Change food into a form of energy
- Energy produced by respiration to transport – sugar to the stomata, where seeds sprout from the reproduction stored where food is in need.

How do plants respond? (Stimulus)

- Light
- Touch
- Gravity

Some respond fast, while others respond slow.

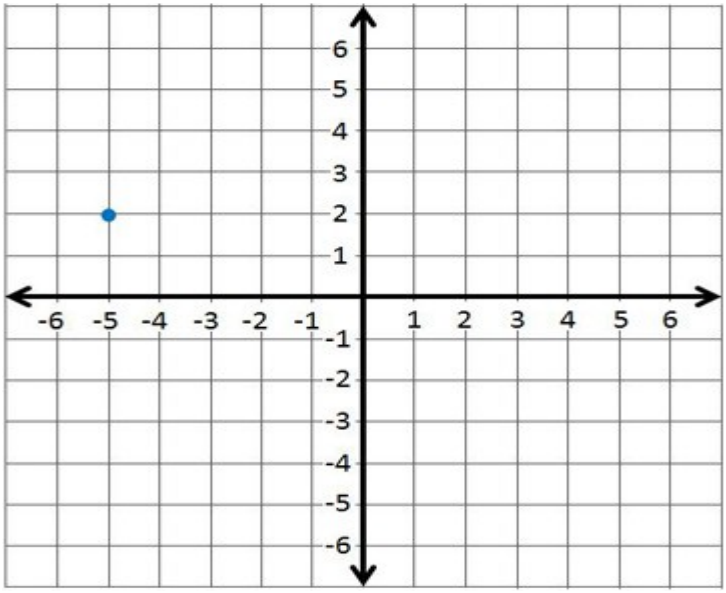
Subject: Mathematics (364)

Topics: Coordinate Plane, Relation & Functions
Graphing Linear Equations, and Graphing using (x and y Intercept)
Slope of a Line
Algebraic Expressions

Definition- Coordinate Plane is used to plot point in a graph. It is an important part of Algebra.

Rules to Remember: (Hints)

- x-axis is horizontal (abscissa)
- y-axis is vertical (ordinate)
- The point where x-axis and y a-xis intersect is called the origin.
- The first # of ordered pair is the x-axis/x-coordinate and the second number is called the y-axis/y-coordinate



Example: (-5,2) (0,2)

The graph would be a line.Relation & Function – the are similar, but it is important to tell them apart.

Hints: **Relation** is a set ordered pairs.

- The x-axis is called the **domain.**
- The y-axis is called the **range.**
- A **function** is a special relation of value x paired with value y.
- Graphing the relation makes it easy to tell whether there is or not a relation.
- If the vertical line can intersect at two or more points, it is not a function, but if it intersects at one point, then it is a function.

Example: **R = {(2,3), (3,4), (4,5), (6,7)}**

The domain is {2,3,4,6} the 1st number (all value x)
The range is {3,4,5,7} (all the y values)

R is a function because each x -value is paired with exactly one y-value.

D = {(0,3), (2,1), (3,0), (2,-2) } (all the x-values)

The domain is {0,2,3, 2} (all the x-values)
The range is {-2,0,1,3} (all the y-values)

D is not a function because 2, an x-value, is paired with two y-values, 1 and -2. There has been an intersection of two points.

Graphing Linear Equations – A linear equation is **always** a straight line. In a linear equation there are always two **variables,** each to the **first power.** The standard linear equation is **ax + by = c,** where a,b, and c are integers and a an b are not both zero. Linear equation has an infinite number of solutions, to make a graph.

Hints to Remember:

- First, select four values for x.
- Second, find the values for y by **substituting** each x-value into the original equation.
- Third, plot the points and connect them with a line.
- To make an accurate (close) graph, use graph paper when doing your work.

Example: $y = x + 3$

x	y	
0	3	(0,3)
1	4	(1,4)
2	5	(2,5)
4	7	(4,7)

Exercise Practice. Graph the following linear equations. (Select 4 for x and 4 for y.)Then connect the points.

1. $y = 2x + 1$
2. $y = 2x - 1$
3. $y = \frac{x}{2} + 2$

Graphing Linear Equations Using x and y Intercepts.

To graph a linear equation by finding x and y intercepts, is the same where lines intersect.
Remember:

- Find x-intercept, let y = 0, and solve x.

- Second, to find the y -intercept, let x = 0, and solve y.
- Third connect the two intercepts with a line
- Use graph paper to show your work.

Example: **Graph x = 3** **Graph y = 2**

Finding the x and y intercepts for the equation 2x + 4 y = 8

Finding the x-intercept.

2x + 4y = 8
2x + 4(0) = 8
2x = 8 8/2 = 4
x = 4

Finding the y-intercept.

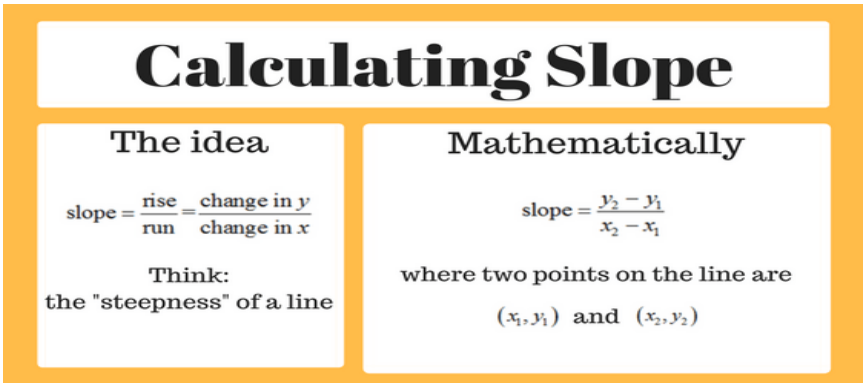
2x + 4y = 8
2(0) + 4y = 8
4y = 8 8/4
y = 2

(4,2)

Slope of a Line (368 – 369)

Definition- Means how deep/steep the line is. Slope is the **ratio** of the **rise** to the **run.**

Formula for Slope:



Example: slope = $\frac{y2 - y1}{x2 - x1}$

(1, 5) (6, 9)

Slope = $\frac{9 - 5}{6 - 1}$

= 4/5

The run is 5 and the rise is 4.

Example 2. (2, 3) (5, 4)

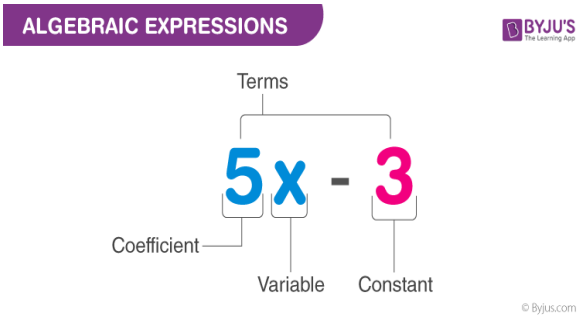
$$\text{Slope} = \frac{4 - 3}{5 - 2}$$

$$= 1/3$$

The run is 3 and the rise is 1.

Algebraic Expressions

Definition – Is to substitute a letter for a number, in order to solve a mathematical equation.



Example: $3x + 1 = 13$
$3(4) + 1 = 13$
$x = 4$

$7c - 6 = 50$
$7(8) - 6 = 50$
$56 - 6 = 50$
$c = 8$

$\frac{a}{14} + 10 = 12$
$28 / 14 = 2 + 10 = 12$
$a = 28$

$10x - 13 = 37$
$10(5) - 13 = 37$
$50 - 13 = 37$
$x = 5$

Reading & Social Studies

Civil War & Reconstruction (440 - 441)

Summary:

Civil War is a war between people/citizens. The Civil War was between the North and the South. The North believed in the following:

- Expansion
- Industrialization
- Technology
- Building with the use of Iron (railroads)
- Monetary Progress – Investing
- Steamboats
- etc.

South (Confederates)

Like their land and keeping agriculture as their main source of income. But with this came the abuse of having slaves work the land for:

- Crops – Cotton
- Plantation
- Working as maids
- Taking care of the owner's children

There was a time where saves were in both regions, but it was abolished 1800s in the North, but the South kept the tradition of owning slaves. The caused a major problem between both (North and South) that end to the Civil War.

Main Causes of the Civil War:

- Economy
- Slavery
- State Rights
- Expansion
- Succession of South with the Union
- Election of Abraham Lincoln

Result:

- There were many wars fought
- The North won over the South
- Abraham Lincoln won the election
- President Lincoln declared the Emancipation Proclamation – giving the rights and freedom to slaves

  Gain of territory/ land to expand
  - Trail of Tears – Natives pushed out of their land
  - Assassination of Abraham Lincoln