## Worksheet Number (3)

	Grade & Section: 6 <sup>th</sup> ( )	Unit: 1		
Student's Name:		Date: _	//	
	<b>Lesson: Atoms</b> (pages 22 + 23)			
<b>Educational Out</b>	tcome: Identify the atom's parts			

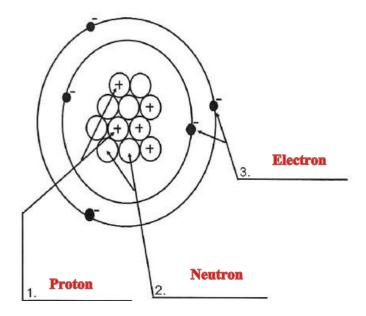
## Atom is the smallest particle of an element that has the properties of the element.

## **Activity 1:**

## Watch the video then answer the following questions:

https://www.youtube.com/watch?v=ajg07Dnc1BQ

Label the parts of an atom on the diagram below.



4. What type of charge does a proton have?

#### **Positive**

5. What type of charge does a neutron have?

#### No charge

6. What type of charge does an electron have?

#### Negative

7. Which two subatomic particles are located in the nucleus of an atom?

**Proton and Neutron** 

#### **Activity 2:**

Complete the following table to compare between proton, electron and neutron

	Proton	electron	neutron
Location	Inside nucleus	Outside nucleus	Inside nucleus
Charge	Positive	Negative	No charge

The atomic number: is the number of protons in an atom

## **Activity 1:**

## Fill in the blank

The atomic number tells you the number of <u>Proton</u> in one atom of an element. It also tells you the number of <u>electron</u> in a neutral atom of that element.

No two different elements will have the <u>same</u> atomic number.

# Activity 2: look at the following figure and answer the following

					18 <b>VIII</b> A
13	14	15	16	17	2
IIIA	IVA	VA	VIA	VIIA	<b>He</b>
5 <b>B</b> 10.811	6 <b>C</b> 12.0112	7 <b>N</b> 14.0067	8 <b>O</b> 15.9994	9 <b>F</b> 18.9984	4.0026 10 <b>Ne</b> 20.179
13	14	1 <i>5</i>	16	17	18
<b>Al</b>	<b>Si</b>	<b>P</b>	<b>S</b>	<b>Cl</b>	<b>Ar</b>
26.9815	28.086	30.9738	32.064	35.453	39.948
31	32	33	34	35	36
<b>Ga</b>	<b>Ge</b>	<b>As</b>	<b>Se</b>	<b>Br</b>	<b>Kr</b>
65.37	72.59	74.9216	78.96	79.909	83.80

a. Give the symbol and number of protons in one atom of:

Helium : He 2 Nitrogen: N 7

Neon: Ne 10 Oxygen: O 8

- b. How many electrons are found in a Chlorine atom? 17
- c. True or false
  - 1. Electrons dart around the nucleus in high-speed motion (very fast). True
  - 2. Atoms of an element can have different numbers of neutron. True
- d. Explain helium-filled ballon rises through the air.

**Because helium is light** 

