Effecting of global water purification processes, humans activities and some facts on human's health and on different environments types of the world.

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### **Abstract:**

Iraq use aluminum sulfate salt  $(Al_2(SO_4)_3.16H_2O)$  for water purification process instead of potassium alum  $(KAl(SO_4)_2.12H_2O)$ . This salt give two ions when it is hydrolyze in water molecules  $(2Al^{+3}$  and  $3SO_4^{-2})$ . Atomic absorption technique indicates that Iraqi tap water contain about (1.89 - 2.1 mg/L) of free aluminum ion  $(Al^{+3})$ .

However, Iraqi people (35 millions) are use above tap water (350 - 400L/day) and return it again to Iraqi two rivers. These rivers transfer aluminum ion (24.5-28 tons/day) with additional other three products that producing from Iraqi water purification stations. These products are about; (130.76-149 tons/day) of sulfate ion  $(SO_4^{-2})$ , (73.5-84 tons/day) to (4961.25 tons/day) of chloride ion (Cl<sup>-</sup>) and hydrogen ion (H<sup>+</sup>) is same as chloride ion. These ions transfer with Aluminum poison ion continuously every day to Arab's gulf. Irag's rivers provided Arab's gulf of three ions one of them is free aluminum poison (Al<sup>+3</sup>). Arab's gulf transfer above ions to other seas and oceans. However, There are another sources for aluminum and other ions over the world. Therefore overall ions that produce continually each day and reach seas and oceans in addition to Iraqi ions are; (149.5-153 tons/day) of Aluminum ion, (20653.5 – 25541.25 tons/day) of Chloride ion, (7125 tons/day) of Potassium ion, (10530 tons/day) of Sodium ion, (880.76 – 899 tons/day) of Sulfate ion, finally (4573.59 -7859.84 tons/day) of Hydrogen ion (acidity).

These ions are throw each day in seas and oceans and they should effect all creatures, one of them is most important organism "algae". In fact, above ions are effected different environments of the world not just water's plants or animals. However, Aluminum ion can ascend with water molecules to form clouds (its amount in clouds = 7-9 mg/L). This means aluminum poison able to spread with air molecules in everywhere in this earth. This means aluminum ion can use water or air for transferring to every place in the world. In addition to above ions effect, aluminum ion is a dangerous poison for human, animals and plants (1-14).

Furthermore, this research predict how all creatures on this earth may disappear "The End" in the next few years unless all people cooperate each other for saving this earth. This may exactly like what happened for dinosaurs before millions years "the end of dinosaurs". In addition, this research suggested the only solution humans have for saving our planet.

**Key words**: Iraq water stations, the world water stations, Aluminum, Sulfate, Chloride, Urine, Potassium alum, the end, Dinosaurs, saving the earth.

## 1. Introduction:

Potassium alum is one of the well known compounds. it is doubled salts compounds, it is one of few likes' compounds which have two positive ions one of them is (+1) while the other is (+3), examples of above salts are (+3):

- 1. Potassium alum,  $K_2SO_4$ .  $Al_2(SO_4)_3$ .  $24H_2O$ .
- 2. Ferric alum, K<sub>2</sub>SO<sub>4</sub>. Fe<sub>2</sub>(SO<sub>4</sub>)<sub>3</sub>.24H<sub>2</sub>O.
- 3.Soda alum, Na<sub>2</sub>SO<sub>4</sub>.Al<sub>2</sub>(SO<sub>4</sub>)<sub>3</sub>. 24H<sub>2</sub>O.
- 4. Chrome alum,  $K_2SO_4$ .  $Cr_2(SO_4)_3$ . 24  $H_2O$ .
- 5. Ammonium alum, NH<sub>4</sub>Al(SO<sub>4</sub>)<sub>2</sub>.12H<sub>2</sub>O.

For unknown reasons Iraq use aluminum sulfate  $(Al_2(SO_4)_3.16H_2O)$  instead of doubled salt potassium alum  $(KAl(SO_4)2.12H_2O)$  in water purification process. Aluminum salt is differ than doubled salt, it is neutral salt gives its components  $(2Al^{+3}$  and  $3SO_4^{-2})$  when it is hydrolyze in water as same as NaCl salt. Aluminum ion is a poison highly effecting ion for all living systems; human, animals and plants (1-14).

## 2. Materials and Methods:

As mentioned before, Iraq use Aluminum salt  $(Al_2(SO_4)_3.16H_2O)$  in water purification process in addition to chlorine gas  $(Cl_2)$ . These molecules give four products when they hydrolyzing in water molecules. Many samples were collected from many Iraqi cities for calculating concentration of aluminum ion which was calculated by using atomic absorption apparatus. However, concentration of sulfate ion was calculated depending on equation of aluminum salt hydrolyzing reaction in addition to my colleagues calculations which they calculated sulfate ion and chloride ion for them research<sup>(16)</sup>.

The last product "hydrogen ion" was calculated depending on chloride ion concentration and depending on water stations employees.

All Iraqi water stations are using same materials for water purification process, aluminum salt (Al<sub>2</sub>(SO<sub>4</sub>)<sub>3</sub>.16H<sub>2</sub>O) and chlorine gas (Cl<sub>2</sub>) and also they use same techniques. Therefore, these stations should be produced same products of above four ions (Al<sup>+3</sup>, SO<sub>4</sub><sup>-2</sup>, Cl<sup>-</sup>, H<sup>+</sup>). However, according to atomic absorption techniques of some rain samples, Iraq rains contain about (7-9 mg/L) of aluminum ion.

## 3. Results and Discussion:

According to atomic absorption technique, Iraqi tap water contain about (1.89-2.1 mg/L) of aluminum ion and also depending on my colleagues research it is contain about (360-396 mg/L) of chloride ion. According to aluminum salt reaction and chlorine gas reaction, sulfate ion and hydrogen ion was calculated. However, all above concentrations are not constant for 12 months (year) because that employees of water stations are not add equal amounts of aluminum salt or chlorine gas during each year from 1996 until now. However, according to my colleagues total dissolve salts is about (553 mg/L) which lead that each Iraqi person produce salts about (6774.25-7742 tons/day)<sup>(16)</sup>.

However, depending on specialists colleagues, many species were disappeared from Iraqi rivers furthermore ratios of some species are decreasing in Iraqi rivers. Amounts of fishes are decreasing in Iraqi rivers in last ten years. However, Some Arabic reports indicated that amounts of fishes in Arab gulf are decreasing too as same as fishes in Iraqi rivers.

Before discussing water stations and how they producing aluminum ion with other three ions, should be clarify two facts:

- 1. There are known amounts of aluminum ion (A1<sup>+3</sup>) in seawater and oceans. Amounts of aluminum in seawater vary between approximately 0.013 and 5 ppb. The Atlantic Ocean is known to contain more aluminum than the Pacific Ocean. River water generally contains about 400 ppb of aluminum<sup>(14)</sup>.
- 2. Above ion (Al<sup>+3</sup>) differs than Aluminum oxide (Al<sub>2</sub>O<sub>3</sub>) in many points one of them is solubility. Aluminum ion dissolves in water while aluminum oxide does not.

Above points indicated that there are known concentrations of aluminum ion in oceans, seas and rivers. However, according to densities differences and other facts these concentrations should come from a source producing aluminum ion continually because of:

- 1. Aluminum ion can be detected by oxygen as hydroxide ion (OH). This because it has a good affinity toward oxygen. However, because this fact, most aluminum compounds contain oxygen such as Aluminum oxide (Al<sub>2</sub>O<sub>3</sub>). This compound have strong bond between aluminum-oxygen because in industries, aluminum natural sources need strong conditions for breaking strong aluminum-oxygen bond such as high temperate degree or acidic condition of sulfuric acid. Therefore, it is difficult for acidic rains (PH > 4) or other factors to break strong aluminum-oxygen bond of earth's compounds. As a result, known concentrations of aluminum ion in oceans, seas and rivers do not come from effecting of acidic rain on the earth. Or acidic rains does not produce high concentration of aluminum ion as it is in seas or oceans.
- 2. Relating to above point, as it is known, earth have large areas of water about 70% and little areas of lands about

- 30%. This indicates that most rains are fall on water surface and small amounts of them are fall on the lands. Furthermore, most rains are absorbed by the earth and some of them reach the rivers or seas leading to oceans. Therefore, acid rains are unlikely to be a source of known concentration of aluminum ion in rivers, seas and oceans.
- 3. Above reference (14) showed that huge amounts of water (rivers, seas and oceans) which are about 70% of the earth, have known concentrations of aluminum ion. These concentrations can not be produced from acidic rain or any other environmental factors because they can produce very small amount of aluminum ion, it is not enough for huge amounts of water (rivers, seas and oceans). This means it is so difficult for acidic rain or other factors to be sources of aluminum ion for huge amounts of water (oceans, seas and rivers). Therefore, it should be there are continues source of aluminum ion for rivers, seas and oceans!
- 4. Finally, aluminum ion is more density than water molecules. Therefore, it should be fall down in oceans and seas which mean it will be in down levels on the lands under the water of oceans, seas and rivers. This indicates that water surfaces or highest levels of oceans, seas and rivers should be clear from aluminum ion! This is not true because there is known concentrations of aluminum ion for the water of oceans, seas and rivers. This means that known concentrations of aluminum ion in oceans, seas and rivers must be come from a continues source which producing aluminum ion continually for long time ago sixteen years since 1996!

In fact, Aluminum continues source can be clarified as follow: Iraq use Aluminum sulfate (Al<sub>2</sub>(SO<sub>4</sub>)<sub>3</sub>) alone in water treatment process without any other compounds such as calcium carbonate (CaCO<sub>3</sub>) for the last sixteen years since 1996. Employees of water purification stations indicate that there is not constant amounts of above salt to be added for water purification process.

However, they showed that they adding about 10-15 kg of above salt to specific container of 1000 L or they adding more than 15 for 1500 L container. However, Aluminum sulfate (Al<sub>2</sub>(SO<sub>4</sub>)<sub>3</sub>) is not soluble in water in contrast with potassium alum. Therefore, Iraq use electric motors for stirring aluminum salt inside above containers for one and half to two hors. After stirring, employees of Iraqi stations indicated that they leave the solution (aluminum salt inside the container) over night just for dissolving aluminum salt (Al<sub>2</sub>(SO<sub>4</sub>)<sub>3</sub>). Aluminum salt dissolves in water by dissociation to its contents inside the water molecules. This because that aluminum sulfate is a neutral salt producing from strong acid (H<sub>2</sub>SO<sub>4</sub>) and strong base (Al(OH)<sub>3</sub>) such as sodium chloride salt (NaCl), when it hydrolyze in water it will dissociate to produce its contents ions as illustrated in the following equation:

$$Al_2(SO_4)_3 + H_2O$$
 stirring for 1.5-2 hours, over night  $2AI^{+3} + 3SO_4^{-2}$  .....(1)

As indicated above there is not a constant amount of above salt that be added in water purification process. Therefore, amounts of aluminum ion were calculated for different samples by atomic absorption technique and it ranged between 1.89 to 2.1 mg/L, it is 2 mg/L in average.

In fact, all Iraqi water stations are use aluminum sulfate  $(Al_2(SO_4)_3)$  instead of potassium alum  $(K_2SO_4.Al_2(SO_4)_3.24H_2O)$  and all these stations use chlorine gas in two stages. Furthermore, they use same techniques in water purification process. Therefore, all Iraqi station should produce same products (ions). This fact should be noticed for this research.

In addition, it should be noticed that above products (ions) values may be increased or decreased depending on employees of water purification stations. However, if aluminum ion concentration is 2 mg/L then number of moles of  $(A1^{+3}) = 0.074$  mmole then number of moles of  $(SO_4^{-2}) = 0.1112$  mmole.

Then, weight of ion product  $(SO_4^{-2}) = 0.1112$  mmole \* 96 mg/mmole

= 10.675 mg/liter

However, Iraq water stations take the water from the two rivers and put above amounts in it. This means water will take 2 mg/L of Aluminum ion and 10.675 mg/L of sulfate ion for Iraqi houses or Iraqi people. Each Iraqi person use about 350 - 400 liters of water and return them again to Iraqi rivers. These amounts return to the two rivers without any treatment. This means they will return to Iraqi rivers without any changes. This indicate that each person produce about 700-800 mg of aluminum ion per day and produce about 3736.25-4270 mg of sulfate ion per day. In another word, above amounts will be: 0.7-0.8 g/day of aluminum ion and 3.736-4.27 g/day of sulfate ion.

Iraqi population is about 35 millions so Iraqi people produce about: 24500-28000 kg/day of aluminum ion and 130760-149450 kg/day of sulfate ion. These amounts will add to Iraqi two rivers step by step during them flux from the north to the south passing thorough different Iraqi cities. After that, Iraqi two rivers meet each other in the south of Al-Basra city forming one river called shat Al-Arab. Therefore, shat Al-Arab will take above amounts of ions to transfer them to the Arab Gulf then to all of the world.

Iraq produces about (24.5-28 tons) of Aluminum poison ion each day and also it produce about (130.76-149.45 tons) of sulfate ion each day. It is producing above amounts since 1996 or before that in long time! However, this means from 16 years until now Iraq continually produces above amounts each day and transfers them to Arab gulf leading to all the world.

It is important to notice that the main job of Iraqi water purification stations is to convert the soil which is contain insoluble aluminum as aluminum oxide (Al<sub>2</sub>O<sub>3</sub>) to soluble aluminum ion (Al<sup>+3</sup>) and distributing this ion to all the world. In fact, this happened by producing aluminum sulfate from soil, this happening in different chemical companies as industry methods over the world. Iraq will buy producing compound then it will use it for water purification process to produce two ions, one of them is aluminum ion. Then overall steps as it is mentioned

before, Iraq converts soil to aluminum ion and distributing it over the world.

Aluminum metal have 13 electrons, the last three electrons two of them are in (S) orbital while the rest one is in (P) orbital. When this atom lose the last three electrons to be aluminum ion (Al<sup>+3</sup>), it will have three empty orbitals (S), (P) and (d). These orbitals can formed different bonding with other atoms and molecules but the main reaction is with Hydroxide ion to form aluminum hydroxide (Al(OH)<sub>3</sub>). This reaction occur only in basic media which means PH >7.5, while in acidic media aluminum ion will be stable ion with three empty different orbitals. According to specific repots Iraq rivers were more than PH =7.5-8 until 1990. After this date, PH of Iraqi rivers now is less than 7.5-6.8. Therefore, aluminum ion can be stand alone as (Al<sup>+3</sup>) in these rivers. Most suitable form for aluminum ion in water in acidic media is as following equation:

$$Al^{+3} + 6 H_2O \longrightarrow Al(H_2O)_6]^{+3}$$
 .....(2)

Aluminum complex is more suitable for aluminum ion to be at the surface of rivers, seas and oceans and also to be in the clouds because water molecules of aluminum complex are represent as balloons for aluminum ion. In another words, water molecules of aluminum complex able to make aluminum ion at the surface of oceans, seas and rivers and they able to ascend it to form clouds. This means aluminum ion can spreading by water molecules through air molecules. However, according to atomic absorption technique, amount of aluminum in Iraqi rains is about (7-9 mg/L). This indicated that aluminum ion can reach the sky to form clouds and it can transfer by air molecules to everywhere in this earth.

However, Main water molecules cycles in the earth is that sun's heat evaporate them from oceans, seas and rivers to form two aspects; clouds in winter and moisture in summer. For all the earth both aspects are formed because earth have two halves when one of them is in the winter the other will be in the summer. In fact, clouds or moisture are forming the ice around

the earth which is the source of rivers of the world. Finally these rivers return water molecules again to oceans and seas. Oceans, seas and rivers (70% of all earth) produce continually two forms; clouds and moisture. However, this research indicated that aluminum ion can ascend with water molecules to form clouds (7-9 mg/L) then it can ascend with water molecules to from moisture too because clouds is higher than moisture in atmosphere. Therefore, aluminum ion can ascend to from clouds then it can ascend to from moisture. This may happened in different percentage around the world. As mentioned before, there are known concentration for aluminum ion (Al<sup>+3</sup>) in rivers, seas and oceans <sup>(14)</sup>.

All above indications indicate that Iraq water stations converted soil to be free aluminum ion and spread it over the world. Aluminum ion is a poison for all living systems in the earth (1-14). Our believe that human made from soil while in another hand depending on the science, soil have aluminum as the third element but the fact is our bodies does not contain aluminum either as ion or as element of soil elements. This means that soil was filtered from aluminum then human was made. Furthermore, this indicates that aluminum is very danger poison. It is ion with free orbitals (S, P and d orbitals) easy to bond with other high electron density elements such as O, N, S, ..etc. human body is formed from high electron density elements! This means aluminum ion can change all the body functions when it enter there, following table will illustrate what aluminum ion can do inside human body. Even that aluminum is very danger poison, it produce continually and it can reach every place in this world. May be 16 years is not enough for all the world to be filled by aluminum ion but it is enough for the next few years for aluminum ion to be increased in the oceans, seas and rivers. Aluminum is poison for most creatures (1-14) therefore it should kill many species and destroyed most food chains in water environments. It effected human in many countries in two ways; directly such as Iraq, Arab gulf countries. Or indirectly such as other countries of the world. Moreover, aluminum ion has very small diameter = 0.51 A. Aluminum metal with three electrons has 1.3 A it lose about 0.8 A when losing three electrons. This indicates that there is not filter can stop aluminum ion. In fact, aluminum ion can pass through everything in this earth but in different percentages.

Countries of Arab gulf does not have rivers for drinking water so they take them drinking water from Arab gulf. Iraqi two rivers transfer aluminum ion to shat al-Arab whose take it continually to Arab gulf then to Arab sea to all water areas. This indicated that people of Iraq and Arab gulf drinking water with aluminum ion. Aluminum ion caused many diseases (1-14) as in the following table:

No.	Disease type	Notices
1.	Tumors	
	Hypocalcaemia	
3.	Delirium	
	Delirium Tremens	
5.	Depression	
6.	Eastern Equine Encephalitis	
7.	Osteomalacia disease	
	Encephalopathy, Hypertensive	
9.	Increased risk of infections	
	Very high levels sudden death	
11.	Renal insufficiency	
12.	Anemia	
13.	Bone disease	
	Deteroxamine therapy	
15.	Abnormalities in Vitamine (D) production	
	Increase bone turnover	
17.	Aluminum causes an oxidative stress within brain	
	tissue leading to formation of alzheimerlike	
10	neurofibrillary tangles	
	Effecting human memory	
19.	Mechanisms of aluminum toxicity include	
	inhibition of enzyme activity and protein synthesis,	
	alteration in nucleic acid function, and changes in cell membrane permeability	
20	Decreased heme synthesis, decreased globulin	
20.	synthesis, and increased hemolysis	
21.	Bone pain	

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22.	Aluminum deposited in various tissues including:	
	bone, liver, spleen, brain, heart and muscle.	
	renal failure	
	Osteoid mineralization	
25.	Uremic pruritus	
	Hypoglycemia	
27.	Hypothermia	
28.	Hypothyroidism	
29.	Encephalopathy stuttering	
	Encephalopathy Uremic	
	Ependymoma	
	Glioblastoma Multiform	
	Head Trauma	
34.	Hemolytic-Uremic Syndrome	
	Hepatorenal Syndrome	
	Hyperosmolar coma	
37.	Hyperparathyroidism	
38.	Hyperphosphatemia	
	Brain Abscess	
	Cryptococcosis	
	Cysticercosis	
	Encephalopathy, Dialysis	
	Encephalopathy, Hepatic	
44.	In children bony deformity is more commonly due	
	to the increased rate of growth and remodeling	
45.	Children may also express varying degrees of	
	growth retardation	
46.	The areas of deformity in children usually involve	
	the epiphyseal plates ( i.e. femur, wrist )	
47.	In adults, thoracic cage abnormalities lumbar	
	scoliosis and kyphosis can be present	
	Anisocytosis	
	Poikilocytosis	
	Chromophilic cell	
	Basophilic stippling	
52.	Aluminum in humans is documented to inhibit	
	learning	

In Iraq, Arab gulf countries, and others nearby countries, there are many people suffering from Hypertension and Diabetes diseases. This may because of aluminum ion which thy take it with them drinking water and air. Over the world (over seven billions), WHO indicated that from each three persons there is one of them has Hypertension and from each ten adults there is one of them has Diabetes. It should be noticed that these diseases are not caused by viruses or microbes, so how they are spread over the world?!

In fact, over the world all people are participating in two things; air and water. As it is mentioned before, aluminum ion able to spread by air and water therefore aluminum poison may cause above diseases. In fact, this research believe that there is not another factor causing above diseases except aluminum poison. In fact, there are another sources for aluminum ion over the world! Global water purification stations are another sources for aluminum ion but These stations will discuss later in another subject of this research.

However, Iraqi water purification stations does not provide only aluminum ion, they producing another three ions, One of them is sulfate ion which was illustrated with aluminum ion while the rest two will be illustrated as fallow:

The other two products that producing from Iraqi water purification process are come from adding of chlorine gas (Cl<sub>2</sub>) in purification process. However, Iraqi two rivers are basic rivers over pH=7 (pH equal or less than 7.5) which means that aluminum ion will precipitate due this pH does not affected by this pH. Iraqi stations add chlorine gas in two stages of water purification stages. This for making pH of drinking water is equal or less than 7 safety for aluminum ion. In fact, this the only scientific reason for adding chlorine gas in two stages because Iraqi two rivers are so pure do not need chlorine gas in two stages. Then, addition of chlorine gas will produce another two products as following equations:

$$Cl_2 + H_2O \longrightarrow 2 HCl + O$$
 (3)  
 $2 HCl \longrightarrow 2 H^+ + 2 Cl^-$  (4)

According to my colleagues<sup>(16)</sup> Iraqi drinking water contain about (360-396 mg/L) of chloride ion (Cl<sup>-</sup>). Then according to above equations concentration of hydrogen ion is have same as chloride ion = (360-396 mg/L). An average of above values = (378 mg/L).

in fact, Iraqi rivers were above than pH 8 until 1990 but they are decreasing to be 7.5 or less than 7.5, and for drinking water equal or less than pH 7 for the last 16 years. As mentioned before, Iraqi person use about 350 to 400 liters of water, in average it use about 375 liters. Therefore, each Iraqi person produce about (141750 mg/day) of chloride ion and also hydrogen ion. Iraq produces about (4961.25 tons/day) of chloride ion (Cl<sup>-</sup>) and also is for hydrogen ion.

However, employees of Iraqi water stations indicated that they add about (3 mg/L) of chlorine gas for each water station. Depending on above equations (3 and 4) the number of moles of chlorine gas (3 mg/L) is multiply by (2) to be (6 mg/L) for each concentrations of chloride ion and hydrogen ion. Therefore, each Iraqi water stations are producing chloride ion is about (73.5-84 tons/day).

Overall Iraqi water stations are producing chloride ion and hydrogen ion in wide range = (73.5-84 tons/day) to (4961.25 tons/day). This wide range is just for Missan city may be its increased for al-Basra city in higher ratio than above number. It should be noticed that above concentrations are not a constant, they changing for each day and for each city but the constant value will not be less than (73.5 tons/day).

In addition to above ions, Iraqi people use additional materials that producing above ions (Cl<sup>-</sup>) and (H<sup>+</sup>)! This means that Iraqi stations are not the only source for above ions. All Iraqi people use different reagents (detergents) for washing them bodies, hands, clothes...etc. In fact, main compounds that producing from above reagents when hydrolyzing in water are; Sodium ion (Na<sup>+</sup>) and Potassium ion (K<sup>+</sup>) that producing from different soaps types and hypochloric acid (HOCl) that producing from cloths washing materials. These producing atoms should give:

HOCl 
$$\longrightarrow$$
 H<sup>+</sup> + OCl ....(5)  
OCl  $\longrightarrow$  O' + Cl<sup>-</sup> ....(6)  
Overall reaction:  
HOCl  $\longrightarrow$  H<sup>+</sup> + Cl<sup>-</sup> + O' ....(7)

Above products with Na<sup>+</sup> or K<sup>+</sup> ions will produce hydrogen ion with salts as; H<sup>+</sup>, NaCl and KCl. Therefore, chlorine gas with washing materials increase salinity of Iraqi two rivers in very wide range. It is so difficult to calculate chloride ion that producing from each of the two compounds alone (Cl<sub>2</sub> and HOCl) because there is not constant amounts of washing materials that using for each Iraqi person. However, as illustrated before chlorine gas produce hydrogen ion and above equations indicated that washing materials produce hydrogen ion too therefore in Iraq, there are two sources for hydrogen ion. Hydrogen ion (H<sup>+</sup>) is indicator for pH values and it increase acidity of Iraqi two rivers and relating water areas.

In fact, all the world use different reagents as washing materials (soaps and cloths detergents) such as Iran and Arab Gulf countries...etc. These reagents should produce as same as above equations (H<sup>+</sup>, NaCl and KCl). World producing salts are additional salts adding to rivers, seas and oceans. However, People in southern cities of Iraq are suffering from increasing salinity of two rivers and Shat Al-Arab River. This because of increasing of chloride ion which it has most salinity taste than other ions. It represent indicator for salinity for oceans, seas, rivers and other water's areas.

However, In addition to chloride ion, sulfate ion is producing from Iraqi stations by huge amount (130.76-149.45 tons) and it will increase salinity such as chloride ion. Increasing salinity of shat Al-Arab will increase salinity of Arab gulf which leading to increase salinity of connecting oceans and seas. However, increasing salinity of oceans and seas will destroyed many food chains leading to destroyed many species.

On the other hand, hydrogen ion (H<sup>+</sup>) is producing from Iraqi stations too as same as chloride ion as indicating above, this ion

decreasing pH and also Aluminum sulfate compound when dissolve in water will increase acidity of the solution. Therefore, there are two factors increase acidity of Iraqi rivers. These factors change pH from basic value more than pH=7.5-8 to acidic value equal or less than pH=7. Increasing acidity of Iraqi rivers will increase it in Arab gulf, oceans, seas and relating water's areas. Iraq continuously produce (130.76-149.45 tons/day) of sulfate ion and (73.5-84 tons/day) to (4961.25 tons/day) of hydrogen ion for the last sixteen years. These two ions are transfer to Arab gulf leading to another seas and oceans. These two ions are change pH and these changing will continue until destroyed many species because pH value is so important for living systems in oceans and seas. Any changing in pH values will destroyed many environments.

Above ions are not like aluminum ion which is a poison for human, animals and plants <sup>(1-14)</sup>. It produce continually (24.5-28 tons/day) for last sixteen years and it can transfer through air molecules to everywhere in this earth. This means that aluminum poison ion will be in everywhere in this earth and will be increased for next years. This ion is so small 0.51 A can pass through any barrier.

However, a lot of global references <sup>(17-19)</sup> about climate change phenomenon indicated that there are many species disappeared from oceans and seas or they will disappear after specific number of years furthermore scientists said this because climate change or global warming. In fact, they said that "after 30-35 years most species will gone from seas and oceans"!

The question will be, are seas and oceans have this time "30-35" years! Or is all earth have this time or not? This will illustrate as follow:

Seas and oceans salinity is one of most interested problem in the last years. There are a lot of images maps about salinity of the world which come from scientific studies. However, unfortunately most of them are focusing on north America and relating areas, there are few images showed middle east countries and relating areas. However, following image will

illustrate salinity of the world, seas and oceans of middle east countries and relating areas<sup>(20)</sup>:

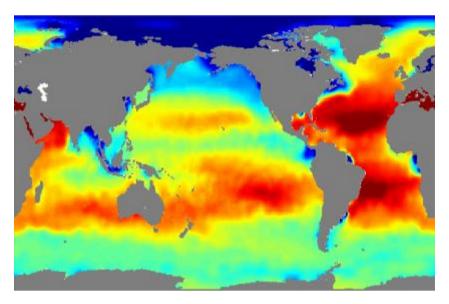


Figure (1): salinity of the oceans (most salinity have dark red color).

Above image map indicated salinity of the three seas; Arab sea, red sea and Mediterranean sea. It should be noticed that Iraq is not the only country which use chlorine gas in water purification process, there are many countries use it such as Iran, Arab Gulf countries. This indicates that there is additional salts will come from these countries as same as Iraq did. However, according to above map, salinity of Iraq and other countries moving with water molecules from Iraqi rivers to Arab Gulf. This gulf transfer salinity to Uman gulf which transfer it to Arab sea. Arab sea should transfer salinity of Iraq and other countries to Indian ocean. these two water areas are connected each other in wide range more than thousand kilometers. However, it is so obvious from above map that salinity does not move toward Indian ocean, it move toward Adan gulf to red sea. This because that there is a barrier between Arab sea and Indian ocean such as the barrier between Mediterranean and Atlantic

References indicated that there is barriers between seas and oceans (21-23). The two barriers (Arab sea-Indian ocean barrier and Mediterranean sea-Atlantic ocean barrier) are obvious in above salinity map and also in the references (21-23). They restrict the water and the products of Iraqi water stations and other products in limiting water's area which is; Arab gulf – Amman gulf – Arab sea – Adan gulf – red sea – sways channel – Mediterranean sea. For the last sixteen years Iraq provide above limiting area by four products in addition to other product that they mentioned in above pages.

According to above image map, Mediterranean sea has higher salinity than other seas (except died sea). Scientists explain this phenomena by explaining that Mediterranean sea has higher evaporating ratio than other seas. This research have two questions; Is sun on Mediterranean sea differ than our sun? Or there is a volcano or volcanoes under Mediterranean sea?!

These factors should make water of Mediterranean be more evaporate than other seas otherwise why it more evaporate sea than other seas?

As a facts, more salinity water is more density than less salinity water and aluminum ion is more density than water density. Therefore, because of higher salinity value of above area (Arab gulf – Amman gulf – Arab sea – Adan gulf – red sea – sways channel – Mediterranean sea), aluminum ion should be at the surface of this water's area easy to evaporate in high concentration with water molecules to form clouds. In addition to these facts, aluminum ion direction is depending on the direction of the main winds of relating countries near above area. However, aluminum ion in Mediterranean sea is bonding with six water molecules forming a complex of  $[Al(H_2O)_6]^{+3}$ , this situation is look like a six balloons ascend with one so small passenger (Aluminum ion, 0.51 A). In fact, these balloons will take aluminum ion for each direction in the world but this is depending on the wind direction. As example for Lebanon, Syria and relating countries most wind direction is north-west wind comes from Europe through Mediterranean sea. This means that this wind should carry aluminum ion continually from Mediterranean sea to above countries for the last sixteen years. This research is highly recommend for all environmental offices of above countries and relating countries to measure aluminum concentration in them drinking water and them rivers because Mediterranean sea is the source of water molecules in the clouds which are main sources for above countries rivers. This research believe that this is an explanation of "sky's justice".

However, above limited area (Arab gulf – Amman gulf – Arab sea – Adan gulf – red sea – sways channel – Mediterranean sea ) is a huge amount of water molecules should need huge amount of the products of Iraqi water stations and other products which illustrated before. This is a fact that above area is not normal area it is huge amounts of water molecules but it should be noticed that this research talk about long time (sixteen years) with huge amounts "tons of atoms each day" should be more than enough for all above area and for additional areas!

According to above map salts of above area (Arab gulf – Amman gulf – Arab sea – Adan gulf – red sea – Sways channel – Mediterranean sea ) are passed through (Mediterranean sea-Atlantic ocean) barrier does not through (Arab sea-Indian ocean) barrier!?

This fact because that flow direction of water molecules is from Iraqi rivers and other rivers (Iran rivers) to Arab gulf then to Amman gulf, to Arab sea, to Adan sea, to red sea, to Sways Channel, finally to Mediterranean sea. Mediterranean sea represent the last storage area for Iraqi salts and other salts or it is represent the last huge container for above salts. Therefore, salts of above area passed through Mediterranean sea-Atlantic ocean barrier do not through Arab sea-Indian ocean barrier. It should be noticed that the important fact is that salts of above area (Arab gulf - Amman gulf - Arab sea - Adan gulf - red sea - Sways channel - Mediterranean sea ) do not passed through Mediterranean sea – Atlantic ocean barrier unless them concentrations were too high more than enough, more difficulty for Mediterranean sea to endure them. In another word, high salts concentrations in Mediterranean sea forced salts to pass through above barrier. This indication is so obvious in above

image map, dark red of above map is for more salinity area and it is exactly same of above indication.

However, This research does not know when and why salts of Mediterranean sea passed through above barrier and spread in Atlantic ocean but according to reference <sup>(14)</sup> Atlantic Ocean is known to contain more aluminum than Pacific Ocean. This means that salts of Mediterranean sea passed before five to three years only! Because if they passed before long time more than five years then pacific ocean should contain practically same concentration of aluminum ion as Atlantic ocean, or if they passed before short time less than three years then salinity does not spread as what above image map indicated of dark red area. However, salts of Iraq and other countries are moving with oceans currents by Great Ocean Conveyor Belt (Salinity) such as following image map <sup>(24)</sup>:

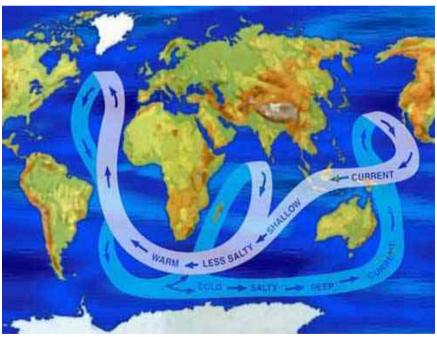


Figure (2): Great Ocean Conveyor Belt.

Iraq salts and other salts transfer and spread to other oceans by above currents and it should be understand that above salts are producing continually for last fifty years and they transfer by above currents to all the world. Oceans Currents transfer salts of;  $SO_4^{-2}$ , KCl, NaCl and Cl<sup>-</sup>.

It should be noticed that aluminum ion transfer with salinity as indicated before but there is not an image map for aluminum concentration in oceans. However, reference (14) indicated that Atlantic Ocean is known to contain more aluminum than Pacific Ocean. This was explained before, more salty water should be more density than less salty water. Salty water carry aluminum ion or aluminum ion will be in higher levels of oceans. This because that aluminum ion is more density than water, then it should precipitate in seabed of above area (Arab gulf – Amman gulf - Arab sea - Adan gulf - red sea - Sways channel -Mediterranean sea ). This does not happened because above area is more salty seas so aluminum ion will be at higher levels of above area which means salts will ascend it to be at the higher levels of above seas as same as oceans. In fact, because of the salts of above seas and oceans, aluminum spread in everywhere depending on the winds direction. As indicated before, aluminum ion of seas and oceans in less or equal to pH=7. This pH is more safety for aluminum therefore at this pH, aluminum prefers to combine with six water molecules forming of an complex  $[Al(H_2O)_6]^{+3}$ . Water molecules of the complex will ascend aluminum ion to higher levels of atmosphere to form clouds. They look like balloons for aluminum ion carrying it to everywhere in this world. Aluminum ion is danger poison for most creatures (1-14).

However, there are another facts about salinity of oceans which is come from human activity! WHO drinking water standards state that 2-3 mg/L chlorine should be added to water in order to gain a satisfactory disinfection and concentration (25). In fact, about five billions persons in this world use water treated by chlorine gas in above concentration. However, chlorine gas produce chloride ion as illustrated before in equations (3 and 4) and they will repeat as follow to explain effecting of chlorine gas:

$$Cl_2 + H_2O \longrightarrow 2 HCl + O$$
 .....(3)  
 $2 HCl \longrightarrow 2 H^+ + 2 Cl^-$  .....(4)

According to WHO five billions persons use 2-3 mg/L, an average of this values is 2.5 mg/L of chlorine gas. According to above equations (2.5 mg/L) should multiply by 2 the number of moles to be 5 mg/L. however, an average amount of using water for each person for five billions persons should be 150 liters therefore each person will produce about 750 mg/L of chloride ion and hydrogen ion. Then for the five billions it will be (3750 tons/day) of above ions. In fact, most rivers of this world are throw what they have from ions to known oceans. This means that above tons of chloride ion and hydrogen ion are continually produce from five billions persons in this world each day and moving toward oceans.

In addition to above indication, five billions persons use different types of detergents such as soaps, shampoos regents, cloths washing reagents and ...etc. This leads that five billions persons produce huge amounts of different salts and hydrogen ion per day, these salts are; KCl, NaCl, Cl<sup>-</sup>, H<sup>+</sup> and ...etc.

Another salts come from human activity is sulfate ion as illustrated before for Iraq situation. However, for water treatment process for all world stations use two products one of them is chlorine gas as explained before, and the other is alum either as aluminum salt as same as Iraq use or as potassium alum. Both products give following ions as follow equations:

Equation (1) clarify ions of aluminum salt as mentioned before:

$$Al_2(SO_4)_3 + H_2O$$
  $\longrightarrow$  2  $Al^{+3} + 3 SO_4^{-2}$  .....(1)

While following equations for Potassium alum as follow:

KAl(SO<sub>4</sub>)<sub>2</sub> + 4 H<sub>2</sub>O 
$$\longrightarrow$$
 Al(OH)<sub>3</sub> + KOH + 2H<sub>2</sub>SO<sub>4</sub>  
.....(8)  
Al(OH)<sub>3</sub> + KOH + 2H<sub>2</sub>SO<sub>4</sub>  $\longrightarrow$  Al(OH)<sub>3</sub> + K<sup>+</sup> + 2  
HSO<sub>4</sub><sup>-</sup> + H<sup>+</sup> + H<sub>2</sub>O ....(9)

Equation (9) indicated that for three molecules of potassium alum there is an aluminum ion should be produced as free ion as follow, equations (8) and (9) will repeat as:

$$3KAl(SO_4)_2 + 12H_2O \longrightarrow 3Al(OH)_3 + 3KOH + 6H_2SO_4$$

$$3Al(OH)_3 + 3KOH + 6H_2SO_4 \longrightarrow 2Al(OH)_3 + 3K^+ + Al^{+3} + 6H_2SO_4 + 6H_2O$$

Overall equation will be:

$$3KAl(SO_4)_2 + 12H_2O$$
  $\longrightarrow 2Al(OH)_3 + 3K^+ + Al^{+3} + 6HSO_4^- + 6H_2O .....(10)$ 

(HSO<sub>4</sub>-) ion in huge amounts of water molecules as rivers, seas or oceans will give:

$$6HSO_4^- + H_2O \longrightarrow 6H^+ + SO_4^{-2}$$

Then equation (10) will be:

$$3KAl(SO_4)_2 + 12H_2O \longrightarrow 2Al(OH)_3 + 3K^+ + Al^{+3} + 6H^+ + 6SO_4^{-2} + 6H_2O$$

At least five billions use potassium alum in them water treatment process and they use an average about 150 liters of water each day so they producing different ions as above equations. Each day five billions persons use treated water by chlorine gas and potassium alum and return it again to rivers for carrying them to oceans as the final step. Therefore, humans (five billions) provide oceans by above ions continually each day, these ions are;  $2Al(OH)_3$  which is precipitate as white precipitation,  $(3K^+)$  potassium ion will collect with detergent reagents ions to form (KCl) salt. Potassium ion concentration is depending on amounts of potassium alum that use in water purification process. However, at least the average of potassium alum that use in water treatment process is (0.5 mg/L resulting it is 75 mg/L for one person of five billions. At least five billions

persons produce (375 tons/day) of potassium ion collected with other amounts of potassium ions per day that illustrated before to be salts with (Cl<sup>-</sup>).

Other product is aluminum ion which is 1/3 of potassium ion which means is about (125 tons/day) produce from five billions persons of the world. This amount of aluminum ion reach the oceans continually for the last 100 years since they use alum before about 100 years ago. However,  $(6H^+)$  hydrogen ion is 2:1 to one molecule of potassium alum therefore amount of  $(H^+)$  is (750 tons/day) produced continually and they reached seas and oceans. The last product of potassium alum is  $(6SO_4^-)$  which its concentration is like hydrogen ion (750 tons/day). This ion is continually produce and reach the seas and oceans.

There is another source for oceans salts which is come from different wastes. In fact, humans and animals are producing different wastes each day. Them bodies eliminate different ions such potassium, sodium, chloride, ...etc each day. It is so difficult to determine amounts of all ions that produce from humans or animals or other creatures bodies so this research will take one example of above wastes ions which is humans urine and what it contain!

In fact, human urine contain many different ions, it is contain about <sup>(26-27)</sup>; (1.17 g/L) of sodium ion, (0.75 g/L) of potassium ion and (1.87 g/L) of chloride ion. Furthermore, each person produce about 1.5 liter of urine each day. This means each human produce about = (1.755 g/L) of Na<sup>+</sup>, (1.125 g/L) of K<sup>+</sup> and (2.805 g/L) of Cl<sup>-</sup>. Therefore, for all the world there are at least six billion persons use healthy systems for them wastes (bathroom- sewages- rivers- oceans). Six billions persons produce each day about; (10530 tons/day) of Na<sup>+</sup>, (6750 tons/day) of K<sup>+</sup> and (16830 tons/day) of Cl<sup>-</sup>. These amounts will add to above ions (Iraq and world ions) to be huge amounts of different ions that adding to oceans each day.

It should be noticed that humans urine does not treat by any treatment methods in all the world even in U.K. or U.S.A. or other countries because it is a liquid dissolved in water

molecules resulting solution with different ions as illustrated before, it moving easily to reach seas and oceans.

This for three ions only of human urine, there are another different ions additional to above ions such as what humans stools contain of different ions. Moreover, there are additional ions are come from animals urine or stool. However, above values are example of known ions that humans urine contain. In addition, as it is mentioned before, humans stool producing additional ions add to above values to be huge amounts of ions but they are not constant amounts for calculating them. In fact, plants absorb soil ions to form human foods, human eat these foods and his body eliminate soil ions outside it to rivers, seas and oceans. A conclusion of this, human take ions from plants (the earth) and spread them in rivers, seas, oceans. Therefore, humans are machines for converting tons of different ions continually each day from soil to oceans.

There are another sources for producing salts in the world but they are not like above sources therefore this research does not mention them. However, the world produce salts from two ways; firstly from water purification stations. Secondly from human activity (wastes as urine and as stool).

Therefore, There three different ions that produce continually each day in huge amounts; they are different salts ions, H<sup>+</sup> ions and aluminum ion. According to them effect, they are collected in three groups as follow:

• First group is about different salts. Iraq and world salts (water stations and human activity or urine) are; Firstly for chloride ion (Cl<sup>-</sup>); The world (stations and urine) = (16830 tons/day) + (3750 tons/day) + for Iraq = (73.5-84 tons/day) to (4961.25 tons/day) = overall (20653.5-20664 tons/day) to (25541.25 tons/day) or its = (20653.5-25541.25 tons/day). These amounts are as overall chloride ion that produce continually each day for the last thirty years from water purification stations and human urine only. However, there are another sources for chloride ion

such as chloride ion that produce from the earth, different industries, pharmaceutical companies and ...etc but them amounts are not a constant so they do not mention in this research. The second ion is sulfate ion  $(SO_4^{-2})$ ; the world = (750 tons/day) + for Iraq = (130.76-149 tons/day) = (880.76-899 tons/day). For potassium ion  $(K^+)$  which is for the world stations and urine = (6750 tons/day) + (375 tons/day) = (7125 tons/day). The last ion is Sodium ion which is for human urine only = (10530 tons/day). As indicated before, detergents and other washing materials increase salinity by adding more salts ions but it is so difficult to calculate them amounts per day.

- The second group is hydrogen ion (H<sup>+</sup>) that produce continually from human activity (drinking water and urine). Amounts of hydrogen ion is; Fro Iraq = (73.5-84)tons/day) to (4961.25 tons/day) + For the world (using of chlorine gas = 3750 tons/day and using of potassium alum = 750 tons/day = overall (4573.5-4584 tons/day) to(9461.25 tons/day). This value is a wide range of an average (4573.5-9461.25 tons/day). There is another source of hydrogen ion which is come from human urine. pH of human urine is about 4.6-8 so an average of this range is about pH=6. Amount of hydrogen ion that coming from urine is about 0.09 tons/day. Therefore overall amounts is (4573.59-7859.84 tons/day). There are another sources for hydrogen ion or acidity such as what is coming from detergents reagents (shampoo) but this research does not calculate them because they do not have a constant value each day so it is difficult to calculate them. However, there are another important sources for hydrogen ion comes from carbon dioxide it will discuss later.
- Last group is aluminum ion group that producing continually from Iraq stations and from using of potassium alum of world's stations. Amounts of aluminum ion is; For Iraq = (24.5-28 tons/day) + For the world =

 $(125 \ tons/day) = overall (149.5-153 \ tons/day)$ . There are some evidences indicated that some countries such as Iran, Sodia Arabia, Egypt ..etc. are using of aluminum salt  $(Al_2(SO_4)_3.16 \ H_2O)$  instead of potassium alum  $(KAl(SO_4)_2.12H_2O)$  like Iraqi water stations. This means additional amounts (hundreds or thousands tons) of aluminum ion will produce continually each day.

A conclusion of above explanation, above three groups are producing continually each day and reaching rivers, seas and oceans. About (20653.5-25541.25 tons/day) of chloride ion, (880.76-899 tons/day) of sulfate ion, (7125 tons/day) of potassium ion, (10530 tons/day) of sodium ion, (4573.59-7859.84 tons/day) of hydrogen ion and (149.5-153 tons/day) of aluminum ion, are producing continually each day and throwing in rivers, seas and oceans. It is true that water areas is about 71% of the earth but above values are huge amounts (tons) of ions that produce each day. In fact, amounts of above ions can be calculated from 1982 to be 30 years ago only. So ions amounts are:

- 1. For Chloride ion is about = 365 \* (20653.5-25541.25 tons/day) = (7538527.5-9322556.2 tons/30years).
- 2. For sulfate ion is about = 365 \* (880.76-899 tons/day) = (321477.4-328135 tons/30years).
- 3. For potassium ion is about = 365 \* (7125 tons/day) = (2600625 tons/30 years).
- 4. For sodium ion is about = 365 \* (10530) = (3843450 tons/30 years).
- 5. For hydrogen ion is about = 365 \* (4573.59-7859.84 tons/day) = (1669360.3-2868841.6 tons/30 years).
- 6. For aluminum ion is about = 365 \* (149.5-153) = (54567.5-55845 tons/30 years).

Above values are for 30 years only and for just continues concentrations of ions, they are not for changing ions each day. Also above ions values are throwing in seas and oceans before 30 years until now. However, each ion of above ions groups has

different effects on human, animals and plants. These effects will discuss after explain additional concentrations of another sources of above ions.

However, according to facts, climate change phenomenon means two aspects; increasing of carbon dioxide gas ( $CO_2$ ) and increasing of temperature degree. In fact, each person produce 10-20 moles/day of ( $CO_2$ ), it means that it is produce about (440-880 g/day). The fact is that human is a machine for producing  $CO_2$  in 24 hours per day, it is a machine work all the time does not stop from producing  $CO_2$ . There are seven billions persons on this earth continually produce  $CO_2$  everyday for 24 hours per 24 hours. Then amounts of  $CO_2$  that produce each day = (3080000-6160000 tons/day). These amounts are increasing continually while plants (of water or of lands) are decreasing continually. This indicate that concentration of  $CO_2$  are increasing in the atmosphere. This is a fact and evidence of global warming phenomenon.

According to its chemical properties, Carbon dioxide gas is heavier than oxygen and nitrogen therefore most of it will be under above gases which means most of it (most of 3080000-6160000 tons/day) should dissolve in (71%) water surface (rivers, seas and oceans). As indicated above, humans produce carbon dioxide in huge amounts each day and most of these amounts dissolve in rivers, seas and oceans so by continue this situation humans will gone because carbon dioxide gas has two effects; one of them is increase acidity of above water areas, while the other is increase acidity of rains. Just increasing of pH means the end for most creatures in rivers, seas and oceans. When carbon dioxide dissolve in water it should produce following products:

$$CO_2 + H_2O \longrightarrow H_2CO_3$$

Carbonic acid is unstable compound but in huge amounts of water such as rivers, seas and oceans, it will dissociate as:

$$H_2CO_3$$
  $\longrightarrow$   $HCO_3^- + H^+$ 

It is difficult to calculate amounts of (H<sup>+</sup>) that producing from carbon dioxide each day because this gas absorb by two kingdoms; plants of lands kingdom and plants of water kingdom which means that amounts of carbon dioxide that absorbing by above kingdoms are unknown resulting that amounts of carbon dioxide does not absorbing by above kingdoms are also unknown. However, increasing of carbon dioxide in atmosphere is indicate that the rate of producing of oxygen gas is less than the rate of producing carbon dioxide gas. However, (3080000-6160000 tons/day) of carbon dioxide are producing continually each day and acidity of water areas are increasing continually each day. This cycle will continue until all creatures in water areas will gone because pH values, when it is become less than 5 will destroy most food's chains in water areas. In fact, this cycle started before many years but its effect is so clear now.

On other hand, carbon dioxide gas will increase acidity of the rains leading to increase solubility of most earth's ions, one of these ions is aluminum ion. Therefore, increasing of carbon dioxide will increasing amounts of aluminum ion that producing from lands. In fact, there is another source for aluminum ion which is the heat. Climate change means that temperature degrees is increasing which means water evaporating process is increasing leading to increase of aluminum ion. This because that aluminum evaporate with water molecules so increasing water evaporating process will increase aluminum ion in atmosphere (as clouds or as moisture). Therefore, Aluminum poison will spread in water and lands more faster than low temperature degrees. This means that there are additional amounts of aluminum ion will reach seas and oceans.

Aluminum ion effected most precious process in the earth <sup>(4)</sup>! The fact is that aluminum ion effect photosynthesis process <sup>(4)</sup>. This process produce oxygen gas so it is most precious process in the world. Aluminum ion effect both plants; water plants and land plants <sup>(1-14)</sup>. As a result, aluminum ion decreasing oxygen gas from atmosphere. Moreover, Toxicity of aluminum increase with increasing of acidity (pH<7) and this effect algae <sup>(28-32)</sup>. This means (149.5-153 tons/day) of aluminum ion (Al<sup>+3</sup>) in addition

to above additional tons with (4573.59-7859.84 tons/day) of hydrogen ion  $(H^+)$  in addition to  $(H^+)$  ion of carbon dioxide = end of water creatures leading to destroyed human life!

This because that it is estimated that marine plants produce between 70 and 80 percent of oxygen gas in atmosphere. Nearly all marine plants are single celled photosynthetic algae<sup>(33)</sup>. Therefore, decreasing of algae lead to decrease oxygen gas in atmosphere. In fact, Scientists believe that algae absorb more carbon dioxide (CO<sub>2</sub>) and release more oxygen (O<sub>2</sub>) than plants do<sup>(33-38)</sup>.

This indicate that algae is most important creatures rather than humans <sup>(33-38)</sup>. Therefore, as indicated before, aluminum ion with hydrogen ion will destroy the algae which means that they destroy oxygen sources leading to destroyed all animals kingdoms from mankind to smaller creatures that depending on oxygen in them lives. It should be noticed that this effect is for aluminum toxicity with (H<sup>+</sup>) only without other effecting ions and factors.

However, there are another factors effect algae and other creatures which are huge amounts of salts that throwing continually each day in seas and oceans. They are about; (20653.5-25541.25 tons/day) of chloride ion, (880.76-899 tons/day) of sulfate ion, (7125 tons/day) of potassium ion, (10530 tons/day) of sodium ion and other amounts that explained before, are throwing each day in seas and oceans. as it is known These salts are effecting algae, other water creatures, most land creatures by osmotic pressure. Salts are perfect drugs against many organisms such as fungi or Bactria because of osmotic pressure. This is a simple fact when salts concentration outside the cells is more than inside them, cell membrane will destroy leading to destroy all cells. This what happened for last thirty years because humans urine and water purification stations.

It should be noticed that this research does not calculate about 50% of aluminum ion, (H<sup>+</sup>) ions and salts that throwing each day in rivers, seas and oceans. As it is mentioned before, sources of these ions are not constant so it is difficult to calculate them each day. However, there are additional sources does not mentioned

before such as petroleum wastes which is contain huge amounts of different ions. Humans produce what this research indicate, thousands of tons each day of effecting ions are throwing each day in seas and oceans. these ions have different degrees of toxicity.

According to above facts and explanation humans produce what will destroy him. In fact, there are another facts about humans acts should be explained as follow:

Every person in this earth feel about climate change phenomenon, it is one of the most serious problem faced this earth. Many scientists introduced them theories about climate change phenomenon. These theories focusing on two aspects, one of them is increasing of carbon dioxide gas in atmosphere and relating subject "Greenhouse effect" and the other is they are focusing on effecting of the sun on the earth. However, above theories are explaining only the warming weather so question is what about the cold weather?!

This year many people have died because of so cold weather, in Ukraina temperature is so cold reach -30°C or may be more. Scientists does not find an explanation for this weather "so cold weather"!

However, this research believe that these theories are depend on just a part of all problem, are not depend on all problem! Or scientists should understand full picture not part of it!

This fact was mentioned before <sup>(39)</sup>, up than atmosphere earth has two faces; sun face and shadow face. According to earth faces there are two temperature degrees up than atmosphere (the space) in case of sun face the temperature degree is 121°C when in case of shadow face temperate degree is -156°C <sup>(40-41)</sup>. These temperatures are outside atmosphere which is responsible for converting them to non harmful temperatures about 0-20°C in average. By another words, between above temperature degrees and the earth, there are three gases only! According to these gases properties, Ozone layer is responsible for converting temperature from 121°C to 20 in average and from -156°C to 0°C <sup>(39)</sup>.

Ozone is responsible for lives of all creatures in this earth therefore it is the most precious gas in the universe. There are another additional facts which are temperature degrees in Missan city reach 55 - 60°C and in Ukraina it is reach -30°C. These degrees are closer to above degrees of outside atmosphere and will be more closer in next few years!

All above facts indicate that Ozone layer is decreasing<sup>(39)</sup>. Ozone layer formed from oxygen gas. Therefore, Ozone layer decreasing because of oxygen decreasing. According to basic information, percentage of oxygen gas is 21% but it is decreasing to be 9% in big cities<sup>(39)</sup> or less as this research found. This percentage is at 2010, Nowadays Our evidences indicated that the oxygen percentage is less than 9%, the fact is oxygen gas is not enough for humans, animals and others creatures that live on this earth.

In addition, there is another fact, it was mentioned before that 70-80% of oxygen in the atmosphere come from marine plants<sup>(33)</sup>. This research believe that there are two sources for oxygen in the earth!

Humans, animals and other creatures that depend on oxygen in them lives, they have all kinds of plants and others creatures that depend on carbon dioxide in them lives and release oxygen. This is the first source for oxygen, plants and others creatures are the first source of oxygen for humans, animals and others creatures. The second source is water plants and other creatures like algae, this source is just for water creatures. These creatures are more than lands creatures therefore they need more oxygen rather than humans and other creatures. Algae produce oxygen for water plants, they release oxygen as dissolving oxygen humans does not use it.

According to above explanation, there are two sources for oxygen in this earth. At 2011<sup>(33)</sup> that 70-80% of oxygen in atmosphere is come from marine plants, this means land plants produce about 20-30% of atmospheric oxygen. These are acceptable results of humans activity in this earth! Humans are increase to be seven billion now while plants decrease to produce about 20-30% of atmospheric oxygen. This research believe that

before hundred years, plants produce 100% of atmospheric oxygen while marine plants produce water oxygen for water creatures. Above situation is depend on facts which indicate that earth is under threat.

Moreover, it should be noticed that Iraq water stations, world water stations and humans wastes are effect marine plants. This means humans destroy them oxygen sources (plants) and now they keep continue for destroying water sources (marine plants). At 2011 weather temperature reached 60°C and -30°C and it is continues until it is become 121 °C in the day and -156 in the night. In fact, temperature in the day is closer to above degree (60°C to 121°C).

Nowadays, in Missan city (39) at may, temperate degree in the day is reach about 50°C - 52°C and it is expected to be 65°C - 70°C at July. This because many reasons that mentioned before at 2010 (39). However, people in Missan are feeling by above weather temperature therefore they; firstly, at midday and its after they put something on them heads because of the sun heat, secondly, sun is so strong affected human skin or human head, at midday and its after any person can feel about strongest of the sun, in fact, weather in Missan is look like it is in another planet such as mercury or any other planet. Finally, there are another evidences but most important one is that before twenty days the weather in Missan is cloudy, there were clouds in the sky of Missan at may. This weather is unfamiliar in Missan clouds at may but because of heat of the sun these clouds are formed. This evidence indicate what it is mentioned before that the sun is so strong mean more heat, more water evaporating process leading to form clouds in the sky of Missan in summer. According to many facts, clouds can not protect humans when temperature reach 70!

This research mentioned many facts and there are another facts, one of these fact is that humans and all creatures in this earth can not stand with temperate close to  $70^{\circ}\text{C} - 80^{\circ}\text{C}$  or  $-40^{\circ}\text{C} - -50^{\circ}\text{C}$ . People died in temperature  $-30^{\circ}\text{C}$  last winter so all creatures can not wait temperature to be  $121^{\circ}\text{C}!$  They will die before this temperature, may it reach  $80^{\circ}\text{C}$ . in addition, temperature degrees

in these days are affect plants and marine plants leading to decrease oxygen levels in atmosphere which means decreasing of Ozone layer more faster than it is expected. All plants kinds can not stand with high temperature degree such as 65°C or more because they will lose water as vapor more than what they gat from the land. This means plants will dry and die. This fact was noticed in Missan at this time (may 2012) leafs of trees are dry and fall down more than last year. Increasing of temperature will decrease of oxygen in atmosphere, keeping continue of this fact will lead to terminate all creatures on this earth. As conclusion, this research mention many factors each one act alone but the fact is they act together which means all factors work together for ending all creatures lives on this earth and this because of humans and its activities.

#### Algae:

As it is mentioned before marine plants are produce about 70-80% of atmospheric oxygen. In fact, algae is the most important creature for producing oxygen gas for humans lives. However, algae and marine plants are exist in few areas in seas and oceans, they are not full all water areas (seas and oceans). Following image showed marine plants and algae areas in 71% of the earth.

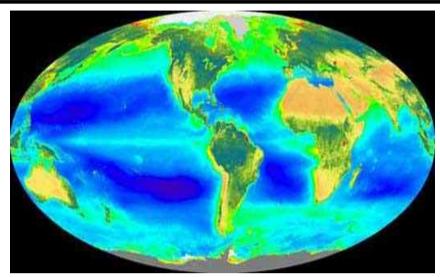


Figure (3): marine plants of the earth.

Above image is a good evidence for explanation of this research; about waterway of (Arab gulf – Amman gulf – Arab sea – Adan gulf – red sea – Sways channel to the last water area, Mediterranean sea), about the two barriers, and finally about aluminum ion, hydrogen ion and salts ions that are produce continually each day to Arab Gulf. As it is indicated before about Mediterranean sea which is the last area of above current so it is more salinity means there is not water plants as above image indicated. Other oceans and seas are showed algae and water plants which are depend on effect of above ions. However, red sea is showed another half empty from water plants while (Arab gulf – Amman gulf – Arab sea – Adan gulf) are filled by water plants even that there are a lot of effecting ions such as aluminum ion which is a poison for most creatures!? This because of Iraqi people wastes!?

Iraq does not treat its people wastes (stool) so it drop huge amounts of nitrate and phosphate ions in Iraqi rivers each day, then these rivers carry above ions to throw them for algae in waterway (Arab gulf – Amman gulf – Arab sea – Adan gulf – red sea). In fact, is not just Iraqi people drop them wastes in them rivers, there are many countries do this too. To be more

specific there are about six billions persons drop nitrate and phosphate in seas and oceans! In fact, human's urine contain nitrate and phosphate in known concentration and each day about six billions persons drop about 9000000000 liters contain nitrate and phosphate ions in seas and oceans. Because of human's urine is a liquid, there is not a country treating its people urine before dropping it in seas and oceans.

It should be noticed that above ions (nitrate and phosphate) of people urine are additional amounts of ions to people wastes (stool) ions. There are two sources for nitrate and phosphate ions urine and stool.

Therefore, this research believe that algae does not exist before humans or before thousand years! they existed in seas and oceans because of human urine and stool in known densities as above image indicate. Human feed algae giving them what they want and they produce oxygen for him. This situation is like a backup plan because humans help for growing and increasing of algae and when earth plants are decreasing, algae gratitude this for humans and give him about 70-80% of atmospheric oxygen. Most creatures are faithful for whose feed them such as dog, cat, ...etc. Most creatures do this except humans.

This research thought that following phenomenon does not happened before! Following image show that algae give a blue glowing waves near the beach. Scientists believe that algae do this for two reasons; Algae do this for frightening its enemies or they do this for attracting other predator to protect the area they presence. Algae species whose do following glowing called Plankton *Viatoblancton*. However, this phenomena occur in two areas only; Maldives beach and south Florida beach<sup>(42)</sup>.

This research believe that above scientists explanations are not correct because if algae want to frighten its enemies or to attract other predator, then why they do this in two areas only?! It should see following glowing waves in most beaches are not in two beaches only! Or in fact, this glowing should spread in all seas or oceans is not in small areas (beaches)! There are many question about following phenomenon but this research is focusing on right explanation for it.

However, following image is strange phenomenon therefore scientists should study blue waves and how Plankton produce them. There are few elements that give blue waves in different situations so if focusing on following image it will find that following waves is same as Oxyacetylene flame. Algae blue glowing waves are oxygenation-reeducation reaction of oxygen with reducing agents. In fact, algae burn oxygen for two reasons as this research think; they do this for warning humans that earth is in danger or they do this because they anger from humans therefore they burn oxygen do not release it better than give it to humans. In fact, either algae do this for warning humans or because they anger from him the result will be "algae warning humans". They do this because they are faithful for humans who feed them. Algae understand that its survive depending on humans lives so they warning them by following phenomenon but it is unusual behavior from human when its look at algae and say; oh beautiful picture! Algae should be angry from this behavior. This research thought that Algae should say; oh humans, I warning him and he smile when look at me. Truly, algae are gratitude for human and they do what they can therefore humans should understand this message very well that them lives are in danger.



Figure (4): Algae show glowing blue waves.

Above picture is happened <sup>(42)</sup> and algae showed them loyalty for humans by do this.

### This research facts:

Until this moment, This research referred to facts in its explanation and it will refer to additional two axioms are not just facts as follow:

1. between outside atmosphere and the land there are three gases only; Oxygen, Nitrogen and Ozone. However, at outside the atmosphere temperature degrees are 121°C and -156°C. Therefore, above gases should be responsible for reducing temperature from 121°C to be 15 in average and from -156°C to be 0°C in average. Above gases are well known gases and the only one who can reduce temperature from 121°C to 15°C in average is Ozone. It reduce temperature with nitrogen gas because nitrogen is 78% of atmosphere so it is an assistant agent to reduce temperature from 121°C to be 15°C in average and also it help with moisture to convert temperature from 156°C to 0°C.

- however, Ozone has major activity for keeping weather temperature between 0-15°C in average. Therefore, changes in weather temperatures has one meaning, Ozone layer are decreasing this result means that oxygen decreasing too because oxygen is responsible for producing of Ozone. These are axioms and so clear facts. This was mentioned at 2010 is that Ozone layer is in danger<sup>(39)</sup>.
- 2. Second axiom is that humans are machines for taking oxygen and giving carbon dioxide. In addition, there are another creatures do this even smaller one "Bactria". All these creature need oxygen in them lives for 24 hours per 24 hours which mean all the time. Huge amounts of creatures want oxygen while there are some creatures called plants give oxygen and take carbon dioxide in opposite of humans and other creatures work. It should be noticed that there is important fact which is that plants does not give oxygen all the time! Photosynthesis of plants depend on sun light so it happened in 12 hours per 24 hours. Moreover, Plants in the night become machines for taking oxygen and releasing carbon dioxide such as humans and other creatures, they breathing like humans. This indicates that in the night all creatures on the earth, human, animals and plants and every creature are taking oxygen and release of carbon dioxide. As evidence of nowadays, there is increasing in carbon dioxide percentage in atmosphere which indicate that there is decreasing in oxygen gas percentage. All creatures in the earth are live in amazing equilibrium, in 12 hours (in the night) they take oxygen for them lives while in the day one of them (plants) change it is activity to start photosynthesis process, they do this with starting of sunrise. Humans destroyed above equilibrium by killing the plants and built cities instead of them. In addition, each day there are additional hundred or thousand machines (babies) are coming to

this life, machine does not stop, them lungs are working all the time taking oxygen and releasing of carbon dioxide while plants are decreasing. On another hands, plants are decreasing because of humans activity and other factors. Therefore, the weather nowadays is inevitable results of humans existence on this earth. These facts are mentioned before <sup>(39)</sup>.

Above axioms are fundamentals of our sciences even that scientists over world are not do anything for stopping earth destiny. This earth is going to its end and no one tried to do something to stop this fact. This is unbelievable behavior such as what showed before of humans behavior with algae! This research believe that there are two reasons for above behavior, either scientists accept them destiny (it is the end) or they give up from finding solutions for weather problems. In fact, this research believe that second reason is the right one, scientist give up from finding solutions for weather problems. This because that they have wrong basics. However, references (39) indicated that at 2010 there are solutions for weather problems as same as this research solutions but these solutions did not use for saving this earth. This research believe that all advantages of this life is not equal to one spirit gone because of the weather problems.

#### Facts of earth at this time:

Recent study at 2010 indicated that south of Iraq is a typical area for knowing what will happened for the earth because of weather's problems <sup>(39)</sup>. In fact, Missan city is best area for detecting the effect of the weather on this earth <sup>(39)</sup>. In the last winter of 2011-2012, Missan's weather temperature reached -4°C for the first time since very long time and also it reached 52°C at these days for the first time too for long time ago.

Furthermore, As it is mentioned before, since 30 days now, there are clouds in the sky of Missan. This phenomenon does not happened before, temperature reach more than 50°C and there are clouds in the sky!?

In addition, Although there are clouds in the sky of Missan city for last thirty days as mention before, many people in Missan noticed that leaf of trees were dry and number of falling leaf are more than before. This because of hot weather which effected the leaf and forced them to fall down. This happened at 51-52°C temperature degree, may in July temperature reach 70°C and all leaf of trees are fall down. Either temperature is more than 50°C or it is more than 70°C, it is effect leaf of trees result decreasing in oxygen level in atmosphere which have one result "decreasing of ozone layer". Therefore, temperature degree effect ozone layer and more temperature such as 50-60°C should accelerate losing process of ozone layer so increasing of temperature degrees accelerate terminate of humans on this earth. This is another factor effecting humans lives.

This situation happened for many cities around south of Iraq such as Al-Basra city and other cities in Arab gulf. Temperature over 50°C with clouds in the sky which means one aspect; above cities are in danger!

Experimental results of this research indicate that oxygen percent of atmosphere in the night is equal to oxygen percent in cloudy days. The fact is that Photosynthesis process depend on sunlight so absence of this light either in the night or in cloudy days will stop above process. Therefore, situation of above cities indicate that in higher temperature over 60°C water molecules of rivers, seas and oceans will evaporate to form clouds which prevent photosynthesis mean decreasing of oxygen in atmosphere leading to decrease of ozone layer. In addition, machines (humans and other creatures) are not stop from taking oxygen in cloudy days or in the night so in cloudy days of over 60°C temperature will accelerate losing of ozone layer mean accelerate the end of this earth.

As a evidence of above fact, even that British country is green country which means it have many green lands, amazon river forests are producing more oxygen than British country. This because that clouds!

The fact is that British country suffering from cloudy days<sup>(39)</sup> therefore its production of oxygen gas is less than amazon green lands. This fact is evidence of above fact that clouds prevent Photosynthesis process.

Above facts indicate that humans and other creatures are gone in about 70°C-80°C relatively low temperature comparing with 121°C which means it does not need to reach 121°C, humans and other creatures will disappear in about 70-80°C. Therefore, continuous of above situation the Ozone layer will gone and all creatures will gone too. This will happen in the next few years or this year unless all human cooperating each other for helping this earth.

According to chemical properties of atmospheric gases ( $N_2$ ,  $O_2$  and  $O_3$ ), Ozone heaver than other gases so it restricting them in limiting space (The atmosphere). Moreover, Nitrogen is non-polar gas while oxygen is semipolar gas depending on them solubility in water molecules. Therefore, they do not mix each other and because of molecular weights Nitrogen under ozone up than oxygen in atmosphere  $^{(39)}$ .

In addition, Ozone concentrated in Canada <sup>(38)</sup> in the north of the earth, this why it does not pass through the hole in the south of the earth. If Ozone gone in the north of the earth, other gases (nitrogen and oxygen) will gone too. This means all creatures will gone if any hole happen in Ozone layer in the north of earth. This may because that gases of atmosphere (N<sub>2</sub> and O<sub>2</sub>) are leaking through above hole leading to destroy all creatures on this earth. This another way for oxygen gases to disappear from atmosphere by leaking to the space and leave all creatures without it leading to finish all creatures that depend on oxygen in them lives.

There is a predicting man in Iraq predicted that temperature will reach 75°C in this summer. This true because temperature now at may is 52°C as it is mentioned before, what will be this temperature in July or August!?

People in Missan know that at July or August temperature is increasing to reach high values but they do not know that may have this temperature. Therefore, temperature may reach 75°C as predicting man has predict. However, In Missan and all other Iraqi cities there is a rumor that children of Iraq should put (Hanna) on them heads. This may because that they tried to save

them children from sun heat. in fact, it is so hot and harmful in the noon if there are not clouds in the sky.

# Dinosaurs disappearing theory:

There are many theories about how dinosaurs disappeared from this earth before thousands years. According to this research results dinosaurs may disappear due to same factors of this research!

There are some basic differences between humans and dinosaurs which are:

- As same as humans, dinosaurs may reach high population ratio caused them disappearing.
- In general dinosaurs are bigger than humans so they should consume more oxygen rather than humans.
- Some dinosaurs were eat plants (trees or other plants) so they may consume green lands leading to decrease photosynthesis process resulting decrease of oxygen in atmosphere comparing with population of dinosaurs. This means dinosaurs are increasing while plants are decreasing as same as earth situation.
- Dinosaurs does not have special techniques for stopping fires so may be one fire will destroy many huge amounts of green lands until its stop may it is stop if there are not plants to take it. This means two or three fires may destroy all green lands of Africa in summer season.
- Relating to above point, the fact is fires need oxygen so more fires need more oxygen. This should lead to decrease atmospheric oxygen.
- There are many causes for starting fires at dinosaurs age, one of them are meteors that fall down on the earth.
- At dinosaurs age, big fires produce huge amounts of smokes which contain carbon dioxide and water's vapor. In fact, huge smokes should produce huge amounts of clouds covering the sky, prevent photosynthesis process as indicated before and decreasing of oxygen and ozone as resulting effect.

- As indicated before, humans are dropping algae's food (Nitrate and phosphate) in seas and oceans therefore they are exist in above water areas. However, in dinosaurs age dinosaurs did not have healthy systems (bathrooms) for them wastes so may there are not algae in seas and oceans as they are now. This means in dinosaurs age there is one source for oxygen which is plants and other creatures. Decreasing of plants lead to decrease of oxygen and ozone in atmosphere.
- May be at dinosaurs age, plants density are lower than their density before two hundred years now.

There are another possibilities may effect dinosaurs age. However, increasing of dinosaurs population, huge fires, number of meteors and others factors may caused together to disappear of dinosaurs kinds before thousands years. According to scientific reports, scientists found dinosaurs as they are without big changes in them bodies so this indicate that at dinosaurs age oxygen are decreasing to dangers levels less than 5% leading to temperatures are increasing above than normal values such as 70-80 °C resulting death for all creatures that live at that age before thousands years.

#### The end:

NASA indicated that there are 4700 asteroids should be "potentially dangerous" to earth. In fact, this research believe that three of them (3 of 4700) are enough for ending all creatures that live on this earth. In fact, when three asteroids fall on three locations in same time; amazon forests, British forests and other forests it will be enough for destroy these forests and ending all creatures that are live on this earth. Ozone layer density may not enough for stop above asteroids. It is exactly what happened to dinosaurs before thousands years. Humans may face same dinosaurs destiny by few years now or this year. In another words, factors that this research was explained in above pages and above 4700 asteroids are waiting for one moment that they shall attach together for ending life of this earth. This will

happen unless all humans cooperate each other for saving them lives.

#### The Solution:

According to our believing and because of our conscience and also for the history, there is one solution for saving our earth! In fact, following solution is supporting solution for the solution of a study that was mentioned at 2010 <sup>(39)</sup>. 2010 solution indicated that each person on this earth should farm at least two plants, them sizes are depend on the person size and also governments should farm thousands of plants as more as they can<sup>(39)</sup>. This solution is not appropriate now because plants need time for grow up and as it is indicated before earth may not have this time which plants need for growing up. Therefore, this research was searched for supporting solution which is as follow:

According to the differences between algae and plants an experimental test was done! Algae are grow up more faster than plants so this research test was put 3 liters of sewage's water on appropriate land. Sewage's water stay at its blackish color solution for 24-36 hours after that which means after 36-48 hours it is color was converted to be green color solution. Algae was grew because Sewage's water contain high concentration of nitrate and phosphate which are best foods for algae. In fact, Sewage's water is the richest food solution for algae so they grew in it.

This earth needs huge amounts of oxygen gas as faster as humans can to fix weather problems so each county of earth's countries should take huge amounts of Sewage's water everyday or every two days and put them in very far areas from cities and humans such as deserts or others areas. Algae will grow in these areas and governments should control algae growing and control these areas from other species such as infection "Microbes". These areas are the cheapest algae farms, humans wastes are useful for saving this earth too. There are some techniques should be noticed such as malodor of sewage's water so workers

should put something on them nose, and they should care about others techniques.

If all countries do this during three to five days huge amounts of oxygen will release to atmosphere and weather's problems will be solved. It should be noticed that above algae farms are for three years only, this time is enough for plants to grow up which means Governments are responsible for algae farms and about seven billions person are responsible for farming at least two plants them size is depend on their size.

This indicate that governments has two jobs for saving this earth; one of them is algae farms and the other is farming thousands plants as more as they can. By this solution earth will be saved.

However, this research believe that there is not another solution for saving earth therefore it is hope that responsible persons are understand that earth is under threat and they have to save it. Depending on facts, this research produce the solution which no one can do it alone or a country do it alone, all earth's countries should participate each other for saving our planet. This is united nations job and this research hope that this organization work to save this earth.

### 4. Conclusion:

As a conclusion, earth is under threat.

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