Water Fuel Cell

Difference of potential between two charges is measured by the work necessary to bring the charges together, and, is given by

$$V = \frac{q}{e^R}$$

The potential at a point due to a charge (q) at a distance (R) in a medium whose dielectric constant is (e).

ATOMIC INTERACTION TO VOLTAGE STIMULATION

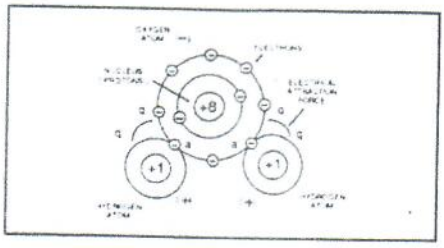

Figure 1-4: Electrical Changes of the Water Molecule

Atomic structure of an atom exhibits two types of electrical charged mass-entities, orbital electrons having negative electrical charges (-) and a nucleus composed of protons having positive electrical charges (+). In stable electrical state, the number of negative electrically charged electrons equal the same number of positive electrically charged protons...forming an atom having **"no"** net electrical charge.

Whenever one or more electrons are "dislodged" from the atom, the atom takes-on a net positive electrical charge and is called a **positive ion**. If an electron combines with a stable or normal atom, the atom has a net negative charge and is called a **negative ion.**

Voltage potential within an electrical circuit (see Voltage Intensifier Circuit as to Figure 1-1) can cause one or more electrons to be **dislodged** from the atom due to opposite polarity attraction between unlike charged entities, as shown in Figure 20F (see Figure 1-3 again as to Figure 1-5) as to Newton's and Coulomb's Laws of electrical force (RR').
The resultant electrical attraction force (qq') combines or joins unlike atoms together by way of covalent bonding to form molecules of gases, solids, or liquids.

When the unlike oxygen atom combines with two hydrogen atoms to form the water molecule by accepting the hydrogen electrons (aa' of Figure 1-4), the oxygen atoms become "net" negative electrically charged (-) since the restructured oxygen atom occupies 10 negative electrically charged electrons as to only 8 positive electrically charged protons. The hydrogen atom with only its positive charged proton remaining and unused, now, takes on a "net" positive electrical charge equal to the electrical intensity of the negative charges of the two electrons (aa') being shared by the oxygen atom...satisfying the law of physics that for every action there is an equal and opposite reaction. The sum total of the two positive charged hydrogen atoms (++) equalling the negative charged oxygen atoms forms a "no" net electrical charge molecule of water. Only the unlike atoms of the water molecule exhibits opposite electrical charges.

VOLTAGE DISSOCIATION OF THE WATER MOLECULE

Placement of a pulse-voltage potential across the Excitor-Array (ER) while inhibiting or preventing electron from within the Voltage Intensifier Circuit (AA) causes the water molecule to separate into its component parts by, momentarily, pulling away orbital electrons from the water molecule, as illustrated in Figure 1-5.

The stationary **"positive"** electrical voltage-field (E1) not only attracts the negative charged oxygen atom but also pulls away negative charged electrons from the water molecule. At the same time, the stationary **"negative"** electrical voltage field (E2) attracts the positive charged hydrogen atoms. Once the negative electrically charged electrons are dislodged from the water molecule, covalent bonding (sharing electrons) ceases to exist, switching-off or disrupting the electrical attraction force (qq') between the water molecule atoms.

The liberated and moving atoms (having missing electrons) regain or capture the free floating electrons once applied voltage is switched-off during pulsing operations. The liberated and electrically stabilized atom having a net electrical charge of "zero" exit the water bath for hydrogen gas utilization.

Dissociation of the water molecule by way of voltage stimulation is herein called **"The Electrical Polarization Process."**

Subjecting or exposing the water molecule to even higher voltage levels causes the liberated atoms to go into a **"state"** of gas ionization. Each liberated atom taking-on its own "net" electrical charge. The ionized atoms along with free floating negative charged electrons are, now, deflected

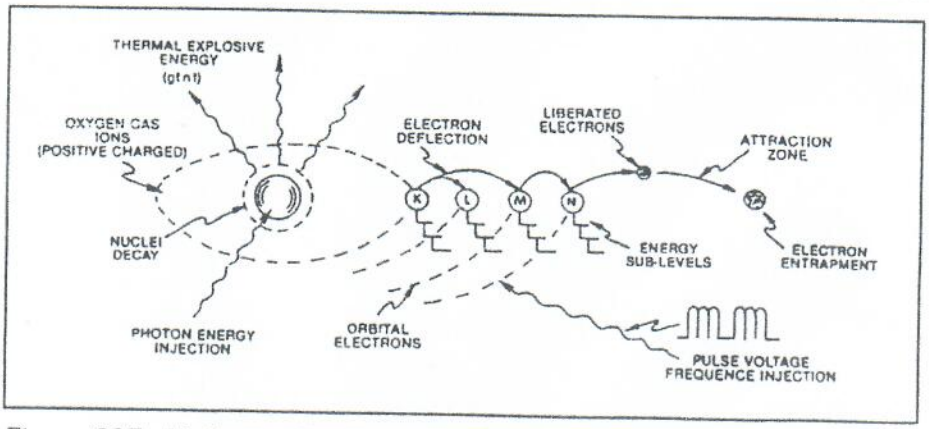

Figure 20F: Hydrogen Fracturing Process