The Investigation of Electromedicine

An Inquiry Into Effectiveness of Electromedicine Devices Against Disease

The Best Electromedicine Devices & Therapies Reviewed

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Preface

This book is the result of my personal interest in electromedicine. I had been healed of a long term viral infection by using the Beck electromedicine devices and so started to research the subject more, build devices, and let friends and associates experiment on themselves and see if all the claims that Beck and Rife had made are true. During those years I experienced other healings using both the Beck and Rife devices as well as other devices reviewed in this book. And many other people sent me their own healing stories. I became pretty convinced that these devices are superior to antibiotics and anti-virals against microbes, especially the Beck devices. But it became obvious that only those who diligently applied the devices in an intelligent way were the ones with the success stories. Those who haphazardly applied the devices did not succeed. Some others did not succeed because they were also abusing their immune systems with junky diets and bad habits. The devices truly only aid the immune system to remove the microbes. They do not do all the job by themselves. So, in reality, it is hard to truthfully make health claims about the devices because oftentimes they are only part of the solution to the health problem. Nothing can substitute for healthy habits that are necessary to keep the immune system strong to fight microbes and infectious diseases. I would not want to contribute to the laziness of others, especially in the realm of health. God has given us these miraculous bodies and it is an act of gratitude to take care of them. So this book presents my experiences and that of others in hope that you too may make your own investigation into electromedicine to see if it is efficacious against microbes. Of course, I would like to be more positive about the devices in some areas, but without clinical studies to back up what I say then any health claims could be considered without scientific basis and would expose me to legal problems with the FDA. That's why this book only talks about the "possibility" of device effectiveness, not a claim that the devices are effective. Anyway, sometimes what works for one person does not work for another, be it by medicine or electrotherapy. Everyone must find their own path to health and well-being. That is much of what life is all about. I hope this book is helpful to you and I now bid you "adios", which means "to God I entrust you". May your journey of discovery be a wonderful one.

[None of this books statements have been evaluated by the FDA, nor are the devices approved by them. This book exists to allow you to investigate the possible effectiveness of electromedicine devices, and not as a prescription for what ails you.]

Introduction To ELECTROMEDICINE

Human history is ripe with examples of resistance to change, even though the change was for societies betterment. And those who promoted the new ideas almost always met with ridicule and sometimes punishment or imprisonment. Usually, those who ridiculed the scientists and innovators were those who were afraid of losing their social status which had, as part of its foundation, the old ideology. Galileo was forced to renounce his belief that the earth was round because of threats of torture, and he spent his last 8 years under house arrest. And Dr. Semmelweis was committed to an insane asylum became he taught that doctors needed to wash their hands before assisting women during childbirth in order to prevent half of the women from dying from infections afterwards.

Recently, the idea has resurfaced (after being suppressed around 1906 when the FDA was created) that fighting infectious microbes (bacteria, virus, fungi) can be done cleanly by electronic means, without the toxic effects that are part of the chemical means of fighting microbes with antibiotics and anti-virals. These anti-microbial chemicals are basically a type of poison that people take in hope they will affect microbes more than they will themselves. Hippocrates, the father of medicine, said "first, do no harm". The medicine of his day was mostly herbs which work synchronistically with the bodies functions to restore health. But the direct effect of herbs against microbes (such as with bacteria-killing garlic) and their support of immune function (by herbs such as echinacea) most often were not sufficient against infectious disease. That's why the "age of antibiotics" superseded the previous herbal age even though it left behind the virtuous "first, do no harm" ideal. Now, if the conventional system will stop suppressing true advancement in medicine, humankind can explore this rebirth of electromedicine against infectious disease because it has been showing itself as having much promise of efficacy against microbes while having no directly harmful effects on the body.

People researching its potential on themselves have reported extreme lowering of viral counts in the blood with AIDS and hepatitis (by lab tests), and disappearance of symptoms in other viral infirmities such as CFIDS, flu, dengue, and herpes. People have reported successes against bacterial infections such as those of the legs (as in diabetes), kidneys, urinary tract, throat, lungs, and stomach. And people have reported success against fungal infections such as lung infections, candida intestinal infections, and sinusitis. Most of all, these personal experiments with electromedicine were done after failure with doctors and pharmaceutical drugs. All this self experimentation started after positive laboratory tests brought to light the high potential of electromedicine. No one yet has made this potential as clear as possible by clinical human studies, possibly because of the high cost (more than \$100,000) and also because of the fear of opposition from the FDA, especially for cancer treatment. There are many books on this subject available in health food stores, but consider the medical monopolies opposition to the cancer cures of Harry Hoxsey, William Koch, Royal Rife, Andrew Ivy, Gaston Naessons, Joseph Gold, and Stanislaw Burzynski. The stories of the suppression of their cures is readable in the book "Politics In Healing" by Daniel Haley.

The following pages give a basic summary of electromedicine and the products invented by Robert Beck, Royal Rife, and others, which I promoted and sold in order to help those who are getting little or no help from conventional medicine, even as I myself recovered my health with the help of electromedicine.

ELECTROMEDICINE DEFINITION

Electromedicine is the medical field concerning application of electromagnetic energy (electricity or magnetics) to the body for health purposes. It has been touted by Beck and Rife as being able to kill or disable pathogenic microbes (virus, bacteria, fungi, etc) and parasites, stimulate lymph fluid circulation, and normalize brain function to counteract addictions, insomnia, stress, and depression. It involves the use of low power levels of electrical energy and should not be confused with electroshock therapy which uses much higher levels of power to shock psychiatric patients back to reality (although I am against it because of the psychological damage it does).

Hipocrates, the father of medicine, said that the first rule of medicine is "to do no harm" which is why I believe electromedicine is superior to antibiotics, anti-virals and anti-parasitic drugs which are all somewhat poisonous to the body. Most electromedicine treatments cannot be felt (other than a possible slight tingling at high level outputs) and the low power does no damage to the body but is enough to affect microbes and parasites. Most of the devices directly apply weak electricity (usually no more than 30 volts) to the body, but the magnetic pulsers apply a short duration strong magnetic field which induces electrical current in the body area being treated. Magnets, which are claimed to be helpful against pain and accelerating healing, output a constant magnetic field which does not induce any electrical current in the body. If a person wants to experiment with them, they should use a high power rare earth magnet (from www.wondermagnet.com) with its "north" end on the body on top of an arthritic joint or an injury. Both magnetism and electricity are "electromagnetic" energy according to science.

The only electromedicine devices most people know about are muscle stimulators which are used to workout and strengthen a muscle group, or to stimulate circulation in stress-holding tight muscles to cause them to loosen up. This latter type of treatment is most commonly done by chiropractors and the devices are called TENS. There are also Cranial Electro-Stimulation devices, which are available by a doctors or psychiatrists prescription in the USA, which can normalize some brain functions, but they are not commonly known. And there's the pacemaker, which is a device which regulates heart beats with electrical impulses to the heart muscles.

Hopefully soon the devices explained in this report will be commonly known and used because, according to Beck and Rife, it is possible to have more success against many common diseases such as AIDS, cancer, hepatitis, herpes, viral chronic fatigue syndrome, malaria (and many other parasitic infections), multiple sclerosis, lupus, and diseases caused by third world viruses (SARS, avian flu, dengue, ebola, hamburg, etc). The Black Plague, which struck during the Dark Ages, was caused by a hidden bacteria which killed 1/3 of the worlds population. The Spanish Flu, which struck during the early 1900's, was caused by a flu virus which killed 3 million people worldwide, and 500,000 people in the USA. Electromedicine devices possibly could have been able to help stop such plagues. The cost of installing one blood electrification unit in a big room to treat 20 - 50 people at the same time is very minimal (<\$200). I believe that electromedicine is the future of medicine against infectious diseases. And the beauty of it all is that anyone with any common sense can understand how these devices work and how to use them on themselves, without any supervised medical help. If we lived in an advanced society then these would be common devices in the hands of the common educated man.

ELECTROMEDICINE HISTORY

The first recorded use of electricity for health was found in Egyptian tombs, estimated to be inscribed around 2750 BC. The drawings showed them touching electric eels for treatment. In the 1st century AD the Greeks were doing the same and recorded various health benefits, including pain relief. In the early days of the USA, Benjamin Franklin invented a device which produced electricity and he was experimenting with it on people with epilepsy. In 1752 Johann Schaeffer published the book "Electrical Medicine". At that time many physicians were using electricity on their patients. In 1858 Dr. Francis, a Philadelphia physician, was the first to describe the relief of dental pain by electricity. After 164 successful tooth extractions using what he called "galvanism" he received a patent on May 25, 1858. His methods then spread throughout the USA and Europe. By the late 1800's the use of electricity for medical purposes was wide spread and described in such medical texts as Osler's "Practice of Medicine". Around 1900 there was much corruption in the business world and there were many medicines and devices being advertised as a cure for all kinds of ailments although some of the claims were exaggerated or false. This situation came to be as a result of an almost total lack of standards in medical education and practice. To investigate this situation, the Carnegie Foundation established a commission headed by Abraham Flexner and subsidized by John Rockefeller who had just purchased stock in pharmaceutical companies. The commissions final report, in 1910, produced an almost instantaneous revision of medical education and electromedicine was prohibited from being taught in medical schools. The report basically discredited electromedicine, and doctors using electrical instruments (which was most of them before this report) began to stop using the devices because the pro-drug efforts were causing them to look like quacks. In spite of the virtual disappearance of all electrical therapy some investigation continued and new diagnostic and therapeutic devices were still becoming available. An electrotherapy book was published in 1916 and it described AC powered devices which had various transformer outputs for applying alternating current to the patient as well as being able to power a large dual-electrode glass vacuum tube that output x-rays which were for taking radiographic photos of bones (with the damaged limb between the tube and an x-ray sensitive plate).

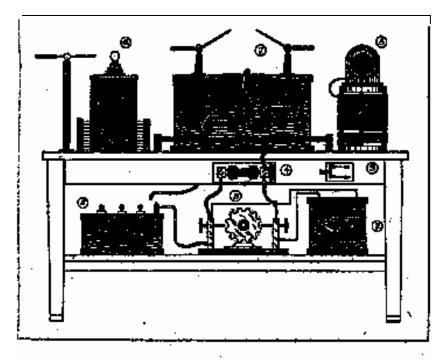


Fig. 1.—Large electro-therapentic paths mounted upon a table

In the 1950's a scientist by the name of Royal Rife invented a new highpowered microscope which he used to observe microbes while subjecting them to an electromagnetic field at various frequencies which he changed until he could observe the microbes destruction. Unfortunately his discoveries were never popularized and were eventually lost until recently. Attempts to revive that knowledge and produce/sell Rife Frequency Generators started happening around 1990. Knowledge of a simpler version of his device surfaced which had come into being after Rife collaborated with John Crane. This device output a simple voltage square wave with direct contact to the body at selected Rife frequencies. This is the common type of Rife device sold now although some companies have attempted to recreate his more complex version that treated the patient with electromagnetic waves although the successes of these complex units have not measured up to Royal Rife's original results. Research into the technology and correct frequencies to use continues today among groups and individuals dedicated to this theme, which are discussed every year at the Rife conference. (see http://www.rifeconference.com)

Another type of electromagnetic therapy came into being around 1993, two years after two researchers at the Albert Einstein College of Medicine discovered that a very low level of electric current was 98% effective at stopping HIV-1 from infecting blood cells in a test tube. There were only a few public reports of this discovery (in the Houston Post, Science News 3-30-91, and Longevity Magazine Dec 1992). The researchers then created a patent for a device which connected to an infected patient by two tubes, one to draw blood out, and one to put it back in. The drawn blood would be treated by electricity in the device to stop the infectivity of the virus in the blood without harming the blood. No company made use of the patent, but a year later Robert C. Beck made an alternative use of the idea. He had the idea of placing two electrodes harmlessly on the skin at locations on the ankles where arteries are just below the surface.

The electricity from his battery-powered device would enter through the skin, into the bloodstream in the arteries, and travel through the bloodstream between the electrodes. He then started to experiment with the blood electrifier on people with AIDS and other viral diseases to discover the effectiveness and necessary treatment protocol. He was successful but found that after a time some patients had a relapse of the viral infection which meant that some viruses were probably temporarily resting in the lymph fluid and therefore not circulating to the bloodstream where they could of been inactivated by the electric current. So to stimulate the natural lymph fluid circulation in patients with stagnant lymph (which is common in the chronically sick) so that the virus-containing fluid would dump its contents into the bloodstream (which is normal in the healthy), he created the Magnetic Pulser. This device created a strong momentary magnetic "pulse" that caused more circulation of lymph in the lymph arteries which caused the lymph fluid to move along through the lymph vessels and rejoin the bloodstream near the heart where the main lymph vessel and blood artery join.

The Pulser also may have broken up electrical attractions and the clumping together of particles, microbes, and white blood cells which would then allow better lymph flow and movement of the microbes towards the bloodstream. With the use of the Electrifier and Pulser together, he said he had success in eliminating relapses of infections in the patients. He then went around lecturing on the subject in alternative health conferences and handing out information sheets which included a schematic diagram for each of the two devices. His purpose in this was purely humanitarian, since he had no financial profit from the lectures or from companies or people who then started making and selling the devices.

Besides the Rife and Beck devices, there have been other effective electromedicine devices recently developed such as the Brain Tuner (for cranial electro-stimulation against addictions, insomnia, stress, depression) which originated in Russia but was further developed by Robert Beck, the EMEM2 (against parasitic infections anywhere in the body), and the Oscillating Magnetic Field Pulser (against bacterial and fungal infections and cancer, which I named the Multi-Pulser). The Brain Tuner was first developed around 1940 in Russia and has consequently been improved and is now available worldwide (but only by prescription in the USA). I have personally used it to successfully combat insomnia and depression. The EMEM2 (Electro-Magnetic Energy Machine 2) can apply an odd AC electrical waveform directly to the body to try to kill parasites (worms) which cannot be killed with anti-parasitic drugs (which are effective mostly when the parasites have not yet ventured past the intestines). I have seen this device used effectively against ascaris lumbricoides (a roundworm) as well as other unidentified parasitic worms in people with the normal signs of parasitic infection (bloatedness, marks in the skin, semi-choking from worms in the esophagus). The Multi-Pulser outputs bursts of magnetic energy which alternates polarity at around 5,000 times per second. I have used it myself successfully against a severe fungal lung infection, a dental bacterial infection (which prevented the necessity of a root canal), various infections from cuts, various pains, and a severe urinary tract infection which also infected the bladder and kidneys. I developed my design of it after seeing patents showing effectiveness against microorganisms and cancer (in rats), and the FDA web page about the effectiveness of oscillating magnetic fields against bacteria and fungi in foods. I also made my own simple device to apply electricity to herpes sores to try to inactivate the destructive virus there. I called it the Skin Electrifier, and my landlord and customers swore by its effectiveness.

ABOUT ROBERT BECK

Robert C. Beck (who developed the home user type of blood electrifier and magnetic pulser) was a physicist, a senior staff scientist at Eyring Research Institute, and a consultant to the U.S. Navy and the Sandia Corporation. The various classified government projects he worked on included a project to measure extra low frequency signals circling the globe. These frequencies are suspect as a means of mind control and Beck invented a small magnetometer that could detect the frequencies better than the existing \$300,000 SQUIDS (Sequential Quantum Integrating Device) in use. In the 1980's he operated his own company



during a time when he did extensive research on the brain. He then developed a powerful electroencephalograph unit.

This research eventually led him to Dr. Margaret Patterson, a Scottish surgeon, visiting the U.S. from England. Dr. Patterson's work was featured in the January 1983 issue of Omni Magazine when Peter Townsend, a British rock star, went public after stopping his slide into "drugged oblivion" from drug addiction by using a cranial electro-stimulation (CES) device. The article, "Brain Tuner", by Kathleen McAuliffe caught Bob Beck's attention.

After working with Dr. H. L. Wen in Hong Kong using electro-acupuncture, Dr. Patterson had developed an electronic device to help her patients with their addictions. Dr. Wong had discovered some of his patients were overcoming addictions without severe withdrawal symptoms by use of electro-acupuncture. Beck subsequently developed his own Brain Tuner after attending a seminar in Quebec in 1982 where he met a researcher who had visited Russia to learn about a 100 hertz CES device that was highly effective against addictions. The first unit Bob made was called a BT5. Later, Bob added extra settings for combination frequencies for the BT6. For his work with the brain, Bob Beck received the John Fetzer Foundation Pioneering Award in 1990. Research with Beck's Brain Tuner gained attention in two books published in the 90's; "Mega Brain Power" by Michael Hutchison, and "Super-Learning 2000" by Sheila Ostrander & Lynn Schroeder.

After inventing his own blood electrifier and magnetic pulser, he proved to himself the effectiveness of them against infectious disease and then started lecturing about this new method at alternative health conferences in the USA. He also funded a study with two doctors and eight people with AIDS. With the use of his electromedicine devices all the patients became symptom free. But because most of them still registered some viral load from a PCR test, the study was abandoned. That situation existed, I believe, because the immune system had still not cleared out all the deactivated viruses at the time of testing. Mr. Beck said he also knew of an MD in a Mexican cancer center who used the devices successfully in over 200 cancer patients, most of which were in an advanced stage of cancer when they started treatment, but I haven't been able to confirm that. He said that the result was that around 80% of the patients were cured. (With my clients I have heard of some of them having success, and some not. But I didn't get enough results to be able to make an evaluation and show what the percentages were.)

Beck himself lost 145 lbs as a result of using his devices. It has since been discovered that there exists an obesity-causing virus (AD-36, an adenovirus) in 15% of overweight people. It's possible that he eliminated that virus by using his devices. Besides this story, he liked to tell of an interesting observation about blood that has been treated with electricity. He said that untreated blood cells normally live for 4 days in a sealed microscope slide, but that treated cells often live for one whole month! So he loved to say that blood electrification can give you "immortal blood". Of course that's an exaggeration but there could be much general health benefit to device users if what he said is even partially true.

His journey of discovery and promotion of the electromedicine discoveries was not without headaches from the government. He told of an incident where armed government men barged into his residence to search for incriminating evidence. And he said that federal investigators used to call him on the telephone to try to get him to give out medical advice so they could convict him of practicing medicine without a license. But, thank God, they never jailed him. He was a great man who contributed what he could to humanity by bringing to light how useful blood electrification, magnetic pulsing, cranial electro-stimulation, and colloidal silver is. Unfortunately the world lost his genius ability on June 23 of 2002 when he died in the hospital after falling and hitting his head. May his spiritual rewards be great, even as his work for mankind was.

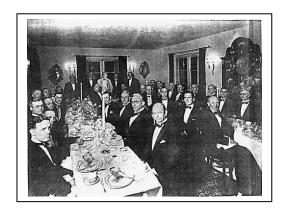
To read the free literature he used to give out at his lectures, you can still find most of it on the internet. Some of his theories of device action on the body have since been refined, but it is still good reading.

ABOUT ROYAL RIFE

In the early 1920's Royal Rife created a new high magnification microscope after having studied optics in Germany. In 1932 he used his microscope to identify a cancer-causing microbe he called Bacillus X (BX) virus that was a virus-sized spore-like motile bacteria. He cultured these microbes and then injected them into lab rats. These injections caused cancer in every one of the 400 rats, which proved that cancer can be caused by this infectious microbe. Later he was able to find the electro-magnetic frequency that would cause the microbe to self-destruct when within that energy field. He called the microbedestroying frequency a "Mortal Oscillatory Rate" (MOR) and theorized that each microbe in existence



had its own MOR. He had created a frequency device that was able to emit an electro-magnetic energy field that was able to successfully destroy patient's cancer microbes with the correct MOR when they were within a few feet of the MOR-radiating device.



On November 20 of 1931 Dr. Milbank Johnson, former president of the Los Angeles Medical Association, invited 30 of southern California's most prestigious medical personnel to a banquet promoted as "The End To All Diseases" at his Pasadena estate. There, Rife's and Kendall's discoveries were announced and discussed. On November 22nd the Los Angeles Times reported that "Scientific discoveries of the Greatest magnitude, including a discussion of the world's most powerful microscope recently perfected after 14 years of effort by Dr.

Royal R. Rife of San Diego, were described Friday evening to members of the medical profession, bacteriologists and pathologists, at a dinner given by Dr. Milbank Johnson in honor of Dr. Rife and Dr. A. I. Kendall. The new microscope, scientists predict, will prove a development of the first magnitude. Frankly dubious about the perfection of a microscope which appears to transcend the limits set by optical science, Dr. Johnson's guests expressed themselves as delighted with the visual demonstration and heartily accorded both Dr. Rife and Dr. Kendall a foremost place in the world's rank of scientists". On December 27 the newspaper reported "Dr. Rife has developed an instrument that may revolutionize laboratory methods and enable bacteriologists, like Dr. Kendall, to identify the germs that produce about 50 diseases whose causes are unknown."

In 1932 Rife brought his 17,000x microscope to Dr. Kendalls' lab in Chicago to study virus-sized microbes along with Kendall and Dr. Edward Rosenow, a senior researcher at the Mayo Clinic. Rosenow published their observations in the July 23 1932 "Proceedings of the Staff Meetings of the Mayo Clinic" and also in an August 26 1932 article in Science Magazine entitled "Observations with the Rife Microscope of Filter-Passing Forms of Micro-Organisms". What they confirmed is that there existed microbes that were as small as viruses.

The cancer "viruses" Rife had discovered were actually "dwarf bacteria" or "nano-bacteria". These observations were generally scoffed at by the scientific community because they weren't knowledgeable of the new high powered microscope of Rife.

In 1934 Dr. Milbank Johnson opened and ran a medical clinic that brought 16 terminal cancer patients from Pasadena County Hospital to the clinic for treatment. Their research team included doctors and pathologists assigned to examine the patients in 90 days. At the end of that 3 months with 3 minute treatments every third day, the team concluded that 15 of the patients had been completely cured. Rife then adjusted the treatment, and the remaining patient also was cured after another month. After this clinical cancer trial, Dr. Johnson formed a Special Medical Research Committee at the University of Southern California to continue to supervise the Rife research and eventually announce it.

In 1936, Rife had trained a Dr. Walker, assistant to Dr. Meyer of the Hoopes Foundation in San Francisco. Walker wrote about Rife's Ray Tube frequency instrument: "The copy of the results of the test on typhoid organisms would appear to establish conclusively its efficacy to kill these organisms in the tissues. If the Ray should prove equally efficient in killing other pathogenic microorganisms, it would be the greatest discovery in the history of therapeutic medicine." In September 1936 Dr. James Couche opened a clinic for treating patients with a Rife Ray Tube and in 1956 wrote: "I saw some very remarkable things resulting from the Frequency Instrument in the course of over twenty years. I had a Mexican boy, nine years of age, who had osteomyelitis (bone infection) of the leg. In less than two weeks of treatment the wound was completely healed and he took off his splints and threw them away. He was completely cured. There were many cases such as this."

In 1937 Rife agreed to the formation of Beam Ray, a company set up to manufacture the frequency instruments. Ben Cullen, Rife's old friend since 1913, became president. Philip Holyland was the engineer, and Dr. Couche was also involved. 14 Frequency Instruments were built, with two going to England, one to Dr. Richard Hamer, one to Dr. Author Yale, two to Arizona doctors, and the remaining 8 devices to southern California doctors. Ben Cullen later wrote: "Hamer ran an average of 40 cases a day through his place... Hamer was very well known on the Pacific coast... His case histories were absolutely wonderful. We would go in there and see rectal cancers... He cleaned them up completely... people...that had developed cancers, he'd find they had syphilis or gonorrhea. By golly, he'd clean those up completely. Not a doggone taint of it in the blood stream at all. Clinically cured. Among Dr. Hamer's cases was this old man from Chicago. He had a malignancy all around his face and neck. It was a gory mass. Just terrible... He was a sight to behold. But in six months, all that was left was a little black spot on the side of his face and the condition of that was such that it was about to fall off. Now that man was 82 years of age. I never saw anything like it. The delight of having a lovely clean skin again, just like a baby's skin. Well, he went back to Chicago. Naturally, he couldn't keep still and Dr. Morris Fishbein heard about it. Fishbein called him in and the old man was kind of reticent about telling him. So Fishbein wined and dined him and finally learned about his cancer treatment by Dr. Hamer in the San Diego clinic. Well, soon a man from Los Angeles came down. He had several meetings with us. Finally he took us out to dinner and broached the subject about buying Beam Ray. Well, we wouldn't do it. The renown was spreading and we weren't even advertising. But of course what did it was the case histories of Dr. Hamer. He said this was the most wonderful development of the age."

Unable to buy Beam Ray, another tactic was devised. Ben Cullen said that a partner in the company was bribed. Holyland had helped with certain electronic improvements and apparently was the only one other than Rife that knew the secret Rife frequencies. He deemed himself more valuable than the others, and so demanded more shares of the company (which had been equally divided among them).

After being refused, he filed a suit against Beam Ray, claiming he'd discovered the frequencies, apparently hoping to seize control of the company and then cut a deal with the L.A. man who was presumed to be the representative of Fishbein. On June 12, 1939, Beam Ray won the court case but Ben Cullen was broke from financing their defense and from lack of sales. During and after the trial, the San Diego Medical Society had warned all doctors that they could lose their licenses if they were using the Rife Ray Tube. Only Dr. Couche refused to stop using his device and did not lose his license. Before the trial, Rife was planning to leave for England to take a microscope and two frequency instruments to Dr. B. Winter Gonin, who, along with his associates, had planned to distribute the microscope worldwide. One week before Rife's departure, he was subpoenaed for the Holyland trial. The main casualty of the trial was not Beam Ray, but rather Royal Rife, who was a very gentle man. Holyland's lawyer had tore into Rife verbally in a way he had never before experienced and his nerves gave out. After that, he started drinking heavily and became an alcoholic. Ben Cullen wrote: "afterwards, during his clear moments when he wasn't under the influence of liquor, he would endeavor to progress but every doggone day at a certain time he would go and get a little nip out of his car and that was the end of it."

In 1944, on the eve of a press conference to announce the results of the Research Committees studies on Rife's cancer therapy, Dr. Milbank Johnson was fatally poisoned in the hospital while there for a tonsillectomy, and his papers were stolen. Dr. Nemes, who had duplicated some of Rife's work, was killed in a mysterious fire which destroyed all his research papers. A similar fire also destroyed the Burnett Lab, which was validating Rife's work.

Rife eventually broke his alcohol addiction, and in 1950 he advertised for a tool and die maker and John Crane answered the ad. Crane had the needed skills, some knowledge of electronics, and was a good machinist, so Rife hired him. Fascinated by Rife's story, Crane urged him to build more Frequency Instruments. In addition to helping him with these, Crane urged him to write, and several of Rife's few writings are from this period. In 1954, Crane contacted the National Cancer Institute about Rife's device and cancer therapy, but they were convinced it couldn't work, although they had not spoken with Rife or any doctor who had success using the instrument. In 1960 Crane and a salesman of his was arrested for practicing medicine without a license and both of them spent 3 years in prison. Witnesses at their trial testified to the instruments curing them of a chronic bladder irritation, the elimination of a throat lump half the size of an egg, fungus growths on the hands, fissures in the anus, pyorrhea, arthritis, ulcerated colon, varicose veins, prostate troubles, tumorous growths over eyes, colitis, back pains, heart attacks, and a cancer tumor on the spine the size of an egg. During the trial Rife lived in Tijuana, Mexico, and during this time his San Diego lab was broke into and set on fire, destroying much of his equipment and the movies of microbes showing their being destroyed by frequency treatment. John Crane lost his boldness and enterprising nature while in prison, and left a

Participating in the original 1934 U.S.C. study were the following people: Arthur Kendall, director of the Northwest Medical School, Rufus Klein-Schmidt, president of the U.S.C., Milbank Johnson, Edward Kopps of the Metabolic Clinic in La Jolla, George Fischer of the N.Y. Children's Hospital, Kurt Meyer of the Hooper Foundation in San Francisco, and Whalen Morrison, the chief surgeon of Santa Fe Railway.

Dr. Milbank Johnson, who was the professor of Physiology and Clinical Medicine at U.S.C. and chairman of the Special Medical Research Committee, operated his own cancer clinic utilizing the Rife therapy for 10 years. He was able to document many cases of cancer reversal there.

By the late 1950's even independent doctors and labs (among them New York's Presbyterian Hospital), unaware of Rife's work, were bringing forth their own proof that cancer was an infectious viral disease, and maintained that "cancer does not consist of a localized tumor alone." They described it as a generalized disease caused by an organism in the blood. More recent research has shown that a combination of cancer-causing viruses and cancer-causing toxins have a multiplied effect instead of a doubled effect. It could be that all of us have cancer-causing viruses (one of which is SV-40 which entered the population via tainted polio vaccines decades ago) which the immune system is able to keep from causing tumors until the system is also burdened with cancer-causing toxins (such as from cigarettes). The viral aspect of this disease is surely reflected in the fact that now half of all Americans will get cancer sometime in their life. This preponderance of the disease in modern times is indicative of an infectious disease epidemic.

On several occasions Royal Rife spoke about some of his personal beliefs; "I hope I have helped humanity some. I am just an ordinary man, doing the best he can. We are all here to do our part. Each has a purpose as he lives it and thinks it. We need religion to balance scientific discovery, and the material and the spiritual must go side-by-side. Religion guides scientific discoveries. Religion is a stabilizer. I sincerely think and believe that our good Lord helps us in many ways to accomplish our desires. This has been proven in many cases where results obtained were from none other than our almighty God. The most important thing I ever did was build a microscope. The things I've done have possibly helped humanity. I have tried to create and develop things for the good of the universe. I am grateful to God that he has allowed me to do the things I have done."

ELECTRONIC MEDICINE and ANTI-AGING

With a Blood Electrifier, Magnetic Pulser, and Magnetic Multi-Pulser, I believe people may be able to lay aside most of their normal conventional medicines. This is my belief because I have personally experienced and seen so many different successes by electrotherapy. I think these 3 devices will find the most use in the hands of someone with lowered immunity, which is typical in those with Epstein-Barr Virus (the cause of CFIDS) and HIV. But I really think everyone should have these to try to fight colds, flus, infections (especially the new types that are antibiotic-resistant), and anything out of the ordinary (hanta virus, dengue, ebola, hamburg, biological warfare germs, etc). Life is too short to be wasted being sick. Instead of being on the defensive, a person can actually try to be on the offensive against disease and aging by using these devices.

Blood electrification may also be able to break up the clumping together of red blood cells which is a common problem according to those who do blood cell analysis (which is looking at blood through a microscope). When my blood was analyzed by a doctor after my first 2 months of electrification, it was seen that my blood was nearly perfect. It had no stacking together of the red blood cells which means that each blood cell was free to function 100% since all of the surface area was exposed which allowed maximum delivery of oxygen to the body cells. Oxygen purifies and energizes the body. Richly oxygenated blood is necessary to disallow cancer to proliferate. One of the reasons for regular exercise is to oxygenate the body and increase the circulatory systems capacity which is of benefit even when not exercising.

My blood also showed good shape (not too fat or thin), no tearing (damage caused by toxins), and very little garbage (from toxins, microbes, and yeast) free-floating in the blood serum (watery liquid that transports the blood cells). The person who did the analysis (Dr. Barclay Tait of Tennessee) said a poster made from a picture of my blood would be very good to show others what blood should look like. That surprised me since I had just gotten over a 15 year viral infection (by doing blood electrification and magnetic pulsing) that had kept me continually sick and tired. 2 years later, after continual daily electrification of my blood during those 2 years, I had my blood analyzed with regular blood tests and all the results were within normal range. These two tests confirmed to me that long term blood electrification had no detrimental effects on my blood.

After 6 years of daily treatments I was feeling so good I started to participate again in a young mans sport which required much cardiovascular fitness. After a season of competing once a month I was the best one in my division (which included people as young as 20 yrs old) which is quite an accomplishment for a 46 year old man who exercised very little. I felt like the daily treatments had improved my cardiovascular system which is very important in most sports. So in addition to fighting microbes in the blood, electrification may possibly reduce the likelihood of premature aging (which is the result of poor circulation, low oxygen levels, and low nutrition). At 46, no one ever believed I was older than 35. Medical journals have shown that electrification of cells causes an increase in cellular ATP, which means, if the same holds true for your blood cells, that they will operate and function with more energy. If these two ideas are true, that means your bloods transportation of nutrients and your bloods immune cells may function more effectively which can affect every aspect of health. That explains why sometimes blood electrification often seems to better the health of people with conditions that aren't directly caused by a microbe.

INCURABLE DISEASE + ELECTROMEDICINE

Electromedicine is making a comeback just in time because recently there have evolved new viruses and new strains of antibiotic-resistant bacteria that can cause the diseases of Tuberculosis, Cholera, Pneumonia, Meningitis, Scarlet Fever, Strep Throat, and untreatable infections of the ears, skin, and blood. Most living things, bacteria included, have the ability to adjust to varying living conditions as a survival mechanism. So, after decades of exposure to the same antibiotic chemicals, they have successfully transformed themselves to have a tolerance to those same chemicals. That's the bad news. The good news is that data (lab tests and anecdotal evidence) shows a possibility that there is no bacteria that can't be attenuated (rendered ineffective) or outright killed with electricity (of small bio-compatible amounts from a blood electrifier) or magnetically-induced electricity (from the Multi-Pulser).

With the use of a Blood Electrifier and Magnetic Pulser for blood-borne microbes, and the use of a Multi-Pulser for localized microbial infections (those in one location of the body), the result is all kinds of good possibilities against incurable infectious diseases. The same also applies to virus-caused diseases. Modern medicine still has no chemical brew that can kill viruses. The most they can do is limit their infective ability (the ability of them to attach to body cells so they can reproduce). But the drawback of anti-viral drugs is that they are toxic chemicals to the body and they make the users feel toxic with varying side effects, some of which are worse than the disease they want to eliminate.

The main negative side effect can be an actual lowering of immunity. This is very undesirable because only your own immune system can kill and/or remove viruses from the body. So although an anti-viral drug causes less viral infectivity, it can also reduce the kill rate of the viruses by the immune system. Investigators have already proved that electricity stops the viral infectivity of HIV (in vitro) without negatively affecting the ability of the immune cells to kill the virus. Viruses are the cause of all the following diseases; AIDS, flu, Herpes 1+2, Hepatitis, Chronic Fatigue Immune Dysfunction Syndrome (CFIDS), Ebola, Dengue, and the Avian Flu. Last, but certainly not least, there are many forms of viral-caused cancer:

VIRUS

Human Papilloma Virus (HPV)
Hepatitis B + C virus
HTLV-1
HTLV-2
Epstein-Barr Virus
Epstein-Barr Virus
Kaposi's Sarcoma Herpes Virus
HPV-5 HPV-8, HPV-17
HIV-1
Simion Virus 40 (SV-40)

Human Mammary Tumor Virus

TYPE OF CANCER

Cervical Cancer
Liver Cancer
a type of Leukemia in Japan
Hairy Cell Leukemia
Burketts Lymphoma, Naso Pharyngeal Cancer
majority of non-Hodgkins Lymphoma
Kaposi's Sarcoma, Myeloma
Skin Cancer
AIDS related Cancer
Brain Cancer
Breast Cancer

Viruses are cancer-causing when they have the ability to alter the DNA of a human cell so that when the cell replicates itself, it will be with an incomplete DNA sequence so that it loses its normal function and thus becomes "cancerous".

OUESTIONS & ANSWERS ABOUT BECK ELECTROTHERAPY

What is this electro-medical technology basically about?

It's about using small amounts of electric current or magnetic fields to try to disable or kill microbes (virus, bacteria, etc) in the body.

Are there other medical devices which safely use electric current on the body? Yes, there are muscle stimulators which run at frequencies between 1 and 130 hertz which relieve pain, reduce spasms and edema (water retention), and tonify weak muscles. TENS devices are used to block pain, and run at around 80 to 90 hz. Interferential Therapy units are a type of muscle stimulator and run at 3000 to 4000 hz. Bio-feedback instruments used to modify behavior and retrain the nervous and muscular systems, run from below 1 hz to about 40 hz. Bone Growth Stimulators, used to heal broken bones faster, run at various frequencies. Deep Brain Stimulators, which use implanted electrodes to impart electrical pulses, run front between 120 and 160 hz directly to the brain to control involuntary muscle movement. Cranial Electro-Stimulators output 111 to 1000 hz to the head in order to reduce insomnia, stress, addictions, and depression. Heart Pacemakers send electrical impulses to the heart to help regulate its rhythm.

Are the Blood Electrifier and Magnetic Pulser safe?

The Electrifier delivers less current than the FDA-approved TENS units, and the Pulser delivers only momentary pulses of a magnetic strength that is less than that of MRI body scanners. Dr. Steven Kaali, owner of 2 blood electrification patents, said that the amount of electricity needed to combat viruses has no bad effects on the blood. In the Biophysics Journal (Vol. 58, Oct 1990, pgs 897-903) the author wrote that "human erythrocytes treated with AC fields for hours were shown to have normal shape, volume, and permeabilities to potassium and sodium". (Erythrocytes are a type of human blood immune system cell.)

Is the electric current helpful to the blood cells?

Beck has said that treated blood becomes so much more "vital" that it will stay alive inside a sealed microscope slide 7 times longer than untreated blood will. And it is possible that the electrical current recharges the energy level of the blood cells which would result in an ATP energy production increase of as much as 500%! (See "Effects of Electric Current on ATP Generation in Rat Skin" by Cheng & Nook, Clin Ortho and Rel Res. #171 Nov-Dec 1982). Some people have reported that they do blood electrification just for the extra energy they get as a result.

Are there any devices like the Magnetic Pulser that have FDA approval? Neotonus products have been approved since 1998. Their Extracorporeal Magnetic Intervention device uses pulsed magnetic fields to treat neurological and neuromuscular disorders. It works by producing a highly focused time-varying pulsed magnetic field that penetrates deep into a targeted region of the body to painlessly stimulate nerve activity in the region which causes muscle contractions and increased circulation. This magnetic field is stronger than that of the Beck style Magnetic Pulsers. And the Neuralieve units (almost identical to the Magnetic Pulser) will be marketed in 2007 for use on the back of the head to stop migraines.

How do you know electromedicine is a true medical field that is truly useful? This bio-technology is based on reproducible laboratory research which proved the consistent negative effects that electric current and oscillating magnetic fields had on microbes in lab tests. Also, many hundreds of people have reported their health successes over disease and disease-causing microbes by using electromedicine devices. These people include doctors, nurses, chiropractors, nutritionists, researchers, and bio-medical scientists. Also there are medical device patents issued for these types of electrotherapy devices. Patents aren't granted without significant scientific evidence in favor of the device.

Why haven't these devices become FDA approved?

Because the approval process costs over \$100,000 (paying clinics to conduct double-blind human studies), which none of the alternative people promoting these devices have available to spend. The drug companies could, but so far have not expressed interest in these devices.

Is using electricity for health a new concept?

No. It used to be a common treatment before 1910. To see a complete history of electrical medical devices you can go to the Bakken Museum of Electromedicine in Minneapolis. Also, researchers in Geneva have discovered that one of the methods human immune cells use to combat bacteria and fungi is to give them an enzyme-triggered electrical shock. So, actually, electricity has been used for health ever since the first human existed! And at http://www.thebakken.org/research/bibliography-electricity.htm you can see a bibliography which shows 840 titles of works relating to the history of electricity and magnetism and their diverse applications in medicine and the life sciences.

How does Magnetic Therapy compare to using a Magnetic Pulser?

Magnets provide a constant force field, but a non-constant varying magnetic field is needed to induce electric currents in the human body. Magnetic Pulsers "pulse" magnetism into the body which induces electric current therein. According to W. H. Philpott, magnets are good for arthritis pain and speeding healing but they do not create any electric current in the body.

What is meant by "60 hz"?

"Hz" is the scientific abbreviation for "hertz" which means cycles-per-second. A voltage waveform with a frequency of 60 hz is one that completes a cycle of polarity change from positive to negative, and back to positive, sixty times each second of time.

Do these devices produce a harmful "EMF" (electro-magnetic field)?

The blood electrifier doesn't produce any EMF. The Pulsers produce some, but only for a fraction of a second every time they pulse. EMF that is harmful is strong and continuous (such as what you get when living close to a high voltage power line, or watching TV within 6' of it).

Are there any books available on the subject of Electrotherapy? Yes:

The Body Electric, Robert O. Becker, William Morrow, Inc., New York, NY (1985); Tissue Response To Exogenous Electromagnetic Signals, Jonathon Black, Orthopedic Clinics of North America, Vol. 15, No. 1 (1984); Electrotherapy for Acceleration of Wound Healing: Low Intensity Direct Current, Patrick J. Carley and Stanley F. Warnapel, Artc Phys Med Rehabil. Vol. 66 443-446 (1986).

What is lymph fluid?

Lymph is basically blood fluid without the blood cells. By virtue of blood pressure, blood serum (the "water" of the blood) partially flows into the lymph system (leaving the blood cells in the blood) and flows into the lymph vessels and nodes, and then empties back again into the bloodstream close to the heart. It is thought that most sick people's lymph flow is stagnant and moving too slow (due to lack of exercise, eating too much meat and dairy products, not drinking enough non-sweetened liquids, etc).

What does it mean if someone gets better using these devices but still doesn't feel healthy?

It means that he/she has gotten rid of the source of the problem but not the results of the problem. The results may be a congested liver, weakened adrenals, mineral imbalances, low thyroid function, lessened intestinal acidophilus count, weakened cardiovascular system due to inactivity, kidney stones, gallbladder stones, systemic candida infection, intestinal bacteria and parasites, and countless other nuances. As a person corrects these remaining imbalances with the help of a Naturopath, he/she will slowly regain his/her feeling of vitality. Also, even without other problems, sometimes it takes a while to recover as the immune system slowly rebuilds itself.

Is there anyone these devices can't help?

Everyone is a carrier of multitudes of bacteria and viruses that these devices can help clear out. For instance, a book about Chronic Fatigue Syndrome states that 97% of adults carry the Epstein-Barr virus, which can cause CFS if the immunity is weakened which allows the virus to multiply too much. The immune system is constantly expending energy to keep bacteria and viruses from multiplying to harmful levels. If they were all eliminated, then the body's energy could be redirected to avenues of healing and building instead of defense.

How do you explain why some people can do Beck Electrotherapy without any effects?

The blood electrification just potentially keeps newly created viruses from infecting other blood cells. That's stage one of the viral removal process. Stage two is the immune cells attacking the deactivated viruses. But that happens at a very low rate of activity if the immune system is very weak. If that is the case, then the person could take a herbal product called MGN-3 which is reported to increase immune cell activity by 3-8 times more. Another reason some people feel no effects is that there are no microbes in the bloodstream because they have a correctly functioning immune system.

What did Beck mean by saying that blood electrification causes T-cell counts to drop because of cell lysing?

He meant that infected T-cells, which are a type of immune cell targeted by HIV and Epstein-Barr virus, can be made to break open and die due to the electric current. This stops the viruses from reproducing inside the cells, and exposes them to the neutralizing electric current although it also destroys the T-cell (which will eventually burst open anyway). This is one reason people need to start with minimum treatment times so that they won't get overly toxic with cellular debris due to cell lysing.

Why did Robert Beck claim that these devices cause electroporation?

Because Beck mistakenly thought that electroporation was the correct scientific term to describe what happens when low frequency (under 10 hz) electricity applied to the blood causes the blood cells to easily absorb too much of chemicals (medicine, herbs, etc) that are in the bloodstream at the time of blood electrification.

What is electroporation?

It is a temporary condition of the outer membrane of blood cells becoming 'porous' (with small holes) as a result of high electric fields affecting the cells. While the cells are porous, normally unwanted fluid & substances can enter into the blood cell with resultant disturbing effects.

What is the evidence that the high-absorption effect is not electroporation? Brian Austin, Technical Support Manager at Genetronics (an electroporation device company), emailed me concerning the blood electrifier that "with the (electrical) conditions used (from the blood electrifier), there should be no electroporation effects. Field strengths are not high enough." J. C. Weaver of the Massacheusetts Institute of Technology in his report on electroporation published in the Journal of Cellular Biochemistry (51:426-435 1993) reported "In the case of isolated cells, mammalian cells experience electroporation for electric fields of about E=1kv/cm (1000 volts with a distance of 1 centimeter between electrodes) for short pulses." The blood electrifier only produces about 1.35 volts per centimeter when the electrodes are placed on the same wrist, and even less when used from wrist to wrist.

What is the evidence that the blood cells are more absorptive during electrification?

In the Biophysics Journal, Vol 58 Oct 1990, pages 897-903 the authors wrote that "...electric fields that generate transmembrane potential in the range of millivolts are capable of activating membrane transport systems." (The blood electrifier does create a potential across the blood cell membranes of millivolts.) Also; "...reversible activation of certain membrane channels or transport systems may be achieved using low-amplitude, low frequency alternating current fields. Electric fields as small as 16 volts per centimeter have been shown to induce membrane conductance, and these effects were completely reversible." From these journals I found the term "transfection" which I think most closely applies to the blood electrifiers high-absorption effect. (see transfection graph \rightarrow)

In Fig. 1 transfection efficiency with ac fields of different waveforms are also compared. Transfection efficiency was reduced by one order of magnitude with a sine wave ac field. A triangle wave ac field was even less effective for electrotransfection. The optimal frequencies in all three cases appeared to be identical at 1 Hz.

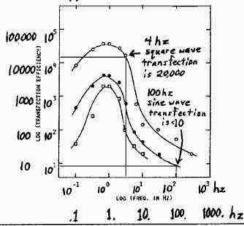


FIGURE 1 Frequency window for DNA transfection by low-amplitude, low-frequency ac electric fields. Experimental details are described in Materials and Methods. The peak-to-peak amplitude of ac fields was 200 V/cm and exposure time for each sample was 30 s. Control samples not treated with ac fields or treated with a dc field of the same strength for 30 s showed transfection colony counts ~10. Logarithm of the transfection efficiency (expressed in colonies per microgram DNA) is plotted against the frequency of the applied fields for square waveform (O), sine waveform (O) and triangle waveform (D). The initial temperature of electroporation was 4°C, and the temperature rise due to the applied field was <2°C.

Biophysical Journal

Volume 58 October 1990

QUESTIONS & ANSWERS ABOUT RIFE TECHNOLOGY

What is Rife technology about?

It's about applying electro-magnetic energy to the body at frequencies that are theoretically destructive to the microbes in the body. These frequencies are called Rife frequencies although only 10 out of dozens that exist now came from Rife. After his death, other researchers added new frequencies for various microbes and diseases.

What types of electro-magnetic energy do Rife devices output to the body? The most common type is alternating current from square wave voltages applied directly to the body. The 2nd type is radio high frequency energy waves switched on and off at the lower Rife frequencies. These energy waves are transmitted through the air to the patient who is close to the transmitter.

How does the energy applied at Rife frequencies affect microbes?

It is theorized to devitalize or kill them without negative affects to healthy tissues or body fluids. Rife discovered a lethal frequency for each of 10 microbes by observing the microbe with his 17000x microscope while varying the applied frequency until the correct frequency was found that killed the microbe. It is believed that each microbe can be killed by just one frequency, possibly because the frequency resonates perfectly in the microbe (to its detriment) because its wavelength matches the microbes diameter.

Is there any pain or discomfort felt while receiving Rife electrotherapy? Nothing at all is felt while using non-contact Rife devices, but the contact type can cause a slight tingling if the power output setting is too high.

Have Rife devices been FDA approved?

No one has spent the money to get them through the approval process in the USA yet, but they have been medically approved in other countries, including Germany and South Africa.

Are Rife contact-type devices similar to the Beck blood electrifier? Their electrical output (30 volt peak AC square wave) is basically the same, but a Rife device can be adjusted to any Rife frequency desired, whereas the blood electrifier is designed to work at frequencies between 4 and 60 hz.

Are Rife contact-type devices similar to the blood electrifier in application of the energy?

The Rife devices apply the electricity to two different parts of the body via large square electrodes, whereas the Beck device applies the electricity to two different locations where the artery is close to the skin, and the electrodes are small 1" long ones. The Rife frequency affects a large cross-section of the body (mostly traveling through lymph and blood), whereas the electricity from a blood electrifier is thought to flow mostly through the blood in the arteries in a path from one electrode to the other.

ORIGINAL INFORMATION FROM ROBERT C. BECK

The following is from the 1999 literature distributed by Robert Beck about his electromedicine devices (blood electrifier & magnetic pulser & colloidal silver maker) and their believed effects against infectious microbes.

Quotes from Beck's literature:

In a public lecture (Oct. 19, 1991) the writer proposed this theoretical do-it-yourself method for eliminating HIV, parasites, fungi, virus and pathogens in vivo. Subsequently, his original modalities and protocols have been refined, simplified and made universally affordable. These three simple treatments used in tandem are offered for research purposes to determine the extent to which they nullify known electrosensitive pathogens residing in blood, lymph, and other bodily tissue and fluids. Following is a summary of several years of testing with this non-iatrogenic, do-it-yourself, simple and inexpensive experimental solution to the ever-escalating "incurables" dilemma. There are no known side-effects since microampere currents applied to skin are much lower than those in FDA approved TENS, CES and muscle stimulators which have been in safe daily use for many years. The described system delivers stimulation through normally circulating blood via electrodes placed at selected sites (such as one electrode below ankle bone on inside of foot and another on opposite foot) over the sural, popliteal, posterior tibial, or peroneal arteries where the subjects' blood vessels are accessibly close to the surface (or on wrist or arm). Treating approximately 120 minutes per day for four or six weeks should, in the writers opinion, effectively neutralize well over 95% of HIV plus any other electrosensitive viruses, parasites, bacteria, pathogens or fungi in the blood. In heavy infections, shorter application times will prevent stressing patients with toxins. Simply treat for a greater number of days or also ingest ozonated water. In time, the restored immune system plus silver colloids may handle residual problems. In the special case of diabetically impaired circulation, longer treatment times may be indicated. Immobilized viruses may be expelled naturally through kidneys and liver. More rapid neutralization is possible but not recommended because of potential excessive toxin elimination (Herxheimer's syndrome). T-cell counts usually drop initially because of cell lysing and scavenging by macrophages but should recover and increase after a few months. Latent/germinating HIV reservoirs in body's lymph or other tissues and glands may theoretically be neutralized with a second and separate device by the strategy of generating a very high intensity (~20 kilogauss) short duration (~10us) magnetic pulse of >32 Joules by discharging a modified strobe light's capacitor through an applicator coil held against body locations over lymph nodes, thymus, kidneys, adenoids, and other possible internal sites of latent infection. By the physics of Eddy current/back-emf "transformer action" (Lenz' law) the desired criteria of minimum current induced through infected tissue on the order of >100uA should be readily attained. Several pulses repeated at each site over several weeks may insure a reliable "overkill" for successful disease neutralization. A magnetic "pulser" is very simple to build. But be advised that electronic cures may be vigorously suppressed or ignored because there is presently no credibility nor drug cartel profit in this inexpensive solution. This was independently developed by me, Bob Beck, at my private expense and offered freely for "theoretical, informational, and educational purposes only" and with absolutely no profit motive.

[end of quote]

APPLICATION of the BLOOD ELECTRIFIER

In order to apply electric current to the bloodstream, the easiest way is to use one electrode on each wrist, putting them 1 inch from the wrist crease (at the base of the hand), laying them on the "valley" between the main tendon and bone, and in-line with the arm (parallel with the artery). The cloth of the wrist electrodes need to be first soaked in tap water so that the current can conduct from the electrodes center metal to the skin through the water (which is electrically conductive due to its mineral content).

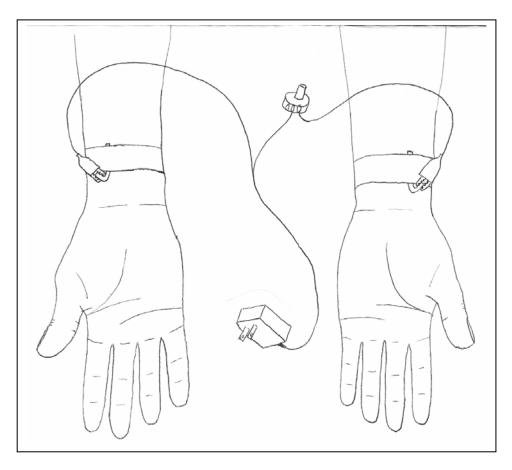
A substitute for a non-commercial wrist electrode could be just using a 1+1/2" square of tight-weave all-cotton cloth, rolled up tightly and sewn lengthwise to keep it from unraveling. Both of these types of wrist electrodes should be held in place with a 1" wide elastic band with Velcro on the ends for adjustability.

The electricity, once in the blood of the arteries, will stay there because electricity always seeks the path of least resistance. The blood is more electrically conductive than the skin/muscle/bone and therefore offers less resistance to electric current flow. The current will flow from one electrode to another via the path of least resistance, which is the blood in the arteries which carries the microbes (causing systemic infections) which can be killed or inactivated by electricity.

Being treated by electricity of frequencies below 10 hertz, the blood cells tend to become temporarily more permeable which means that any strong substance in the blood serum can more easily penetrate into the blood cells. This process is a type of "transfection" (trans-membrane infection) and is more pronounced the lower the frequency is although 1 hz has the strongest transfection effect, and DC (which is 0 hz) is less than 4 hz (which is the frequency Beck preferred) in effects. This effect is felt as an amplification of the normal effects from chemical substances (natural or not) in the bloodstream. For instance, if one does low frequency blood electrification after drinking coffee, he/she might feel like 5 cups were drank instead of just one. Also, this effect may cause one to feel toxic, with a headache and tiredness. So the recommendation is that one doesn't use low frequencies (including DC current directly from batteries) if he/she has taken any strong substance beforehand that day, or took antibiotics or anti-virals or chemotherapy the previous days. Substances considered "strong" include any medicine, medicinal herbs (either ones with potent effects, or large amounts of them), nicotine, alcohol, mega doses of vitamins, and even carbon monoxide from breathing much auto exhaust or air from a faulty gas heater.

The number of hours needed between taking a strong substance and doing blood electrification at low frequencies varies depending on the potential toxicity, but generally the blood is clean enough in the morning to do the treatment without problems since during the night the organs were cleansing the blood. Low frequency treatments are more effective against microbes than higher ones, but it is thought that DC can possibly cause some water molecules in the blood to break up into hydrogen and oxygen molecules, and the oxygen molecules (unescorted by red blood cells) can act as free radicals which is not desirable. For this reason I recommend that DC treatments be done for no more than 1 hour daily for 1-2 months, whereas 4-60 hz treatments can be done one hour daily for the rest of ones life.

The normal treatment protocol is to turn the control knob till you can feel the electricity and back it off a little. Start using 50 or 60 hz for 15 minutes and see how one feels both that day and the next. If the person feels OK then they should daily increase the time by 5 minutes until he/she gets a slight headache as a result of treatment. Then the time should be kept at that level daily until the day comes when one no longer experiences a headache. The idea is to keep increasing the time as one is able. Most people can work up to 1 hour after 1 month and work up to 2 hours by the end of the second month. Normally, as the days goes on, one will be able to turn the control farther clockwise (increasing the current) as the nerves get used to the electricity. One could use a 1K resistor in-line with one of the main output wires to adjust the device control for a digital voltmeter to read .15 volts across the resistor. That would indicate an ideal 150 uAmp going to your wrists. After 2 months or so, a good final test, to see if all microbes are eliminated from the bloodstream, is to do blood electrification for 4 hours in the morning to see if any side effects are subsequently felt. If there are, then more treatments are needed until the final test yields no headache or tiredness.



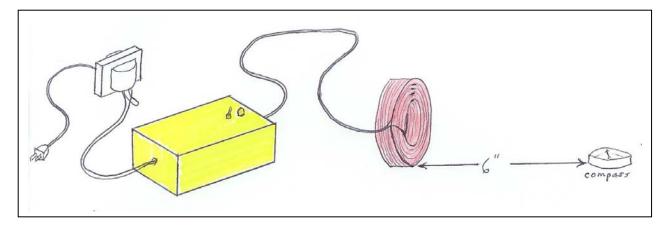
Connection to wrists for blood electrification

APPLICATION OF THE MAGNETIC PULSER

As was stated before, magnetic pulsing is believed to cause circulation of the lymph fluid which is helpful in two ways. It is primarily helpful to move out any microbes hiding out in the lymph fluid into the bloodstream where they can be exposed to electricity via blood electrification. Secondly, it is helpful to move out more immune cells from the lymph system (where they are created) into the bloodstream where they can attack the microbes that have been or will be zapped by blood electrification. The most basic way to use the Pulser is to apply a magnetic pulse 3 times to each 4" long area along the path of the main lymph vessels. These vessels are closest to the skin along the inside of the legs, where the lymph nodes are at the groin, along both sides of the spine, on the underside of the forearms, on the underside of the arms, below the collar-bones, and on both sides of the neck.

Treatment should be started above the ankles and then incrementally moved up to the groin and then up along both sides of the spine up to the top of the back. Then continue at the inside of the wrists and work along the undersides of the arm to the center of the persons chest and then go down the sides of the neck. Then if a person wants to, he/she can pulse all the rest of the body which is recommended to do at least once a week to help neutralize any electrical attractions keeping microbes stuck and not in circulation. Magnetic pulsing can be done by itself or while one is doing blood electrification.

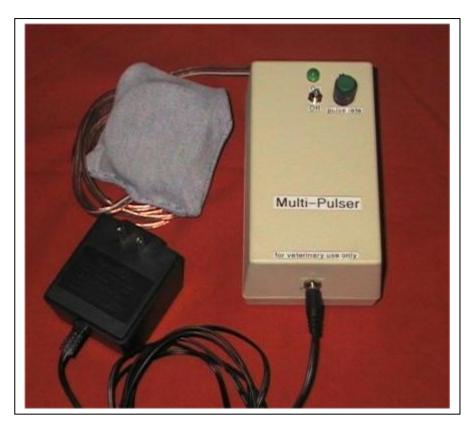
The output coil emits a north pole magnetic energy on one side, and a south pole energy on the other side. For best results one should place the north emitting side on the body with the south side facing away from the body. North pole energy is reported by biomagnetic expert William H. Philpott, M.D., to have its own pro-immunity properties. To find out which side is which on the output coil, one would need to test its output with a needle compass. (see drawing below.) The coil's north emitting side will move the north-seeking pointer of the compass away from the coil. (I know that sounds backward but it's not.) The north pole side of the coil should be marked so that from then on the user will know which side to place on the body.



When using a Pulser, one should make sure the marked side is the one touching the body. Care should be taken not to use the output coil close to any magnetic media (cassette tape, credit card, etc.) to keep from erasing their magnetically stored information. Also it should not be used on the abdomen of a pregnant woman so that the baby inside is not within 7" of the pulsing coil. (The coil has no magnetism of its own. It only produces it with each pulse of voltage sent to it.) It is safe to pulse on any sensitive part of the body since the amount of current it induces there is a small amount.

ABOUT THE MAGNETIC MULTI-PULSER

The Multi-Pulser is similar to the Beck style Magnetic Pulser in that it uses the same output coil to produce an electrically powered magnetic field around it. But instead of one uni-polar pulse every 3 seconds (as the Beck Pulser produces), it produces a decaying strength bi-polar series of pulses that have a frequency close to 5000 hz. Very similar multiple oscillating pulse outputs were described in patent 4,524,079 as being effective against bacteria and fungus in lab tests. In patent 4,665,898 this oscillating magnetic field (OMF) was described as being effective against beginning rat cancer tumors. The Multi-Pulser outputs 1.8 Tesla and has proved itself to me to be very effective by eradicating a urinary tract infection I had but could not completely eliminate with the previous Multi-Pulser that output less magnetic strength. I had success stories from people using the old style Multi-Pulser against various types of bacterial and fungal infections, as well as cancer (mostly of the skin). It was also effective with one person against oral herpes (caused by a virus) when used in conjunction with the blood electrifier. Others have reported its beneficial effects against inflammation and pain. It outputs a decaying series of pulses (of 2 millisecond duration) once every second. Usage is simply holding the flat side of the output coil (either side) onto the infected body part and letting it magnetically pulse there for 3 minutes, which should be done 2 to 3 times a day. The Multi-Pulser is powered by a 115 volt AC adaptor.



ABOUT RIFE FREQUENCY GENERATORS

These units are for applying user selectable frequencies to the users hopefully to negatively affect microbes or positively affect glands/organs or natural health processes (such as immunity). The frequency to be applied to the subject can be any frequency, typically between 3 hz and 30,000 hz, selected at random by the user (for experimenting), or selected from a Rife frequency list (on the internet). This list is a composite of frequencies that Rife experimenters have reported thru the years as effective against various health problems. Royal Rife started the list with 10 frequencies that were effective against 10 microbes with the application of his original device which output electromagnetic waves thru the air. The most common Rife machines available now are simpler versions that conduct alternating polarity electrical currents thru the user at the selected frequency with a power level of 30 maximum peak volts (as a square wave) via metal electrodes or wet 3" square cloth electrodes. Although many success stories have been submitted by experimenters, this type of electrotherapy needs to be researched thoroughly to validate frequencies as being effective, find out effective treatment protocols, and investigate the minimum electrical parameters needed for repeatability of successful treatments. Despite being in a beginning stage of development, this electrotherapy has been reported by users to occasionally be successful against many diseases that other therapies can't cure, and is an accepted form of medical treatment in various countries, including Germany. Below is a picture of one Rife Frequency Generator.



About the Skin Electrifier

This wonderfully simple device is used to apply electricity from a 9 volt battery through a current-limiting resistor to the skin where a herpes simplex lesion is starting to develop in order to try to disable the viruses ability to infect the cells there. It is for use with Herpes Simplex 1 (oral) and Herpes Simplex 2 (genital). This electro-therapy has often stopped herpes in its tracks by diligent application (30-45 seconds every hour for 8 hours) within 12-18 hours of noticing the first symptoms of a herpes flare up. The device is a 3"x2"x1" plastic box with two 1" cloth-covered electrodes sticking out one end. The electrodes need to have regular tap water applied to them before usage in order to make them electrically conductive. You should be able to feel a tingling sensation from the electric current when applied to your lip. If in the future you no longer feel that sensation then you'll need to remove the box lid and replace the battery with another 9 volt alkaline battery.

Here's one persons account of his experience with its usage against Herpes Simplex: D. P. wrote: "After suffering with Herpes Simplex sores on my lips for years, the pain lasting as much as 3 weeks, I decided to look for an answer. I tried the Zorivax cream and pills but this only shortened the cycle to 2 weeks. I tried drinking food grade hydrogen peroxide in water and this was a little better than Zorivax. Then I was loaned a Skin Electrifier and started using it when I felt the normal slight tickle on my lip which indicated an upcoming Herpes outbreak. Every hour I applied the electrodes to the area on my lips where the sores usually appear. This eliminated the tingling sensation of the impending outbreak. Then I experimented by stopping the use of the device and, sure enough, the tingling sensation started to return and sores started to appear. Then I restarted using it which greatly diminished the pain and limited the outbreak to a week and a half. About 2 months later another Herpes episode started and I applied the device hourly (for 1 minute) two days in a row and then less frequently for about 7 days and no sores appeared at all. The next Herpes episode happened when I was away from home (where the device was) but it never progressed past the first few days of minor symptoms. This was highly unusual because of the high amount of stress I had at the time. From these experiences I can tell that with the usage of this device the Herpes Simplex outbreaks can be stopped and the viruses lose their punch afterwards. Definitely I can say that the Skin Electrifier does work against the Herpes virus."

D. B. emailed: "I used the Skin Electrifier per instructions. It really works! I used it for about 20 seconds every hour until symptoms went away."



ABOUT COLLOIDAL SILVER

When two silver electrodes with an opposing electrical charge of 30 to 36 DC volts are dipped into distilled water then microscopic particles (colloids) of silver jump off the electrodes and into the water. When 8 ounces of distilled water is treated correctly, then the concentration of silver particles is around 5ppm (5 parts per million) which is an ideal strength for most applications at .001 - .004 microns in size.

SAFETY

Dr. Henry Crooks wrote that colloidal silver particles are small enough to be useful to the body for nutritional purposes as well as being a powerful agent against viruses, bacteria, and fungus. In 1940 R. A. Kehoe reported that the average daily intake of fruits and vegetables provided between 50 and 100 mcg (1 mcg=1/1,000,000 gram) of silver. 1 teaspoon of 5 ppm colloidal silver provides 25 mcg of silver. This indicates that 2 teaspoons would give a nutritionally adequate amount of silver daily. More than that should only be taken for a short while during a health crisis (1 tbspn 3x daily). I heard a person tell they were overdosed (40 times normal) with silver from taking 2 tablespoons colloidal silver nightly for 4-5 months, which is why I recommend therapeutic dosages for no more than a few weeks. The non-silver metal that is in .999 (99.9% pure) silver put in a normal solution of silver colloids is only 5 parts per billion, which is much less than the level of impurities found in distilled water. Toxicity is always measured in parts per million, which is a thousand times more than parts per billion. So .999 silver electrodes are very safe to use.

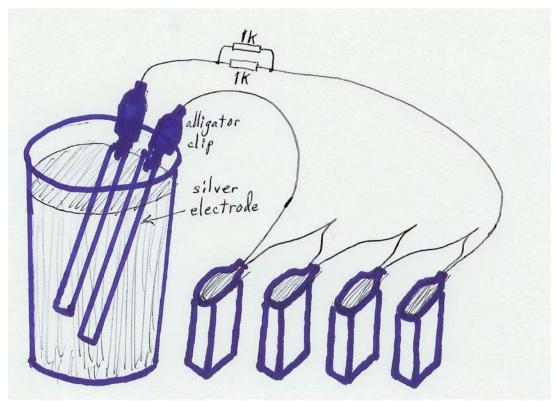
USES

Many internet reports I've read say this colloidal silver solution is excellent as a disinfectant for the kitchen and bathroom with hundreds of uses, including usage as a mouth wash and for wound disinfection and repair. Otherwise, colloidal silver is excellent when taken occasionally during the cold and flu season to help prevent one from getting sick or to combat the sickness. It can be used to combat stomach or intestinal infections as well as infections of the throat and month. Some people have used it by itself against Lyme disease and different viral diseases, but it's risky to do that since there's the risk of getting silver toxicity from taking it daily for too long a time. My general idea has been to use the electromedicine devices to fight systemic infections, and use colloidal silver to fight gastrointestinal or external infections.

HOW IT'S MADE

With a 36 volt supply, connecting to the electrodes (1/4" wide, 4-5" long, separated 1"), of four 9 volt batteries in series (with red wires connected to black) and two 1K resistors tied in parallel in series with the batteries, colloidal silver can be made any time other than the week surrounding the new moon (which is when the moon is overhead at noon). A 3 inch diameter drinking glass should be wrapped in duct tape to prevent light entry and to insulate it. 8 ounces of distilled water should be heated just enough so that when you dip your finger into it, you can't keep it in due to the heat. Make sure the actual silver part of the electrodes are 1 inch apart and they are very parallel to each other with their flat areas facing each other. Immerse the electrodes into the water and cover the opening so that light doesn't enter. Then set a timer for 20 minutes and remove the electrodes at the end of that period.

The solution should be stored in glass (not plastic) in a way that light is not permitted to shine on the solution which could cause the particles to fall out of solution. Within 2 hours of making the colloids, the solution should be light yellow or golden yellow. Other colors indicate the particle size is slightly larger than the ideal size (of .001 - .004 microns) which can be due to using a low quality distilled water. The darkness of the color can also tell you that the solution needed to be treated for more time if the color is too light, or less time if the color is too dark. A more accurate way of determining the ppm of silver is to use a tester bought on-line at http://www.utopiasilver.com/generator.htm, a Hanna Instruments TDS-1 Dissolved Solids Tester (for \$39) which works good. It gives a digital readout of the density of the silver solution when it's probes are inserted into the solution. The silver electrodes should only be cleaned with a plastic scrub pad. The solution should not be stirred with anything metal. Try different brands of distilled water to see which brand best produces a yellow color when through. Avoid brands that cause a black residue to accumulate on the electrodes during the water treatment. The best brand I tried out was Land Sky from Ingles grocery.



Making Colloidal Silver Solution

Parts from Radio Shack:

Fully Insulated Mini 1-1/4" Alligator Clips, #270-378, \$3.49 Heavy-Duty 9V Snap Connectors, 5 Pack, #270-324, \$2.59 1K Ohm 1/4-Watt Carbon Film Resistor, 5 Pack, #271-1321, \$.99 four 9 volt batteries

from www.wishgranted.com:

ITEM #6 Ten 999 Pure Silver Electrode (Five Pairs) .28 gauge 1/4 " X 6" \$32

ELECTROMEDICINE IN THE NEWS

This page contains summaries of the news articles on the following pages.

Houston Post, 3-20-91, reported that medical center doctors are using electricity to weaken the AIDS virus and that they hope it will lead to a new way to treat AIDS patients.

Science News, 3-30-91, reported that researchers at the Albert Einstein College of Medicine found that exposure to 50-100 uAmps of electricity reduced the infectivity of HIV by up to 95%. Shocked viruses lost their ability to reproduce.

Longevity Magazine, Dec. '92, reported that Steven Kaali, M.D., found that most of the AIDS viruses in blood lose their ability to infect cells after being zapped by low level electric current and that repeated treatments leave the blood virtually free of HIV, as well as hepatitis.

Science & Vie Magazine (a French publication) in issue 972 reported of research from the University Hospital of Geneva that showed the leucocytes (a type of immune system cell in the blood) killed bacteria and fungi with an enzyme-activated electric shock.

Professor Guy Madden, of Adelaide University, told Reuters Health that liver cancer tumors can be destroyed by placing electrodes into the tumor and conducting a small electric current through it.

Science News (vol. 156) listed two studies showing electromagnetic fields reduce pain and swelling (applicable to such diseases as arthritis, carpal tunnel syndrome, etc.). Also noted is that the company president of OrthoLogic said there's sufficient data to support their belief that oscillating magnetic fields combined with a static magnetic field (from a true magnet) promotes bone growth (countering osteoporosis and aiding broken bone repair).

The Russian 1999 Scientific and Technical Conference reported a 96% cure rate of hepatitis by use of frequency treated water given to the patients intravenously (which is a type of proof of Rife's belief that every microbe has a certain frequency that is deadly to it).

In the publication Medical Hypotheses was this article that explains how to stop cancer growth by disabling a crucial enzyme by use of direct electrical current.

From: The Houston Post, March 20, 1991: Scientists Say Electric Current May Help Fight AIDS

Doctors at a prestigious New York medical center are testing a new way to fight AIDS - using electrical energy to weaken the killer virus - and say their first results are encouraging. Researchers William Lyman and Steven Kaali of the Albert Einstein School of Medicine said Tuesday that initial laboratory tests have shown electrical current can weaken the virus believed to cause acquired immune deficiency syndrome. The two men said they plan to move to the next phase of the experiment in April using blood samples from people with AIDS. If their tests are successful, the researchers hope it could lead to a new way to treat AIDS patients, possibly involving a dialysis-type machine in which an AIDS patient's blood would be treated with electrical current outside the body. "What we have done is expose AIDS virus in laboratory circumstances to electrical current and then incubated the virus with white blood cells susceptible to the virus. We found that the virus became much more ineffective," Kaali, a specialist in the medical use of electrical current, said. Lyman, an AIDS researcher and associate professor of pathology at Einstein, likened the new technology to chemotherapy. "You are not going to get rid of the tumor, but you could get rid of enough of it to help the patient lead a normal life. This is not a cure but a new tool," Lyman said. He added that the use of electrical energy has no toxic side effect and that a similar technique has been used as a treatment for reducing herpes.

From: Science News, March 30, 1991: Shocking Treatment Proposed For AIDS

Zapping the AIDS virus with low voltage electric current can nearly eliminate its ability to infect human white blood cells cultured in the laboratory, reports a research team at the Albert Einstein College of Medicine in New York City. William D. Lyman and his colleagues found that exposure to 50 to 100 microamperes of electricity - comparable to that produced by a cardiac pacemaker - reduced the infectivity of the AIDS virus (HIV) by 50 to 95 percent. Their experiments, described March 14 in Washington, D.C., at the First International Symposium on Combination Therapies, showed that the shocked viruses lost the ability to make an enzyme crucial to their reproduction, and could no longer cause the white cells to clump together - two key signs of virus infection. The finding could lead to tests of implantable electrical devices or dialysis-like blood treatments in HIV-infected patients, Lyman says. In addition, he suggests that blood banks might use electricity to zap HIV, and vaccine developers might use electrically incapacitated viruses as the basis for an AIDS vaccine.

From: Longevity Magazine, Dec 1992: "Electrocuting" the AIDS Virus, A Safer-Yet Blood Supply

Despite official reassurances about the safety of the nations blood supply, concern lingers that small amounts Of HIV-infected blood may be sneaking through, especially since current screening detects only antibodies to the virus, which can take months to form. But now a new electrical process for cleaning blood of viruses may solve the problem. At the Albert Einstein College of Medicine in New York City, Steven Kaali, M.D., has found that most of the AIDS viruses in a blood sample will lose their infectious capability after being zapped by a very low level current. Repeated exposure appears to leave blood virtually free of HIV, as well as hepatitis - without harming blood cells. Kaali cautions that it will take years of testing before a virus-electrocuting device is ready for use. But, ultimately, he predicts, it could be used not just to purify blood, but to treat people with AIDS, by channeling their blood out of the body, exposing it to virus-killing current and then returning it. "By lowering the viral count," he says, "we'll be able to lengthen and improve the quality of patients' lives."

Scientific Evidence that Electricity is a Natural Defense Mechanism

French Science & Vie Magazine Issue 972, Sept. 1998, page 44 (*Translated to English*)

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Immunology Medicine Bacteria Electrocuted

The white globules (leucocytes) kill bacteria and pathogenic fungi by electrocuting them. Discovered by the team of Jacques Schrenzel and Karl Heinz Krause (at university Hospital of Geneva), this means of defense is started as soon as the receivers of the white globule detects the presence of a microbe. This signal activates an enzymatic system located in the membrane of the leucocyte and made up by an enzyme at rest (NADPH oxydase) and by its coenzyme (NADPH). The reaction starts with the waking up of the enzyme, which receives electrons of its coenzyme and transports them through the membrane. Ejected from the white globule, the electronic flux (electric current) is focused towards the bacteria by oxygen molecules: the bacteria succumbs. This discovery should open the field of research on immunity deficiencies of patients deprived of this enzyme system.

Original French wording below:

Médecine Immunologie
Bactéries électrocutées

Les globules blancs (leucocytes) tuent bactéries et champignons pathogènes en les électrocutant. Découvert par l'équipe de Jacques Schrenzel et Karl Heinz Krause (hôpital universitaire de Genève), ce moyen de défense est déclenché dès que les récepteurs du globule blanc décèlent la présence d'un microbe. Ce signal active un système enzymatique situé dans la membrane du leucocyte et constitué par une enzyme au repos (NADPH oxydase) et par sa coenzyme (NADPH). La réactin commence par le réveil de l'enzyme, qui recoit des électrons de sa coenzyme et les transporte à travers la membrane. Bjecté du globule blanc, le flux électronique est focalisé vers la bactérie par des molécules d'oxygène; la bactérie succombe. Cette découverte devrait ouvrir le champ des recherches sur les déficiences immunitaires de patients privés de ce système enzymatique.

Electric Current Helps Wipe Out Liver Tumours by Nic Rowan Thursday, November 08, 2001

Adelaide, Australia (Reuters Health) - Surgeons here who pioneered the use of electrical current to destroy liver tumours say they are optimistic that the treatment could be used for tumours of the pancreas and kidney as well. The treatment, called electrolysis, involves placing electrodes into liver tumours and surrounding tissue. A small electric current is then passed through the electrodes to destroy the tissue. In some cases, affected parts of the liver are removed surgically. The leader of the surgical team investigating the treatment, Professor Guy Maddern of Adelaide University, told Reuters Health that the method causes a change in the acidity of the tissue and "poisons the tumour." "It is less destructive than surgical removal of the tumour, and can be used to treat tumours that are awkwardly located, such as next to large blood vessels," he added. Maddern and his colleagues have treated 10 patients, with follow-up ranging from 6 to 43 months. Nine of the patients had bowel cancer that had spread to the liver, and one had cancer that originated in the liver. In order to be included in the study, patients had to have no other untreatable tumour outside the liver, and to be fit for major surgery. All patients, said Maddern, had extensive disease in the liver. Eight of the patients show no evidence of residual tumour at the treatment site. Five of these eight patients have developed new areas of tumour spread, while three have no evidence of new cancer growth. "In any case, after surgical intervention without electrolysis, 60% of patients would be expected to develop new disease," Maddern said. "We are trying to increase the percent who don't get new disease." When added to surgery to remove a tumour, Maddern noted, electrolysis increased the percentage of patients who were treatable with surgery from 20% to 25%. "We have been developing this technique for 5 years. We are now ready to move forward and are considering tumours of the pancreas and kidney," Maddern told Reuters Health. "They will be the next step."

Health Effects of Electro-Magnetic Fields from Science News, Vol. 156, No. 20 November 13, 1999, p. 316

http://www.sciencenews.org/sn_arc99/11_13_99/bob2.htm http://www.sciencenews.org/sn_arc99/11_13_99/bob2ref.htm

Two previous studies had found that electro-magnetic fields (EMFs) reduce pain and swelling. EMFs also have that effect in a new trial headed by orthopedic surgeon Roy K. Aaron. Presumably, he says, it does it "by changing the chemistry of the joint." Studies by his team and others indicate that these fields can increase a joint's production of natural anti-inflammatory agents, such as transforming growth factor-beta. Not surprisingly, Aaron notes, medical supply companies are now developing products, such as a glove with coils, to deliver EMFs to arthritis-savaged joints.

Softer tissues also respond to these fields. For instance, Arthur A. Pilla, a biophysicist at the Mount Sinai School of Medicine in New York City, observes that many people with bone breaks experience significant pain in muscles around their injuries. Shortly after EMF therapy begins, however, that pain disappears. Though the mechanism remains elusive, Pilla says, the treatment seems to affect swelling, which can cause pain. If this proves true, he says, EMFs might benefit people with carpal tunnel syndrome, where swelling in the wrist pinches nerves going to the fingers. Indeed, that's a possibility that Betty F. Sisken of the University of Kentucky College of Medicine in Lexington would like to explore. Currently, she's probing EMFs' direct influence on nerves. In their initial studies, she and her colleagues crushed a nerve in the hind leg of rats and then treated the animals with EMFs for 4 hours daily.

In one 6-day-long experiment, the treatment speeded the nerve's recovery by 22 percent. In follow-up tests -- where 16 rats received EMFs for 40 days and an equal number were allowed to heal unaided - treated animals again showed an accelerated recovery. Last June, Sisken's group reported on test-tube experiments showing that pulsed EMFs can turn on a gene in damaged nerves. That gene plays a role in triggering growth-related repair. Aaron has also examined effects of the 60-Hz fields generated by power lines and home wiring. In the August Bioelectromagnetics, his group reports that field strengths similar to those in the home and workplace increased production of a protein that regulates proliferation and development of cells destined to become bone. The EMFs also stimulated some maturation in cells. Aaron concludes that fields associated with electric power may exert a beneficial influence on such tissues rather than harm them.

James T. Ryaby, vice president of OrthoLogic, a medical device company in Tempe, Arizona, has been using what he calls combined fields - oscillating magnetic fields superimposed on a static magnetic field. They appear to spur bone growth more quickly than the older type of pulsed EMFs, Ryaby says. More tantalizing, says Ryaby, are the data from a just completed study with female rats suggesting that the combined fields can reverse the kind of bone loss women experience after menopause. After removing the rodents' ovaries to simulate a postmenopausal state, Ryaby's team watched the animals quickly lose bone. Six weeks later, some of the rats began receiving combined-field therapy for 30 minutes a day. Within a little more than a month, he says, the treated animals were regaining lost bone while their untreated counterparts continued to lose it. What's more, the combined-field devices require just a small percentage of the power used by typical pulsed EMF generators. In Bioelectrochemistry and Bioenergetics last February, Pilla and his colleagues reported finding that pulsed EMFs appear to increase the binding of ions to receptors on the surface of cells. For instance, they've witnessed enhanced binding of calcium to the regulatory molecule called calmodulin. This difference may prove important in stimulation of bone-cell growth by EMFs, Pilla says. EMFs can also increase bone cells' production of insulin-like growth factor II, according to test-tube experiments by Ryaby of OrthoLogic and his colleagues. This hormone-like molecule plays a key role in bone growth and may be regulated by calcium binding to calmodulin.

Modern Combinational Use of Rife Frequencies and Homeopathy

On August 19th, 2000, the New England Journal of Medicine carried an article warning that 2.7 million Americans now carry the Hepatitis-C virus, according to statistics from the CDC. This would make Hepatitis, a potentially fatal disease, the most common blood-borne infection in the country. Globally, the World Health Organization has reported that almost half the world's population carries one or more of the various hepatitis virus, and fatalities are greater than for HIV.

On the same day the article appeared a patient became the first in the USA to begin treatment at an experimental clinic In Georgia, where a multidisciplinary team is attempting to reproduce a 96% hepatitis cure rate claimed for a Russian trial program last year. The most astounding feature of the Russian treatment is that it used neither drugs nor surgery. A combination of two techniques from beyond the medical mainstream, and often soundly condemned by it, are reported to have removed all traces of the virus in as short a time as three weeks. These results are in the published proceedings of the 1999 Scientific and Technical Conference, an annual event in Moscow sponsored by the Russian Ministry of Foreign Affairs.

The word from Georgia insiders is that lab results on the first batch of patients are pretty exciting, although astounding might be a better word, given the mode of treatment. Patients receive only an IV drip of - believe it or not - the same standard saline solution used in hospitals around the world. The difference is that this IV solution carries a special charge or resonance, in a surprise blending of Homeopathy and the pioneering research of Royal Raymond Rife. Rife demonstrated the destruction of disease organisms by energy broadcast through the air at specific frequencies. Today, a new twist takes his work another step forward.

The Russian team apparently combined several technologies to create a scientific breakthrough. While the devices and technology are protected by patent and the subject of considerable secrecy, it is apparent that several problems have been solved. These involve the selection of what specific frequency or resonance will be effective, and the method of "charging" water molecules with that energy to create a viable delivery system.

While diagnosis is still dependent on traditional lab work, and patients applying to the Georgia clinic are expected to forward a liver scan from their own physician and lab, computerized instrumentation is being used to confirm that the selected frequency is correct before treatment begins. In other words, technicians can measure the response of a particular person to a particular frequency. While no details are offered so far, this technology has the potential to turn Rife-based frequency work into a very practical and useable medical treatment overnight.

The existence of this technology might have remained secret but apparently the device is being used to check the original treatment plan against American patients who present a slightly different clinical picture than the original Russian subjects. Due to better health care in the U.S., hepatitis patients live longer. They may appear as "chronic" rather than "acute", which may mean more organs are involved. Apparently, the device used at the clinic can measure the response of a particular organ to a particular frequency in only minutes, eliminating a lot of trial and error experimentation.

The second breakthrough is in the delivery system, both in theory and in practice. The Russians see their frequency selection as an opposite or "canceling" frequency, rather than the more direct, "destructive" frequency which Rife observed when microorganisms glowed and shattered in the view-field of his microscope. While it may not be possible to prove exactly What the mechanism really is, the Russian theory is that an invading virus (and perhaps other problems as well) has a certain frequency, and that by bathing this pathogen in something carrying an "opposite" frequency the result is a zero sum: the organism's energy is neutralized and the virus dies.

The choice of water and a homeopathic system, as opposed to frequency exposure via a Rife tube, is fascinating. Homeopathy, a highly respected school of medicine around the world, is totally dependent on the concept that water molecules can carry "information" or "charge" left over from some other substance that has been so greatly diluted that for all practical purposes it is no longer there at all. Apparently it is also possible to induce the desired frequency or resonance at a molecular level through electronic or other means. This is the physical key to the delivery system and apparently a Russian device or machine is used to do the charging.

The real story, over and above what may be a terrific treatment for hepatitis, is the technology itself. Working with "frequencies" may turn out to be the medicine of the new millennium. If lab reports can show dramatic improvements when the only thing administered was hospital saline solution still sealed in its original sterile bag, a major paradigm shift is on the way. Surveys already indicate that chemical-based Allopathic medicine is now the "alternative medicine" as far as the American public is concerned. Once the Georgia clinic has run through a few thousand patients and published their results, we may have a medical revolution on our hands.

Targeting a key enzyme in cell growth: a novel therapy for cancer

Abstract --- The enzyme ribonucleotide reductase (RR) controls the synthesis of DNA precursors and thus plays a pivotal role in cell growth. Since the free-radical-containing active-site of this enzyme can be disabled by a lone electron, low-level direct electric current should have an inhibitory effect on RR and, thus, on uncontrolled cell proliferation. This hypothesis is strongly supported by the results of several cancer electrotherapy studies reported over the years.

Introduction

Cancer is uncontrolled cell growth. For a cell to divide, it must replicate its DNA strand. The building blocks of this strand -- four bases -- are in short supply in a healthy, resting cell. However, the building blocks of a related molecule RNA are always in great abundance since RNA is needed for many cellular functions. When a cell is ready to divide, an enzyme called ribonucleotide reductase (RR) converts building blocks of RNA into those of DNA. The enzyme RR is, thus, pivotal for cell growth. Not surprisingly, the activity of this enzyme is tightly linked, much more than that of any other enzyme, to neoplastic transformation and progression (1).

A whole class of anti-cancer chemotherapeutic drugs -- hydroxy-urea being best known -- is aimed at blocking the enzyme RR (2). However, utility of such drugs is limited since inhibition of the enzymic activity is only partial and undesirable side-effects are many.

Hypothesis

A novel way of arresting the activity of this pivotal enzyme in cell growth is suggested by the fact that the active site of RR contains a stable tyrosyl free radical which is essential for its activity (13). Such free radicals can be neutralized/destroyed by free-floating electrons — easily available in the form of direct electric current. Thus DC electrotherapy should result in inhibition of RR and cessation of malignant cell proliferation. Low-level surface DC electrotherapy would act selectively on cancerous growth since the concentration of the target enzyme RR is exponentially higher in cancerous cells, as compared to healthy quiescent cells (1). Metastasized cancer should also be treatable by direct current electrotherapy since even in the metastatic state, irrespective of the organ micro-environment, the biochemical mechanism of cell division involving the enzyme RR, remains the same.

Experimental evidence

The connection between low-level DC electrotherapy and deactivation of enzyme RR is being proposed for the first time. However, use of low-level direct electric currents to treat tumor -- without any clear understanding of the underlying mechanism -- has been reported in scientific literature about ten times during the last four decades (4-13). Three of these papers - the last one in 1985 - reported very encouraging results. For example, in some experiments, there was total regression in 60% of mice (4), an average of 88% tumor necrosis [destruction] in hamsters (5), and 98% reduction in tumor mass, also in hamsters (7). (It is strange that none of these studies had any proper follow-ups.) The outcome of other studies was less positive -- almost certainly due to poor choice of parameters.

Following is a summary of these ten reports. (The electrode near the tumor is termed as 'active', the other one being called 'passive'.)

1. Humphrey et al, 1959 (4)

ACTIVE Electrode: Copper or Zinc plate with saline-solution-saturated sponge on unbroken skin over tumor.

PASSIVE Electrode: Same, over ventral area.

BEST RESULTS (Total regression in 60% mice): at cathode, with 3 milliamperes at 3 V, 4.8 hours per day for 21 days.

2. Schauble et al, 1977 (5)

ACTIVE Electrode: Silicone covered steel needle - exposed tip implanted.

PASSIVE Electrode: Wire-mesh with electrode paste and saline-dampened sponge - over chest skin.

BEST RESULTS (88% Necrosis): at positive electrode with 3 mA at 1.5 V, 1 hour per day for 4 days.

NOTE: Necrosis was also observed when active electrode was made negative.

3. Habal 1980 (6)

Poor results with 0.5 μA at 1.5 V, for 12 days continuous, using an implanted device.

4. David et al, 1985 (7)

ACTIVE Electrode: Silicone covered Steel or Platinum-Iridium (70:30) needle - exposed tip implanted.

PASSIVE Electrode: Aluminum foil plate with conducting paste - over shaved underbelly.

BEST RESULTS (98% Reduction in tumor mass): at either electrode, with 2.4 mA at less than 3 V, for 1 hour per day for 5 days.

5. Marino and Morris et al, 1986 (8)

Both Electrodes ACTIVE: Insulated Platinum - except for the implanted tips - at foci of tumor.

BEST RESULTS (Total regression in 43% of primary tumors): with 2 mA at about 3 V, 1 hour per day for 3 intermittent days.

6. Morris and Marino et al, 1992 (9)

Both Electrodes ACTIVE: Platinum needles - implanted in tumor.

BEST RESULTS (Reduction in tumor mass without improved survival): with 20 mA at 8-10 V, for 15 minutes once.

7. Miklavčič et al, 1993 (10)

ACTIVE Electrode: Platinum-Iridium (90:10), Gold, Silver or Titanium needle tip implanted.

PASSIVE Electrode: Same, placed subcutaneously the whole length, near tumor.

BEST RESULTS (About 70% necrosis): at cathode, with 0.6 mA at unspecified volts, for 1 hour once.

NOTE: "Field" electrotherapy, by placing both electrodes subcutaneously for their entire length, on either side of tumor, also produced similar necrosis.

8. Griffin et al, 1994 (11)

ACTIVE Electrode: Gold needle - implanted.

PASSIVE Electrode: Copper plate with conducting gel - beneath the animal.

BEST RESULTS (Regression proportional to charge passed): at anode, with 1-4 mA at 1-16 V, for 30-90 min. once.

9. Taylor et al, 1994 (12)

ACTIVE Electrode: 4 parallel brass plates, vertically mounted, in a specially designed oesophageal tube.

PASSIVE Electrode: Large plate with saline-soaked pad on human patient's back. BEST RESULTS (Oesophagus tumor of one patient regressed completely at the primary site): with 20 mA at 7 V, at each of four anodes, for 1 hour. Three treatments over 4½ month period.

10. Miklavčič et al, 1994 (13)

ACTIVE/PASSIVE Electrodes: Gold needles, placed subcutaneously the whole length, on either side of tumor.

BEST RESULTS (Tumor growth slowed by a factor of 3): with 1.0 mA at unspecified volts, for 1 hour, applied once.

NOTE: No correlation was observed between the amount of deposited electrode material (gold) and anti-tumor effect.

Discussion and conclusion

Both positive and negative results of the published low-level electrotherapy studies can be adequately explained by the posited enzyme-mediated mechanism. Various aspects of these reports is being discussed in three sections:

Most Beneficial Voltage Range

Free radicals are known to be formed in a biological medium when it is subjected to any voltage in excess of 1.2 volts. Electrochemical products begin to form around 1.5 to 2 volts (8) but these products may not be significant in concentration until the voltage is raised to, say, 3 or 4 V. If the anti-tumor effect of electrotherapy is due to the disabling of the pivotal enzyme RR through free radical interactions, voltage between 1.2 to about 3 V should be most beneficial. Higher voltage, for this mechanism, would be undesirable for two reasons: (i) more and more electrons would engage in electrochemical processes, leaving less and less electrons free or as free-radicals, and (ii) concentration of toxic electrochemical species would increase steadily. This toxicity may be as harmful as the tumor itself.

Studies 1, 2, 4 and 5 above (4,5,7,8), have reported the most positive electrotherapy results to date. Voltages in all of them was kept around 3 V or less. In study 1 (4), experiments with 6 V seemed to show less benefits. When investigators of study 5 (8) employed 8-10 V in their next study, 6 (9), tumor mass was reduced again but, this time, without improved survival. Toxicity, significant now, must be targeting the host, and not the tumor. Study 8 (11) reports on toxicity in blood after treatments at 1-16 volts. Mention must be made here of Bjorn Nordenstrom of Sweden, who has, since mid-1980s, advocated "high"-voltage (about 10 volts) electrotherapy for cancer (14). This therapy is also known as electro-chemo-therapy (E.C.T.) since it entails toxic electrochemistry. If the hypothesis about deactivation of the enzyme RR by stream of electrons is correct, then high-level direct currents suggested by Nordenstrom, for the reasons given above, should be much less beneficial than low-level currents. The last five studies (9-13), which were, partly or wholly, influenced by Nordenstrom's ideas, suggest that this is so since their outcomes were much less favorable.

Unlike Nordenstrom's modality, which is usually a one-time treatment, the low-voltage electrotherapy, due to its minimal toxicity, can be applied repeatedly. Total or almost total regression of some tumors was achieved with multiple treatments in studies 1, 4 and 5(4,7,8).

Study 3 (6) employed too feeble a current to produce any significant results. The procedure was also very invasive.

Positioning & Polarity of Electrodes

If deactivation of the enzyme RR is the dominant mechanism underlying the efficacy of electrotherapy, then it should not matter whether electrodes are implanted or on the surface -- as long as the tumor is in the path of the current. Only in study 1 (4) were both electrodes placed on unbroken skin, and it reported one of the better results. Beside being non-invasive, surface electrodes also minimize electrochemistry and its attendant toxicity.

Similar reasoning would suggest that the polarity of the electrodes is inconsequential. Almost all electrotherapy studies where beneficial results were obtained, confirm this. Results of "field" electrotherapy experiments, where electrodes were implanted on either side of tumor (10,13) also show that polarity of electrodes is immaterial, and that electrode-electrolyte interactions are of little significance.

Electrode Metal Dissolution

If the primary mechanism of electrotherapy involves inhibition of enzyme RR, then electrode metal deposition should have little or no influence on the beneficial outcome. Study 10 (13) has clearly shown that this is so. The fact that different electrode materials produce very similar results, further indicates that electrodes act merely as electron conductors.

Thus, virtually all the observed facts are in accord with the proposed mechanism involving the deactivation of the free-radical-containing active site of RR. Furthermore, a recent experiment has shown that the concentration of enzyme RR decreases and cell growth ceases when direct electric current is passed through the tumor (15). The proposed hypothesis, thus, is on the verge of being proved. This novel way of arresting cell growth can be the foundation of a cancer therapy that is non-toxic, non-invasive, site-specific, low-cost and easy to administer. The current cancer treatments are called "slash, burn & poison" by oncologists themselves, and are mostly empirical in nature. The gentle electrotherapy, on the other hand, would be deductively scientific with potential to cure most cancers.

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Cranial Electrotherapy, a Profound Alternative Therapy from: FOCUS on ALCOHOL and DRUG ISSUES, Jan/Feb 1983

ANXIETY & Cranial Electrotherapy

Cranial Electrotherapy Stimulation (CES) has been used as a treatment for anxiety in several parts of the world for over a quarter of a century. American medicine has only recently begun to realize its use as a safe and effective treatment. Studies show that Cranial Electrotherapy treatment yields highly significant reductions in anxiety. Further, while many different kinds of anxiety have been studied, as measured by the six different psychological measuring instruments found in these studies, they all responded significantly to CES treatment. Less intense or less permanent forms of anxiety - the so-called 'situational anxiety' in which a person habitually responds to personally threatening events in his environment with an anxiety reaction - respond to Cranial Electrotherapy treatments within a week or less. The more permanent forms of anxiety - the so-called trait anxiety or that underlying level of anxiety that a person typically carries with him at all times - require a longer period of Cranial Electrotherapy treatment. This kind of anxiety typically is not reduced significantly in fewer than 2 or 3 weeks of daily treatments.

DEPRESSION

Studies show that reactive depression (that which results from acute changes in the patients life situation such as a job change or divorce) is decreased after 6 days of Cranial Electrotherapy treatment. More deep seated depression (endogenous) in some cases required 3 or more weeks of daily treatment. Since many patients have a 'depression habit' physicians should include a home CES unit in their treatment plan so that the patient can meet any new sign of impending depression with effective treatment and thereby break the behavioral reinforcement chain that has both led to and maintained the habit. In this way, a maladaptive habit can be effectively controlled or broken without the use of frequent medications and/or repeated visits to the physician. Other research has shown that Cranial Electrotherapy, when used this way is neither habit forming nor addictive. Such patients use it only when they experience an impending medical necessity.

INSOMNIA

Because Cranial Electrotherapy was originally called 'Electrosleep' in European countries, many earlier American studies were designed to learn whether or not such small amounts of electric currents would actually put people to sleep. That is, just as 50ma of current - called 'electroanesthesia' - put an individual into anesthesia so that surgical procedures could be performed, 1ma of Cranial Electrotherapy current was assumed to put them into a normal state of sleep if 'Electrosleep' worked. Such studies discovered that while Cranial Electrotherapy does not necessarily "put a person to sleep", it does accomplish some very therapeutic changes in the sleep patterns of people who complain of insomnia. Whether measured by the patient's own ratings, psychiatrists ratings, or by electroencephalograph or polygraph recordings before and after Cranial Electrotherapy treatments, the following effects of CES in insomnia can be expected:

- 1. Sleep onset latency is reduced. That is, once a person has retired for the evening, the amount of time it takes him to actually fall asleep is reduced from one to two hours or more to the more normal twenty minutes or less.
- 2. The number of awakenings during the night are reduced.
- 3. Cranial Electrotherapy treated patients spend more time in stage four sleep following CES treatments. That is, patients spend more time in the deepest most restful stage of sleep than they did prior to Cranial Electrotherapy treatment.
- 4. Finally, it was discovered that many patients receiving Cranial Electrotherapy treatments report feeling more rested when they awaken in the morning following Cranial Electrotherapy treatments.

Treatment Parameters: While some patients begin to respond after the second or third day of treatment, others do not have their best response within fewer than 24 days of treatments lasting from 15 minutes to 1 hour. The beneficial effects have been measured in some experimental groups for as long as two years.

Some people with insomnia have a habitual pattern of responding to situational stress with an interruption in their sleep patterns. The best results are obtained when Cranial Electrotherapy is used each time unusual stressors occur in their life situations that would ordinarily cause poor sleep. The Cranial Electrotherapy device user is thereby trained over time to expect a good night's sleep no matter what stressful interruptions occurred in the normal flow of daily life.

ADDICTIONS

Foremost among the treatment problems among chemically dependent persons is the need to help them through the psychologically and physically demanding period of withdrawal. The body reacts to the depressed physical state engendered by alcohol and other drugs with a rebound stress reaction. This reaction commonly includes states of extreme anxiety, depression, and insomnia, for which Cranial Electrotherapy treatment is known to be effective. Underlying the addictive state is an insidious and progressive destruction of normal brain functioning, including an often incapacitating memory loss, inability to process information involving abstract symbols, and other dysfunctions associated with the organic brain syndrome, an advanced condition which is known as Korsakoff psychosis. Studies of the use of Cranial Electrotherapy in chemical dependencies are among the best studies on controlled and well designed research in the USA. They indicate that Cranial Electrotherapy is a highly effective adjunct to methadone withdrawal in heroin addicts, significantly shortening the time to symptom-free withdrawal when compared with methadone alone, and significantly lowering withdrawal anxiety as measured by the Taylor Manifest Anxiety Scale. Further, the anxiety and depression accompanying and following withdrawal of both alcohol and other drugs in polydrug abusers is significantly reduced when patients receive Cranial Electrotherapy as a post withdrawal treatment. Most importantly, perhaps, is the finding that Cranial Electrotherapy treatment halts and significantly reverses brain dysfunction in these patients as measured on seven different psychological scales of cognitive function, bringing many such functions back to the level of the pre-addiction state in the majority of patients studied. Another problem in the treatment of chemically dependent persons is frequently recurring 'dry withdrawal' in which the individual suffers withdrawal symptoms within several weeks, then again in several months. The phrases used to describe these phenomena are a 'dry drunk' followed by the 'dry withdrawal'. These psychological states lead to high recidivism rates among these individuals as they return to treatment after "falling off the wagon". Cranial Electrotherapy is now thought of as one of the most effective, non-drug treatments for these periods of withdrawal, and a patient who has a personal Cranial Electrotherapy unit available should be able to use it to prevent a full-blown withdrawal reaction at such times. By doing so he can reduce the need for additional medical treatment in a clinic or hospital setting, and will be less likely to resort to alcohol because of the discomfort accompanying these withdrawal states.

ELECTROMEDICINE DEVICE PATENTS & REPORTS

The following patents and scientific papers deal with both DC and AC blood electrification, and with oscillating magnetic fields (such as what the Multi-Pulser outputs) against cancer, bacteria, and fungus. They include positive laboratory reports of these treatments effectiveness against microbes and cancer tumors. Since the whole patents are very lengthy, these summaries have quoted just the parts that contain their essential message and lab tests. Go to http://patft.uspto.gov/netahtml/PTO/search-bool.html to see the whole patent for free. I've also included my own notes about each one to offer explanations and comparisons to the electromedicine devices of this book.

- A. Biocompatible Electric Current Attenuates HIV-1 Infectivity (research paper on DC blood electrification against HIV)
- B. Patent 5,139,684 (patent on DC blood electrification against bacteria, viruses, parasites, and fungus)
- C. Patent 5,188,738 (patent on AC blood electrification against bacteria, viruses, parasites, and fungus)
- D. Kinetics of Microbial Inactivation by Oscillating Magnetic Fields (FDA report on OMF against bacteria & fungus)
- E. Patent 4,524,079 (patent on OMF against bacteria and fungus)
- F. Patent 4,665,898 (patent on OMF against cancer tumors in rats)
- G. Patent 4,683,873 (patent on treating bone with pulsating electromagnetic fields)
- H. Patent 5,133,352 (patent on using direct electrical battery current to stop development of herpes simplex lesions)

BIOCOMPATIBLE ELECTRIC CURRENT ATTENUATES HIV-1 INFECTIVITY

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Summary

In this report, we present the results of double-blinded studies on the use of direct electric current to alter the infectivity of HIV-1 for susceptible cells in vitro. These experimental currents were equal to 3.85 and 7.7uA/mm² current densities respectively. The reduction of infectivity was dependent upon the total electric charge (uA x min) passing through the chamber to which the virus was exposed. Viral infectivity was determined by two independent measures: a syncytium-formation assay which can be used to quantify the production of infectious particles; and a reverse transcriptase assay which is an index of viral protein production.

Results

Syncytium-formation assay:

Using this index of HIV-1 infectivity, it was determined that exposing virus to direct electric current suppressed its capacity to induce the formation of syncytia. Figure 1 shows a representative experiment and Table 2 shows the Croup data for 3 separate experiments. As can be noted in Figure 1, a statistically significant (p<0.001) reduction in syncytium number was absented and this reduction was dependent upon the current applied to the viral isolate. At three different viral dilutions, there were analogous results in that a total charge of 200uA x min (25uA for 8 minutes) reduced the number of syncytia from 50% to 65% while a charge of 300uA x min (50uA for 6 minutes, 75uA for 4 minutes or 100uA for 3 minutes) resulted in 90% reduction.

Reverse transcriptase assay:

The direct electric currents to which HIV-l was exposed also reduced reverse transcriptase activity. Five separate experiments were conducted and a representative experiment is shown in Figure 2 and the data are included in Table 3. As can be seen in Figure 2, there was a significant decrease in the amount of reverse transcriptase activity after exposure of the virus to either 50uA for 3 or 6 minutes. An equivalent reduction in reverse transcriptase activity was also noted with exposure to 100uA for 3 minutes and almost ablation of reverse transcriptase activity was seen with exposure of the viral isolate to 100uA for 6 minutes. The group data (Table 3) show that after exposure to 50uA for 6 minutes, there was a 44% reduction in activity and treatment of virus with 100uA for 6 minutes resulted in a 94% reduction. An analysis of variance indicates that the decrease in reverse transcriptase activity was statistically significant (p<0.0001).

DISCUSSION

The results reported here demonstrate that HIV-1 treated with direct electric currents from 50 to 100uA has a significantly reduced infectivity for susceptible cells in vitro. This reduction of infectivity correlates with the total electric charge passing through the chamber. The therapeutic potential of electric current may reside in its ability to lower the viral titer to subclinical significance or in its incorporation into a strategy analogous to that of other therapies in which repeated cycles of treatment eventually achieve remission or cure. It may be also feasible to treat AIDS patients with direct electric current using either extracorporeal [out of body] systems or self contained indwelling electrodes.

Figure 1

Syncytium Formation at 1:160 dilution

0/6	25/8	50/6	75/4	100/3	exposure (uA/minute)
128	45	9	7	2	# of syncytium formed

Five aliquots of the RF strain of HIV-1 were exposed to direct electric current. At all the dilutions tested, electrical treatment of the virus aliquots resulted in a significant decrease in syncytium formation.

Figure 2

Reverse Transcriptase Activity

0/3	0/6	50/3	50/6	100/3	100/6	exposure (uA/minute)
300	205	108	105	100	12	CPMx10 ⁻³ reverse transcriptase

Six aliquots of the RF strain of HIV-1 were exposed to different amounts of current for 3 or 6 minutes. A significant decrease (p<0.005) from 0 current levels (0/3 and 0/6) in reverse transcriptase activity is noted. However, the decrease is more significant (p<0.0001) when virus is exposed to 100uA for 6 minutes.

Editor's Notes:

Human CD4 immune blood cells were exposed to various amounts of electric current for various amounts of time and then mixed with HIV-1 virus. The resultant decrease in CD4 infection by the virus (resulting in cell enlargement [syncytium] and reverse transcriptase production) is listed in the two tables under the column headings indicating how much electric current in microamperes (uA= millionths of an ampere) was applied to the virus for how many minutes. 100uA applied for 3 minutes to the virus produced only approximately 2% of the number of enlarged cells (syncytium) as was produced after 6 minutes without electrical treatment of the virus. 100uA applied for 6 minutes to the virus produced only 6% of the reverse transcriptase activity as was produced after 6 minutes without electrical treatment of the virus. 100uA is equal to 7.7uA per square millimeter (mm²) of the surface of the electrodes delivering the electric current to the virus.

Explanation of tests: Human CD4 immune cells, when exposed to HIV-1 virus, normally become infected with the virus and then enlarged as the virus reproduces itself (with the coerced help of the blood cell) within the CD4 cell. So anything that can reduce the viral infectivity (the ability of the virus to infect a cell) can be tested in the laboratory to see if less enlarged cells (syncytium) are produced which will show the degree of success of the anti-viral. Reverse transcriptase is an enzyme used by retroviruses to form a complementary DNA sequence (cDNA) from their RNA. The resulting DNA is then inserted into the chromosome of the host cell. A test showing how much is being produced is a way to quantify approximately how much viral reproduction has happened as a result of viral infection of the CD4 cells. So a test result showing reduced reverse transcriptase activity is one that shows how successful an anti-viral is at reducing the infectivity of a virus.

U.S. PATENT 5,139,684

By Steven Kaali and Peter Schwolsky Filed 11-16-1990, approved 8-18-1992

Electrically conductive methods and systems for treatment of blood and other body fluids and/or synthetic fluids with electric forces

Claimed:

"...applying... no biologically damaging electric potentials... to the electrically conductive electrode segments whereby electric field forces are produced... that induce biologically compatible current flow through the blood... to attenuate bacteria, virus, parasites, fungus contained in the blood... to render the bacteria, virus, parasites, fungus ineffective while not impairing the biological usefulness of the fluids"

Summary:

"...to attenuate such contaminants to the extent that bacteria, virus, or fungus, or parasites contained in the blood... are rendered ineffective to infect or affect healthy human cells."

Best Mode of Practicing Invention:

"For example, treatment of AIDS virus in media at 100 microamperes for 3 minutes has been observed to substantially attenuate (render ineffective) the AIDS virus."

Experimental Results:

"In conclusion, these experiments... indicate at a statistically significant level that direct electric current... can attenuate the ability of HIV-1 to infect normally healthy cells which are susceptible to the HIV-1 AIDS virus."

"Both of these assays (syncytia & reverse transcriptase) are widely used as reproducible measures of viral infection and can be used to determine if alternations in viral infectivity as a product of this electrical treatment can be detected."
"...it is believed obvious that other modifications and variations of the invention will be suggested to those skilled in the art in the light of the above teachings."
"...it is possible that certain virus may be attenuated (or attenuated at a faster rate) if they are exposed to a greater electric current magnitude of the order of 500 microamperes for shorter time periods."

Editor's Notes:

The patent's 1st laboratory test used electrically treated (at 100uA/3min which is 7.7uA per square millimeter for 3 minutes) HIV-1 virus mixed with human T cells (immune cells which the HIV likes to infect) and showed 99% less infected & enlarged T cells (syncytia) by viruses after 4 days compared to T cells mixed with HIV-1 not electrically treated. The patents 2nd lab test used electrically treated (100uA/6min) HIV-1 mixed with human T cells and showed 72% less virus associated enzymes (reverse transcriptase produced as a result of viral reproduction) after 4 days, compared to T cells mixed with HIV-1 not treated. The patent stated; "it is possible that certain virus may be attenuated (or attenuated at a faster rate) if they are exposed to a greater electric current magnitude of the order of 500 microamperes for shorter time periods." 500 microamperes (500uA) applied to the experiments electrodes with a surface area of 13.3mm² yields a current of 38.5uA per square millimeter (38.5uA/mm²). In approximation of this idea, this books blood electrifier is estimated to produce 17 to $34uA/mm^2$ (for 4 - 8 mm² cross sectional arterial area). This high current is necessary due to the short (but repeated) treatment durations of blood when using an electrode on each wrist. Due to the short treatment durations, as the blood passes through the arms arteries (\sim 1 minute), it is necessary to do treatments of up to 1 - 2 hours.

U.S. PATENT 5,188,738

Inventors: Steven Kaali, Peter Schwolsky Filed: Nov 16 1990 Granted: Feb 23 1993

Alternating Current Supplied Electrically Conductive Method and System for Treatment of Blood

ABSTRACT

A new alternating current process and system for treatment of blood... from a donor to a recipient or storage receptacle or in a recycling system using novel electrically conductive treatment vessels... with electric field forces of appropriate electric field strength to provide electric current flow through the blood... at a magnitude that is biologically compatible but is sufficient to render the bacteria, virus, parasites and /or fungus ineffective to infect or affect normally healthy cells... For this purpose low voltage alternating current electric potentials are applied to the treatment vessel... and produce current flow densities in the blood or other fluids of from one microampere per square millimeter of electrode area... to about two milliamperes per square millimeter.

SUMMARY OF INVENTION

The treatment can be accomplished in a treatment system external of the body or by implant devices.

BEST MODE OF PRACTICING INVENTION

Recent experiments have proven that exposure to electric fields... produces electric current flow through blood Of the order of 1 to 100 microamperes. For example, treatment of virus in media at 100 microamperes for 3 minutes has been observed to substantially attenuate (render ineffective) the AIDS virus. The length of travel of the blood through the sustained electric field induced current flow also can be adjusted so that the blood is subjected to the electric field force for time periods of the order of from one to six minutes at least. At the current values noted above this is believed adequate to attenuate (render ineffective) bacteria, virus (including the AIDS virus), parasites and/or fungus entrained in blood.

PRACTICAL USE OF INVENTION

...it is possible that certain virus may be attenuated (or attenuated at a faster rate) if they are subjected to greater electric current magnitudes of the order of 500 microamperes for shorter time periods... It is believed obvious that other modifications and variations of the invention will be suggested to those skilled in the art in the light of the above teachings.

Editor's Notes:

From their previous patent 5,139,684 I know that 500 microamperes applied to the experimental electrodes (with 13.3mm² area) yields an electric current of 38.5uA/mm² although that patents experiments produced only 7.7uA/mm² when 100uA (100 microamperes) total current was applied. This books blood electrifier is estimated to produce 17 to 34uA/mm² (for 4 - 8mm² cross sectional arterial area) which is necessary, as was suggested, to attenuate microbes when the uninterrupted exposure time is minimal, which would be the case (being probably 1 minute) given the treatment method of the blood electrifier with an electrode on each wrist. This patent, # 5,188,738, is the last of their two electromedicine patents, and I suppose is proposing use of AC current, instead of the previous DC current, because they may have found in subsequent tests that AC is even more biologically compatible with blood than DC is (which theoretically may produce oxygen by electrolysis which is a free radical in the blood when not being transported by red blood cells).

from: http://www.cfsan.fda.gov/~comm/ift-omf.html U.S. Food and Drug Administration Center for Food Safety and Applied Nutrition June 2, 2000

Kinetics of Microbial Inactivation for Alternative Food Processing Technologies Oscillating Magnetic Fields

Scope of Deliverables

This section reports the effects of magnetic fields on microbial populations.

1. Definition, Description and Application

Static (SMF) and oscillating (OMF) magnetic fields have been explored for their potential as microbial inactivation methods... an OMF is applied in the form of constant amplitude or decaying amplitude sinusoidal waves. OMF applied in the form of pulses reverse the charge for each pulse, and the intensity of each pulse decreases with time to about 10% of the initial intensity (Pothakamury and others 1993). Preservation of foods with OMF involves sealing food in a plastic bag and subjecting it to 1 to 100 pulses in an OMF with a frequency between 5 to 500 kHz at temperatures in the range of 0 to 50 degrees Celsius for a total exposure time ranging from 25 to 100 milliseconds. OMF of intensity of 5 to 50 tesla (T) and frequency of 5 to 500 $\,$ kHz (5000 - 500,000) was applied and reduced the number of microorganisms by at least $2-\log$ cycles (1/100th). OMF of this intensity can be generated using: (1) superconducting coils; (2) coils which produce DC fields or (3) coils energized by the discharge of energy stored in a capacitor (Gersdof and others 1983). Inhibition or stimulation of the growth of microorganisms exposed to magnetic fields may be a result of the magnetic fields themselves or the induced electric fields. The latter is measured in terms of induced electric field strength and induced current density.

2. Inactivation of Microorganisms

Table 1. Effect of magnetic fields in microorganisms.

field strength	frequency of pulse	type or magnet:		Effect	Reference
12 tesla	6000 (1 pulse)	OMF	Streptococcus Themophilus in milk	Cell population reduced from 25,000 cells/ml to 970	Moore (1985)
7.5 tesla	8500 (1 pulse)	OMF	Mold spores	Population reduced from 3,000 spores/ml to 1	Hofmann (1985)

Hofmann (1985) reported on the inactivation of microorganisms with OMF in milk, yogurt, orange juice and bread roll dough. According to Hofmann (1985) only 1 pulse of OMF was adequate to reduce the bacterial population to between 1% and .1%.

References

Hofmann G.A. 1985. Deactivation of microorganisms by an oscillating magnetic field. U.S. Patent 4,524,079.

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Pothkamury, U.R., Barbosa-Canovas, G.V., and Swanson, B.G. (1993). Magnetic-field inactivation of microorganisms and generation of biological changes. Food Technol. 47(12):8593

Editor's Notes:

This books Multi-Pulser is an oscillating magnetic field generator (with OMF of decaying amplitude as Hofmann and Moore used) with a magnetic field strength of around 5 Tesla and a frequency of around 5000 cycles per second (5 kHz). Its electromagnetic coil is energized by the discharge of energy stored in a capacitor. The experiences of myself and others with the Multi-Pulser are in agreement with the scientific test results of Moore and Hofmann in that it is effective against bacteria and mold (fungus) although our test medium was human tissue instead of food. Their test results showed a 96% reduction of streptococcus bacteria (at $6 \, \text{kHz} / 12 \, \text{T}$) and a 99.9% reduction of mold spores (at $8.5 \, \text{kHz} / 7.5 \, \text{T}$).

U.S. Patent 4,524,079

Inventor: Gunter A. Hofmann

Date: June 18, 1985

Deactivation of Microorganisms by an Oscillating Magnetic Field

Abstract

Material... such as food products... is disposed within a magnetic coil and subjected to one or more pulses of an oscillating magnetic field having an intensity of between 2 and about 100 Tesla and a frequency of between 5 and about 500 kHz. A single pulse of the magnetic field generally decreases the microorganism population by at least about two orders of magnitude. $[1/100^{\rm th}]$

Detailed Description of a Preferred Embodiment

The magnetic field in the coil is produced upon discharge of a capacitor. The capacitor is charged from a source, and when a switch is closed... an oscillating current is generated between the plates of the capacitor. The oscillating current in turn generates an oscillating magnetic field which is concentrated within the region bounded by the coil... Immediately subsequent to closing the switch, an intense magnetic field is produced by current flowing in one direction. As the current changes direction, the magnetic field changes polarity. The oscillating current and, hence, the oscillating magnetic field rapidly deteriorates, with the field intensity after about ten oscillations dropping to a few percent of the original intensity. Herein, magnetic field intensities refer to the intensity of the initial peaks... Herein pulse duration is considered to be 10 oscillations, after which the substantially decayed field has a negligible effect.

Example 1

A sample of pasteurized milk is... inoculated with Streptococcus thermophilus at a concentration of 25,000 bacterium/cm 3 ... The milk is subjected to 1 pulse of a 12 Tesla, 6kHz, oscillating magnetic field... An aliquot of the milk is plated on a standard plate. The colony count of the plate shows a concentration of about 970 Streptococcus thermophilus per cm 3 .

Example 2

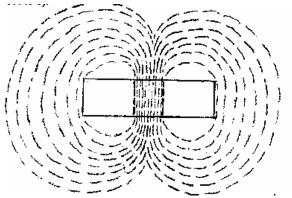
350g of plain 4% fat yogurt is opened, inoculated with Saccharomyces at a concentration of 3,500 bacteria/cm³ and stirred thoroughly. The container full of inoculated yogurt is placed centrally within the coil described above and subjected to 10 pulses of a 40 Tesla, 416 kHz oscillating magnetic field. A sample of the yogurt is plated on standard plates, and a count of the cultures reveals a concentration of only about 25 Saccharomyces bacteria per cm³ of yogurt.

Example 4

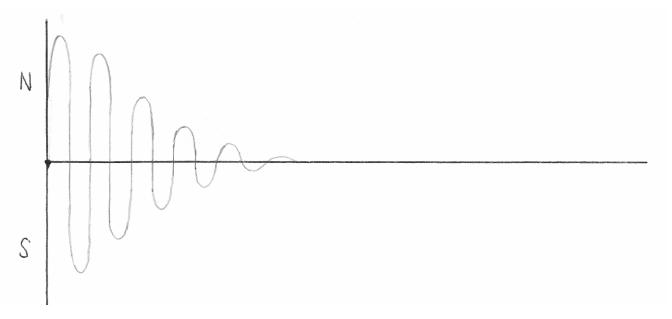
A prepackaged dough product... is thoroughly mixed with mold spores to give a concentration of 3000 spores/cm³. The chopped rolls... was centered in the above-described coil where it was subjected to 1 pulse of 7.5 Tesla, 8.5 kHz, oscillating magnetic field. A sample of the chopped rolls is plated on standard plates, and a culture count shows a mold spore concentration of only about 1 spore per cm³.

Editor's Notes:

This device produces the same type of oscillating magnetic field as does the Multi-Pulser. The basic design of the Multi-Pulser is the same, with a capacitor (charged with high voltage) connected in parallel with a coil by an electrically controlled switch (a xenon flash tube) to produce a decaying oscillating magnetic field. This patents device varies from the Multi-Pulser in application only by the test product being placed inside the coil, whereas the Multi-Pulser is used so that the coil rests on the test subject which is effected by the lines of magnetic force emanating from the coil (see drawing below). Field force becomes less and less with more distance from the center of the coil as is indicated by the dashed field force lines separating more. The patent's results of test example 1 is a 96% reduction of bacteria (from 25,000 to 970). The patents results of test example 2 is a 99.3% reduction of bacteria (from 3,500 to 25). The results of test example 4 is a 99.9% reduction of fungi spores (from 3000 to 1).



Side view of output coil of Multi-Pulser showing invisible dotted lines of magnetic force



Graph of magnetic field strength (vertical) and time (horizontal)

U.S. Patent 4,665,898

Inventor: Jonathan L. Costa, Gunter A. Hofmann

Date: May 19, 1987

Malignancy Treatment

Abstract

A body part of an animal afflicted with malignant cells is disposed within a magnetic coil and subjected to a plurality of magnetic field pulses, the pulses having intensities of between about 1 and about 100 Tesla and characteristic frequencies of between about 5 and about 100 kHz. The pulses magnetic field selectively inactivates and/or destroys malignant cells with relatively little damage to normal tissue.

Summary of the Invention

... Herein, it is discovered that high intensity magnetic fields applied in short pulses with moderate frequencies, can be used to selectively destroy or otherwise inactivate malignant cells within tissue of a living animal. Selective inactivation of malignant cells within animal tissue subjected to a pulsed magnetic field is accomplished without noticeable deterioration of gross characteristics of normal tissue.

Detailed Description of a Preferred Embodiment

It is found that subjecting body parts containing cancerous tissue to a plurality of magnetic field pulses, with characteristic frequencies above about 5 kHz and intensities above about 1 Tesla, will either arrest the growth of tumors or progressively reduce the number of cancerous cells, resulting in remission of tumors... The magnetic field in the coil is produced upon discharge of a bank of capacitors. The capacitor bank is charged from a source, and when a switch is closed... an oscillating current can be generated between the plates of the capacitors. The oscillating current, in turn, generates a pulsed magnetic field which is concentrated within the region bounded by the coil... Immediately subsequent to closing the switch, an intense magnetic field is produced by current flowing in one direction. As the current changes direction, the magnetic field changes polarity... The oscillating current and, hence, the oscillating magnetic field rapidly decreases after about ten oscillations dropping to a few percent of the original magnetic field strength. Herein, magnetic field intensities refer to the intensities of the initial peaks... The method is applicable to practically any type of tissue and is believed applicable for treatment of most types of malignancies... In each session, an animal is exposed to at least 1 and up to 1000 magnetic pulses. Generally a living animal would be subjected to at least ten pulses at each therapy session and up to one hundred pulses. An animal will be subjected to additional sessions until tumor remission is achieved... Malignant cells are more susceptible to destruction and/or inactivation by a pulsed intense electromagnetic field because the field may create eddy currents that are unique to the tumor. These localized eddy currents may cause effects that are deleterious to the viability and/or reproductive capability of the tumor cells. Alternatively, there may be macromolecules unique to malignant cells which are especially magnetically susceptible... Furthermore, treatment with a pulsed magnetic field does far less damage to the natural immune system than does radiation treatment or chemotherapy. Frequently, a patient who is treated extensively with ionizing radiation and/or with chemotherapy will experience an almost complete breakdown of the immune system. Subsequent to treatment, the immune system may take up to a year to recover, particularly with respect to immunity to viral infections. As a result, even if a patient is cured of the malignancy by radiation and/or chemotherapy, he is subject to debilitating disease or even death by infections to which his body would ordinarily have built up immunity. With the magnetic treatment described herein, here has been no evidence of major immune system beak-down.

TABLE 2
Evaluation of the Growth of Rat Mammary Tumors Following
Multiple Exposures to a Rapidly Varying Magnetic Field

	Field			. Partial or Complete Response .			
Tumor	Strength/	Total No. of	Intermention			Tumors	
Type	Frequency Tesla/kHz	Tumors	Interruption of Growth	Shrinkage	Respo	<u>%</u>	
DMBA primary	5T / 8kHz	8	2	6	8	100%	
NMU primary	5T / 8kHz	10	1	9	10	100%	

It can be seen from the above table that the method of the present invention is useful for treating a variety of malignancies, although the response varies according to the type of tumor. Accordingly, the method has general applicability to malignancy treatment.

Example 3

Twelve rats having primary DMBA-induced mammary carcinomas were treated daily with a conventional Magneform machine. A primary mammary gland carcinoma induced by a carcinogen, such as DMBA or NMU, is highly virulent, as outlined in substantial detail in P. M. Guillino, et al., Journal of the National Cancer Institute, Vol. 54, no. 2, February 1974. It is common for such a tumor in a rat to increase in size by about 10 to 30 fold in about 30 days, and if left untreated almost invariably will ulcerate within about 45 days. Ten of the rats are treated daily with 20 pulses at 5 Tesla and 8 KHz. Their tumor volumes on the 1st and 30th days are listed in with table 3 below:

TABLE 3

Test	Tumor volume (cm ³)				
Rat	<u>Day 1</u>	Day 30			
1.	1.60	1.95			
2.	1.20	3.65			
3.	2.10	1.20			
4.	1.40	3.81			
5.	.90	.42			
6.	3.00	3.81			
7.	.38	.45			
8.	2.10	8.18			
9.	6.79	8.88			
10.	1.10	.85			

It can be seen from the above table that after thirty days the tumors were either diminished in size, stabilized, or at least controlled relative to untreated tumors... The remaining two rats were treated in an identical manner but at 1/4th the field intensity, i.e., 1.2 Tesla, 8 kHz, 20 pulses. One of these died on day 58 while the tumor size of the other had decreased in size from 1.6 cm³ on day 1 to 1.4 cm³ on day 62. The rats generally appeared to exhibit normal behavior and appetite and did not appear to lose weight. The fact that the rats did not die of infections suggested that the immune systems functioned normally.

Editor's Notes:

This device produces the same type of oscillating magnetic field as does the Multi-Pulser. The basic design is the same, with a capacitor (charged with high voltage) connected in parallel with a coil by an electrically controlled switch (a xenon flash tube) to produce a decaying oscillating magnetic field. This patents device varies from the Multi-Pulser in application only by the test subject being placed inside the coil, whereas the Multi-Pulser was used so that the coil rests on the test subject which is effected by the lines of magnetic force emanating from the coil (see drawing below). Field force becomes less and less with more distance from the center of the coil as is indicated by the field force lines separating more. The results of test example 1 is a reduction of live cancer cells (in test tube) of 32% of undifferentiated carcinoma and 29% of embryonic carcinoma after 18 days. This was after 8 pulses of oscillating magnetic field of 5 Tesla at 8 kHz on day 1. The results of test example 2 is 75% and 90% of treated rat mammary tumors (6 of 8 DMBA primary tumors, and 9 of 10 NMU primary tumors) shrunken after 20 pulses daily of OMF at 5 Tesla and 8 kHz for 6 days. The results of test example 3 is an average 86% reduction of tumor size after 30 days (compared to a typical 20 times tumor growth after 30 days). Treatment was with 20 pulses OMF of 5 Tesla at 8 KHZ daily for 30 days. Tumors were induced by injection of the DMBA chemical.

The table below has columns for the typical 20x size after 30 days and the percent reduction of the treated tumors compared to the 20x size. It also shows the equally positive lower intensity (1.2 Tesla) test results on one tumor with a resultant 96% reduction.

TABLE 3

•	• Tumor Volume (cm ³)				
			typical	size after 30 days	percent
	Day 1	Day 30	if left	untreated (x20 size)	reduction
1.	1.60	1.95		32.	94%
2.	1.20	3.65		24.	85%
3.	2.10	1.20		42.	97%
4.	1.40	3.81		28.	86%
5.	.90	.42		18.	98%
6.	3.00	3.81		60.	94%
7.	.38	.45		7.6	94%
8.	2.10	8.18		42.	81%
9.	6.79	8.88		13.6	35%
10.	1.1	.85		22.	96% .
					0.00

average 86%

treatment with 20 pulses of 1.2 Tesla at 8 kHz for 30 days 11. 1.6 1.40 32. 96%

U.S. Patent 4,683,873

Inventors: Ruggero Cadossi, Donata Marazzi

Date: Aug 4, 1987

Method and Device for Treating Living Tissues and/or Cells by Means of Pulsating Electromagnetic Fields

ABSTRACT

A method for treating living tissues and/or cells consisting essentially of electromagnetically inducing in the tissue and/or cells alternating pulsating electrical signals having a waveform which comprises a positive portion with a duration of between 1 and 3 milliseconds, and a negative portion having a peak value less than that of the positive portion, followed by a region of exponential extension tending to the reference value zero.

CLAIMS

We claim:

- 1. A method for treating living bone tissue by means of pulsating electromagnetic fields to stimulate the growth of said tissue,... the frequency of repetition of said pulsating electrical signals being greater than 50 Hz, with said treatment causing substantial formation of periosteal callus in the region of said bone tissue growth.
- 2. A method as claimed in claim 1, wherein said electromagnetic field has a value such as to induce in said tissue a current density of between 2 and 30 microamperes/cm 2 .
- 3. A method as claimed in claim 2 wherein the duration of the treatment is between 8 and 14 hours per day.
- 9. A device as claimed in claim 8 wherein said oscillation circuit further includes a diode connected between the outputs of said power supply unit and oscillator means, and a capacitor collected between the output of said power supply unit and ground, with said diode and said at least one inductor being connected in parallel.
- 13. A device as claimed in claim 12, wherein said oscillation circuit includes a pair of inductors, between which, when in operation, there is placed said tissue to be subjected to treatment.

DESCRIPTION

BACKGROUND OF THE INVENTION

It is known to use pulsating electromagnetic fields for inducing alternating electrical signals in the tissue or cells, such signals having proved particularly effective in promoting healing both in the case of delayed union fractures and pseudathroses and in the case of associated cutaneous lesions of traumatic or vascular origin. In this respect, delayed union fractures are considered to be those bone fractures characterized by low presence of bone callus and lack of rearrangement of the fragments at least 6 months after the trauma, whereas it is more proper to speak of pseudathroses when a clear morbid state with pathological evolution of the callus formation process is present at least ten months after the trauma.

SUMMARY OF THE INVENTION

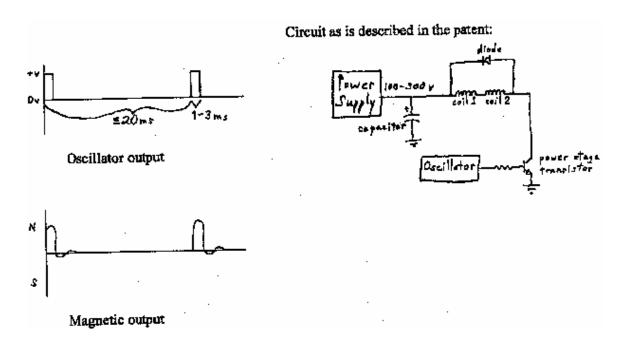
The object of the present invention is to define a method and a device for treating living tissues and/or cells by means of pulsating electromagnetic fields which... in particular favors the formation of periosteal callus conjoining the opposing ends of the fracture.

DETAILED DESCRIPTION

Finally, it is apparent that modifications can be made to the described method and device without leaving the present invention. In particular, as it has been reliably demonstrated that pulsating electromagnetic fields have a favorable effect on tissue repair processes at all levels (osteocartilaginous, nervous, vascular, paranchymal, etc.), it is apparent that the described method can also be advantageously applied in treatments which are outside the pathology described by way of example. In this respect, it has been recently observed that the aforesaid method and device also enable significant results to be obtained in the field of so-called "fresh" fractures. Although the invention has been described in conjunction with the foregoing specific embodiment, many alternatives, variations and modifications are apparent to those of ordinary skill in the art. Those alternatives, variations and modifications are intended to fall within the spirit and scope of the appended claims.

Editor's Notes:

The magnetic output of this device is similar to the Magnetic Pulser but with less magnetic field strength and a much higher repetition rate per second of the magnetic output. This patent describes two output coils (inductors) of the same electronic circuit to be placed on opposite sides of the injured limb. The principal use of this is for speeding up the healing of broken bones although it is said to also have a favorable effect on all tissue repair processes (bone, cartilage, nerves, arteries, veins, etc).



U.S. Patent 5,133,352

By Peter H. Lathrop & Steve K. Johnston
July 28, 1992

Method for Treating Herpes Simplex

Abstract:

The present invention provides an apparatus and method for treating infectious skin conditions, such as Herpes Simplex 1 and 2. By the application of an electrical field and current to the area of the manifestation of the disease on the body there is activated a reaction at the cell level to combat the virus and disrupt its attack on the healthy cell structure. The present method comprises a direct application of a low voltage direct current, low amperage stimulation to the skin about the infected location for a few seconds every hour for a length of time sufficient to prevent formation and/or heal the resultant lesion.

Claims:

- 1. The method of treating herpes virus infections of the human body by inhibiting viral infections of healthy cells and the development of virus infected cells which comprises: applying a low voltage DC current to the skin immediately adjacent the symptom site to penetrate the protein envelope of the Herpes virus infected cell, break up the polypeptide structure of the virus core and disperse the lipid proteins; increasing the mitochondrial function of the herpes virus infected cells and the healthy cells to restore cell capacitance to normal, thereby preventing development of the Herpes virus.
- 2. The method of claim 1 further defined by applying the defined therapeutic steps repeatedly at hourly intervals for very limited time durations of two to fifteen seconds for at least eight hours after onset of symptoms.
- 3. The method of claim 2 further defined by applying the electrical field to the skin at two points spaced apart a distance of one-half inch to one-and-one-half inches.
- 4. The method of claim 3 further defined by applying a nine volt DC field to the skin of the tissue under virus attack to cause a small milliampere current to flow through the cells in the tissue adjacent the virus attack zone.

RESULTS

Ninety-six men and women between the ages of 19 and 37 participated in the study which took place over a period of years of clinical trials. Group One--23 controls. These subjects were administered no electrical stimulation. Some of these subjects sporadically used some form of drug therapy. Group Two--50 subjects who were seen in a medical clinic with their treatment supervised by a medical doctor. These patients took no drugs and were treated solely with electrical stimulation. Group Three--23 subjects who were each issued a small electrical stimulation device. All of the subjects in this study suffered from either Herpes Simplex 1 (mouth herpes), or Herpes Simplex 2 (genital herpes). Prior onset of the disease ranged from 1.5 to 5 years. The most successful treatment group were those subjects who treated themselves with a portable electrical stimulator prior to onset of the lesion. Average length of lesion for this group was 6 hours. It also appears that the sooner treatment starts after symptoms, the better the results. To prevent lesion formation treatment within the first twelve hours appears mandatory. The data further demonstrates, even more dramatically, the self-treatment with low voltage electrical current within the first 15 minutes of the occurrence of a Herpes Simplex symptom, can prevent the occurrence of a lesion at the site of stimulation. Finally, the data indicates that there was no significant difference in results of treatment with regard to sex or type of Herpes.

CONCLUSION

The key to effective treatment of the herpes virus, whether it is Herpes Simplex 1 or Herpes Simplex 2, is the beginning of treatment by low voltage electrical stimulation at the possible site of a lesion, as indicated by tingling or other pre-lesion symptoms, as soon as the symptoms are felt. Delay beyond the first 12-18 hours after the first symptoms will usually result in lesions occurring, although if treated, the duration is greatly reduced.

[This patent gives the background info for the Skin Electrifier, whose construction plans are available. The plans are identical to what is proposed in this patent.]

Select Quotes from Various Electromedicine Patents

Patent 6,231,497

Magnetic therapy device

The beneficial effects of applying a magnetic field to an area of human and animal anatomy such as the back, legs, arms and the like, are widely known and well documented. Magnetic fields are commonly used for therapeutic purposes such as reduction of inflammation in tissues and pain relief. Magnetic fields are known to improve the blood flow to tissues to which the magnetic field is applied.

Patent 6,675,047

Electromagnetic-field therapy method and device

Pulsed [electromagnetic] field therapy produces a complex effect on the human organism, because it contributes to an improvement in the energy metabolism, increases the mobility of lymph, enhances the blood supply of capillaries, and, as a consequence, improves nutrition of all tissues of the organism. The pulse field therapy liquidates stagnation of energy in tissues, whereby painful sensations are eliminated. The pulse therapy improves ion exchange on the level of cells, regulates the intracellular pressure, this contributing to normalization of the overall metabolism.

Patent 7,024,239

Pulsed electromagnetic energy treatment apparatus and method

Electrotherapy includes various means for applying an electric or electromagnetic field to a wound area to facilitate growth and proliferation of new tissue, i.e., healing. Application of external electrical and electromagnetic fields is now an increasingly standard therapy for the treatment of non-union bone fractures, but these devices have seen limited use in other areas of healing. The present invention may also be utilized in other treatment areas where increasing the rate of growth and proliferation of human or other living cells is essential, including the treatment of burns and surgically implanted skin or soft tissue grafts, rehabilitation medicine, post surgical repair, and neuronal/brain/spinal injury repair and regeneration.

Patent 6,858,000

Device for treating tissues with an electromagnetic field

Currents having the frequency of 80 to 100 Hz act to the sympathetic nervous system, cause relaxation of smooth muscles and reduction of the pressure in the proper hepatic artery. Currents having the frequency of 800 to 1000 Hz act to the parasympathetic nervous system, cause drastic increase of the tone of smooth muscles and increase of the pressure in the proper hepatic artery (USSR Inventor's Certificate 1,147,408, A 61 N 1/18, 1985).

Patent 6,261,221

Flexible coil pulsed electromagnetic field (PEMF) stimulation therapy system PEMF therapy has been satisfactorily used in treating spinal fusion, failed arthrodeses, osteonecrosis, and chronic refractory tendinitis, decubitus ulcers and ligament, tendon injuries, osteoporosis, and Charcot foot. During PEMF therapy, an electromagnetic transducer coil is generally placed in the vicinity of the musculoskeletal injury (sometimes referred to as the "target area") such that pulsing the transducer coil will produce an applied or driving field that penetrates to the underlying damaged bone or other body tissue.

Testimonials of Electromedicine Device Users

[These results are not necessarily typical, just the best of collected ones.]

AIDS/HIV

A Device Manufacturer wrote: "So far, we have treated eight PCR-tested, HIV positive customers. After treatments with the Blood Electrifier and Magnetic Pulser, ranging in length between two weeks and two and a half months, they each went to zero, below detectable levels. We were absolutely astounded to get that type of documentation. These are separate from the AIDS patients Bob Beck has mentioned. We did our own testing. Many doctors, particularly naturopathic doctors, are trying out our technology, and their patients are getting well. The blood of an AIDS patient is extraordinary to look at under a microscope. What you see will just shock you. There are life forms in their blood that look like octopuses with a hundred arms, and there are things creeping around. Then we look at their blood after a few weeks, and all of these things are disappearing. Their blood returns to the natural, healthy state it was in when they were born."

CFIDS

"I had all the classical symptoms of CFIDS (Chronic Fatigue Immune Dysfunction Syndrome which is caused primarily by a virus such as Epstein Barr) for 16 years. These included feeling infected by something like the flu, profound fatigue (especially after exercise), muscle weakness, muscle aches, sleep disturbance, forgetfulness, irritability, confusion, difficulty thinking, depression, light sensitivity, anxiety, emotional instability, sensitivity to heat and cold, intolerance of alcohol, low temperature, hearing sensitivity, chemical sensitivities, and foggy thinking. In 1996 I used the Blood Electrifier and Magnetic Pulser for two months for a total of 92 hours. Much cleansing of deactivated viruses and whatnot was experienced during this time but 2 weeks after stopping usage of the devices I noticed a sudden marked improvement in how I felt overall with a great lessening of all the above symptoms and a complete alleviation of the feeling of having a constant flu. Everyone who knew me then would comment on how I looked so much improved even though I hadn't told them I had just finished using the Blood Electrifier." Michael F.

THROAT INFECTION, ASTHMA, CHRONIC PAIN

"I bought a Rife Frequency Generator and a Multi-Pulser. The Frequency Generator was used mostly on a setting of 30 hz using the wrist electrodes for blood electrification. I found the Multi-Pulser was most effective in bringing swift relief to throat infections, and much better than anything else I tried (lozenges, etc.) When used for about 10 minutes at a time on my lungs it also worked as well as salbutamol to relieve my asthma. I was able to reduce my use of salbutamol inhalers (which I had been using for many years) and eventually stopped using them altogether. I tried the Multi-Pulser on a friend who suffers from chronic pain from having some torn back muscles which happened years ago when she lifted a heavy weight and then twisted. She said that the Multi-Pulser gave her noticeable relief." M.A.

From S. S.:

1. I've had **splitting fingertips**, off and on, for about 15 years. It had been getting a lot worse. When I visited the doctor I literally had bandages on every finger because they would split and bleed. He said it was caused by a **bacteria** and gave me an anti-bacterial salve. It helped a little, but the

splits and the bleeding didn't go away. Then I remembered the **Multi-Pulser**. After about 3 weeks of using it all my fingers were completely healed. The tips were smooth and there was no sign of splitting. I hadn't been without at least one split finger for 15 years, and now they were all gone. Even my wife, who is very skeptical, didn't think it was a coincidence.

- 2. My wife developed a **cancer** in a saliva gland about 10 years ago. They were able to remove it and she was free of cancer for about 8 years. Then the same cancer appeared in her lungs. It is a very slow growing cancer, but by the time they detected it, she had 4 spots in one lung an 5 spots in the other. Radiation cannot be used because the spots are distributed too widely. They cannot be removed surgically because too much lung tissue would have to be removed (1 inch sphere around each spot). Chemo cannot be used because the cancer grows so slowly. Chemo is only useful against fast growing cancers because it can kill a fast growing cancer before it kills the patient. I talked her into using both the **Multi-Pulser** and the **blood electrifier** for about a month. When she went back for her check up, there was no detectable growth.
- 3. I have also been able to cure **athletes foot** between the toes with the **Multi-Pulser**. I even cured a form of athlete's foot that caused the bottoms of my feet to crust over, itch, and then split and hurt. I just put the Multi-Pulser on the floor and moved my foot over it while it pulsed.
- 4. I was coming down with a **cold** and so I took the **blood electrifier** to work and used it most of the day. I came home, mowed the lawn, and then started to feel really sick. My temperature went up and I felt like I was coming down with the flu. It kind of ticked me off. The device was supposed to cure my cold, and instead I was coming down with what felt like the flu. I couldn't even see how I could go to work the next day. Then, about an hour later, the "flu" went completely away. Except for feeling a little weak, I felt great.
- 5. One more experience. A few months ago I was visiting the doctor for an annual check up. My right eye had been gumming up. He took one look at it and said I had pink eye. He gave me an eye drop, told me to throw away the contact lens in that eye since it was infected, and not wear contacts again until the pink eye cleared up. He said it would take a few weeks. I went home and started using the eye drops he gave me. However, I also started dropping colloidal silver into the eye. I combined this with holding the Multi-Pulser over the eye. Two days later I couldn't see any sign of the pink eye. I not only started wearing contacts again after only two days, but even used the "infected" lens, which had been soaking in colloidal silver. I continued using his eye drops, colloidal silver, and the Multi-Pulser for about a week. There has been no sign of the pink eye since.

BLOOD PARASITES

"I'm 75 year old and for the past two years I have had my blood checked with a dark-field microscope. At first, my blood indicated a number of problems with **parasites** in advanced stages. I started using herbs, enzymes and other natural products and my blood showed I was making progress. I also took chelation treatments. I then started using the **Blood Electrifier** and also making **colloidal silver**. After one week, my blood plasma was completely clear, no signs of any parasites." A.S.

TOOTH INFECTION

"I was able to use the **Multi-Pulser** to manage my **tooth infections** without taking any conventional antibiotics, which amazed the dentist. My husband was hoping that they would help him with his skin cancers, but did not see any improvements." T.H.

CANDIDA, ASTHMA, WORMS, FLU, LEG INFECTION, TYPHOID

From a Christian pastor in the Philippines who made his own blood electrifier, EMEM2, and Multi-Pulser:

"I had systemic **candidiasis** for 10 years before getting 95% relief by these devices. Here are the stories of people I have treated: N. A. had allergy-induced **asthma** with severe coughing who had immediate relief that lasted 4 days after treatment by the EMEM2 at 30,000 hz for 30 minutes. J. S. and family had **pinworm infestations** that were alleviated by use of the blood electrifier (head to anus) for 30 minutes twice daily for 3 days. L. G. had a **flu** with high fever which was immediately cleared up by using the blood electrifier with his hands holding the electrodes. J. G. couldn't walk due to pain from a severe swollen **infection** of a leg wound until he used the blood electrifier 1 hour daily for 3 days with the pad electrodes on both sides of the infection. R. C. was bedridden with **typhoid** (salmonella infection) before drinking one glass of **colloidal silver** hourly for 12 hours, with a complete recovery in 2 days." S.M.

STREP THROAT

"After I came down with **strep throat** I went to my doctor and received antibiotics. The strep throat cleared up, but on February 2, I felt like I was coming down with it again - severe throat pain and swollen glands in my neck. Over the weekend I got tired of the pain to I decided to use my **Blood Electrifier**. I placed the electrodes on the front and back of my throat and used the 4hz frequency for about 15 minutes. Within a matter of hours the pain was reduced about 80%. I followed up that evening with another 15 minute session. The next morning the pain was completely gone and the swelling in my glands was almost gone. I continued to use the device once a day for 15 minutes for about 5 days. I didn't have to go back to the doctor and haven't had another case of strep throat yet." J.W.

AIDS

"January 26, 1982 was a fateful day. While in the hospital for breast reduction surgery at the age of 44, I received a blood transfusion. Within hours I felt I was battling for my life. When I was finally diagnosed with HIV in early 1995, I was suffering from childhood diseases; chicken pox and mumps, herpes sores in my mouth, a peptic ulcer, aneurysm, numerous allergies, aches and pains, and I was always tired. My liver was so bad, the doctor thought I was an alcoholic. I was now taking a variety of prescription drugs ... swallowing 32 pills a day. On December 12th, I started using the Blood Electrifier and the Magnetic Pulser. Within three weeks I felt great. I was walking miles a day. My mouth blisters (herpes) cleared up. When they return, colloidal silver clears them quickly. On November 22, 1996, my PCR HIV test read 3,763 counts. Two months later, on January 24, 1997, my PCR HIV test read "not detected". What's my life like today? I'm living a full life but I'm living with the stigma of HIV. I do a lot of yard work, I'm tanned, I look after my two young grandchildren, I cater to weddings ... and I look younger. My husband says I put three gardeners to shame! I continue to use the Beck units." Norene M.

GENITAL HERPES

"I had Genital Herpes-please notice I use the word 'had', as I am now symptom-free! I started on the Beck Protocol in January of 1997. For a three week period I used the Blood Electrifier over arteries behind my knees for 45-minutes a day; and I drank 2-cups of Colloidal Silver water daily. I also used the Magnetic Pulser every day for 15-minutes per day. I had one herpes outbreak during this time. Then I used the units again in July 1997. I went on them for the 21-Day Protocol for one hour per day, including the Magnetic Pulser, which I used on a swollen lymph node on the right side of my pelvis area. I 'zapped' it for 10-20 minutes a day with the Magnetic Pulser, plus 15-minutes all over the body. Since that time I have had NO SYMPTOMS. It took me two times on the 21-Day Beck Protocol for it to work, but it did! I have an active lifestyle and am athletic. I am 47-years old, but my girlfriend says I have the body of an 18-year old. Sometimes I overdo it with sunburn and stress. Stress or sunburn from my outdoor activity usually complicates my condition but I still haven't had a Herpes outbreak. I never feel the tingling in the lymph in the pelvis area anymore. Hard to believe I no longer have swollen lymph. I plan continuing a healthy lifestyle and remaining symptom-free!" D.C.

HEPATITIS B

"15 years ago I caught Hepatitis B while traveling. My doctor said it was something I couldn't get rid of. The Blood Electrifier and the Magnetic Pulser with colloidal silver and ozonated water are by far the best thing I have tried. I feel I'm rid of the Hepatitis B virus. Now if I feel a cold coming on I use the units and the symptoms stop within two days. If I get a headachy feeling, I use the Magnetic Pulser right away all over my head to clear the feeling." M.M.

SKIN CANCER

"Skin biopsies and blood tests from two separate labs confirmed I had cancer. On my arms and legs were skin cancer lesions. Through my veins flowed other malignant cells-less visible but more deadly. A researcher at the cancer clinic at UCLA told me flatly that without treatment I had six months to a year of wasting away before I died. His words fell like hammer blows. A younger researcher advised against the experimental chemotherapy describing the painful side effects. "Your only hope is alternative therapy," he said. Cigarettes, liquor, cholesterol, a sedentary life-I had done everything wrong but drug abuse. Who could I blame? My first inclination was to give up as I knew nothing about 'alternative therapies.' With the help of my friend, Peter, I waded through many 'sure-fire' cures and narrowed my choice to the research of Robert C. Beck, DSc. Beck's documentation was impressive and cited real medical references and patents as well as case histories. I had just read the media reports about a new electrical device that neutralizes snake venom and I like gadgets, so I decided on the Beck units. I followed the Beck protocol: drank freshly-made colloidal silver and used the Blood Electrifier and the Magnetic Pulser faithfully. The results were immediate. Diarrhea, runny nose, bleeding, aching joints, fluids oozed from every orifice. All of which the Beck papers predicted-apparently due to the flushing of toxins. In my case from almost fifty years of hard living. After five days, the deep profound pain in my arms and legs just stopped. After living in pain for so many months, I was able to stop taking morphine. The skin lesions were drying up as well so I discontinued all medication except vitamin/mineral supplements. On the tenth day I returned to my home in Mexico. My energy level had doubled

and my appetite came back. It had been so long since I'd felt hunger that I mistook the feeling for stomach pains. I stopped losing weight. Once home I completed the recommended three weeks in August 1997. I have been symptom free since then and I'm gaining back my weight. To confirm the results, a blood test came back negative-No sign of cancer." W.R.

FIBROMYALGIA, ASTHMA

"I was diagnosed with Fibromyalgia about 2 years ago. Even though it seems some doctors deny the existence of it, I certainly had something wrong. I was in pain most of the time. I couldn't sleep, and in the afternoon and evenings I found myself extremely tired. I wasn't getting much relief from traditional doctors who told me I needed to learn pain management instead of using painkillers. I went to several types of doctors, but was finding very little relief. I also tried alternative medicine. I found little help and was resolved to having this the rest of my life. A friend gave me Robert Beck's video. Beck talked about colloidal silver, the Blood Electrifier, and the Magnetic Pulser. I ordered the Blood Electrifier and the magnetic pulser, willing to give it a try. After a week on the Blood Electrifier, I started feeling better. I stopped taking medication to help me sleep and I was pain free. After a week I started experiencing some pain and symptoms again. After 3 weeks I felt great! I decided to try using the Blood Electrifier electrodes for an eight-hour period. That was a year ago, I have had no symptoms of that type since. I have asthma and allergy problems that are ongoing. The magnetic pulser helps with that also. When my air passages are inflamed and constricting I use it to get relief. I just place it on my chest and in about ten minutes I feel better." S. Y.

DUPUYTREN'S CONTRACTURE

"A surgeon advised me an operation is the only cure for **Dupuytren's contracture**-bending of the ring and little fingers that is considered hereditary in men. I've been using the **Magnetic Pulser** on my left hand and the surgeon now says I don't have to have surgery. I am very happy." M.S.

CELLULITIS INFECTION

"Let me explain how I acquired my cellulitis infection. The dis-ease infected both lower legs, from my knees to the ankles. Occasionally, the elbow to the wrist begins to itch, just like poison oak. Last summer I purchased a pair of new, very stiff, leather boots. Whenever I wore them, my left boot rubbed on my ankle so much that the lymph would flow like blood. I didn't pay attention to it. The second or third day I placed a Band-Aid over the sore, much too late. The dye from the threads in my socks had infected the lymph system. I didn't realize this until a month later when my legs turned beet red and swelled up. Any slight irritation to these areas, such as clothing rubbing on it, increases the swollen red areas. On occasion, I just plain lose control and scratch the itching areas, which makes it much worse. I tried many things such as, ozone, antibiotics, pitch (which provided the greatest relief from itching) and hydrogen peroxide. Nothing worked! But the Magnetic Pulser stops all itching in the area where it's applied. The relief is instant. The red itching areas just dried up and healed. My natural skin color came back within a short time." B.D.

COLDS, SORE THROAT, CHEST AILMENTS, ALLERGIES

"I have been using the **Blood Electrifier** for about a year and a half in its capacity as a "theoretical" blood purifier and its ability to make colloidal silver water. Using the Blood Electrifier and taking **colloidal silver** water

has had the most positive effect on my health of any alternative therapy I have ever tried. In my early childhood I had contracted double pneumonia and other childhood diseases that put me in the hospital seven times by the time I was two years of age. As a result of this I had weakened respiratory and immune system that allowed constant colds, sore throats, chest ailments and allergies to develop. This continued right up to my adult years. Prescribed medicines didn't seem to work, nor did diet modifications, and herbals and vitamins had marginal positive effects. Some homeopathic formulations were effective in reducing the frequency of my colds but not the severity. Since using the Blood Electrifier and taking silver water daily, I have been free of colds and associated respiratory complications for a year and a half. There have been occasions when I feel the early symptoms of something trying to develop but nothing does. I use the Blood Electrifier two hours daily for one month periods and then one month off. I take silver water twice daily, 1 oz. morning and evening. I have recently purchased the magnetic pulser to use with the Blood Electrifier for deeper lymph cleaning. I had a blood analysis done about a year ago using the dark field microscopy method and it showed my blood to be quite clean and free from active virus and fungi, which I attribute to using the Blood Electrifier. I can only conclude that these theoretical health treatments for blood and lymph cleaning had been responsible for restoring my immune system so that it can properly function." N.O.

VIRUS INFECTION

"To cure a mysterious and stubborn virus that I contracted while living in the Caribbean, my U.S. doctor put me on strong antibiotics-permanently. Five years later looking like "the night of the living dead," with my immune system completely destroyed, raging systemic candida, chronic liver and kidney infections, small intestine problems, and a general feeling of constant exhaustion, I felt desperate to find another way. Finally, I found a naturopath in Calgary who gradually began to unravel the damage done by conventional medicine and I did greatly improve over the next year. But the candida and bacteria were still out of control and nothing we tried seemed to give my immune system a fighting chance. Then the naturopath introduced me to the "Blood Electrifier" and colloidal silver. The first few days of use sent my body careening through terrible detox-like a horrible flu-but I stuck with it because, after all, anything this terrible was either going to kill me or cure me. On day four my husband said, "Honey is there anything I can doanything I can get you?" "Yes," I said, "How about a loaded gun." Then on day five I woke up and felt suddenly better. On day six I felt better still and I have continued to feel increasingly better ever since. After two months the naturopath checked my blood work again and was astonished to find a whopping improvement-the candida and bacteria were reduced by 60%! Yahoo! I'm winning! I still use the Blood Electrifier religiously for 2-3 hours every day and drink between 2-3 cups of silver colloidal. I continue to improve. My eyes are clear, my hair is glossy, my skin is healthy and people who have not seen me for several months say, "Hey you look great!" I feel great! You helped me change hopeless to hopeful. Thanks for my miracle." D. D.

CFS, FIBROMYALGIA

"I bought a **Blood Electrifier** and have used it every day now for about a month. This is the first time in 9 years I've felt great!! (from **Chronic fatigue syndrome, fibromyalgia, hashimoto's, candida,** etc.) My life is just starting over—thank you so much!" C.W.

Gulf War Illness

"I had **Gulf War Illness** so bad that I was bedridden and would occasionally black out. When I started to use the modified 4 hz **Blood Electrifier** I only used it once a week. After 3 weeks I used it 3 times a week. After 5 weeks total usage I was out of bed and thinking of ways to start earning a living again. So, I would have to say that thus far, the results across the board are positive. I am slowly continuing to improve." Thomas R.

GASTRITIS

"My lawyer suffered with stomach pains due to **gastritis** (stomach inflamation caused by the Helicobacter bacteria which also causes stomach ulcers). She used the **Blood Electrifier** at 100hz with pads front & back of her stomach for 15 minutes 3 times weekly and after 3 weeks her stomach no longer had any pain and it never came back." M.F.

BALDNESS

"My friend's hair has really started to sprout! He uses the **Magnetic Pulser** daily and it is definitely doing something up there for sure. He was completely **bald** over the entire top of his head. He showed me the new stuff coming in a couple of days ago. It is sure popping up all over his head! take care. Pete" [EDITOR'S NOTE: could be from increased lymph flow from pulsing]

FLU

"Hey listen.. my son had the <u>flu</u> last week; high fever, chills, the works. I made him wear 2 **Blood Electrifiers** at the same time. He went to sleep .. got up 2hrs later feeling cooler and hungry.. he ate and he went back to sleep with the 2 boxes, and 2 hrs later got up cool to the touch, and a great appetite. So we knocked the flu out in a matter of hours... GOD I LOVE MY Blood Electrifier! And the rest of us used the Blood Electrifier as a preventive so that we didn't get it from him. And none of us got the flu. Now if that isn't a testimonial .. I dont know what is.. I love it more than my Rife Machine.. Ciao for now. Carol in NY"

ATHLETES FOOT, TOENAIL FUNGUS

"infected toe, cleared up 50 percent in 12 hours after 3 weeks of agony and cherry red inflamation. Totally vanished in 48 hours to full usage of the toe, flexion, etc. I used the plan for the Skin Electrifier, a simple 9 volt battery and a 1K resistor (in series). Athlete's foot was also cleared up by use of the device. Also concerning toenail fungus, My mother had toes that were viral and fungal, with nails deformed. She was 85 yrs old. Device: the basic skin electrifier, but with two nine volt batteries in series with a 1k resistor, and 100k potentiometer. All this was mounted on a pair of BBQ tongs so subject could easily apply to toes without straining her back. She was of the good old 'cooperative' generation, did twenty minutes of application to all toes everyday for 3 weeks. It appeared to clear it up, and the nails grew out clean, not deformed." T.S.

HERPES ZOSTER

"the blood electrification allowed a vanishment in a week, and strong remission in only a couple days...this, for **Herpes Zoster**, is incredible." Michael D.

CYST

"During the late eighties, I underwent excision of a cyst from my right breast. Accordingly, it was fibroadenoma. In 1995, I again detected a cyst on the same breast. My surgeon was not inclined to conduct operation. He just told me to refrain from eating meat and processed foods and be vegetarian. Last April 1999, four years later, I experienced severe pain on my right breast, right arm and shoulder. At that time, I could not even carry my handbag. Prior to this, I experienced pain every now and then but ignored it. I was determined to be under the knife again, but a friend of mine referred me to a physician who is into alternative medicine and practices electromedicine to treat her patients. I had live blood microscopy and we found out that my body was already working on a very little oxygen, I had plenty of bacteria in my blood, my red blood cells were coated with toxins and blood spicules were very thick. I was advised to take a 180 degrees turn around on my lifestyle and undergo blood electrification and Magnetic Pulsing. Aside from that, I was advised to take silver colloid and antioxidant with grape seed extract. I used the Blood Electrifier for 2-3 hours a day for 2 weeks. Although I was only using the Blood Electrifier I had tremendous improvement. The quality of my red blood cells improved, spicules vanished, and bacteria was at zero level. More importantly, the pain was gone. I am presently undergoing Magnetic Pulser treatment every weekend, and after almost three months, the size of the cyst has decreased. It is so small now that my doctor and I are having a hard time looking or rather feeling it. I'm still using the Pulser, and I have resumed using the Blood Electrifier. I will again use it for 30 days then use it at least one week straight every month, thereafter. There are plenty of patients in the clinic who have also experienced great improvements ever since they shifted to electro-medicine." Ella D.

STOMACH VIRUS, BRONCHIAL FLU

"I just got my **Blood Electrifier** in 2 days ago. I just happened last night to start getting the stomach virus that is going around. I had to go to the toilet with diarrea. I thought ok I'll try that Blood Electrifier and see if it does any good. So late last night I spent a little under an hour with the electrodes over my abdomen on each side so that the current would go through my intestines and stomach. Well it worked. I got up this morning with no stomach trouble. This thing is really powerful. About 3 months ago I got one from a company in California, Action Electronics I think. Well the day I got it in, a friend called and I just happened to remember that his wife had chronic fatigue. I told him about the device, and he wanted her to try it, so I brought it over. I just let her borrow it for about 2 1/2 months. When I went back, she would not let me have it back. She paid me for it right then. It had done so much for her. She had told her Dad and he bought one from you. She said that yours was much more powerful than the other one, although she had gotten results with the Action device. I decided I would invest in another blood electrifier with more features and power. I cannot bear to turn it full power whereas the other I could not even feel it at full power. Now we have been using the Blood Electrifier to treat the bronchial flu. I had gotten it pretty bad, but after a few treatments of placing the electrodes on my neck where the current would flow through the infected area, it went away quickly. I then loaned it to others to try and they all seemed to get good results too. While the device was loaned out, my virus started coming back, and I finally got the box back. After the first 1/2 hr treatment, I was greatly improved. I really think there needs to be more research done on treating viruses at the site of infection, rather than just on the arteries of the wrist or foot." Bob S.

HEPATITIS C

Someone called into the Art Bell program of Jan 08 2000 when Bob Beck was being interviewed and the person said that a girl who had **Hepatitus C** had a reduction of viral count to 1/2 within 10 days of doing **blood electrification** but that it took 4 months to fully eradicate the virus. The doctors did pronounce her cured. He didn't say if she was also using the Pulser.

ASTHMA

Deb emailed: "I started using the Bob Beck blood electrifier on Friday Aug 13. Surprisingly I awoke this morning (the 16th) with totally clear lungs. This is a big surprise to me because I have had moderately severe asthma (50% lung function and unable to undergo general anesthesia) and been on many pills and inhalers since I was in my mid 20's. I am obviously very happy! I did 4hz/square-wave treatment for the times as follows: Friday 1+1/2 hrs, Sat 1+1/2 hrs, Sun 1/2 hr, Mon 50 min. After I used the Electrifier again today (the 18th) I coughed up mucous but my lungs remained clear. I am going to use the Electrifier for the 6 week recommended time-frame."

Rife Testimonies

[These results are not necessarily typical, just the best of collected ones.]

Willy M. emailed: "I got the research equipment (Rife Frequency Generator) on Dec.31 around noon. I began doing 'research' immediately. After 1 month of using these units the **infection in my leg** (due to a major motorcycle accident in 1972) has become completely under control. Before, the infection could not be brought under control from my knee down and was taking over completely so that I was not very far from losing my leg. Now the major wound site has completely healed about 30%! Side effects; new hair where there has never been hair before, hair growing on scar tissue, inflammation of entire left leg gone completely, pain created by herniated disc in my back is 95% gone, pain from neck injury is gone, a 26+1/2 year reliance on pain medicine (poison) is gone and the major joint pain is gone. I cannot express how I feel now in words. Thank you."

email: "Hi there, I wanted to let you know how I was doing with the Rife unit that I have had for two months. I bought it specifically to try and eliminate a persistent yeast infection that I have had in my lungs and sinuses (sinusitis) for seven years. Although cleared by the medical establishment as perfectly healthy, I could not drink a beer or eat ice cream especially before bed. I would wake up with terribly congested sinuses, drainage and a tight constricted feeling in my chest that was painful. I started with short 20-30 second treatments on my sinuses and lungs and didn't get much of a dieoff reaction until I went to two minutes and then it was large die-off that made me sick all day. I gradually worked up from there, using the unit every other day. I am now up to 10-12 minute treatments every 2-3 days. The progress on my sinuses has been phenomenal. I think I have virtually eliminated my problem and now have been doing maintenance treatments of 10-12 minutes about once a week. My lungs are 50-60% improved and will probably take a few more weeks or months to clear out. I am very pleased with the

progress to-date. I have not combined the treatment with any diet restrictions because I wanted to see the effect of just the Rife unit alone."

Jerry S. email: "The benefit it's been continues to amaze me. I hired a welder to modify a flat deck for my electrical business and he came in the other morning limping, said he was fine the day before and didn't know what caused this. We guessed **GOUT** but he's only 23!.... I applied the pads to his foot that night at my birthday party he came to and immediately after the treatment he said the sharp pain was gone and was just left with a dull ache. This morning he showed up at work and was impressed that he still felt good."

"Randy M. is the president of the local **Multiple Sclerosis** Society in my city and he claims that the bi-monthly sessions on my pad style setup from Jaguar Enterprises is easing his suffering markedly. I can't give you anything more than his reports to me that his legs work better and his vision is improved. I'm using the MS frequencies and having him stand in bare feet on the salt water wetted pad and holding another 3 inch denim wetted pad in both hands. His knees also were giving him trouble and I went thru the 'Knee Pain' frequencies. To say he's thrilled with the results would be an understatement."

"I would like to inform you the Rife machine is a Miracle Machine to us, especially to my wife. She has been **paralyzed**, half of her body, right side, due to **stroke**, since April 1991. After just a couple of uses, she can walk and put her weight to the right side of her body, the paralyzed side. She can walk now, not yet like the original way before she had the stroke, but she does not use her wheelchair."

"Carpal Tunnel Syndrome once made it too painful for me to write, type, or lift a fork to eat. Imagine my astonishment after two sessions with an Rife frequency machine at being able to type for hours with my crippled hands! With a "touch-up" about twice a year, I now type 8 to 10 hours a day."

"My friend Evan...had been diagnosed with inoperable **prostate cancer** which had metastasized to the bone marrow. He was...not expected to live much longer. Upon learning about my Rife machine, he wanted to experiment on himself. The second time he used the unit, that night he had to urinate more than usual, and the urine was cloudy and loaded with pus. By the FOURTH treatment, he was free from bone pains (from the site of the metastases), and was able to discontinue the morphine he'd been taking for the past several months."

Rita F told me on the phone that her **lung cancer** came back after doctors had previously removed the top 3rd of one lung. But after using one of my Rife frequency generators for 9 months there was no sign of it when x-rayed again. She was zapping with these frequencies for 5 minutes each for 3 times a week: 663, 727, 778, 787, 880, 1050, 1550, 2008, 2050, 2127. The only other thing she did different was change her diet from high protein to VEGAN (vegetarian w/o dairy).

Rita F told me on the phone that her **glaucoma** eye pressure was significantly down after converting to a vegetarian diet and using these frequencies for 5 minutes each 3 times a week: 727, 787, 880, 5000, 1600. She also said her eyesight had improved so much she had to have a reduction in the strength of the lenses in her glasses. This all was after 9 months of Rifing.

"When I was young, I crushed all the discs in my neck. For years, I suffered migraine type headaches as well as severe neck and shoulder pain. I started receiving relief from my pain the first week I used the Rife frequency generator. Now I just use it once a week for 1½ minutes per setting. My husband had breathing problems progressively getting worse. His father died from emphysema. Night time was the worst for my husband. When he laid down, he would cough so much he would wake up exhausted. Now he uses the Rife once a week. He now breathes easy and sleeps good. It also stopped his snoring. I want others, who have suffered as I have, to receive the relief I have. Life without pain has given me a better life."

"A report on the use of Rife frequencies. I purchased a Rife frequency instrument. I had a very serious internal virus infection that I had not been able to control by any means. With large lesions in the mouth, I had to use self-hypnosis to consume food and fluids. Five hours after the first application, all pain ceased, and three days later all lesions had closed. I have been totally free of the virus since!!!"

"In my last letter, I told you I had named my Rife unit "Albert". I loaned "Albert" to a lady with **breast cancer** in June. About the 3rd of July, she reported that her tumor had shrunk 1/3 in size."

"I had a brother-in-law who is **mentally ill**. I tried on him all the frequencies for mental illness. I noticed lots of improvement in his behavior. Before he only sat and looked out the window. Since I have given him a couple treatments on the machine he is now interested in becoming an American citizen."

"Because of a weakened immunity I frequently suffered from **kidney infections** and pneumonia which typically lasted for 6 weeks with antibiotics. After using the machine I was astonished to see the pain and symptoms clearing up in less than 6 hours!"

"I have suffered from **type 2 diabetes** for over 18 years. The disease had advanced to the stage of reduced circulation in the hands, lower legs, and feet. I was also experiencing blood clots. My first treatment was 6-2-93. Ten days later all circulation problems disappeared along with the diabetes symptoms and have not returned to this day."

"I started out with your Tenma oscillator and Rife Amplifier and am now using the R/B plasma tube. I probably could have saved myself \$2000 if I'd stayed with your unit. It seems to be just as effective as the tube unit and my volunteers liked it better because "I could feel the pulsations before!" My grandfather, father and myself had bad knees. I applied your units 2 pads on either side of the knee and ran the "KNEE PAIN" freq's at 3min each. Immediately afterwards (the treatment) he said the pain left completely. He used to have a nap for 20 min every noon so he could make it thru the afternoon. The next day (after the 1st treatment) he phoned me at 10 pm having not had a nap that day and in no pain at all, with energy to spare. I treated him again 2 weeks later as the pain was back. With a 2nd treatment he didn't need another one until a month later, then 2 months before the next treatment, He danced all night at my son's wedding and was fine. Went skiing, no pain.... He's impressed. Dad's 64."

Construction Plans for Electromedicine Devices

These pdf files are available from http://www.geocities.com/a57ngel/book/plans/

Construction Plans

Blood Electrifier, with controllable output current at AC line frequency (50 or 60 hz) or at DC current. Powered by AC adaptor. (9 electronic parts)

Beck style Magnetic Pulser, outputs a single unipolar magnetic pulse every 3 seconds. Powered by AC adaptor. 32K gauss magnetic output. (17 parts)

Magnetic Multi-Pulser, outputs a single burst of declining strength oscillating magnetic field pulses every ¾ second. Powered by AC adaptor. 1.8 Tesla output. (19 parts)

Rife Frequency Amplifier, which accepts any 5 volt peak audio frequency signal from a computer (with frequency generator software) or separate frequency generator. Output is a variable voltage (max 30) dual polarity square wave to wet pad electrodes. Powered by four 9 volt batteries. (33 parts)

EMEM2 (Electro Magnetic Experimental Machine 2), a dual output (contact with wet pad electrodes or non-contact with light waves) Rife frequency generator device. Powered by AC adaptor. (33 parts)

Cranial Electro-Stimulator (CES), outputs a mixed frequency signal via wet electrodes to the brain. Powered by rechargeable 9 volt battery. (47 parts)

Skin Electrifier, outputs a milliampere DC current to skin between its wet cloth covered electrodes. Powered by a 9 volt battery. (5 parts)

Infra-Red Relaxer, outputs infrared and near-infrared light via two light emitting diodes switched on and off at 80 hz. Powered by AC adaptor. (17 parts)

These construction plans are as simple as possible but only the plans for the Blood Electrifier, both Pulsers, InfraRed Relaxer, and Skin Electrifier are truly easy. If you are inexperienced with soldering electronic parts together then you may want to hand the parts and the plans over to a radio/TV repair technician to assemble the devices for you.

Online soldering tutorials for beginners:

http://www.epemag.wimborne.co.uk/solderfaq.htm#howto

http://www.epemag.wimborne.co.uk/desolderpix.htm

http://www.epemag.wimborne.co.uk/solderpix.htm

For a soldering iron I recommend a dual output (20/40 watt) one, # 64-2184, for \$23 from Radio Shack. A good cheap .05" diameter solder is available from Radio Shack (locally or online at www.radioshack.com) for \$3.