SAFE Lecture

SYMPATHETIC VIBRATORY PHYSICS The Science and Technology of John Ernst Worrell Keely Lecture given by Dale Pond before the Swiss Association of Free Energy, October 28, 1989, Einseideln, Switzerland

Mankind has placed himself in a grave situation. He has divorced himself from Nature with his current attitudes towards Science and Religion. The study of Nature is really a study of Science and Religion. Science is man's effort to know about Nature. Religion is man's effort to reconnect with that Nature. Hence through the arts of science and religion Mankind is attempting to know what Nature is in its truest sense and by way of this ever-expanding understanding to establish his kinship with Nature. These two subjects are bound together as a two sided unit. Science on the one side is ever expanding understanding and Religion is the assimilation of himself into this ever growing awareness of all that is around him. This concept is of course the ideal situation. Mankind has rarely attained this ideal state.

In actuality Mankind has separated himself from Nature with his ever increasing materialistic views embodied in both Science and Religion. His Science admits no connection between himself and his experiments. Atheistic attitudes separates him from Nature and natural processes. This is in error and has lead ultimately to the abysmal situation we find on earth today. Pollution is rampant and uncontrolled. Hunger, pain and suffering, and a lack of the basic material necessities plagues people in all countries. In fact, this century has been the bloodiest time in all of Mankind's history with nearly 100 million souls destroyed in all parts of the globe.

It would seem, at first glance, that with all the modernizations and increases in human science and technology, that we are living in the greatest age of history. But this is not so. To those who have perished and those who now suffer this is a terrible time in history. The question remains "why is this so?"

It is an easy thing to point ones finger at the "bad guys" and lay blame at someone else's feet. It is easy to say one political group is evil and ones own political group is innocent. The truth of the matter is these problems were not created by any one or several groups of politically oriented peoples. These problems were created and perpetuated by ignorance. This ignorance is a lack of awareness that all of Mankind is a part of Nature. This materialistic ignorance does not recognize that we are all part of a single natural scheme closely bound together in our actions and circumstances. A concept of Oneness, an idea that Mankind is a valuable part of Nature, has long been held and preserved through the centuries most conspicuously by the religious and metaphysical organizations. Materialistic science has cut off these tried and true ideas at the knees and left man bereft of his common foundation. Materialistic science has left mankind with nowhere to go except along the paths he has established in this century. These paths have lead to more bloodshed, pain and suffering than all previous paths he has ever choosen.

Free energy will not liberate Mankind from these evils. Neither will faster and more powerful machines free him of these self imposed burdens. Certainly more money, more people and more bureaucracies will not help either. We already have cheaper energy, more people, more bureaucracies and have spent vast amounts of human effort towards the solution of these problems and the net result has been an increase of the same problems. Mankind is on the wrong path.

What is needed is a comprehensive awareness that binds Mankind together within a wholistic knowledge that he is a part, an important part, in the natural processes of Nature in which he finds himself. What one man does has an effect on his neighbor and the natural processes surrounding them both. This dual view of nature is fundamental to science, religion and common sense. It is called the Law of Cause and Effect by science and karma by certain religions. This is an almost impossible law for most science or most religions to accept because it implies responsibility to one's self. It also implies that the perpetrator be charitable. He must concede that his neighbor have as much importance to him as himself. Another false premise of materialistic science is that of insufficiency. The establishment of monopolistic and totalitarian organizations is based on this false idea of there not being enough energy or materialistic substances to go around. With a broader paradigm that concedes the Universal Forces of Nature are limitless mankind can then be charitable. But to even concede this much many

are hesitant because it implies their knowledge and power structures are based erroneously on false premises. These ideas of endless abundance implies sharing and most refuse to share because they believe in limited materialities as opposed to limitless potentialities. Hence, the exercise of charity has not been one of Mankind's greatest achievements.

My message to you today is that there is a paradigm of both Science and Religion that encompasses the highest of virtues expressible by Man. There is a field of science so powerful that it can build a new and better future for Mankind. There is a philosophy and science so all-encompassing that it can bring Mankind to a realization of his Oneness with his neighbors and with all of Nature. This paradigm has latent within itself, because of its breadth and scope, more than enough material and spiritual benefits for everyone because it recognizes and uses the very foundation principles of Nature itself. Because of its recognition and acceptance of its role in life it does not trample human rights or the rights of Nature and assumes full responsibility for itself within its own scope of possibilities. More than all this, it recognizes the valuable parts of all sciences and religions and merges them into a comprehensive and usable paradigm that has within itself seeds for unlimited growth and expansion. This paradigm of science is called Sympathetic Vibratory Physics.

What is Sympathetic Vibratory Physics? It is the science of Harmony, of Oneness. It holds the concept that all comes from One Source, One Force. It maintains that the fantastic array of things and activities throughout the universe are related in a simple manner. This simple basis of relativity is called vibration. It has been long recognized that everything in the universe vibrates. Thus, a study of vibrations is the study of the very foundation of Nature. For once we grasp the inner functioning of the vibratory Universal Creative Forces as they operate throughout the universe, then, and only then, can we correlate them into a comprehensive paradigm and bring them into practical modes of usefulness for the benefit of mankind. Unlike dogmatic, cold science, Sympathetic Vibratory Physics does not isolate one phenomena from another but accepts and shows the interconnectivity between all things and forces. This interconnection between all things is vibration and related vibratory phenomena. To understand vibration we must develop a comprehensive organized science of vibration governed by laws and principles. Fortunately a great deal of this development work has already been done. We have a well developed science of music. Music is an organized art and science of vibrations found within the audible range of the infinite Electromagnetic Scale. A major segment of Sympathetic Vibratory Physics is therefore a study of music, its arithmetical and philosophical basis of development and how these may be applied to procedures for inventing new and useful devices and processes.

The scientific implications of this science are no greater than the social implications. In fact, one person suggested to Keely that he cease his scientific work and proceed with the spiritualization of civilization. This is to say that Sympathetic Vibratory Physics is as important to mankind's spiritual and moral growth as it is to his material benefit. It has been often said that this science can not be fully mastered without first having mastered self - a very metaphysical principle to be sure. The greatest pursuit of any man is to know himself and his connection to all that is around him. This self-knowledge then brings an awareness of Oneness and defeats the ideas of separateness As a consequence it brings an awareness of responsibility to the individual himself and to those around him.

Should we dare to place in man's hands such fantastic instruments as this science appears capable of delivering without the requisite moral and spiritual understanding such that man might not misuse this knowledge to his own detriment? Technology is a double edge sword - its products can be used for man's benefit or his destruction. How wonderful it is that this technology, which promises so much in the form of new discoveries and controls over natural forces, also contains within itself that which may guide man in the correct usage of them. Stories abound of Keely's accomplishments in this regard and point to a new method of engineering and building machines - a method that binds the purposes of the mind of man to mechanical function.

Rudolf Steiner said in 1913: "The "West people" of the English-speaking countries, Great Britain and North America, will develop the new mechanical faculty. They will be able to create machines and mechanical devices which work with hardly any human effort; which work with help of the "Laws of Sympathetic Vibrations." These machines will do about 90% of the labor, and all social and material trouble as we know it will cease to exist." Steiner went on to say: "The famous technology of our days will come to it's end soon; because she will in a

certain way wind up herself. The following phenomenon will then appear: Man will achieve the faculty to employ the fine vibrations of his ethereal body to impulsate mechanical devices. The individual will be able to transmit his own vibrations onto the machine, and only he will be able to set the machine in motion, by the vibrations generated by himself. The men who are now practical technicians will soon discover that they are standing before a complete change as to what one calls practical, when man will be involved with his will in the objective feeling of the world."

In 1918 Steiner brought the matter up again from another direction: "All searching in solid matter is nonsensical. One will at a certain time abandon it - and mankind will do this before the year 4000 - that searching in solid matter as underlying nature. Mankind will discover something totally different; he will discover rhythms everywhere in nature, rhythmic arrangements. And when this knowledge about nature's rhythms is carried on, one will come to certain employments of these rhythms in technology. That is the goal set for the future technology of Sympathetic Vibrations, vibrations generated on a small scale, and then continued on a large scale, so that by this simple sympathizing, harmonizing, an incredible lot of work can be done." As some of you know, this is exactly what Keely did over 100 years ago.

John Ernst Worrell Keely worked incessantly for over 30 years to dis-cover the simple laws governing naturally occurring or artificially derived vibratory forces. The result of his work was the rediscovery of 40 laws that govern all vibration and vibratory phenomena. These laws have been and are being published in The Journal of Sympathetic Vibratory Physics. Much work has gone into the interpretation and application of these laws as they apply to modern physics and technology. Modern science is using some of these laws unbeknownst to itself. The laser, microwave, quantum physics (chip design), musical and audio component manufacturers are all using some of these laws in the design and construction of their products. Because of the differences in paradigms however, it will be many years before these laws become recognized for their true worth. Modern science is based in the concepts of mass vs energy begun by Isaac Newton and furthered by Albert Einstein. Sympathetic Vibratory Physics is based on the actions and interactions of polar and depolar vibrations and the resultant sympathetic associations. It appears that these actions are the causes of mass and energy. It is believed that a study of causes advances science to greater accomplishments with more surety and speed than the study of the results or symptoms of these causes.

Sympathetic Vibratory Physics focuses on the inner nature of vibratory phenomena. It is well known that vibratory activity contains within itself many differing characteristics and phenomena. These include: amplitude, velocity, mode, sympathy, number and periodicity. Each of these characteristics can be regarded as independent factors as they are generally considered in conventional solutions. However in order to have validity within an integral synapsis they must be considered as parts of a whole. In a wholistic paradigm each of these characteristics or components must be considered as being relative one to the others. This viewpoint is generally referred to as the Law of Relativity. No thing can be considered of and by itself as no thing in the Universe is isolated from interactions upon or by something else. The isolation of one phenomenon from all others is science's greatest mistake. Until this error in thinking and practice is corrected we will continue to experience deleterious effects of our scientific endeavors. Sympathetic Vibratory Physics gives us a broad field in which all things can be studied as relative parts of a comprehensive whole. Through the study of music and music development we have this relativistic paradigm. The fundamental principle of music is relativity. A simple frequency is nothing of and by itself. But relate that frequency to another and we instantly have two separate entities locked together by a fixed interval between them. This relationship is always expressed as a ratio or the relative values rigidly fixed in a given relationship known as an interval.

These actions are held to be in certain and specific relations one to another. It is fundamental to grasp the significance of this concept of relativity. In an analysis of a simple hair comb which part, the teeth or the space between the teeth, is more important? The teeth of the comb are the active parts - the part that does the work but without the spaces between the teeth the teeth would have no value whatsoever. Just so with frequencies of vibration. The frequency of a vibration is the active component within an environment but the importance of this frequency can only be derived from its action and interaction with other frequencies in that same environment. This interaction with other frequencies is the embodiment of known natural laws of forces: every force has or creates a reaction (Law of Polarity or Opposites), two forces summed or differenced result in a third force or

reaction (Law of Three).

A study of synthesized wave forms best explains the relationship between music and quantum physics as used by John Keely. Among his legacy to us are a number of charts showing musical notations arranged according to his paradigm. It has been discovered that these musical notes are placed so as to be synthesized into more complex wave forms. Modern engineering recognizes the value of and uses harmonics of frequencies. This is a doubling or halving of a given frequency as part of an analysis of vibratory phenomena (Keely's Law of Harmonic Vibrations). Keely teaches us that there are many more relationships in vibrations than just the fundamental and its octave harmonics. There are also Sixths, Thirds, Fourths and Sevenths as well as many others (Keely's Law of Harmonic Pitch). It is an established fact that several frequencies synthesized together form a complex wave form. If concordant frequencies are merged we have one kind of vibratory force having specific characteristics. If enharmonic frequencies are merged we have a different vibratory character. These differences in character can be readily seen or heard in the differences between a trumpets middle C and middle C sounded on a piano. The fundamental is the same yet the chordal tone produced is altogether different. The auditory and physiological impact on the human organism is altogether different also. It is this difference that can be understood and applied to mechanical devices. The vibratory tones of a string are more harmonious than the chord components of a brass instrument. One can calm or bring quietude and the other can bring discord or activity. Activated atomic particles can thus be created and used as a power source in a device once this association of frequencies is more fully understood. When considering compositions of molecules it is assumed they all have the same component parts, i.e., electrons, photons, etc. The basic differences are the number of these particles making up the aggregate and their individual orbit characteristics. Since each one of these particles has a chord of composite frequencies it must therefore be safe to assume that the apparent differences between aggregates is the sum total or summed difference of their composite frequencies.

Within these 40 Laws of Harmony are the defined relationships between electricity, magnetism and gravity. Keely demonstrated this relationship to be as thirds or 33 1/3, 66 2/3 and 100. This relationship of forces he eventually applied to his inventions such that they operated without any apparent energy input. By establishing the proper relationships of these three forces his equipment developed unheard of power and force. Since these laws govern the very vibrations from which all material substances are built up they also therefore govern all material things. Through their use Keely was able to liberate incredible forces of the atom in such a way that harmful and deleterious nuclear forces such as radioactivity were not evident or experienced. All atomic and nuclear forces are measured in terms of frequency and these frequencies can be manipulated to either liberate forces or they can be modified to absorb or form into new products - transmutation, in other words. This process does not require hugh energies as are found in common accelerator configurations or nuclear piles. Nature is subtle and subtle means are required to awaken her energies. This science demonstrates that all things are related and that the resultant effects of a relationship are a consequence of the characteristics of that relationship. Thus no thing or function can exist in and by itself. There must be an active force, a receptive force and a neutral zone or zones of communication between these two forces.

Herein lies the hidden power of Sympathetic Vibratory Physics as developed by John Keely. A concordant waveform, composed of harmonic frequencies, tends to pull subatomic particles together. On the other hand discordant waveforms will tend to split or explode the particle or aggregate. A simple analogy is that of dynamite, a harmonious substance when at rest, one which is held together by the molecular and atomic component frequencies. The introduction of a strong introductory impulse from a dynamite cap destroys its homogeneous integrity and the component subatomic particles are liberated from their bonds. Keely explained the relationship between matter and force thusly:

"There is no dividing of matter and force into two distinct terms, as they both are ONE. FORCE is liberated matter. MATTER is force in bondage." [Keely, 1893]

This quote is a demonstration of an understanding of nuclear and atomic forces well before our much heralded and over-thought-of "Nuclear Age." In our age we have begun to decipher the true relationships between matter and force. We have a long way to go yet.

There is far too much knowledge to cover in this short paper. We have yet to cover Keely's work with: acoustic

levitation, water and mineral disintegration, cold steam, colors from sounds, telescope and microscope developments and his incredible work with healing mental illness with acoustical resonators. It would take years of study and application to unravel the many mysteries of Keely's scientific discoveries. So much of our current scientific thought is based on false premises that it will be years before the accepted paradigms are evolved sufficiently for a continuous and unhindered growth. But even more difficult is the evolution of Man's spiritual and philosophical ideas. If man's actions during this century are any indication - it may be that Steiner and Blavatsky were correct by saying it would be centuries before man could assume his true birthrights.

In America there are many individuals and companies working in some way with this new view of science. It will not be long before we have practical functioning machines. New techniques and new devices are constantly being developed that will allow even more work to be done with less work or energy. It is now possible to acquire quite easily components and processes that employ the principles Keely demonstrated for us over 100 years ago. These materials range from simple auditory devices to powerful and expensive instruments for testing and measuring vibratory phenomena. They are becoming quite plentiful which leads me to assume it won't be long before many new and wondrous things are made manifest in the affairs of man. These new devices and processes won't reflect all that will be done eventually - but will provide further foundations upon which we can build towards this new technology now open to us. As part of my paper I am including Keely's forty Laws of Harmony as he left them to us. Keely left these laws to mankind in the hope that one day man may create a better and more bountiful life for himself. The Journal of Sympathetic Vibratory Physics has been publishing these laws and attempting to decipher them that they might be applied in the work of others.

All of you in this room are in some way working to develop this and other areas of science. It is sincerely hoped that as you develop your particular field you will give thought to the imperative development of the philosophical, moral and spiritual growth of yourself and those around you. Failure to create the proper individuals to handle these new forces you are about to release on mankind may prove to be our own undoing.

Keely's Forty Laws of Harmony