

\$5.00

DAILY HEALTH™ FORMULA

Enzymes and Your Health

Another in the Life Sources' Client Education Series

**This pamphlet is complimentary to Life Sources' clients.
This pamphlet may be purchased by the general public from:**

Life Sources, Inc.

5006 Sunrise Blvd., Suite 101

Fair Oaks, California 95628

916-536-9930

www.life-sources.com

The information contained in this booklet is for educational purposes only. It is not to be considered medical advice, prescriptive or diagnostic. See your physician for qualified health care.

Is Your Body Demanding Food Enzymes?

By Dr. Edward Howell

The following article was written by Dr. Howell late in his life, in an attempt to make clear his revolutionary food enzyme concept.

In spite of all I have written about food enzymes since 1936, common misconceptions persist and distort their significance in nutrition. Let me restate that all animal and vegetable foods in their natural state contain non-caloric elements in addition to proteins, carbohydrates and fats. In the order of their discovery and recognition as indispensable food elements, they are minerals, vitamins, and enzymes. It is obvious that merely discovering that foods are endowed by nature with any particular non-caloric food material should constitute all the proof needed to establish this substance as a protector of the health and well-being of living organisms, including the human race, during the whole life span. This is because constituents of unprocessed natural foods have had countless eons of time to mold and shape the form and function of living organisms and have created a dependence to fill a need. Therefore, to remove any part of natural food from the normal diet could not be sanctioned because of the possibility of harm to the health and well being.

This has been shown by the history of nutrition. Not very long ago, the only elements considered necessary for wholesome nutrition were protein, carbohydrates and fats. Minerals were considered unimportant and ignobly characterized by chemists as "ash" because they were all that remained after food was burned in the laboratory. Vitamins and enzymes in foods were unknown. The fiber of foods was removed and discarded because fiber was believed to be too coarse for the human digestive tract. Many people formerly believed that vegetables were fit food only for rabbits and cows - not humans. The immigrants, flooding here from Europe during the early years of this century, foolishly embraced white bread with open arms. In the backward, unindustrialized countries, only the wealthy ate white bread, the common people having to be satisfied with whole-grain bread, of whose health value they were ignorant. The bran of wheat, which we now value as necessary food fiber, along with the valuable wheat embryo or germ, were removed and found their way into rations for cattle and hogs, proving to serve as excellent nutrition for these animals.

For over a hundred years, enzymes had a reputation as being important in the digestion of food, and that was all. Their area of operation was believed to be limited to the stomach and intestines. It was not realized until recently that the work enzymes do in the digestive tract is only a minor part of their complete duties in the bodies of animals and human beings. Enzymes are the active agents in metabolism - in anabolism and catabolism. **Enzymes are the actors behind the scenes in the immunity processes. They power your thinking, breathing, sexual activity - your very life.** Thousands of different enzymes - metabolic enzymes - are involved in every thing going on in the

heart, lungs, liver, arteries, blood, muscles - in all organs and tissues. Your body is expected to make all of these digestive and metabolic enzymes.

But while the body is required to produce less than a dozen essential digestive enzymes, functioning only in the food canal, it must furnish thousands of metabolic enzymes to service the multitudinous activities of the entire organism. Metabolic enzymes do work, they are workers. They take absorbed food products with their minerals and vitamins, and build them into tissues. They repair the body and aim to keep the organs healthy. Furthermore, through substrate action, metabolic enzymes remove worn-out material from the cells, keeping everything in repair. It can be recognized that this is a far bigger job for enzymes than merely digesting food in the food canal, part of which should be done by food enzymes, or if need be, by other exogenous enzymes, meaning supplemental enzymes. So which are more important in the body, digestive enzymes or metabolic enzymes? Let us beware about permitting a metabolic enzyme labor shortage to form, which can induce our problem diseases.

If metabolic enzymes are more important, then why must they play second fiddle, and have second call, in the allocation of the body's resources? Why are digestive enzymes kept rich by having first call on the limited enzyme potential of the organism, while the more important metabolic enzymes must be satisfied with what is left? I must emphasize that the reader of this treatise is an owner of the serviceable and precious metabolic enzymes. Smart owners will not force their digestive enzymes to do work meant for food enzymes if this extra burden on the digestive enzymes requires the body to put a strain on producing their multi-functional metabolic enzymes and not have enough of them to carry on their important functions. If you were a biological engineer, responsible for efficient operation and health of human organisms, is it not logical that you would see to it that the digestive enzymes be given less work by allowing food enzymes, or supplemental enzymes, if need be, to do more digesting, as evolution, or the God of nature's laws, ordained?

Each plant, animal and human being can make the enzymes needed to do that which needs to be done in the organism. Any high school student knows that the human digestive glands can make the enzymes needed to digest our foods. Some well-informed students also know that human saliva and pancreatic juice are fabulously rich in enzymes, far stronger than in any wild animal living under the laws of nature. The uninitiated and perplexed reader may reasonably ask why we need the enzymes in food when our digestive enzymes, in the prime of life, can do the job so well. "Are not food enzymes superfluous and nonessential," some people may ask. Even those in high places have been beset by difficulties in discerning the hidden facts. To clarify an otherwise muddled situation, is precisely why I wrote this narrative. But before proceeding, it is urgent to call attention to yet another important pillar in the Food Enzyme Concept.

Let me repeat again the vast difference between vitamins and enzymes in food, and the unique quality that separates enzymes from all other food factors and establishes food enzymes as very special food ingredients. I refer to their extreme vulnerability to

destruction by heat. Whereas most food factors, including vitamins, suffer only minor or no demonstrable harm from heat preparation in the kitchen or factory, enzymes are completely destroyed by manufacturing or culinary operations.

Enzymes can withstand no cooking, boiling, frying, roasting, stewing, broiling or pasteurizing. Cookery destroys them to the extent of - not 99%, but 100%.

Now, permit me to return to the matter of why food enzymes are so important and indispensable to the reader's present and future health - possibly even more so where the digestive juices are overflowing with personal enzymes. In the first place all of nature's creatures welcome and receive food enzymes, in every morsel of food, in addition to the enzymes they produce. Fish are surrounded by enzymes as they swim in the ocean water. Plants are dependent on free enzymes in the soil to help make plant food, and suffer increased susceptibility to disease when they must subsidize deficient soil enzymes with their own metabolic enzymes. When you eat a raw food, the enzymes within it are immediately released and begin to digest it in the mouth, even before being swallowed, and before your own enzymes are even secreted.

The same happens with living on raw food. When birds, like the chicken, swallow intact wheat or corn seeds, they go into the crop. There the seeds swell with moisture and the food enzymes inside the seeds begin to digest the starch, protein and fat before the seeds reach the stomach of the bird. Snakes and many other creatures eat their food by swallowing it entirely without chewing. Small snakes swallow live rats, frogs, and such. Large snakes, such as the python, engulf live pigs. The body of the hapless victim shows up as a large bolus in the midriff, causing an enormous distention of the stomach of the snake, which allows no room for the snake's enzymes or acid to enter. Only after the digestive enzymes and catheptic enzymes of the prey, which now belong to the snake, and have become its food enzymes, have performed the ritual of predigestion, and liquefies the body of the prey, can the snake's enzymes find room in its own stomach, to proceed with digestion.

Millions of fish swallow entire smaller fish every day as their normal diet, while millions of birds gulp down entire fish or other organisms to constitute their complete food intake. And thus the ritual of predigestion by food enzymes is carried on in the entire animal kingdom. A lion has teeth adapted only to tear away large chunks of meat from the body of prey. He may tear off thirty pounds of chunks and then walk away dragging a full belly to a sanctuary to rest, while the pressure from the enormous distention of his stomach by the meat forms a coalescent bolus which crowds out everything, giving no room for the lion's acid and enzymes to enter. The lion's peptic enzymes and acid can find room to get into its stomach only after the catheptic enzymes within the meat itself have performed their role of predigestion and reduced the bolus to a plastic or liquid consistency. Only then can the lion's enzymes carry on the digestive process from where the cathepsin stopped. It is indeed a law of nature, tested and proven by millions of years, that enzymes within the food have been ordained by evolution, or evolution's God, to predigest food, and that your private enzymes were never intended to do the job alone.

Must we pay a penalty when we alone, of the hundreds of thousands of species of living treasures on this earth, force our unaided, personal (endogenous) digestive enzymes to digest food, instead of letting exogenous (outside) enzymes do part of the job by predigestion, according to nature's law? There is a penalty which is inescapable and cumulative.

It is deceptively unnoticeable when we are young, but when our bodies are permanently called upon to make too many enzymes for digestion, the stress of competition for enzymes, forces our organism to produce less of the other kinds of enzymes needed to keep all organs and tissues in proper repair and health.

In other words, if the body has very rich digestive enzymes, it must be satisfied with poor metabolic enzymes. The organism cannot at the same time make very rich digestive enzymes, and very rich metabolic enzymes, but a hypersecretion of one kind can be attained only at the expense of a hyposecretion of the other kind. The old saying that the man with an "iron stomach" is the prime candidate for an early heart attack, is unfortunately quite true. When we flirt with the integrity of metabolic enzymes, and abuse the enzymes' potential, we are inviting the most serious types of intractable diseases to come in and establish housekeeping.

We are notifying cancer, cardiovascular disease, diabetes, etc., to make themselves at home in our bodies. Food-enzyme deficiency and its aftermath must be recognized as the most serious and profound oversight and omission in nutrition.

Since wild animals do not cook, what is there to prevent ingested food enzymes from predigesting the food of wild animals? This leaves the human race in the unenviable and isolated position of being the only living creatures forcing their digestive enzymes to suffer the burden of unaided digestion of food, which in turn is reflected in compromising the potency of metabolic enzymes. Anything lowering the efficiency of metabolic enzymes, impairs their ability to keep the organ systems healthy enough to ward off disease. The fact that the health of people and their domesticated animals does not measure up to the high standards of wild animals, offers support to indications that the relative potency of metabolic enzymes plays a key role in the health discrepancy. Professional experience has shown that those domesticated and laboratory animals eating a human-type diet, are plagued with a variety of human-type serious diseases after they pass the middle of the life span. On the contrary, wild animals are immune to our problem diseases, unless they are exposed to toxic influences, or fed at our garbage dumps. The animals of the deep jungle are singularly free of degenerative and problem diseases which affect people and their pets and farm animals.

It is sometimes said that food enzymes or supplemental enzymes swallowed with food cannot do any work because the acid in the stomach prevents their activity. This is true if the enzymes and very strong acid are mixed together in a test tube in a laboratory demonstration. But it is untrue when enzymes are taken into a living body.

The stomach normally allows salivary enzymes, food and supplementary enzymes to digest food for up to an hour. When they have finished their job of performing predigestion, food enzymes and proper supplemental enzymes, functioning at a lower pH, continue digestion of protein, carbohydrate and fat for a longer time than salivary or pancreatic enzymes; salivary digestion being restricted to starch. As the stomach acid level becomes higher, the special acid enzyme, pepsin, can continue the digestion of protein where the others left off.

These facts have been elicited after the stomach and upper intestinal contents were pumped out and examined at various intervals following meals.

I have been able to show the dire consequences following use of the enzyme-deficient diet by discovering that the pancreas must enlarge to produce the vast quantities of enzymes necessary when the body is forced to digest all of the food without outside aid. This does not harm the pancreas at all, anymore than it harms a muscle when it must enlarge to do more work. Similarly, when a government agency must enlarge to give away more money to foreign governments, the only harmed parties are the taxpayers. An enlarged pancreas can give out and waste more precious enzymes than a normal organ, but this generous dispensation is not good for the body as a whole because it strains the enzyme potential of the whole body in its effort to produce a normal quota of metabolic enzymes to keep all organs and tissues healthy and disease-free.

Those who theorize that food enzymes do not digest food in the human stomach, thereby confess ignorance of the fact that physiologists have fed test meals to human subjects, along with the food enzyme, barley amylase. Other physiologists fed test meals and waited for the salivary enzyme, ptyalin, to work on them. Later, the contents of the duodenum and stomach were pumped out and it was learned that marked digestion of the food consumed occurred in both instances. And a large portion of the enzymes fed with the food, were recovered, proving that they were not permanently inactivated, and proving furthermore, that theoretical prognostication can be dangerous.

There are those who surreptitiously proclaim that food enzymes cannot do any work in the stomach because all enzymes are proteins, and food enzymes are digested as are other proteins. But this argument very conveniently overlooks, or perhaps tries to hide the fact, that if the enzyme complex had no special and specific immunity against being digested because it contains protein, what is to prevent one portion of the enzyme pepsin from being digested by an adjoining and contiguous portion of the same enzyme while pepsin functions in the stomach? Why do pancreatic proteolytic enzymes not digest each other while they are at work reducing food proteins to amino acids in the small intestine?

Further evidence that food enzymes have been ordained by nature over countless millions of years to help digest the food of all creatures, including human beings, is supplied by special organs with no function except to serve as food-enzyme stomachs. Food enzymes are made up of proteolytic food enzymes to digest protein, amylolytic food enzymes to digest carbohydrates, and lipolytic food enzymes to digest fats. The so-called killer whale, a member of Cetacea, has a food enzyme stomach larger than

any land creature. The food-enzyme stomach of this whale has been found to contain more than a dozen porpoises and seals. In one instance this enormous food enzyme stomach, which is the first of the whale's three stomachs, and much larger than the others, was found to house the bodies of 32 entire seals undergoing digestion by the seal enzymes, which now belong to the whale, and are the whale's food-enzymes. The remarkable fact elicited by physiologists is that the first stomach (forestomach) has no enzymes or acid of its own at all. Its membranes have no glands to produce these agents for digestion. The first stomach is simply a large reservoir which provides space for the enzymes within the bodies of swallowed animals to digest their own bodies to a sufficiently plastic or liquid consistency which enables the food material to pass through a small opening connecting the first stomach to the second stomach, which makes enzymes to continue the digestion.

For hundreds of years human beings felt quite sure they had only a single stomach to digest food. But scientists have found this is not strictly true, and that humans have a digestive organ functioning as two stomachs. The upper part, or cardiac end, produces no acid or enzymes and is a food-enzyme stomach. It has been designed as a reservoir to receive food, and permit the enzymes in the food itself to predigest the food for further digestion by the chain of enzymes along the digestive tract. Therefore, the human being also owns a food-enzyme stomach. This fact, along with the other evidence I have presented, establishes food enzymes as cardinal digestive agents, making it impossible for anyone to lightly brush them aside.

The foregoing avalanche of relevant information supports the recently discovered law of the adaptive secretion of digestive enzymes which proclaims that the body values enzymes highly and produces no more of them than it is forced to. If more digestive food enzymes are eaten, the body will automatically make fewer digestive enzymes and can then produce more metabolic enzymes, should they be needed. The body will therefore be in a better position to prevent or deal with the problems of killer diseases.

ENZYME DEFICIENCIES

"How is it possible that I am sick even though I eat the most organic foods, am very careful with my diet and exercise regularly?"

The answer tends to be: ENZYME DEFICIENCY.

The following is a brief summary of several of the more common enzyme deficiency conditions and is presented for the clients of *Life Sources, Inc.* to educate and inform. It is not presented as medical advice.

For specific conditions, please consult your physician.

PROTEASE DEFICIENCY CONDITIONS: Protease digests protein. What happens when you are protease deficient? You will have protein deficiency symptoms, depending on how deficient you are in protease. Protease deficiency creates alkaline excess in the blood.

This is not because protease itself is acidic; it is not. Acidity is created through the digestion of protein with protease. Some people may be vegetarian not by choice, but because they are protease deficient and cannot digest protein. Since acidity comes from the digestion of protein with protease, protease-deficient people may have an alkaline excess which can produce anxiety states. Often people take tranquilizers such as Xanax™ and then they “zombie” around in a fog, when simply taking protease can, through increased digestion of protein, acidify them to HOMEOSTASIS with resulting relief of their anxiety.

Homeostasis is the dynamic equilibrium within the body. Without successful physiological homeostasis (balance), in which relatively constant conditions are maintained in the internal environment, the body cannot survive. The maintenance of homeostasis involves a number of factors in addition to metabolism, such as water intake and retention, acid-base balance, excretion of waste matter and control of body temperature. In other words our body will do whatever it must to stay in homeostasis.

Protein is also required to carry protein-bound calcium in the blood. Insufficient protein-bound calcium lays the foundation for arthritis and other calcium deficient diseases. Why? When the blood cannot carry calcium because it lacks protein, it withdraws the necessary calcium from the bones to maintain homeostasis. This situation is aggravated in people who take calcium carbonate supplements, such as Tums™ or other antacids, because this adds to the alkaline stress on the blood. The blood cannot carry ionic calcium as efficiently because ionic calcium requires a certain level of acidity to be present.

Overly alkaline people have a multitude of calcium metabolism problems, such as osteoarthritis, osteoporosis, gouty arthritis, degenerative disc problems, bone spurs and related disorders such as sciatica and ligament problems.

Because 46% of digested protein is converted to glucose upon demand, inadequate protein digestion leads to hypoglycemia (hypoglycemia also has other causes such as hypothyroidism and vitamin deficiency). Symptoms include moodiness, mood swings and irritability among many others.

Water follows protein (literally). Inadequate protein in the blood also means inadequate water. Where does the water go? Into the tissues after the protein! This causes tissue swelling (edema). Water is forced into the capillaries and into the tissues by the pressure of blood being pumped around the body. By a reverse process, which depends on the water-drawing power of the proteins in the blood, it is reabsorbed in the capillaries from the tissues. These two mechanisms need to remain in balance.

Protein maldigestion leads to a toxic colon. People in this category often have problems in the area of the descending colon (lower right quadrant of the abdomen). This includes developing appendicitis and even more serious problems such as mucous colitis and even colon cancer.

Another of the most common results of protein maldigestion is chronic ear infections and fluid in the ears, especially in children. This is a protease calcium deficiency. To drain fluids from the middle ear, you must increase protease in the blood.

Protease will pull water out of the middle ear, and also the ankles, hands and feet during PMS, and put it back into the blood.

Protease is also involved in the immune system via its action on bacterial debris, certain viruses, and its ability to break down circulating immune complexes. Protease has an ability to digest unwanted debris in the blood and should be considered your friendly blood cleanser. Protease deficient people are immune compromised, making them susceptible to bacterial, viral and yeast infections and a general decrease in immunity. Protease deficient women are predisposed towards PMS. The only people who cannot tolerate protease are those who suffer from ulcers, gastritis or hiatus hernias. The already damaged mucosal tissue cannot handle the extra acidity from the digested protein.

AMYLASE DEFICIENCY CONDITIONS: Amylase digests carbohydrates or polysaccharides into smaller disaccharide units, eventually converting them into monosaccharides such as glucose. People who are fat intolerant (can't digest fats) often eat sugar and carbohydrates to make up for the lack of fat in their diet. If their diet is excessive in carbohydrates, they develop an amylase deficiency and symptoms arising therefrom.

Amylase digests not only carbohydrates but also dead white blood cells (pus). For example, when you are low in amylase you are a candidate for abscesses (areas with pus but not bacteria). If you have a toothache and are being treated with antibiotics, but it doesn't go away, chances are you may have an abscess.

Amylase is involved in anti-inflammatory reactions such as those caused by the release of histamine and similar substances.

The inflammatory response usually occurs in organs which are in contact with the outside world such as the lungs and skin.

These include skin problems such as psoriasis, eczema, hives, insect bites, allergic bee and bug stings. atopic dermatitis and all types of herpes. The lung problems including asthma and emphysema require amylase plus other enzyme formulas depending on the particular condition.

Carbohydrates require phosphorus. If excess refined carbohydrates are consumed, a phosphorus deficiency will result.

Phosphorus deficiencies include: thick blood, tendency towards gastritis (inflammation of the gastrointestinal tract) and stiff joints, especially in the morning. Why stiff joints? Adequate phosphorus prevents the deposit of calcium oxalate and calcium carbonate in the joints. If phosphorus is deficient due to excess consumption of sugar, joint pain

results from deposits of oxalates and carbonates. Phosphorus deficiency is often accompanied by thick blood and high blood pressure. Please do not feel you can run out and get a phosphorus supplement to solve this problem. Quite the contrary. The only way the calcium and phosphorus can be balanced is by getting them both from the foods in which they originate in a natural, balanced proportion.

LIPASE DEFICIENCY CONDITIONS: Since lipase digests fat and fat-soluble vitamins, lipase deficient people can be expected to have a tendency towards high cholesterol, high triglycerides, difficulty losing weight and diabetes or a tendency towards glucosuria (sugar in the urine without symptoms of diabetes). The down-the-road outcome of these tendencies is heart disease.

Because lipase requires the co-enzyme chloride, lipase deficient people have a tendency towards hypochlorhydria (low chlorides in our electrolyte balance). This can be easily remedied with lipase, but often nutritionists recommend using betaine HCL, which places acidic stress on the blood, leading to an inability to provide the alkalinity required to activate the body's pancreatic enzymes. Lipase requires a high pH for its activation among food enzymes. That is why fats are the hardest of all foods to digest.

Fat intolerant people can be helped by taking a lipase supplement, but the fat intolerance problem still exists. (I.e. Taking a food combination containing lipase will gradually reduce the size of gall stones, thus reducing symptoms, but this does not cure fat intolerance just as surgery does not cure disease.) The lipase will help prevent an aggravated condition ONLY if the fat intolerant person minimizes fat consumption.

Lipase deficient people have decreased cell permeability, meaning nutrients cannot get in and the waste cannot get out of the cell. For example, diabetics are lipase deficient and cannot get glucose into their cells, and wastes or unwanted substances cannot get out. People with "hidden viruses" that are often diagnosed with "Chronic Fatigue Syndrome" also fall into this category. Lipase modulates cell permeability so that nutrients can enter and wastes can exit. Of course, waste-eating enzymes (such as protease) must be taken to help cleanse the blood of the unwanted debris.

A common symptom of lipase deficiency is muscle spasms. This is not the "muscle cramp" (tetany) resulting from low ionized blood calcium. It commonly occurs as trigger point pain in the muscles across the upper shoulders, but it can occur in other muscles, such as those in the neck or anywhere in the small or large intestines including the muscles of the rectal tissues. If chronic muscle spasms keep you going back to a chiropractor, osteopath or acupuncturist for repeated adjustments or therapy, try adding some lipase to your diet. It may help you hold your adjustments.

People with "spastic colon" may be lipase deficient. They are given toxic muscle relaxant drugs to control the symptoms, but what they really need is a simple food enzyme called lipase.

The condition of vertigo, or labyrinthitis, also called Meniere's Disease (dizziness aggravated by movement such as walking or driving), can result from lipase deficiency. A nutritionist saw this condition develop suddenly in a young man after the typical American fat challenge test - a meal which consisted of a fried fish sandwich with tartar sauce, double cheeseburger plus a bag of French fries. The dizziness was accompanied by severe nausea and vomiting which was aggravated by movement. This condition lasted several days. Lipase can relieve a condition like this, often within minutes.

The condition of menopause is often associated with lipase deficiency because lipase addresses the gonadal tissue. However, PMS is more often associated with protease deficiency.

CELLULASE DEFICIENCY CONDITIONS: Our body makes no cellulase at all, whereas our pancreas produces enzymes similar to protease, amylase and lipase. They are similar, but not identical, because ONLY FOOD ENZYMES WORK IN THE STOMACH. Pancreatic enzymes work in the duodenum when it is at the right alkaline pH (third part of digestion).

Because our bodies do not make cellulase, this food enzyme is essential. We must eat it on a daily basis. Remember, ONLY RAW FOODS contain cellulase. Of all the enzymes, this deficiency carries with it the most categories of problems.

Cellulase deficiency is a malabsorption syndrome (impaired absorption of nutrients, vitamins, or minerals from the diet by the lining of the small intestine) with its many symptoms of lower abdominal gas, pain, bloating and problems associated with the jejunum and pancreas. Other conditions associated with cellulase deficiency include nervous system conditions such as Bell's Palsy, Tic and facial neuralgia, all of which respond remarkably to cellulase. Certain toxic conditions, such as chemicals, drugs and toxic metals, including silver amalgam fillings (mercury in the teeth) are greatly alleviated with cellulase. This also includes acute food allergies. People who have malabsorption syndrome and cellulase deficiency have a tendency toward sugar and/or gluten intolerance.

SUCROSE INTOLERANCE: This condition exists when people cannot split the sucrose disaccharide into its twin partners, two units of glucose. Glucose is a primary brain food so expect mental and emotional problems in people who cannot get glucose into the brain. These symptoms include the whole gamut from depression and moodiness to panic attacks, manic and schizophrenic behavior and severe mood swings, which often lead to toxic behavior- modifying drugs.

Seizures, cranial problems and headaches in sucrose intolerant people have been observed, not to mention the symptoms of B-vitamin deficiency resulting from the use of refined white sugar. One researcher has observed almost a universal intolerance syndrome among childhood asthmatics. Whether from genetic intolerance or over consumption, the symptoms are the same.

Do not be fooled by thinking that refined white sugar is the only culprit and that other synthetic sugars are okay. Many people do not think that such synthetic sugars as corn syrup, fructose, Nutrasweet™, saccharin, Sorbital™ and Mannitol™ are harmful. However, severe health problems have occurred from one or all of these as well.

LACTOSE INTOLERANCE: People who are intolerant of lactose also have classic symptoms which include abdominal cramps and diarrhea. Other allergic symptoms have been recorded, not the least of which was asthma, from the ingestion of lactose-containing products. You should know that the FDA allows the addition of lactose as a food additive without labeling. Do not think that your children are safe if they are lactose intolerant just because they do not drink milk.

GLUTEN INTOLERANCE: Gluten intolerance is associated with Celiac Disease and Malabsorption Syndrome. It is also associated with Crohn's Disease. The insidious thing about gluten intolerance is that it creates a sugar intolerance because when gluten intolerant people eat food containing gluten, the brush border cells of the jejunum are injured and thus unable to secrete the disaccharidases (sucrose, lactase and maltose) leading to sugar intolerance. Double Trouble! Most gluten intolerant individuals usually do not need to abstain from all the gluten grains (wheat, oats, rye and barley). However, sometimes it is a must.

Death Begins in the Colon

Enzyme Supplements: The Simple, All-Natural Solution to Putting Food Enzymes Back into your Diet

The length of one's life is inversely proportional to the rate of exhaustion of the enzyme potential of an organism. But the increased use of food enzymes promotes a decreased rate of exhaustion of the enzyme potential, and thus, results in a longer, healthier and more vital life. -- **Dr. Edward Howell in Enzyme Nutrition**

Thanks to the pioneering work of medical researchers and biochemists like Dr. Edward Howell, enzymes are now finally beginning to be recognized as the premier element in human health and well being. Vitamins, minerals and trace elements have long been known to be essential to human health and longevity, but what has only been discovered in the past 50 years or so is the fact that **without enzymes, the human body simply cannot utilize vitamins, minerals, trace elements and other nutrients. Enzymes are the body's nutritional delivery system.** Without them in sufficient quantities, nutrients simply cannot be effectively delivered where needed in the human body.

In short, your stamina, energy level, ability to utilize vitamins, minerals and other nutrients, and your body's self healing immune capability **all depend directly upon the**

quantity of enzymes in the blood, organs and tissues. Without enzymes, not one single metabolic process can continue. In fact, having sufficient numbers of enzymes throughout the body is absolutely essential to the body's ability to break down toxins, build protein into muscle, eliminate carbon dioxide from the lungs, fend off attack from invading organisms, and much more.

Dr. Howell and others have concluded in their research that **decreasing enzyme activity in the human body is directly related to the increase of disease and chronic degenerative conditions** now so prevalent in modern society.

That's why we believe that **the development of pure vegetable ("plant derived") enzymes, in supplement form, is probably the single-most important health development of the past fifty years.** We strongly recommend that you should without a doubt be taking pure vegetable enzymes with each and every meal in order to help guarantee full digestion, assure proper nutrient assimilation and eliminate the intestinal toxemia that directly results from undigested food languishing in the bowels.

Why Life Sources' Daily Health Formula is Best

After doing extensive research on enzyme supplements, we have concluded that the supplement we call **Daily Health Formula**, developed through the clinical research of Life Sources, Inc., has to be about the finest, most potent, concentrated enzyme product you can find **anywhere in the world today.**

Unlike many other enzyme formulas, the **Daily Health Formula** contains a synergistic, balanced combination of all four natural food enzymes - **Protease, Amylase, Lipase** and **Cellulase** - plus three more vital enzymes crucial to the typical American diet: **Sucrase, Lactase, and Maltase**. In short, this exclusive formulation contains all of the essential food enzymes necessary for the proper predigestion of your foods, for full nutrient assimilation, and for protection against intestinal toxemia and resulting illness and disease.

Taken with every meal, these highly beneficial all-natural vegetable enzymes will more than make up for the enzyme shortfalls in the food you eat. What's more, they will dramatically help relieve the exhausting burden on your body of having to produce the extra digestive enzymes you should be getting from your food. This will allow your body to concentrate more on the production of metabolic enzymes, which in turn will almost instantly begin to increase your energy levels and significantly boost your stamina. In fact, in our own research into the **Daily Health Formula** we found that increased energy levels are one of the very first and most dramatic benefits to be experienced from the use of this product.

If you're at all skeptical about the effectiveness of these digestive enzymes, we challenge you to take 1 capsule of **Daily Health Formula** with each meal for about 3-5 days; then, stop taking them altogether for a day or two. You'll immediately notice the

contrast as your body goes back to what you will now realize was your earlier sub-par state of lower energy. The difference is absolutely incredible!

Company Profile

Life Sources, Inc. is a Nevada Corporation with order fulfillment located in Fair Oaks, California and is a member of the NNFA, National Health Federation, Sacramento Business Bureau and the Citrus Heights, California Chamber of Commerce.

The President and Founder is Andrea McCreery, Ph.D. Her combined talents represent 10 years of research in nutrition, bio-energetics and Targeted Nutritional Intervention-TNI.

Based upon clinical observations, Dr. McCreery has developed several innovative products designed to slow the aging process and naturally combat chronic illnesses. Nutritional counseling is effective with ADD/ADHD, fibromyalgia, chronic fatigue syndrome, irritable bowel syndrome, weight loss, arthritis, candidiasis and more. Dr. McCreery has written many articles for a national magazine; Healthy Living and local health magazines, Valley Living and Health & Fitness in the greater Sacramento area. Her expertise has captured the interest of several medical doctors and chiropractors who consult and refer their more “difficult” patients for nutritional counseling.

Life Sources, Inc. specializes in Vital Hematology as a means of observing cell wall deficient forms in the living blood of clients to recommend nutritional interventions to reverse risk factors for chronic disease and nutritional deficiencies. (If an individual is interested in scheduling a consultation, please e-mail for details and fee schedules to clinic@life-sources.com or call the clinic at 916-536-9930.

The Life Sources clinic is located at 5006 Sunrise Blvd., Suite 101, Fair Oaks, California 95628. Initial client visit includes the observation of living blood (with a video tape of the observation included), blood typing and nutritional counseling for chronic illness and potential risk factors.

Individuals interested in scheduling a seminar or group demonstration of Vital Hematology should address e-mail to clinic@life-sources.com.

Dr. McCreery is available for demonstrations to groups, health food stores and/or practices wishing to offer nutritional interventions to their clients and practice.

Life Sources is dedicated to quality and quantity of life and the eventual reduction of health care costs in the U.S. Client support is appreciated.