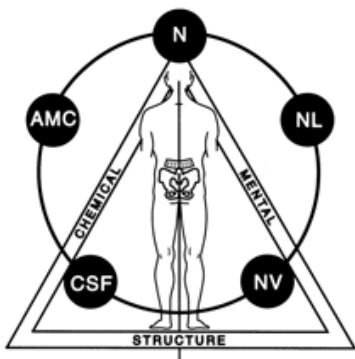


Take Charge of your Health



Osteoporosis Is Not A Disease!!!

The Merck Manual defines it as: “The loss of bone mineral density with a consequence of increase in bone fragility and susceptibility to fracture.” This however, describes the condition not the cause. Osteoporosis (and osteopenia) are caused by our bodies’ trying to correct a long term, crucial biochemical imbalance that in turn serves to maintain life function.

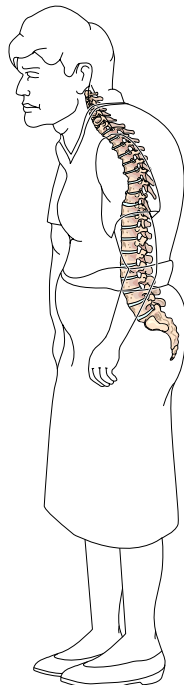
What is the Nature of Our Skeleton?

Karl Insogna, Director of the Bone Center at Yale School of Medicine, describes our bones as “every bit as dynamic as other tissues, bone responds to the pull of muscles and gravity, repairs itself and constantly renews itself.” Five to ten percent of bone renews itself every year.

Statistics

Osteoporosis affects a minimum of 10 million people annually over the age of 50, with some authors suggesting that number might be as high as 28 million. Additionally, 33 million people, mostly women, have low bone density

with an increased risk of developing osteoporosis. And as a result 1.2 million people in the USA fracture bones as a result of developing osteoporosis or osteopenia. Resulting in over 50 thousands deaths due to complications. Many end up in nursing homes.



Many Myths About Osteoporosis

There are many myths associated with osteoporosis including the idea that it is a normal part of aging. The truth is that bone loss occurs as we age but healthy bones continue to repair and do not become fragile. Poor nutrition, lack of exercise, excessive caffeine, alcohol, acid diet and tobacco cause loss of bone and minerals and impair the natural ability to repair. Additionally, many people think it’s a disease of the elderly. Young people are at risk too; especially anorexics, women with irregular periods, those women who have had partial or total hysterectomies before menopause, elite athletes with low body fat, and soda drinkers. Women aren’t the only ones. Up to 1/3 of all hip fractures occur in men and 25% of men over 50 will have osteoporotic related fractures in their lifetime.

Osteoporosis **P.1**

Exercise for Osteoporosis **P.2**

Heart Foods - Triglycerides **P.3**

Emotional Side of Healing **P.4**

Chocolate - Hypertension **P.5**

Healthy Pearls **P.7**

Bones are dynamic, living tissues that constantly make new cells to replace worn out ones as long as the right conditions are in place. With an 80% alkaline diet, weight resistant strength training and keeping inflammatory levels low, you will begin to reverse the problem. Begin with good digestive enzymes if needed, viable probiotics, good quality vitamins and minerals – calcium citrate or hydroxyapatite, magnesium, zinc, manganese, boron, vitamins D, K, B complex, and C, omega-3 oils as well as strontium. Reduce stress, toxic exposures to allergens. See your applied kinesiologist for regular check ups to make sure you are on the right track.

Exercise guidelines for people with osteoporosis or osteopenia

An exercise program for people with osteoporosis or osteopenia should contain elements that improve posture, balance, gait, coordination, and pelvis and trunk stabilization. These are not always the goals of the regular aerobic fitness programs. The exercise program should consist of a warm-up and then the workout. Besides maintaining bone strength, the main goal of exercise therapy in women is to increase muscle mass in order to improve parameters of muscle function such as balance and strength, which are both important risk factors for falls and - independent of bone density – risk factors for bone fractures.

The warm up part should start with gentle range of motion exercises for the major joints. Just like a cat or dog gets up and stretches, your warm up should do the same. After the stretching, you should walk or possibly dance to get your heart rate, pulse, to between 110 and 125 beats per minute. This portion should last for at least 20 - 30 minutes.

The workout should also consist of strengthening and stretching exercises to improve your posture by combating slouching shoulders, a forward head, increased chest bending, and a loss of

the low back curve causing stomach protrusion. Testing in the office can help to determine which muscle groups need to be addressed.

Excellent exercises for balance are line or ball-room dancing as well as some of the standing yoga poses or Tai Chi. Wolf and colleagues compared Tai Chi performed for 15 minutes twice daily at home over 4 months in a group of 200 women with a mean age of 80 years against a control group participating in education sessions once a week. At the end of the study, subjects who performed Tai Chi had a 47% lower risk for falls compared to the control group.

Part of the workout should emphasize deep breathing to properly exercise your diaphragm. For this you need to fully exhale and then inhale as much as you can. This should be done slowly. If you do this at the end of your exercise routine, you should aim to slow your breathing down to around 6 breaths per minute. There is strong evidence that this can help reduce blood pressure if you do it for 10 – 15 minutes.

A routine like this should be done at least 4 days a week.

Bone density starts in your youth

In a recent paper published in Sports Medicine, June 2013, entitled the Effects of Weight-Bearing Exercise on Bone Health in Girls: A Meta-Analysis.

Professor Ishikawa, from Middle Tennessee State University, researched the effects of exercise on bone density and the possible effects on growing females. They wrote “Because growing bone possesses a greater capacity to adapt to mechanical loading than does mature bone, it is important for girls to engage in weight-bearing activities, especially since the prevalence of osteoporosis among older women is considerably higher than that of older men. In recent years, the osteogenic potential of weight-bearing

ing activities performed by children and adolescents has received increasing attention and accumulating evidence suggests that this type of activity may improve bone health prior to adulthood and help prevent osteoporosis later in life.”

Their conclusions confirmed the obvious. Weight bearing exercises are site specific. The bones that are stressed increase in the bone density, and those that are not stressed do not gain bone density. They draw the conclusion that people, especially females during their growth years should be doing weight bearing and stress exercises to increase bone mass so that they can help avoid later bone degeneration in the form of osteoporosis later in life. Our sedentary lifestyle is therefore going to increase conditions like osteoporosis and osteopenia as the younger less active generations age.

Foods to help your heart

Apples have fiber in them and that makes them a wonderful food choice if you are trying to reduce your LDL cholesterol levels. Your body needs fiber to help it flush out toxins and substances your body can do without. They are also quite sweet so you can use raw apple in the place of sugar on your breakfast cereals and other meals without doing your cholesterol levels any harm. Other high fiber foods include natural (not refined) cereals, oat products and foods like dried beans, peas and lentils.

The juice in pomegranate includes an anti-oxidant with properties which can reduce cholesterol levels. It does this by reducing the oxidization of LDL cholesterol which effectively reduces the risk of the LDL cholesterol we have in our cells.

Pomegranates are also a good source of a number of phytochemical compounds that work to improve the effectiveness of the heart muscle and blood vessels. In a year long study using pomegranate administered to heart patients it was found that blood pressure levels were reduced by 20% and arteries were cleared by

a massive 30% - just by taking one ounce of pomegranate juice per day.

Green vegetables contain folic acid and folic acid is something that our body needs to help grow new cells all around our body. That in itself is a good enough reason to eat them, but more recently studies have also found that folic acid is really effective in increasing the flexibility of blood vessels and that it also allows blood vessels to dilate more readily.

What are Triglycerides?

Triglycerides are the other main form of fat beside cholesterol that can be found in your blood stream.

Usually, if you have a high triglyceride level you will also have high LDL and low HDL cholesterol levels as well. An optimum triglyceride level for an adult will be below 150 mg/dL and anything above this should be addressed although it is possible to have scores up to 500 mg/dL. High triglyceride levels can cause metabolic syndrome which increases your risk factors for both heart disease and diabetes.

The main causes of high triglyceride levels are being overweight or obese; a lack of regular exercise, smoking, drinking too much alcohol and eating high amounts of carbohydrates (more than 60% of total calorie count per day).

In some cases high triglycerides can be caused through ill health or genetic disorders, but in most cases lifestyle choices are the main problem for most people.

Reducing the amount of sugar and alcohol intake is a good way to start lowering triglyceride levels, combined with stopping smoking, eating a healthy diet and getting some regular exercise everyday.

The Emotional Side of Healing

The concept that the mind influences the body is widely accepted in all forms of healing. Over the years we've all heard the expression "its all in your head." The truth is that the mind has a profound influence on body health and capacity.

It's important to distinguish between the mind and the brain if only simply to state that the brain is the neuro-physiological hard drive directed by specific automatic programs (software) that allow the body to experience, act and react. The mind on the other hand is the capacity of the brain to volitionally think, create, and do. The consciousness that causes us to interpret experiences, make decisions, and act with intention.

When considering the emotional impact of the mind on the body, there are several thoughts that express the power and capacity of decision-making and interpreted reality on our health. What we have to understand is the neuro physiology and hard substances of the body doesn't know the difference between an actual experience of injury, chemical poison, or a thought process.

The effect is the same. If you believe something to be true like "my father died at age 60, so I probably will too", then you probably will. Similarly Norman Cousins, a well know editor, after he was told that he had less than six months to live made a decision to live. Six months later he was still alive despite medical certainty to the contrary.

There are many documented accounts of people who have survived in the face of over whelming odds and those who have not when there was no reason to succumb. The effect and area of study is called Psychoneuroimmunology.

Bruce Harold Lipton, an American developmental biologist, is best known for first promoting the idea that genes and DNA can be manipulated by a person's beliefs. Today we know that genes and DNA do not control our biology, that our DNA and genes are controlled by signals from not only outside our cells but from messages

emanating from our very thoughts. We now call this Epigenetics.

So, is our health psychosomatic? In many ways the answer is a resounding...Yes! If you are constantly fighting the emotional tiger, or you are predominately a "nay sayer" the physiology of your body will turn on you.

Conversely, if you make an emotional decision to change anything your physiology will follow your thought process. The power of the mind is greater than any computer ever built. Learning how to use it to your health advantage is the trick. So where do you begin?

Since we are talking about Neuro Associative Conditioned or NAC, we must condition our minds to think positively. Our experience of life is based on the filter of our minds. So, eliminate "stinkin thinkin." Replace negative words in your vocabulary like "I hate for I dislike". Meditate and or pray daily. Learn how to clear your mind of negativity and replace it with positive mantras.

Start each day by thanking your body for being strong, healthy and durable. Smile, hug and kiss, they will increase your red blood count and kick in your immune system.

Listen to good music, read motivating books, get excited over little things and fall in love with a child's eyes or the beauty of an amazing vista. See yourself strong, vibrant and healthy.

Improved Brain Performance Linked to Chocolate

It's been a long time coming but those chocoholics among you now have a reason to rejoice. According to over 100 scientific reviews chocolate has significant health benefits.

Recently published in the British Journal of Clinical Pharmacology, Astrid Nehlig suggested there was evidence to believe that cocoa flavanols contained substances that can boost cognitive functioning and stabilize mood. The European Food Safety Authority (EFSA) supported these findings and another by chocolate manufacturer Barry Callebaut linking cocoa to improved blood flow.

It seems that not only European manufacturers have staked a claim but also our home-grown Mars candy bar company. They have recently rolled out a product called CocoaVia claiming it good for heart and arteries. Apparently the cocoa flavanols have been proven to have a preventive impact but also touted as having the ability to reverse some aspects of plaque build up.

The cognitive benefits are what scientists are excited about. Nehlig's group observed that "Cocoa powder and chocolate...display several beneficial actions on the brain." Including inhibiting brain cells from dying by delivering blood to capillaries, which in turn create new blood vessels. Epicatechin, the most active flavonoid seems to be the primary suspect in protecting brain cells.

Epicatechin is higher in darker chocolate but is negatively effected by varied processes of manufacturing, such as high roasting temperatures. The effect on mood initially seemed antidotal, since people seem to consume more chocolate when upset or stressed. However Nehlig's research seems to show that chocolate seems to stimulate the release of endorphins, which enhance the pleasure of eating. Ah, the side effect. So maybe it is too good to good to be true?

There are other side effects. Fat makes up about 50% of the cocoa bean and additional sugar is often added in chocolate formulations, which increases the risk of weight gain and inflammation. There's that inflammation thing again. We know that inflammation will cause plaque formation in the arteries and the heart. Well, I guess chocolate is its own problem and its own fix.

So, next time you reach for the chocolate remember its good for you but in excess you will put on some extra pounds.

You decide the risk / reward benefit.

Hypertension and Cholesterol

Constant hypertension, commonly called high blood pressure, wears out an artery's capacity to stretch. It is like a balloon that's been blown up too many times, the lining of the artery becomes less elastic and can rupture easily.

Because high blood pressure has constantly stretched the artery beyond its natural capacity, arterial cells are no longer as tight. Small, dense particles of cholesterol can easily embed themselves in these "tight junctions."

Arteries that have been damaged by high blood pressure can also rupture, causing an aneurysm and internal bleeding into the surrounding tissues.

High blood pressure doesn't cause any perceptible symptoms until the condition has become severe. But even mild high blood pressure constantly damages your arteries.

Other inflammatory conditions, such as rheumatoid arthritis, pneumonia, even common infections, can cause inflammation in the arteries.

That inflammation allows particles of cholesterol to embed in the lining at areas that are inflamed, or damaged. A vicious cycle sets in: Embedding of cholesterol leads to more inflammation, and

inflammation leads to more embedding of the damaging cholesterol particle.

Cholesterol that embeds in the lining causes a condition which sparks chemotactic factors, which in turn play a key role in the development and progression of atherosclerosis, or hardening of the arteries. This complex process is how cholesterol forms deposits called plaque.

People react differently to the embedding of cholesterol in the artery's lining.

For some, the embedding of cholesterol in the artery's lining is a minor thing that happens all the time with no great damage done. For another, it can be the beginnings of an eventual catastrophe. It all depends on how the your body reacts to these tiny attacks on the artery. The reaction depends on the frequency of the damage, your general health, and other factors.

Inflammation in the arteries also can develop as a result of inflammatory conditions elsewhere in the body, such as rheumatoid arthritis, pneumonia, and various forms of infection. In this case, the inflammation itself can be the factor that attracts cholesterol to the site and results in a build-up of plaque.

Deposits of plaque are like blisters in that they have liquid centers. Plaque deposits are weakest around their edges, where the wall of the plaque is the thinnest. Most of the time, they are simply reabsorbed by the body. But they can also rupture, releasing their liquid into the blood stream.

Sometimes the rupture of a plaque deposit will result in the body's defense mechanisms going haywire. A blood clot can form at the site and cause a heart attack, or this clot can detach and travel through the circulatory system, causing a blockage in the arteries leading to other areas of the heart or other organs.

This is how a heart attack, technically called a myocardial infarction, commonly occurs.

A blood clot delivers a devastating blow to the cardiovascular system. Blood clots also cause

brain-damaging strokes. The clot retards the flow of blood to or within the heart and heart tissue, which rapidly begins to die from lack of oxygen and nutrients. Normal blood flow must be restored as quickly as possible in order to minimize the damage and prevent death.

Luckily, most plaque deposits do not initiate the catastrophic chain of events that lead to heart attacks and strokes. The body successfully copes with these blister-like structures and turns them into fibrotic and calcified deposits. Old plaque becomes as hard as cement.

Unless an artery has been narrowed by more than 75 percent, blood flow remains largely unaffected.

There a number of steps that you can take to combat this problem. First, niacin, or vitamin B3, is terrific at lowering LDL and boosting HDL. Most significantly, it changes dense, small LDL particles into larger, more buoyant particles that do not embed as easily in arterial lining.

Second, fish oils, omega- 3 fatty acids, can provide benefits for those who have trouble controlling their triglycerides (another form of fat in the blood). Fish such as salmon, trout, mackerel, and sardines contain large amounts of these fatty acids. You can also get these oils by taking supplements.

Third, oat bran and oatmeal work by binding cholesterol in the small intestine, causing you to eliminate it rather than reabsorb it Into your blood stream and then back to the liver.

Fourth, reduce stimulants like caffeine and alcohol, and reduce your salt intake drastically. Cutting the amount of salt is more than putting down the salt shaker. Processed foods are loaded with salt.

Fifth, increase your physical activity. As you age walking is more important than anything else because past age 50 we can have trouble maintaining our balance like a bicycle. Jogging or running is hard on the knees, spine, and back. Walking is something almost all of us can do for

a lifetime.

Sixth, as we age we have a decrease in our hormones. As a result of the decreasing levels of hormones like testosterone and estrogen our muscle mass decreases. These changes often lead to weight gain. Additional pounds and our sedentary lifestyle exacerbate muscle loss — a vicious cycle sets in. And, people over 50 simply cannot “bounce back” from overwork or stressful situations as well as we did when we were younger.

Finally do not retire. Think instead of changing jobs. You need to stay active both physically and mentally. Your brain is just like your muscles. If you don't use it, you will lose it. Set a plan on physical activity that makes you do something at least 5 days a week. Meanwhile, make a list of things you have wanted to know about but don't. Set a time everyday to read about this new information and then talk about it to someone.

Remember, if you sit down in that recliner and don't get up and move, you start to rot and decay.

Healthy Pearls

Selenium and the Prostate

A study done in the Netherlands followed over 58000 men between the ages of 55 and 70 for eighteen years. Those men with the highest levels of selenium in their diets were more than 60% less likely to develop advanced prostate cancer. The following is a list of the foods with the highest levels of this mineral.

Brazil Nuts Sunflower Seeds
Fish (tuna, halibut, sardines, flounder, salmon)
Shellfish (oysters, mussels, shrimp, clams, scallops)
Meat (Beef, liver, lamb, pork)
Poultry (chicken, turkey)
Eggs
Mushrooms (button, crimini, shiitake)
Grains (wheat germ, barley, brown rice, oats)
Onions

Olive Oil and Alzheimer's

New studies have shown that olive oil can reduce the risks of Alzheimer's disease. Researchers have isolated a chemical called oleocanthal in olive oil. This molecule decreases the accumulation in the brain of beta-amyloid. This compound clumps in the brain and also causes memory loss. The olive oil chemical causes an increase in two proteins and enzymes that remove the beta-amyloid from the brain.

Melatonin and Diabetes.

Researchers at Brigham and Women's Hospital in Boston have found that women with low levels of melatonin were more likely to develop diabetes. The researchers theorized that melatonin must play an effect on our ability to secrete insulin and/or plays a role in the sensitivity to insulin. Luckily, we have a simple test that can be done in the office to test your ability to produce melatonin.

This marks a transition in this newsletter. I have had the pleasure of writing it since its first edition. The learning experience has been a treat and a trial. You learn that it is difficult to edit your own writing.

A new team will be putting the newsletter together starting in August.

I look forward to their thoughts and writings.

If you have any comments or topics that you would like discussed, email them to the ICAK-USA headquarters.

I hope that you have enjoyed the newsletter.

*Published by Triad of Health Publishing
6405 Metcalf Ave, Suite 503
Shawnee Mission, KS 66202
www.triadofhealthpub.com*

