



# Water-Only Fasting

## The Fast Track to Health

Dr Frank Sabatino

In addition to my own personal fasts, I have fasted thousands of people over the past 40 years for a wide variety of health concerns. I have also been part of a group of dedicated Hygienic Physicians who have supervised many thousands of fasting patients over more than 60 years.

Fasting is one of the most profound yet misunderstood therapeutic approaches in health care. The word fasting comes from the Old English faestan, which means to be strict, to have discipline. By definition, water-only fasting is the complete abstinence from all food and liquids, except water, for some extended period of time.

I'm sure you can appreciate that in our culture of gluttony and overeating, the idea of voluntarily abstaining from food-unless there is some enforced famine-may seem somewhat absurd and insane. Yet, there is an extensive body of evidence over many years, including lab studies in a variety of species and clinical observations in humans, supporting the use of water-only fasting for a wide range of health problems including obesity.

These data are consistent with the idea that throughout evolution all life forms, from

bacteria to humans, have experienced periods of starvation and food deprivation alternating with periods of abundant food availability and, as a result, have evolved the ability to adapt to long periods of starvation. (1)

The loss of appetite and fasting are natural to all animals, including humans, in response to disease and stress. If you observe animals in the wild, or even your own house pets, you will notice that when they are injured or diseased, they will often retire

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to a quiet and comfortable place, drink water and stop the intake of all food. The loss of appetite in disease is also present in humans, but the idea of complete abstinence from food for most people in our culture is such an abhorrent frightening notion that they will continue to eat even when all their natural

instincts are telling them to stop. However, it is important to realize that when less energy is required for eating, digesting and procuring food, more energy is available for healing and repair.

### Where Does Energy Come From During Fasting?

The body has a deep-rooted need for energy and the sugar in plants that provide it. Because sugar (glucose) is needed to produce energy in the body, the food we eat must replenish and maintain adequate blood sugar levels.

However, since elevated blood sugar levels can be dangerous, it is critical that blood sugar is maintained in a well-defined range of normal. If you over eat sugar and processed foods, sugar levels in the blood can increase to toxic levels beyond the normal needs of the body. The body protects itself by removing excess sugar from the bloodstream and storing it in the liver and muscles as glycogen for a future time of need.

If you consume more sugar than the bloodstream can handle, and the liver and muscles can accept, the surplus will be moved by the body into fat cells for long term energy storage, contributing to fat and weight gain.

When you stop eating, blood sugar levels drop. As a result, the body begins to access the glycogen that is stored in the liver, to replenish the declining blood sugar level. However, the glycogen reserve in the liver is typically depleted within the first 24 hours of fasting, and if you continue to fast, the body needs to find some way to satisfy its blood sugar and energy needs. Therefore, by the second day of fasting the amino acids from protein in our muscles, and glycerol from the fat in our fat cells are used to create sugar.

This process of creating sugar from protein and fat is called gluconeogenesis, gluco (glucose), neo (new), genesis (creation), the creation of new forms of sugar from other existing nutrients. By the third day of fasting, the metabolism of the building blocks of fat (fatty acids) from body fat becomes a dominant source of energy for the needs of the brain and body thereby conserving and sparing protein. (2, 3, 4) .

Some scientists estimate that a person between 150-160 pounds can obtain basal caloric requirements from their fat reserves for up to 2-3 months of fasting. (5)

### Unscientific Fears and Concerns

Due to the use of proteins and fats in the fasting state, some people have expressed concerns about the efficacy and risks of fasting.

One of these concerns is that protein muscle mass will be so depleted on a fast leading to dangerous muscle wasting. While there is more protein metabolism and lean muscle breakdown in the first few days of fasting, about 2-3 ounces

of protein loss per day, after approximately 2-3 days of fasting protein loss slows down to about 1/2-1 ounce per day to provide for a still small ongoing need for glucose. But by the third day of fasting the body shifts primarily to

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fat metabolism for its primary energy needs, so that by day ten of fasting the energy needs of the body are derived almost exclusively from fat.

Furthermore, the loss of protein and the depletion of blood sugar throughout a fast are more comfortably regulated by ensuring that the fasting person maintains maximum rest. If the person attempts too much activity on a fast, there will be more rapid and consistent muscle loss, as the body breaks down muscle mass to replenish blood sugar levels, and a can lead to a more potentially dangerous drop in blood sugar.

The metabolism of fat during the fasting state has generated another cloud of controversy that is unfounded and must be addressed. When fat is broken down to produce energy, a class of compounds called ketones are produced. This

creates an acidic state in the body called ketosis, or a more complicated condition called ketoacidosis, and is generated whenever there is a significant breakdown of fat for energy, in lieu of carbohydrates and protein.

The concern is that ketosis in fasting could damage the kidney and brain, possibly leading to loss of consciousness and even more dire consequences. However, both scientific studies and the extensive clinical experience of hygienic physicians like myself, have shown these concerns to be unfounded.

In fact, when fasting is done in a supportive environment, with proper hydration under total resting conditions, just the opposite is observed.

Kidney and heart function often dramatically improve as weight and blood pressure drop. In an extensive study of hypertension (high blood pressure), medically supervised water-only fasts, averaging 10-11 days, significantly lowered both systolic and diastolic blood pressure, enabling people to eliminate the need for blood pressure medication. (6)

Rather than a loss of consciousness, there is often a dramatic improvement in the acuity of special senses: vision, hearing etc. People wearing glasses will sometimes remark how they experience moments of absolutely perfect eyesight without their glasses.

In addition, in the fasting state the brain makes a unique adjustment that insures its stability even in the absence of food intake. Brain cells are one of two directly glucose dependent cells of the body.

Since the brain is truly the conductor of our remarkable body-mind symphony, the energy needs of the brain are top priority. Especially when you consider that the brain is only 2 percent of our body weight but demands 20 percent of our daily energy requirement.

However, even though glucose is essential to the function of the brain, in the fasting state brain cells are capable of utilizing ketones directly for energy in the absence of available glucose. It has been suggested that the ketone, beta-hydroxybutyrate, is the most abundant ketone used by the brain during fasting, accounting for roughly 2/3 of the brain's fuel supply, (7) and the ability of the brain to utilize this ketone body has permitted man to survive prolonged periods of starvation. (8)

This ability is unique to healthy brain cells, and also explains how the brain and body can

thrive during extensive periods of fasting. I have supervised fasts as long as 2-6 weeks for certain pathological conditions, and it is remarkable that while there is fatigue and an increased need for rest, a person is still remarkably stable in body and mind.

**Detoxification and Elimination**

Fat is not only an available energy reserve in the body, but it also serves as vehicle for the storage of metabolic waste products, toxic fat-soluble chemicals and environmental toxins that we are routinely exposed to.

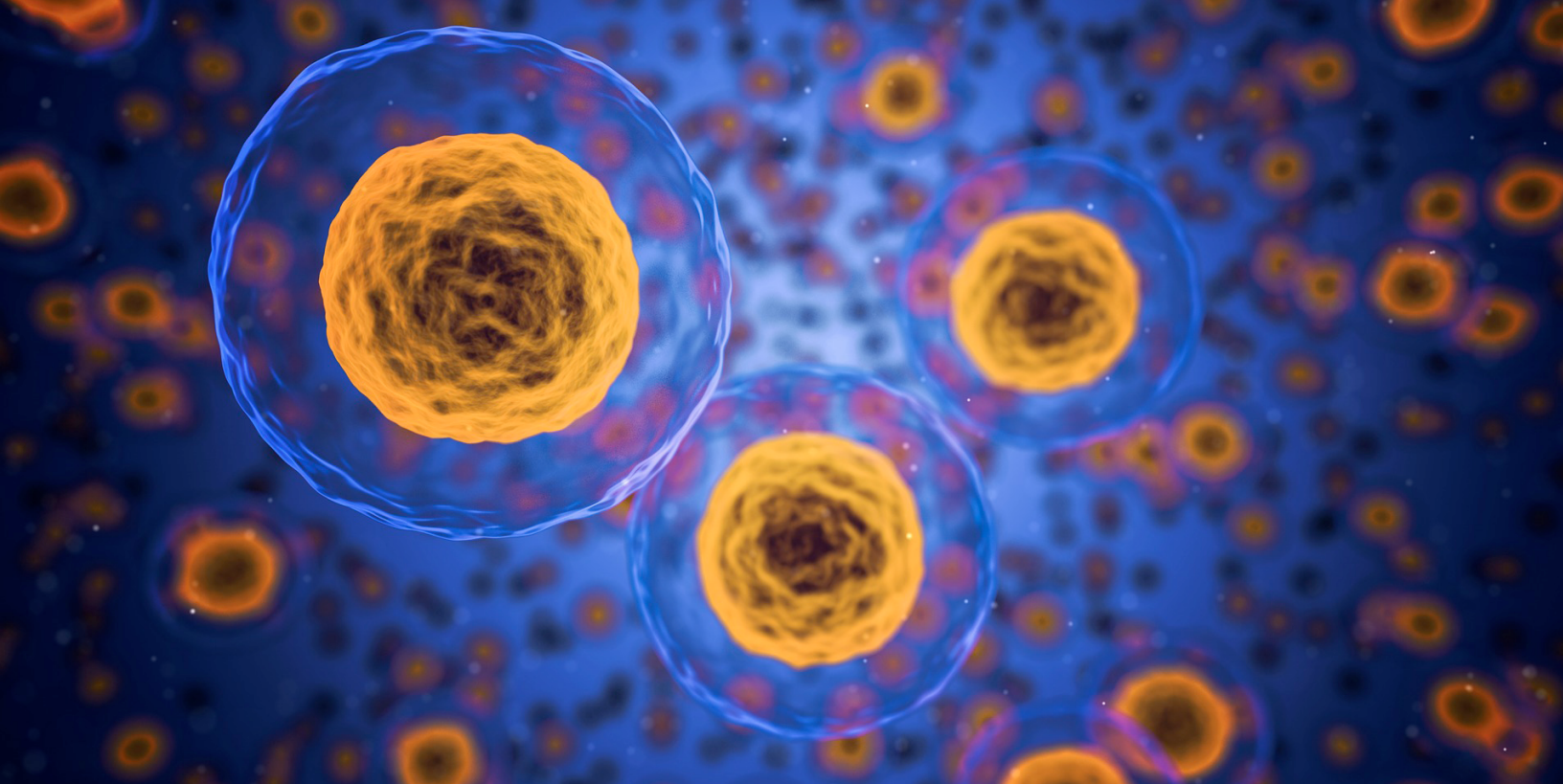
When fat is being utilized in fasting, the toxic debris stored in fat tissue will also be mobilized from these cells back into general circulation. This makes the toxic load of the body ripe for removal. Here's where fasting exerts a profound benefit.

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An interesting observation is that when brain cells become cancerous, they lose the ability to utilize ketones for energy. So that when people with brain cancer are maintained on sugar free diets, or even more powerfully, water only fasting, cancer cells and tumors in the brain may be starved, shrunk and destroyed to some degree.

Since fasting is an energy conservation process, and energy is not being used in the procurement, digestion, and utilization of food, the energy that is harbored in the fasting process can be diverted to enhance the mobilization and elimination of waste. This mobilization of waste from storage areas, and the circulation and removal of





this waste through organs and tissues of elimination, is what is more accurately referred to as detoxification and elimination.

It is important to recognize that the body in its wisdom clearly recognizes what belongs in it and what does not. It will do anything in its power to eliminate any and all threats to its integrity. This work requires energy.

When energy is made available in the fasting process, the body elaborates the action necessary, under the direction of its own innate intelligence, to carry out the inborn genetic directive of health and healing. In fasting, not only are the processes of detoxification and elimination enhanced, but the body also demonstrates an intelligent and very selective control over these processes.

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So as the body shifts from a growth mode to a maintenance and repair mode, through the process of autophagy (self-digestion), it will break down a

tumor or a cyst and the debris in our cells, take from it what it can use to support the vital organs of the body and eliminate the rest.

That's why we often see cysts, tumors, and stones break down and dissolve during fasting. As fasting is prolonged this autophagic process is also an additional attempt to produce a small amount of glucose from these extraneous tissues and conserve and spare protein muscle mass in the process.

I have monitored women with uterine fibroids or ovarian cysts that significantly shrink and

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dissolve after several weeks of fasting. Some of these changes can sometimes occur in relatively short periods of fasting. I had a woman come to me with fibrocystic breasts that looked like they were full of shrapnel on a mammogram. After just 7 days of fasting, the breasts were

virtually clear!

### Case Study:

A young teacher from Canada came to me some years ago diagnosed with neurofibromatosis, aka Elephant Man's disease. In this disease there are multiple small fibrous tumors (fibromas), along the nerve fibers throughout the body and brain. One of her larger tumors was located at the base of the brain blocking the main blood supply to her brain. So she had a shunt surgically implanted to allow blood leaving her heart to by-pass this blockage and feed the brain directly.

Because of these small tumors, she had constant small epileptic like seizures that made her life unbearable. She was on high dosages of Dilantin and phenobarbital to control the seizures. These drugs are hard on the liver and produce a toxic state in the body.

Although the intensity of the seizures was lessened by the drugs, the phenobarbital kept her in a semi-comatose state with no energy, so that when she came to me, she had been bedridden for some time.

She was carried into my center so weak and fragile, and put in

bed as if poured off a spoon. It broke my heart to see this young professional woman in her early 20s just a fading shadow of what she could be, what she should be. She had no affect, no smile, just a blank shell in a dormant state of non-being.

After a period of vegan nutrition and vegetable juices, to help her withdraw from phenobarbital, she was put on a fast that lasted 30 days.

Again, please understand that the length of this fast was determined on per day-to-day basis, taking into account the reactions, physiological responses and vital signs that were monitored daily. However, many people come in with a finite period of time to both fast, and break the fast. Fortunately, her mother and family were committed to the vegan lifestyle and clinical fasting. So, we had the time to fast as long as clinically necessary.

During the fast, she became more and more coherent and energetic, even as the days of abstinence increased. Around the 25th day of the fast, her neurological system expressed a flurry of short frequent seizures related, in my opinion, to the previous patterning and exaggerated activity of her nervous system, and potentially tied in to a healing crisis. In the midst of this crisis, consistent with an attempt to eliminate the toxic load on her body after years of toxic medication and the assault on her liver, her belly button drained black bile from the abdominal wall.

After an extensive period of re-feeding, I happily carried her around the property of the retreat until she got the energy to walk on her own. Her seizure activity was virtually non-existent, and she was drug free. It was an incredible feeling to see her living and loving life. Her smile and the joy she radiated was an absolute joy to behold as we wove our way thru the perfume of gardenia

bushes and orange blossoms that decorated the property of the fasting center, sharing the sweet taste of honey bell tangelos.

Unfortunately, when she went home, her and her family were browbeaten, pressured by her previous medical doctors, and relentlessly chastised for even doing a fast. She was put back on a variety of medications, subjected to a botched surgical procedure to remove a small tumor in her ear resulting in deafness, and after a series of medical crises, interventions, and mismanagement she was dead in two years.

Although time has a way of dissolving the hard edges of past emotion, I can still feel the pain and anger that I first felt at her untimely death. It still brings tears to my eyes.

### Benefits of Fasting

Fasting has improved many pathological conditions including chronic inflammation, autoimmune diseases (lupus, rosacea, rheumatoid arthritis), asthma, high blood pressure,

ulcers, heart disease, irritable bowels, colitis, allergies, depression, anxiety and even addiction etc. as it also promotes significant fat and weight loss. In the early days of fasting, weight loss can be as much as 1-2 pounds per day.

However, this weight loss will taper off to some degree as the fast ensues, often reducing to a half a pound per day in the latter stages of more extensive fasts.

In a human study, weight loss caused by fasting was initially rapid, as much as 1.5-2 pounds per day during the first week of fasting followed by 0.5-1 pound per day by the third week of fasting. And as much as a 20 percent loss of body weight occurred by 30-35 days of fasting. (9) It is not always true, but usually the more obese the individual is at the start, the more dramatic the initial weight loss is.

It is important to keep in mind that fasting is just a profound process of deep physiological rest. That's the main reason fasting is only recommended in a resting state.

Typically, other than going to the





bathroom and simple activities of daily living, no other physical activity is allowed. The goal is to harbor as much energy as possible for the healing work at hand.

That means rest on every level, including all the senses. So, while watching TV, listening to music, playing on the internet etc. are ok during the fast, the more time spent being quiet, serene, and introspective the better. It is so beneficial to give your eyes, your ears and your brain a total break in the action.

This not an easy thing in our culture. We are so inundated with information and stimulation that we are constantly being pulled outside of ourselves. So the thought of spending time with, and within, ourselves can sound like a daunting, almost frightening task. However, it is in this introspective time that information about what motivates our cravings and desires can be revealed.

Sometimes, only by slowing everything down and stepping back from the chaos and distractions around us, can we

question and change the patterns and choices of our lives. We need to afford new choices an opportunity to breathe and thrive in our brains and neurological systems, making it easier for us to establish constructive healthier choices over time.

For this reason, fasting is also

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a profound tool for creating a more mindful self-aware life, and resolving compulsive addictive behavior.

Many people have dealt with and resolved the compulsive addictive use of drugs and food by fasting. In addition, fasting promotes a stability in brain chemistry that even helps with the pain of withdrawal from addictive substances. It's never easy, but I have helped people even resolve the typically debilitating pain and craving of opiate withdrawal from heroin and dilaudid, and

other drugs including cocaine, with significantly less pain and discomfort, utilizing the fasting process.

Even short periods of fasting, from 3-5 days, are extremely useful for changing food habits and addictions to sugar (refined candy, ice cream, cookies and pastry products), other refined carbohydrates (refined breads, pasta etc.), gluten, meat, and dairy products. And short fasting periods, can also jump start a successful weight loss program and promote a rejuvenation of the immune system by removing old white blood cells to trigger the stem cell activation of new white blood cell production.

## Refeeding and Contraindications

I think that you can probably appreciate that the re-feeding period after fasting is crucial for the success of the fasting experience. In fasting centers, a common recommendation by supervising physicians is that the person take half the time of the fast to ease back into eating. So,



if you fast 10 days, you should take another 5 days to break the fast. A conservative approach to re-introducing food and activity is in the best interest of all fasters at any age.

If there are two mistakes that are commonly made after fasting, they are eating too much too soon, and moving too much too soon. Food needs to be gradually introduced after a period of fasting.

Fasts are most successfully broken with a succession of diluted and full-strength fruit and vegetable juices, fresh fruit, fresh vegetables and salads, raw and cooked whole plant-based meals.

Even if you fast, fasting will always be just a small part of your life. You will be eating 99 percent of your time and if you decide to fast, it will be a very a very small percentage of your life. So, what you do before and after the times that you fast is going to be the most significant part of your health and weight loss program.

However, there are potential contraindications to fasting and people who are not good candidates for fasting. Some of these include people that have an extreme fear of fasting, people

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that are anorexic or bulimic, people with metastatic cancer and body wasting, pregnant diabetic women, nursing mothers, medicated diabetics (Types 1 & 2), people taking medication and people with specific metabolic genetic defects like porphyria when there is difficulty processing the porphyrins that affect red blood cell production and energy utilization in the energy factories of cells (mitochondria).

Just keep in mind that during a fast the body can express eliminative

activity and healing crises by a variety of acute symptoms involving the skin, kidneys, intestines, liver, lungs and other body organs and systems. While these actions are in the best interest of the body, most of us have been brought up to fear our own vitality, our own vital action.

We have been conditioned to fear the acute symptoms of disease, even when these symptoms are typically the most direct expression of the body’s inborn ability to protect and heal itself, e.g. fever and discharge.

So that fear can surface during the fast if you encounter the symptoms and actions of elimination. This can create stress that is debilitating and counterproductive to the fasting process.

This is one of the reasons fasting is usually recommended under the supervision of physicians that have been trained in fasting care. Typically, when we supervise fasts there is a lot of hand holding,

counseling, and monitoring of the fasting process. This helps the faster have a better understanding of their symptom picture and what is going on clinically so that much of their fear can be put to rest. If you are comfortable with the symptoms that may arise, or if you have fasted before, you can probably fast for a few days at home without professional supervision.

However, when fasting is done with proper supervision under proper resting and stress-free conditions, fasting is a remarkably valuable tool for promoting health recovery from a wide range of pathological conditions, in addition to promoting and supporting long term weight loss.

Just be mindful that fasting is a conservative approach for health and healing that is always available to you as a viable option before you entertain more debilitating drug and surgical interventions. And if other treatments and therapies have not worked for you, water-only fasting is a remarkable alternative that you may want to consider on your path to health and wellness.

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