Energy and Epigenetics 2: The Real DHA Story

Readers Summary

1. Is the most dominant part of life invisible to us?
2. What is an example of a “field” effect?
3. What does a lack of DHA and ketosis mean to a young human?
4. How are environmental ecologic niches linked to evolutionary design using the field as the paper blueprint?
5. What are nature’s three laws that govern all of biology, chemistry and biochemistry?

We are all products of our environment. Our genes are the first draft of what we are created to be, but the experience those genes face (epigenetics) is how the novel of our life is really written. This blog is about how this experience begins to unfold in our species. I call that experience “the field” or “the cellular terroir.” Today’s blog post is an introduction to levee one from the Quilt. Most people who follow my blog often remark that levee one is linked to leptin. I tell them this is not true. Go look for yourself. We must stop focusing on disease states and instead think about what happens to the cell’s environment that dictates its fate. The cellular terroir are what cause the disease states. Let me restate this to make it clearer: “The ‘field dictates all epigenetic expression and it extends to trans-generational epigenetics as well. My theory of aging and the development of neolithic disease is that the environment the cell finds itself in is directly proportional to outcomes the cell may face. This means that your genetic identical twin only needs to live in another room in your house to face a different

existence that you to get a massive change. Genes are important, but they are not the dominant player modern science believes. The ‘field’ makes the call when gene products should and need to be expressed. This implies that cellular timing … is pretty important in this ‘new cell theory.'”

When you finally begin to understand the electromagnetic field’s main purpose in biology, you will become captivated by all you are connected to within the universe. Within you lies the sun, the moon, the sky and all the wonders of this universe. At our cores we all come from stardust. Our species’ delusion is that we believe our experience of our life and our thoughts as our own singular experience are somehow separated from the rest of life. When in reality, this is an optical delusion of human consciousness. The intelligence that created these wonders in nature are the same forces that have created us all. When you tug on your own nature, the rest of nature moves in unison.

It is time you realize we are more connected to the invisible than the visible forces of nature. Healing yourself is entirely connected with helping heal and nourish others. Our existence is a way for the universe to know itself. The field is the most important factor in life, because it is the one none of us perceive, yet has the greatest effect on our biology. Einstein once said he could not believe that God threw dice to help form life using the the laws of nature buried in quantum theory. He said this because his ideas lead to the mathematics of QED. That math led to the uncertainity principle. This principle implies all life is based upon making sense of randomness. He could not accept that morally.

What does levee one really imply? “God not only plays dice with the universe, he sometimes throws them where they can’t be seen.”

Truth Bomb: How a Field Changes Your Reality

Let me give you and example of how a field can determine your reality. Assume your weight is 180 lbs. on Earth. Now you step into a time warp, and I am going to weigh you simultaneously in our own solar system:

- On Mercury, you weigh 68 lbs.
- Venus: 163.2 lbs.
- Mars: 67.8 lbs.
- The Moon: 29.8 lbs.
- Jupiter: 425.5 lbs.
- Saturn: 191.5 lbs.
- Uranus: 160 lbs.
- Neptune: 202.5 lbs.
- Pluto: 12 lbs.
- On a star like a sun, you would weigh 4872.9 lbs.
- On a white dwarf, you would weigh 234, 000,000 lbs.
- On a neutron star, you would weigh 25,200,000,000,000 lbs.

Weight is determined by the gravitational and electromagnetic field that matter exists in. You all know this based upon the science trips you took to museums as a kid. The problem for you today is that physicians and researchers forgot how to scale this “field problem” to how cells have to change and adapt to things in the environment based upon the field they find themselves in. The point is biochemistry on Earth at 180 lb.s cannot and will not happen as it does on a neutron star. It is relative to the field that Earth is found in now. When life first evolved, the field was stable for millions of years. In the last 113 years, humans have altered all three of nature’s basic laws that life follows in its blueprint design.

To prove another point to you, let us revisit EMF 2, EMF 5 and EMF 8. I showed you how a cosmonaut got massive bone loss in

14 short months by just going into space and changing his field from the one he developed within. The field of space is radically different than the one in which he was embryologically formed or lived the first 40 years of his life. In 14 months, he nearly died, just because of a “field effect.” This observation should have been a huge clue to modern biology about how big a deal the field really is to humans.

The Human Brain Connection

Based upon studies of tissue composition that we talked about in the recent Brain Gut series, and considering the performance of the biosynthetic pathways of Docosahexaenoic acid (DHA) in humans, it should be clear to you that the dietary supply of Polyunsaturated fatty acids (PUFAs), including Omega 3s, is the critical factor in the tissue composition of DHA and Arachidonic acid (AA) in the human brain. We also explored in Brain Gut 13 that the vulnerability in humans is most critical in the third trimester and perinatal period and not in the adult period because this is when the human brain is growing at its fastest rate in the human life cycle. It also turns out that the human brain is the most insulin resistant during the third trimester as well because it is completely un-myelinated while the grey matter is exploding in growth. If the mother provides a fetus with a diet high in carbohydrates during this phase of pregnancy you can bet that the child will be quite large in body size, have a brain that sustains many variable neurologic developmental issues and has a metabolism that strongly craves carbohydrates for the rest of its life. These three months can set the stage for adult-onset Type 2 diabetes 25-50 years later. The effect of glucose on an un-myelinated brain makes in an altered EMF field sets the stage for metabolic syndrome, autoimmunity, neuro-degeneration, and cancer later in life. I’d strongly suggest you go back and re-read Brain Gut 13 and Brain Gut 5 carefully. I also think the recent Energy and Epigenetics 1

blog should be re-read again too so you can understand why I can make this claim. This is a time in morphology when the grey matter is exploding in growth (Vitamin A) and the white matter (vitamin D), called myelin, is dormant embryologically. Brenna found in 2007, that all human milk has DHA in it because of this vulnerability. Gibson found in 1997 (as did Francois in 2003) that breast milk DHA levels are unaffected by higher dietary levels of ALA in humans too.

These findings then lead to experiments done on primates and human infants who were given formulas with acceptable ALA levels, but without acceptable DHA and AA levels. Chimp's and humans share 99.99 percent genetic homology, so if the genes were the dominant driver of biology the human and chimp experience should be the same with regard to our diet's construction. The diet, after all, codifies the photoelectric effect of food derived from the energies of the sun.

Beginning back in the early 1990s, studies showed a major advantage in neonates who were given a formula with DHA in it. It provided an advantage in vision and cognition. The major benefits were seen in visual acuity and problem-solving. Conversely, it was also shown in formulas without DHA that infants had lower brain levels of DHA. This had no benefit on chimps because their CNS is 90 percent developed at birth. It seems chimps do not need what humans need to eat even though their genomes are almost completely identical. In the early 2000s, more work was began to show that the higher levels of DHA provided in breast milk or formula provided an even greater benefit to the mother and infant cognitively and in behavior all the way out to 16 years of age in life. Data began to suggest that consumption of DHA are specifically related to developing affective disorders and mood disorders. In the last few years now, literature is linking neuro-degeneration and autoimmunity later in life as possible correlations. These are diseases that are now at epidemic levels in the western world, in case you did not know it. All

one has to do it to look at prescription data from pharmaceutical companies to see this is the case. Several metaanalyses now clearly show this relationship is pretty tight. In 2010, a study even suggested improvements in depressive symptoms for pregnant women who consume DHA and EPA (Su et al.,2008) All of these studies also support the implications I drew in Brain Gut 13 and in Brain Gut 5, that tissue composition and optimal cognitive function and behavior depends primarily on a steady supply of preformed DHA in the diet from seafood and not from meat.

Why Is This Data Important?

What separates us from all other mammals? It is the functioning of our brain to collect energy and information. Many animals find ecologic and evolutionary niches by evolving special organs unique to them and their environments compared to other mammals. For example, the hummingbird's breast muscles, the giraffe's neck, the lobster's big claw and the elephant's trunk. In all these cases, the dietary needs for these organs are not substantially different than the rest of their body. It also follows that the biologic niche the animal is in supplies these specific nutrients required for the growth of the special organ as well. Humans are a particular species that has a runaway organ called the brain. Neural tissue in humans has a specific neural composition that is unlike any other large organ it has and because of this, it requires an efficient acquisition of highly specific nutrient components to make it run optimally. That source is only found in seafood. Moreover, it remains clear that among the 50 or so nutrients required for all mammals to remain healthy, those derived from dietary PUFA's remain a dispropriate fraction of neural tissue in every species of mammal on this planet today.

Because humans have such a large brain, it places our burden on a constant source of dietary DHA in our food chain. In humans, this implies that DHA is no different than Vitamin A

for example. It, too, can be found performing in animal sources, or as an inefficient precursor in plants. Humans are like the cat family. They retain the ability to synthesize DHA, but at such low quantities and efficiency and not to a level to support their requirements for optimal physiologic function. This makes cats remain obligate carnivores to support their dietary DHA needs. They do not need a huge source of DHA because their brains are not well developed compared to humans. Human brain function is akin to the elephant's trunk. It makes us unique, but because we cannot make enough DHA to support our function, it compels us to replenish DHA in our diet by making us obligate seafood eaters. This implies that these dietary sources were found in abundance in their ecological niches as we evolved as well. This is why reading my book, The Epi-Paleo Rx can lead to disease reversals and not just health improvements. It is all about increasing energy efficiency in your brain using semiconductors that use extremely low-frequency electromagnetic forces to time and express gene products (proteins) that ultimately make you human and not a chimp. It might begin to explain why you and "that ancestor" have 99.999 percent similar DNA, but yet, how that DNA has expressed looks like night and day different in physical, mental and emotional abilities. What really separates us is how the ELF on this planet altered gene expression to build its newest and latest hominid based upon what went on in the environment and East Rift ecology around 3 tectonic plates in Africa when the seas blocked a group of our ancestors from being able to return to their native forests.

Truth Bomb Alert: Our brain imposes on our biology our real dietary needs, and it primarily determines what nutrients contain our best nutrient density in "the field" our lives are lived in. Since the field on our planet has changed, maybe what we believe about food needs to change as well?

The infant human brain is clearly different than the adult

brain for many evolutionary, functional and quantum reasons, all of which are tied to energy generation. Energy is connected to everything in the cosmos including life.

Many people in paleoanthropology seem to be completely unaware that in the food chain in the savanna is scarce in DHA and iodine. This is why they should begin to look outside their own box about human evolution for a very fundamental reason. You cannot have a human brain develop from eating the food found on the savanna. Meat and offal won't cut it. This is dogma that just won't stand up against the evidence required to form a human brain that is well established in my literature as a neuroscientist. This is not meant to be a criticism of the discipline of the blogosphere. It is made to enlighten you and them to examine *why* this might be the case.

The morphology, ecology, and behavior of early hominids are not common topics in biochemical or nutrition publications. When one layer of the specialization of neural lipid biochemistry that I have mentioned here, I cannot fully appreciate why this information remains in the paleosphere's blind spot. What I can't fathom is that they refuse to look at the holes in their own theories while they make fun of modern medicine routinely for its own lack of insight on nutrition. I think we all need to be aware of what we do not know. Cordain's reporting of his data has been responsible for much of the paleo dogma beliefs, but his weaknesses in the areas I am highlighting in many of my blog series should be eye-opening to those with a scientific bent.

If you do not believe what I am laying out here in excruciating detail, I would suggest you read pages 108-113 in Loren Cordain's latest book, The Paleo Answer. No one wants to believe that seafood outperforms most classic paleo proteins for nutrient density. Re-read the Brain Gut 5 blog again. For what is to come later in this series, it will be foundational. The amount of data supporting this assertion in this series of blogs is overwhelming if you choose to educate yourself. As

patients and clinicians, you would be smart to read the cites in the last three series closely, especially if you are a skeptic. It will begin to explain why paleo is a step in the right direction for wellness but it does not go far enough for disease reversals. Since I am a clinician, I must pay attention to these details regardless of what the critics may say.

Summary

This is why Michael Crawford and Mark Verhaegan have suggested many times in their own writings of why we see a “degenerative cognitive de-evolution” of the brains of all true savanna species on this planet! If meat and offal could build a brain, why are their no big-brained smart ass lions? It amazes me that these smart people interested in evolutionary lifestyles do not realize that the basic science of DHA is a major clue of where we really come from and why we have the neurodegenerative diseases and neuroimmune diseases like autism. It points out what a powerful meme dogma really is for humans. The only food chain loaded with water, DHA and iodine are the aquatic food chain. And when you begin to understand that iodine and magnesium are special kinds of kosmotropes when they swim together in a water gel in the cytoplasm of the cell, your understanding evolves. I am quite sure you won’t find a discussion of kosmotropes in any paleo book. It is hard to write about things when you are not looking for it. It also turns out, Darwin was right about the conditions of existence being more important than natural selection for life. He said this in his original book on evolution. He spent the rest of his life trying to figure out what controlled this biologic process. Today, conditions of existence have been renamed, and they are called epigenetics. It turns out the “on and off switch” that Darwin was looking for in our genome is an ELF, called the Schumann resonance. It was not discovered until 93 years after Darwin wrote The Origin of Species. The Schumann resonance is an ELF in the lowest energy and frequency range

of the electromagnetic spectrum and our brain cannot see it, touch it, or smell it but our cells sense it using quantum resonance. It is below the power of the visible light spectrum where the photoelectric reigns supreme. This is an ELF that few seem to realize but has major physiologic power to control how genes are expressed in wellness and in neolithic disease states by affecting water chemistry and protein chemistry.

When you mix in the concept of finally realizing the photoelectric effect is codified in our diet as food, you begin to see food as a synonym for the photons and electrons. Suddenly, you might begin to see how the quantum magic actually happens in our species and in all life. And this ketotic marine food chain has some amazing interactions with the natural ELF field found on this planet to allow us to be the species we are. This blog is an opening salvo of many surprises yet to come. When you consider what man-made EMF's have done to this field, many paradoxes and enigmas begin to make sense. Many diseases are known to have no cures suddenly make some sense.

Considering the skull sizes of the the homo species that encases the brain that we have recovered and dated, there is overwhelming and definitive proof that early hominids would have had to make use of the aquatic food chain, enabling their spectacular evolution of the central nervous systems and dramatically increasing their brain size in a small amount of time from an evolutionary sense.

What remains in the world's blind spot is why this is the case. The why is all about the quantum effects that form the foundations of all life.

In life, I have found the questions are more complicated, but the answers always seem to be quite simple and elegant.

Those three answers are the photoelectric effect, water, and magnetism. These three fundamental laws of nature are what

dictate where life can be found in the solar system. Earth has all three, and our nearest neighbor, Mars has two of the three. It is a dead red desert.

Those three effects are the only three effects one needs to use as their “straight edge” to make decisions for your biology. How they work in unison is what this blog series is all about. Food is only one part of the story, and that part is buried in the photoelectric effect. In your life, if you only do one thing correctly of the three, with nature’s laws, you are still not doing enough for your health quotient. The proof will be found in you illness quotient, eventually in some manner. Two out of three is bad for life when using nature’s laws as your measuring stick.

To be truly positive in the eyes of some, you have to risk appearing negative in the eyes of others to uncover some hidden truths.

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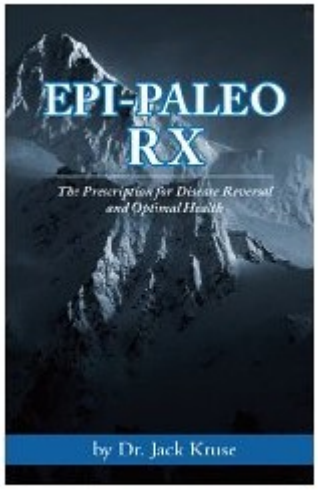

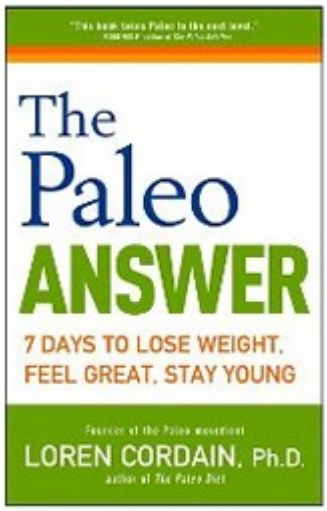

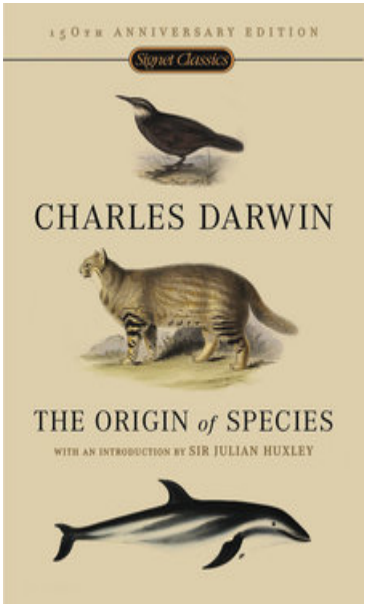

The Epi-Paleo Prescription	The Paleo Answer: 7 Days to Lose Weight, Feel Great, Stay Young	The Origin of Species

- View The Energy and Epigenetics Store

Additional Resources

- The Quilt Levee 1: Cellular Homeostasis
- Brain Gut 1: Who Are We Really?
- Brain Gut 5: Paradigm Drifts Paradigm Shifts – Epi-Paleo
- Brain Gut 13: Where Optimal Meets All World Performance
- Energy and Epigenetics 1: The Infant Brain Is Unique
- Energy and Epigenetics 4: Light, Water, Magnetism
- EMF 2: Einstein, Meet Leptin
- EMF 5: What are the Biologic Effects of EMF?
- EMF 8: Quantum Bone

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