



The Bond Briefing

The Science and Art of Living the Way Nature Intended

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Book Review

Hunter-Gatherer Studies



The Hadza Hunter Gatherers of Tanzania by Frank W. Marlow [1]

Frank Marlowe has spent many years field researching this extraordinary African hunter-gatherer tribe, the Hadzas – and this book is an eminently readable distillation of his work.

For professionals it is a rich source of information and ground-breaking insights. For the lay reader, it is a fascinating and eye-opening account of what life must have been like for us humans for eons in our evolutionary past.

Marlowe is conscious that the Hadza are in a way an oddity. They have maintained their ancient way of life in spite of outside efforts from missionaries and governments, and external pressure from surrounding tribes like the Masai.

Where necessary he points up where they differ from other savanna forager models such as the !Kung San, as exemplified by Richard Lee's classic studies in the 1960s [2].

For example, compared to the San, the Hadza seem to be less territorial and less confrontational. **Cont: page 4**

Hints & Tips

Hide Vegetables in Kids' Food



Researchers tested three familiar foods -- zucchini bread for breakfast, pasta with a tomato-based sauce for lunch and chicken noodle casserole for dinner. The team modified the standard recipes for these foods by adding a variety of puréed vegetables to reduce the calories by 15% and 25% [3].

The children ate the same weight of food regardless of the vegetable content. With the vegetable-enhanced dishes, their daily vegetable intake doubled while their calorie intake decreased by 11 percent.

Our View? If it works, then subterfuges like this are a way of shifting your kids' diets in the right direction.

However, it would be even better if they were given a taste for vegetables from the earliest age – as is the case with our young acolytes, who desire nothing else!

We Think Differently

We like to think differently. And as one of our dear readers, we hope you think differently too.

We like to think you don't believe everything you're told – especially if it comes from the Government, pharmaceutical industry, food industry, or the mainstream press.

Essentially, you're independent enough to think for yourself. That's what our message here is all about.

News Shorts

Diverse Gut Flora Nix Allergies

"Children acquire intestinal microflora from their environment, and in our society they are probably exposed to insufficient bacteria that are necessary for the immune system to mature," says Thomas Abrahamsson, at Linköping University, Sweden [4]. Gut microbe diversity was significantly greater in healthy children at one month of age compared to those children who later developed allergies.

Diversity in certain groups appears to be particularly important: 'Proteobacteria' (common in children who grew up on livestock farms) and 'Bacteroides' which fight inflammation. Meanwhile, Bifidobacteria in dairy products (notably yogurt!) is discredited. The researchers did not find any protective effect.

See: *Antibiotic-caused Diseases*, page 3.

Low Vitamin D, Early Menarche

Girls who were low in vitamin D were aged about 11.8 when they started menstruating, compared to normal level girls who started at about age 12.6 [5].

This is still very young compared to hunter-gatherers where girls have menarche from 15 to 17 years old. **Cont p.4**

Food Ideas

These totally conforming crackers make an ideal platform for all kinds of canapé.

Try them too with cod liver pâté ([Nov 2010](#); [May 2011](#)). Our UK supplier (with whom we have no commercial interest) is: www.danishfooddirect.co.uk



Walnut Crackers

Yield: about 50 crackers, depending on size

1½ cups (about 4½ oz) almond flour
½ teaspoon salt
½ cup (about 1½ oz) chopped walnuts

1 egg
1 tablespoon olive oil

1. Combine all the ingredients in a food processor and, using the blade, mix them to obtain a dough with a smooth consistency. Form a ball using your hands.
2. Line a baking sheet with baking paper and place the dough in the center.
3. Place another piece of baking paper over the ball of dough.
4. Roll out the dough between these two pieces of baking paper until it is about 1/8-inch thick and covers the entire baking sheet.
5. Remove the top baking paper and cut the dough with a knife into small squares or rectangles, to a size of your liking (typically 2-inches square).
6. Bake at 350°F (175°C) for 10-12 minutes, or until golden brown.
7. Serve, or store in a sealed container.

Jungle Lore

Whole Food not Supplements



New research finds that if you want the many health benefits of broccoli or other cruciferous vegetables, you need to eat the real thing— a key phytochemical is poorly absorbed if taken as a supplement [6].

My View? Healthy foods are more than the sum of their parts! We need our nutrients all working together in harmony like a symphony orchestra. It is quite illusory to imagine you can short cut the process with supplements. But watch out for Big Pharma; it will continue trying to persuade us otherwise!

See also '[Doc rethinks Food-Disease Link](#)', [Aug 2010](#).

Human Behavior

Childhood: Forager Indulgent or Modern Discipline? Part V

In parts [I](#), [II](#), [III](#), [IV](#) I talked about the historical rise of fierce childhood punishment...

What lessons are there for us today? Forager children lived in an environment which was pretty safe: they could wander at will; there was always a concerned adult nearby keeping an eye out.

They didn't need to be disciplined into going to bed on time; they didn't have to bend their brains to cognitively tiresome tasks (like learning to read or do addition sums); they didn't have to be bullied into keeping their bedrooms tidy; they weren't dragged around shopping malls where they could be lost or abducted; they weren't cooped up in confined spaces like cars or airplanes; they weren't nagged to keep their elbows off the table or to close their mouths when eating; ... and so much more.

So it is a regrettable feature of modern life that *some* discipline is

essential. But to be in harmony with Pleistocene brains, this has to be the bare minimum – and certainly not gratuitously violent like the egregious and sociopathic maltreatment advocated by belief systems such as Pauline Christianity, Judaism and Islam.

See: [Child Maltreatment & Disease](#), next item.

See also my review of philosopher Steven Law's book: '[The War for Children's Minds](#)':

<http://amzn.to/Bond-Law>

Mind/Body Connection

Child Maltreatment & Disease

Children subject to high levels of psychological stress are more likely as adults to have cardiovascular disease, autoimmune disorders, and die younger [7]. Childhood stress gets hard-wired into immune system cells called 'macrophages'. The programming switches on inflammatory genes – this is the 'epigenetic effect' (see [May 2009](#)).

As a consequence, these cells tend to cause inflammation through abnormal production of 'cytokines' (hormone-like molecules) and by ignoring calming hormonal signals. Over a lifetime, these inflammatory tendencies are multiplied up by poor lifestyle and malfunctioning hormone responses – which are themselves caused by the inflammation! This is what happens:

Behavior: Childhood stress gives rise to excessive threat vigilance, mistrust of others, poor social relationships, poor self-control, and unhealthy lifestyle choices.

Hormonal Response: Childhood stress alters secretions of endocrine glands and their stimulation by the nervous system. This multiplies the inflammation already started by macrophages. All this adds up to people who, if maltreated in childhood, will have more of a struggle to stay healthy as adults.

Musings

Child Upbringing: Character Change

For much of western history, childhood has been traumatic.

How did this affect the character of the western peoples?

After his experience with the Pirahãs of the Amazon jungle, missionary Daniel Everett realized that most westerners are 'maladjusted' (see [Oct 2011](#)).

With the move, since the 1960s, towards an indulgent upbringing in our industrial societies, I wonder how that might have changed the character of our peoples.

Presumably they are 'better adjusted' – all the better to cope with the Procrustean Bed that modern life forces us to lie on! (See '*Nature's Misfit with Modern World*', [Dec 2010](#)).

Unintended Consequences

Antibiotic-caused Diseases



Irritable Bowel increases with the number of antibiotic courses.

The average child in the United States and other developed countries has received 10–20 courses of antibiotics by the time he or she is 18 years old.

The assumption that antibiotics are generally safe has fostered overuse and led to an increase in bacterial resistance.

Other, equally serious, long-term consequences of our love of antibiotics have received far less attention.

Antibiotics kill the bacteria we do want, as well as those we don't. Early evidence hints that sometimes our friendly flora never fully recover.

These long-term changes to the beneficial bacteria within people's bodies increase our susceptibility to infections and disease.

Overuse of antibiotics could be fuelling the dramatic increase in conditions such as obesity, type 1 diabetes, inflammatory bowel disease, allergies and asthma,

which have more than doubled in many populations [8].

See: [Diverse Gut Flora Nix Allergies](#), page 1

Briefings

What are AGEs? Part II

I undertook [last month](#) to explain what Advanced Glycation End-products (AGEs) overload does...

AGE overload is a factor in diabetes (type II and gestational) atherosclerosis, asthma, arthritis, heart attack, kidney failure, retina damage, periodontitis and neuropathy (nerve damage).

What is to be done?

First, let's understand that **SOME** level of AGE activity is **NORMAL**. Just like other toxic by-products of simply being alive, the body has ways of dealing with them.

After all, for eons our forbears roasted nuts, tubers and animal parts in the embers of the camp fire. They even had a little sugar intake (of honey).

Apart from excreting AGEs in the urine, the body makes use of micronutrients to quench AGEs. Resveratrol (found in red wine and grapes) is only one of many.

Our View? Follow the Bond Precepts and AGEs will be under control. When cooking, prefer steaming and boiling. Microwaving in the presence of water is OK too. This article updates and complements '*Cooking Inflames Arteries*', [Feb 2003](#).

Second-guessing Fats

In previous Briefings I have tried to bring some clarity to the incredibly mixed messages that are pushed at us. Even so they continue to come thick and fast and readers write to me every month with yet more queries.

At the end of this article I will give a rule of thumb. I have no illusion that it will stop the queries, if only because the siren songs out there continue to sow doubt!

For example, coconut oil is classed as 'saturated' which should make it resistant to heat – and many health mavens proclaim it so.

Yet the truth is very different when this is measured. When heated, coconut oil actually produces higher levels of oxidized

fat (which is bad) than heated rapeseed oil [9]. Moreover, its lauric acid is artery-harmful [*Coconut Oil Mania*, [Oct 2011](#)]

In fact the issues are even more complex than that. The levels of bad substances produced by heat depend on a range of factors: heat levels, exposure to oxygen, method of heating.

Where harmful oxidation is concerned, shallow frying (which only partially submerges the food) is worse than sautéing which is worse than deep frying [9]. The researchers opine that this reflects the amount of exposure to air.

The bad substances are hydroperoxides. But worse are their metabolites, "alkenals", which some oils produce more than others. But it only gets bad if you exceed the body's ability to get rid of them.

Other factors include how the oil is manufactured, its antioxidant content, and many more [10].

By the way, never-heated fish oil capsules actually contain higher concentrations of these bad substances than any of the heated vegetable oils [11]. But then one doesn't consume much in the way of capsules either.

Another source of confusion is the shorthand we use to label fats and oils as 'saturated', 'poly-unsaturated', or 'mono-unsaturated'.

In reality, fats and oils are a *cocktail* of all three in various proportions. And it depends what position on the triglyceride molecule as to the effect they have [*Palm Oil: Friend or Foe?*, [Oct 2011](#)]

Can you micromanage all this? Of course not! You have to cling to the mast like Odysseus and sail on past the siren songs, so:

1. If the fat is solid at room temperature avoid it.
2. Olive oil is good cold and for the sort of heating/sautéing we do.
3. Rapeseed (best if cold pressed, and perhaps organic) is the best cold oil. Not good to heat.

Mind-Body Connection

Acupuncture not without Harm

High-quality trials show that acupuncture is no better than sham

acupuncture (where no needles penetrate the skin) for treating chronic low back pain.



Any effects are attributed to such factors as therapist plausibility and patient credulousness.

If normal acupuncture does some good, then what is the harm? Answer: complications – which include penetration of the thorax, and bacterial and viral infections. Five patients died after their treatment [12].

Acupuncture is no better than sham either for: hot flushes [13], fibromyalgia [14], headaches [15].

Our View? Many people do find comfort in acupuncture but this is due to the 'placebo effect'. If it works then better use sham acupuncture which does no harm.

A wider question is why placebos work at all – or worse, the 'nocebo effect' which gives a harmful reaction instead of a positive one.

That is a question for a later date!

Continued from Page 1

Hadza Hunter Gatherers

...If someone tries to boss them around, they just move away or even move to another camp.

There are only a few hundred Hadza in total so they seem to regard themselves as one big extended family rather than (as with other foragers) a collection of rival bands maintaining bitter-sweet relations with each other.

It is refreshing to find that Marlowe is not infected with the starry-eyed ideals of the 'noble savage' or the grotesque aberrations of the Standard Social Science Model (SSSM) promoted by (notably) Margaret Mead and Steven J. Gould. (For a fine debunking of the SSSM see Steven Pinker's *The Blank Slate* [16].)

So it is that Marlowe drily reports on the men always on the lookout to have extra-marital affairs; on stepfathers, in spite of their protestations to the contrary, giving preference to their biological offspring; on males being fiercely sexually jealous (leading sometimes to murder); on gender roles being specific – men hunt (and do it alone), women forage (and do it in parties of average size 5).

[Next Month](#): part II

Continued from Page 1

Low Vitamin D, Early Menarche

... (see *Deadly Harvest*, [Ch 8](#), p 210, and Marlowe's Hadza, page 1 [1]). Perhaps it is no coincidence that foragers make massive amounts of vitamin D by living stark naked under a tropical sun.

Why might early menarche matter? Amongst other things, the more a woman experiences menstrual cycles over a lifetime, the more likely she is to develop breast cancer. As Marlowe points out, ([next month](#)) Hadza women on average only menstruate 100 times in a lifetime compared to 400 times for a western woman.

Media Update

Natural Eating Kindle (German)

Geoff's first book, much expanded and revised, is now available in German on Kindle:

<http://amzn.to/NE-kindle-Deutsch>

Radio Interview

Geoff's radio interview with Rosie Charalambous now posted:

<http://bit.ly/Bond-audio>

Body Language Article

Geoff's article *Dietary Devolution*, now posted:

<http://bit.ly/Bond-BL-article>

Body Conference Interview, UK

Geoff's video is now posted: <http://bit.ly/Bond-BL-Video>

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- 1 The Hadza: Hunter-Gatherers of Tanzania, Marlowe, F. UC Press; 2010. ISBN 978-052025342.
- 2 Lee & DeVore (eds.). Kalahari Hunter-Gatherers: Studies of the !Kung San and Their Neighbors. Cambridge, MA: Harvard University Press, 1976.
- 3 A. D. Blatt, et al. Hidden vegetables: an effective strategy to reduce energy intake and increase vegetable intake in adults. *Am J Clin Nutr*, 2011; 93 (4): 756
- 4 Thomas R. et al. Low diversity of the gut microbiota in infants with atopic eczema. *J. Allergy and Clinical Immunology*, 2011
- 5 A. Baylin et al. Vitamin D deficiency and age at menarche: a prospective study. *Am J Clin Nutr*, 2011
- 6 Clarke JD et al. Comparison of Isothiocyanate Metabolite Levels and Histone Deacetylase Activity in Human Subjects Consuming Broccoli Sprouts or

Broccoli Supplement. *J. Agric. Food Chem.*, 2011, 59 (20), pp 10955–10963

- 7 Psychological stress in childhood and susceptibility to the chronic diseases of aging: Miller G et al. *Psychological Bulletin*, Vol 137(6), Nov 2011, 959-997.
- 8 Martin Blaser. Antibiotic overuse: Stop the killing of beneficial bacteria. *Nature*, 2011; 476 (7361): 393
- 9 Fatty acid oxidation and other biochemical changes induced by cooking in commonly used Indian fats and oils; Priyanka Rastogi, et al; *Nutrition & Food Science* Volume: 36 Issue: 6 2006
- 10 *J Am Oil Chem Soc* (2009) 86:301–307; Chemical Properties of Virgin Coconut Oil; A. M. Marina et al.
- 11 *Food Nutr Res*. 2011;55; Determination of lipid oxidation products in vegetable oils and marine omega-3 supplements; Halvorsen BL et al.

- 12 E. Ernst, et al. Acupuncture: Does it alleviate pain and are there serious risks? A review of reviews. *Pain*, 2011; 152 (4)
- Harriet Hall. Acupuncture's claims punctured: Not proven effective for pain, not harmless. *Pain*, 2011; 152 (4)
- 13 Lee et al. Acupuncture for treating menopausal hot flushes: a systematic review. *Climacteric*, 2009; 12 (1): 16
- 14 *Ann Intern Med*. 2005 Jul 5;143(1):10-9. A randomized clinical trial of acupuncture compared with sham acupuncture in fibromyalgia. Assefi NP et al
- 15 Linde K, et al. Acupuncture for tension-type headache. *Cochrane Database of Systematic Reviews*, Issue 1. Art. No.: CD007587
- Linde K, et al. Acupuncture for migraine prophylaxis. *Cochrane Database of Systematic Reviews*, 2009, Issue 1. Art. No.: CD001218
- 16 Penguin (2003) ISBN: 978-0142003343