

# HAIR ELEMENTS



**PATIENT:** Number 538  
**SEX:** Female  
**AGE:** 41

## POTENTIALLY TOXIC ELEMENTS

TOXIC ELEMENTS	RESULT µg/g	REFERENCE RANGE	PERCENTILE	
			68 <sup>th</sup>	95 <sup>th</sup>
Aluminum	1.6	< 7.0		
Antimony	< 0.01	< 0.050		
Arsenic	0.030	< 0.060		
Barium	3.2	< 2.0		
Beryllium	< 0.01	< 0.020		
Bismuth	0.034	< 2.0		
Cadmium	0.050	< 0.050		
Lead	0.73	< 0.60		
Mercury	0.80	< 0.80		
Platinum	< 0.003	< 0.005		
Thallium	< 0.001	< 0.002		
Thorium	0.001	< 0.002		
Uranium	0.013	< 0.060		
Nickel	0.14	< 0.30		
Silver	0.75	< 0.15		
Tin	0.10	< 0.30		
Titanium	0.13	< 0.70		
Total Toxic Representation				

## ESSENTIAL AND OTHER ELEMENTS

ELEMENTS	RESULT µg/g	REFERENCE RANGE	PERCENTILE				
			2.5 <sup>th</sup>	16 <sup>th</sup>	50 <sup>th</sup>	84 <sup>th</sup>	97.5 <sup>th</sup>
Calcium	3410	300- 1200					
Magnesium	250	35- 120					
Sodium	55	20- 250					
Potassium	12	8- 75					
Copper	33	11- 37					
Zinc	520	140- 220					
Manganese	0.12	0.08- 0.60					
Chromium	0.32	0.40- 0.65					
Vanadium	0.070	0.018- 0.065					
Molybdenum	0.039	0.020- 0.050					
Boron	0.45	0.25- 1.5					
Iodine	1.1	0.25- 1.8					
Lithium	< 0.004	0.007- 0.020					
Phosphorus	154	150- 220					
Selenium	0.84	0.55- 1.1					
Strontium	5.3	0.50- 7.6					
Sulfur	43800	44000- 50000					
Cobalt	0.012	0.005- 0.040					
Iron	13	7.0- 16					
Germanium	0.029	0.030- 0.040					
Rubidium	0.014	0.007- 0.096					
Zirconium	0.086	0.020- 0.42					

### SPECIMEN DATA

**COMMENTS:**  
 Date Collected: 7/5/2011      Sample Size: 0.199 g  
 Date Received: 7/11/2011      Sample Type: Head  
 Date Completed: 7/17/2011      Hair Color:  
 Client Reference:      Treatment:  
 Methodology: ICP-MS      Shampoo:

### RATIOS

ELEMENTS	RATIOS	EXPECTED RANGE
Ca/Mg	13.6	4- 30
Ca/P	22.1	1- 12
Na/K	4.58	0.5- 10
Zn/Cu	15.8	4- 20
Zn/Cd	> 999	> 800

V010.08

To whomever is reading this:

Thank you for taking the time to look at my chart and read my answers to the questions below. Your input is most welcome.

## **1. What are your current symptoms and health history?**

### **Health history**

I never had any health problems until Sept. 2001 (age 30). Shortly after using Vigamox (moxifloxacin - belongs to the fluoroquinolone class of antibiotics) I started retaining water and having severe menses and everything went downhill from there. Never weighed more than 108 lbs., I suddenly weighed 140 lbs! Not long after this I started having problems with my teeth, even though I had excellent oral health. I started losing them one after another.

My symptoms (listed below) got steadily worse until I was finally able to see a doctor in 2005, at which time I was diagnosed with acquired iron overload, phlebitis, and limited kidney and liver function with possible cirrhosis. I was instructed to see a liver specialist but I didn't have the money and there's no way I would let them biopsy if I did go, so I never saw one.

A person I met knowledgeable in nutrition put me on IP6 (high dose), SAME (high dose), milk thistle (ate them all day long like they were candy), NAC, vit C, along with other supps. Within a year or less, my liver pain stopped, ankle and foot swelling went away completely (even left foot!), weight dropped - everything went back to normal.

Out of range serum results then (DDI lab):

Serum iron: 253 mcg/dL  
Serum iron saturation: 84%  
Ferritin: not measured

BUN: 7.0 mg/dL  
ALT: 13 mu/mL  
Mg: 1.58 mg/dL  
Ca/P index: 44.1

I did not have a hair test performed back then.

Symptoms then were:

Menstrual: menorrhagia, extremely severe migraines, malaise.

Almost constant pain in liver.

Weight gain/distended abdomen.

Severe water retention (felt "puffy" all over) - sitting on the floor w/legs crossed in front of computer for a length of time left an indentation about one inch deep above my ankle, persisted for about a half an hour before going away.

Fatigue.

Extreme muscle weakness - muscles burn due to slightest effort, such as when brushing teeth or hair, etc.

Foggy thinking - forgetfulness, inability to do calculations, think of the word I want to say, or spell correctly (I've always been naturally good at spelling).

Decreased libido.

Both ankles and feet swollen. After awhile my lower left leg (from below knee to tips of toes) was swollen to about 1.5 times the size of my right. Skin smooth, shiny. Foot looked like it was going to explode, was red, purple, almost black in areas.

Mild scalp hair loss.

Night sweats.

Inability to sweat. Instead, upon exertion I would overheat, get flush (beet red) and would feel little pins all over my body.

Extreme sensitivity to cold, especially my swollen left leg/foot.

Chemical sensitivity.

Prominent, dark bands across toenails and fingernails, where pink meets white.

I've read that fluoroquinolones can cause endocrine alterations, affecting cortisol, thyroid hormones and others. I wonder if there is any interaction with mercury?

### **Current situation:**

I never thought of the possibility that my use of Vigamox was related to my health problems until I had to use it again at the beginning of this year - 10 years after my only other use of it. Again, within a week of its use I had gained enough weight (water retention?) that I couldn't come close to fitting into the slacks that I comfortably wore to the eye doctor exactly a week before when I received the prescription. (My alternative medicine doctor who ordered my recent hair and serum tests told me it was not possible, but I feel the timing - both 10 years ago and now - is too close to be coincidence.)

Right around the same time, a molar that I had a temporary filling in (was placed after the tooth split and a dentist removed the nerve, leaving the tooth so my bone did not recede) split further and the filling fell out along with a chunk of my tooth. This left a gaping hole in what remained of the tooth, a hole that was visibly lined with metal, all the way around. Upon close inspection the metal was bright and shiny in some areas, and dark in others. Another chunk broke off the tooth, exposing even more metal, and it stayed like this until I was finally able to have it extracted a couple of months ago. Leading up to this, my symptoms got steadily worse to what they are today. They are very close to being identical to those experienced five years ago:

Menstrual: menorrhagia, severe migraines, malaise.

Intermittent pain in liver.

Unexplained and very rapid weight gain (water retention?) in abdomen (I look like I'm pregnant but I'm not), hips, thighs.

Feel "puffy" all over.

Fatigue all day, gets worse as day progresses, some days much worse than others.

Extreme muscle weakness - muscles burn due to slightest effort, such as when brushing teeth or hair, etc.

Foggy thinking, forgetfulness, inability to do calculations or think of the word I want to say.

Low libido.

Intermittent ankle/foot swelling (left again worse than right, but nowhere near as bad as before).

Mild scalp hair loss.

Hot flashes.

Sugar cravings.

Prominent, dark bands across toenails, where pink meets white. To a lesser-degree on fingernails.

**2. Dental history (Wisdom teeth removed and when? Any other extractions. First root canal placed? Braces? First amalgam etc.)**

Braces around 1982 or '83.

First amalgam around 1983 or '84 - ended up with eight amalgams total.

Wisdom teeth removed in the early 90's (three).

Started Having problems with my teeth at the beginning of 2002, not long after my health problems began. At this time, two different dentists told me all my fillings (amalgam) were leaking (I guess this meant separating from the tooth?) and that they had to be replaced or I would eventually lose all those teeth. I have lost three molars since then.

**3. What dental work do you currently have in place? What part of the dental clean-up have you completed?**

Had all my amalgams replaced (there were five of them left) with white fillings about 1 year ago. The dentist did not take any of the special precautions when removing them that I have since read about - none whatsoever beyond the usual - and the fillings were all replaced in the same visit. I did not have the dentist do anything for the molar with the temporary filling because I still did not have the money for an implant.

**4. What dentistry did your mother have at any time before or during pregnancy?**

Does not remember having any dentistry work performed while pregnant. She had braces in high school and amalgam fillings done during both junior high and high school.

**5. What vaccinations have you had and when (including flu and especially travel shots)?**

I had all the usual vaccinations that a small child received in the early seventies - polio, DPT, measles. Never any travel shots or flu shots.

**6. Supplements and medications (including dosages) taken at time of hair test, or for the 3-6 months before the sample was taken?**

Synergy multivitamins (too many ingredients to list).

Synergy green foods powder.

Synergy Klamath algae.

NAC.

Milk thistle.

Fish oil.

Vitamin D3.

Transdermal magnesium.

Nascent iodine.

Diet of predominantly fruits, vegetables, eggs, nuts, seeds, with meat now and then and only cheese for dairy. All of these being organic, grass-fed, pasture-raised.

Drinking water passed through two different filtration systems, one of them includes a fluoride filter.

All personal care items along with household cleansers are organic and/or 100% natural,

purchased at the health food store.

**7. What is your age, height and weight?**

Just turned 42 years old on 5 Oct, 5'3", 140 lbs. I am usually a thin person, except for both times my health became problematic. At these times my weight went up to 140-142 lbs.

**8. Other information you feel may be relevant?**

My current doctor diagnosed estrogen dominance, hypothyroidism, secondary hyperparathyroidism, low calcium and low mag, and wanted to put me on pig hormones for the rest of my life. He diagnosed these things from a blood panel (all of which was in range) and the hair test you see above.

I tried to tell him about my amalgams and that I've had all these symptoms before and they went away, so I don't feel thyroid hormones treatment is in order. I also tried to tell him that my serum vitamin D level was 118 ng/mL when I last had it checked, so I couldn't understand how I could have secondary hyperparathyroidism (usually synonymous with vitamin D deficiency, vit D is given as treatment for this condition) or how I could have low calcium. I also tried to tell him about my use of transdermal magnesium everyday - from head to toe - and asked where the magnesium was going. He wasn't interested in any of these things and was offended at my questioning his diagnosis/treatment recommendations.

Before I resign myself to having to take the hormones of a swine, I need to know that that is definitely the correct diagnosis. I don't feel thyroid function is the root of the problem and that it will return to normal when I fix the actual root of the problem, whatever that may be. I'm wondering if it is mercury.

**9. What is your location - city & country (so that we can learn where certain toxins are more prevalent).**

San Dimas, CA, USA.