

# Toxic & Essential Elements; Hair

| TOXIC METALS               |         |                |                       |                                                 |
|----------------------------|---------|----------------|-----------------------|-------------------------------------------------|
|                            |         | RESULT<br>µg/g | REFERENCE<br>INTERVAL | PERCENTILE<br>68 <sup>th</sup> 95 <sup>th</sup> |
| Aluminum (Al)              | 3.3     | < 7.0          |                       |                                                 |
| Antimony (Sb)              | 0.017   | < 0.066        |                       |                                                 |
| Arsenic (As)               | 0.031   | < 0.080        |                       |                                                 |
| Barium (Ba)                | 0.24    | < 1.0          |                       |                                                 |
| Beryllium (Be)             | < 0.01  | < 0.020        |                       |                                                 |
| Bismuth (Bi)               | 0.023   | < 2.0          |                       |                                                 |
| Cadmium (Cd)               | 0.009   | < 0.065        |                       |                                                 |
| Lead (Pb)                  | 0.69    | < 0.80         |                       |                                                 |
| Mercury (Hg)               | 0.51    | < 0.80         |                       |                                                 |
| Platinum (Pt)              | < 0.003 | < 0.005        |                       |                                                 |
| Thallium (Tl)              | < 0.001 | < 0.002        |                       |                                                 |
| Thorium (Th)               | < 0.001 | < 0.002        |                       |                                                 |
| Uranium (U)                | 0.009   | < 0.060        |                       |                                                 |
| Nickel (Ni)                | 0.11    | < 0.20         |                       |                                                 |
| Silver (Ag)                | 0.03    | < 0.08         |                       |                                                 |
| Tin (Sn)                   | 0.07    | < 0.30         |                       |                                                 |
| Titanium (Ti)              | 0.32    | < 0.60         |                       |                                                 |
| Total Toxic Representation |         |                |                       |                                                 |

| ESSENTIAL AND OTHER ELEMENTS |         |                |                       |                                                                                                       |
|------------------------------|---------|----------------|-----------------------|-------------------------------------------------------------------------------------------------------|
|                              |         | RESULT<br>µg/g | REFERENCE<br>INTERVAL | PERCENTILE<br>2.5 <sup>th</sup> 16 <sup>th</sup> 50 <sup>th</sup> 84 <sup>th</sup> 97.5 <sup>th</sup> |
| Calcium (Ca)                 | 406     | 200- 750       |                       |                                                                                                       |
| Magnesium (Mg)               | 35      | 25- 75         |                       |                                                                                                       |
| Sodium (Na)                  | 50      | 20- 180        |                       |                                                                                                       |
| Potassium (K)                | 42      | 9- 80          |                       |                                                                                                       |
| Copper (Cu)                  | 15      | 11- 30         |                       |                                                                                                       |
| Zinc (Zn)                    | 220     | 130- 200       |                       |                                                                                                       |
| Manganese (Mn)               | 0.10    | 0.08- 0.50     |                       |                                                                                                       |
| Chromium (Cr)                | 0.42    | 0.40- 0.70     |                       |                                                                                                       |
| Vanadium (V)                 | 0.035   | 0.018- 0.065   |                       |                                                                                                       |
| Molybdenum (Mo)              | 0.032   | 0.025- 0.060   |                       |                                                                                                       |
| Boron (B)                    | 1.5     | 0.40- 3.0      |                       |                                                                                                       |
| Iodine (I)                   | 6.3     | 0.25- 1.8      |                       |                                                                                                       |
| Lithium (Li)                 | < 0.004 | 0.007- 0.020   |                       |                                                                                                       |
| Phosphorus (P)               | 198     | 150- 220       |                       |                                                                                                       |
| Selenium (Se)                | 0.84    | 0.70- 1.2      |                       |                                                                                                       |
| Strontium (Sr)               | 0.45    | 0.30- 3.5      |                       |                                                                                                       |
| Sulfur (S)                   | 49500   | 44000- 50000   |                       |                                                                                                       |
| Cobalt (Co)                  | 0.008   | 0.004- 0.020   |                       |                                                                                                       |
| Iron (Fe)                    | 6.6     | 7.0- 16        |                       |                                                                                                       |
| Germanium (Ge)               | 0.031   | 0.030- 0.040   |                       |                                                                                                       |
| Rubidium (Rb)                | 0.053   | 0.011- 0.12    |                       |                                                                                                       |
| Zirconium (Zr)               | 0.15    | 0.020- 0.44    |                       |                                                                                                       |

| COMMENTS:                                                                                                                                                                                      | RATIOS   |        |          |
|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|----------|--------|----------|
|                                                                                                                                                                                                | ELEMENTS | RATIOS | RANGE    |
| Date Collected: 5/29/2012<br>Date Received: 6/1/2012<br>Date Completed: 6/12/2012<br>Methodology: ICP/MS<br>Sample Size: 0.205 g<br>Sample Type: Head<br>Hair Color:<br>Treatment:<br>Shampoo: | Ca/Mg    | 11.6   | 4- 30    |
|                                                                                                                                                                                                | Ca/P     | 2.05   | 0.8- 8   |
|                                                                                                                                                                                                | Na/K     | 1.19   | 0.5- 1.0 |
|                                                                                                                                                                                                | Zn/Cu    | 14.7   | 4- 20    |
|                                                                                                                                                                                                | Zn/Cd    | > 999  | > 800    |

### **Health history for hair test 627**

Current symptoms include severe digestive issues, hormone insufficiency, total insomnia, chronic fatigue, anxiety and depression. Thyroid seem to really pulse and become very dry resulting in difficulty swallowing

Dental work includes removal of all wisdom teeth 20 years ago, removal of 3 normal back teeth, 4 root canals done, last one 4 years ago. Mother had alot of dental work done but dont know exactly what.

Supplements taken during test were Vit c, Vit B complex, Forskolin, Vit D, and Zinc and Magnesium.

Vaccinations, usual Tetinus, MMR, etc . No Flu shots.

Didnt experience any of these symptoms until 5 months ago when I started taking One World Whey ( seemed to really raise glutathione, then had an experience where it fought something in head bursting through. Sensation then went to top of head and down to top of spine. Also travelled to behind left eye. Pulsing sensation had been on left hand side of head.

Tried Indian herb shilajit to get rid of symptoms ( brain fog ) Only worsened it and then cilantro where everything came crashing down, affecting brain and hormone system.

No amalgams have been removed yet ( 13 in all and 4 root canals )

First amalgam placed at 8, I am 5 foot 9 and 178 pounds.

42 years old.

Philadelphia