

Symptoms of Mercury Toxicity

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Amalgam was developed over 180 years ago and has never been exposed to any meaningful safety testing. It is a mixture of 50% liquid mercury and 50% powdered metals and because mercury is liquid, the amalgamation of it simply creates in fact, a stiff paste of metals in a liquid mercury base. That mercury DOES release vapors, as measured every time a person touches an amalgam with a toothbrush or chews. There truly is NO SAFE LEVEL of mercury. Mercury disrupts the biological functions of the body on several different levels, which means it can cause a myriad of disturbances, imbalances, illnesses, and symptoms in your body.

Dental amalgams are 50% mercury. The mercury contained in the amalgam leaches out as a vapor into your body. If you have amalgams, it's for the lifetime of the amalgam in your body, every single time you chew. It's worse if you eat or drink anything hot because mercury vaporizes easily at body temperature, but it does it faster when exposed to heat. If you have no amalgams in your mouth but get occupational exposure from removing amalgams without adequate PPE, then you are getting far more exposure than when you are simply chewing. Mercury is a highly toxic heavy metal and the mental, physical and emotional effects of mercury on the body have been well documented and known for centuries.

Although you are exposed to mercury through many sources including environmental exposure, eating fish etc, the majority of mercury exposure comes from dental amalgams. The argument has been over ethyl mercury vs methyl mercury, and whether it's absorbable or not. And truthfully, you don't have to wonder, because YOU CAN TEST. So don't let anyone tell you that "it's perfectly safe".

MEASURED MATTERS. If you can measure it, then why just TRUST that you are fine. If you are, GREAT! If you are not, then you will finally know. So go get yourself properly tested!

A word about those who are "hoarders". There are people whose bodies hold on to mercury like white holds on to rice. Those people will test at negligible amounts of mercury in their bodies with conventional testing. But if they are exhibiting MANY of the health symptoms listed below, an EDTA mercury challenge test may make them feel sicker. The EDTA challenge test is considered to be the "gold standard" of mercury levels testing. But for some people, it's just too much. I would encourage anyone to work with their functional medicine doctor who is experienced in mercury toxicity before just taking this kind of test into their own hands. **Work with someone who is EXPERIENCED in heavy metals toxicity.** Your regular MD literally will have NO IDEA how to do this, and conventional medical doctors only catch problems with heavy metals poisoning if it is extreme AND ongoing. They literally have NO idea how to properly test anyone. At my sickest, I had over 60 symptoms of mercury toxicity. **Everything listed on the following pages in PINK was one of my symptoms.** And yet, when I was tested by conventional methods, they found virtually nothing, because I am a hoarder. So, my functional medicine doctor used different methods to figure it out for me.

The following list provides the most recognized symptoms of mercury toxicity. For ease, I have broken them down into regions of the body. This list is extensive but not exhaustive and just because you have or may have some of these symptoms it is not a diagnosis for mercury toxicity. Remember, **MEASURED MATTERS.** So, the more issues you have, the better it is to consider getting tested.

Self-Assessment: How many of these symptoms do YOU have? If you are a dentist, dental hygienist or dental assistant, or even if you work or have worked in a dental office EVER, then it's important to assess how well your body is responding to the years of dental school and dental practice life, particularly if your dental school and subsequent dental career did not in any way protect you from breathing in the mercury vapors when placing or removing amalgams. If you are a cancer warrior, it's VITAL to figure out where your toxic burdens are coming from, and then eliminate them. However, it's ALSO VITAL to be READY!!! Removing amalgams before your body is ready to is NOT A GOOD IDEA!!! It's important to work with a good functional medicine doc to prepare your body for the removal. There is no right or wrong answer here. But the more of the symptoms on this list that you have or have had in the years since you started dental school, the more likely it is that you may have mercury toxicity. MEASURED MATTERS. IT IS IMPORTANT TO BE TESTED!

Respiratory System - Up to 80% of inhaled mercury vapor is absorbed through the lungs. From here it travels to all the other tissues and organs of the body in the circulation but particularly concentrates within the kidney, liver, and brain.

- Asthma
- Bronchitis
- Breathlessness
- A persistent cough
- Bad breath

Brain Function - Mercury binds tightly to nerves and fats, so it is readily absorbed into the brain and nerve endings that regulate all the functions of the body. It prevents nerves regenerating and disrupts nerve function. Mercury from amalgam crosses the blood-brain barrier and can damage any part of the central nervous system including the master endocrine glands at the base of the brain which control both the nervous and hormone systems. Mercury can produce a host of mental, emotional, and behavioral changes and what are considered 'psychiatric' disorders by disrupting neurotransmitters, interfering with endocrine gland function and hormones and causing the destruction of nervous pathways.

- Poor memory
- Difficulty multitasking
- Difficulty finding words
- A lack of initiative
- An inability to concentrate
- Brain fog
- An inability to make decisions
- Lack of motivation
- Changes in mood
 - Fears
 - Anxieties
 - Irritability
 - Fits of anger
 - Panic attacks
 - Mood swings
 - Loss of self-confidence
 - Withdrawal
 - Being easily embarrassed
 - Feeling overwhelmed
 - Feeling easily discouraged
 - A loss of sense of humor
 - Life seems an endless, joyless struggle
 - Psychiatric' symptoms
 - Hallucinations
 - Depression
 - A persistent death wish
 - Suicide attempts
 - Obsessive-Compulsive Disorders
 - Manic-Depressive Disorder
 - Panic disorders
 - Schizophrenia spectrum disorders
 - Peripheral nervous system symptoms
 - The profound disruption of nerve structure and function leads to difficulty with motor nerve function including:
 - Difficulty articulating words
 - Numbness and tingling
 - Clumsiness
 - Difficulty doing fine tasks such as typing or adding numbers on a calculator
 - Tremors
 - Ticks and twitches (especially of the face and eyes)
 - A loss of coordination and
 - Restless legs

Reproductive and Sexual Function - Mercury collects in the reproductive organs where it can cause a variety of disorders including infertility. It is known to directly cross the placental barrier in pregnant women and to concentrate in breast milk and mercury levels in newborn babies have been shown to be directly related to the number of amalgam fillings in the mother's mouth.

- A low or non-existent libido
- Precocious or late puberty
- Infertility
- In women
 - Heavy, missed or irregular periods
 - Severe period pains
 - Pre-menstrual tension (PMT)
 - Miscarriages
 - Stillbirths
- In men
 - Impotence
 - Premature ejaculation
 - Low sperm count,
 - defective sperm and sperm with poor motility

The Urinary System - Mercury from dental amalgam fillings is also recognized to severely impact kidney function such that animal studies have shown a 50% reduction within a month of placement of the first amalgam filling.

- Kidney damage
- Frequent urination
- Frequent nocturnal urination (2-3 times a night or more)
- Incontinence (especially in women)
- Difficulty urinating (especially in men)
- An urgent need to urinate
- A variety of kidney and bladder diseases.

The Musculoskeletal System

- Tender, sore muscles
- Rapid muscle fatigue
- Joint pain
- Joint swelling
- Joint stiffness
- Muscle cramps
- Low-back pain
- Muscle weakness

The Cardiovascular System and Heart - Mercury collects in the heart muscle and valves and has been found at 22,000 times the levels found in the blood. Mercury is strongly associated with elevated levels of homocysteine and cholesterol and heart attacks. It also causes red blood cells to rupture and replaces the iron in hemoglobin so that the oxygen carrying capacity of the blood can be reduced by half. Mercury also causes a weakening in the walls of the small blood vessels leading to the reduced blood supply to the organs and tissues.

- Heart palpitations
- An irregular heartbeat
- Angina or chest pain
- A racing heartbeat
- Either an abnormally slow or rapid heart rate
- Low or high blood pressure
- Frequently feeling faint
- Elevated blood cholesterol and homocysteine levels and
- Easy bleeding and bruising.

The Endocrine Hormone System - Mercury disrupts hormone production and release from the endocrine glands and blocks the receptors which allow the hormones to send messages to cells and organs. The endocrine system has a high requirement for specific trace minerals and accumulation of mercury within the glands may occur because of the chemical similarity to the essential mineral, zinc.

- Low and poorly controlled blood sugar respectively
- Hypothyroidism – under-active thyroid gland
- Hypoadrenalism – under-functioning adrenal glands
- Constant fatigue -adrenal and thyroid gland exhaustion
- A poor physiological response to stress.

The Oral Cavity / Mouth

- Bleeding gums
- Periodontal disease
- Mouth ulcers
- A metallic taste
- Excessive salivation
- A loss of the sense of taste
- A burning, red, inflamed mouth
- Bald' patches on the tongue or cheeks (includes geographic tongue)
- Dark spots on gums ('amalgam tattoos')

The Ears: Hearing and Balance

- Dizziness
- Vertigo
- Poor balance
- Tinnitus (ringing or whining noises in the ears)
- Pain in the ear canals
- Poor hearing and deafness
- Difficulty interpreting what you hear.

Skin, Hair and Nails

- Cold, clammy skin
- Dry skin
- Peeling or flaking skin on the hands, feet and face
- A puffy face
- Red, flaky skin around the eyes
- Thick, red skin on hands & feet
- Pricking, stabbing, fizzing or crawling sensations in the skin
- Very itchy rashes
- Eczema and psoriasis.
- Excessive perspiration
- An inability to sweat
- Night Sweats.
- The quality of the hair and nails is also adversely affected causing:
 - Loss of underarm, pubic, body or head hair
 - Greying of hair
 - Dry, thin, wiry, dull hair
 - Weak, flaky nails that split and tear easily.

The Nose and Sinuses

- Chronic sinusitis
- Poor sense of smell
- Chronic or recurrent rhinitis
- Nasal congestion
- A persistently sore throat
- Chronic tonsillitis.

Eyesight

- Intermittent visual blurring
- Deteriorating peripheral vision or 'tunnel' vision
- Bulging eyes
- Sensitivity to light
- Difficulty focusing
- Poor color vision
- Poor night vision
- Difficulty moving the eyes.

The Digestive System - Mercury also collects in very high concentrations in the jaw bones and the soft tissues of the mouth. Mixing gold and amalgam restorations in the mouth increases the amount of mercury vapor given off several folds and placing gold crowns over amalgam cores particularly drives mercury into the surrounding bone. Much of the mercury vapor from dental amalgams is swallowed along with foods or in the saliva and the digestive system is usually one of the first areas of the body to be affected. Mercury binds with and blocks the actions of digestive enzymes leading to poor digestion and the development of food intolerances. It also alters the normal gut bacteria, favoring the overgrowth of yeasts (most commonly *Candida albicans*) and suppressing the growth of 'friendly' bacteria which can lead to the development of intestinal permeability or a so-called 'leaky gut'.

- The development of food sensitivities and intolerances
- Abdominal cramps and pain
- Constipation and/or diarrhea
- Irritable bowel syndrome
- Malabsorption
- Leaky Gut
- Gastroenteritis
- Nausea
- Heartburn.

The Immune System - The immune system is one of the first casualties of mercury toxicity. It causes a reduction in the number of natural killer (NK) cells which are responsible for policing tumours and viruses leading to the development of chronic viral infections and cancer.

- Chronic, recurrent or frequent infections.
- Chronic or recurrent yeast infections. Mercury actively promotes the overgrowth of yeasts such as *Candida albicans* causing thrush, 'jock' itch and athlete's foot.
- The development of allergies and sensitivities. Mercury alters the ratios of T-helper cells to T-suppressor cells so that the immune response is turned on more readily but not terminated, leading the immune system to over-react to a wide variety of foods and chemicals.
- Autoimmune diseases. Mercury binds to proteins on the surface of the cells of the body leading the immune system to identify them as being foreign and initiating one of the 100 or more autoimmune diseases such as multiple sclerosis, scleroderma or Hashimoto thyroiditis.
- Various Cancers. The undermining of the immune response and in particular the disabling of the natural killer cells leads to the development of one of the most prevalent immune deficiency disease of all: cancer.
- The lymphatic system works to drain and filter excess fluid from the tissues and to initiate an immune response is required. The effects of mercury toxicity on the lymphatic system include:
 - Water retention (especially of the legs)
 - Swollen lymph nodes (especially in the neck).

General Symptoms of Mercury Toxicity - Last, but not least, mercury particularly accumulates in the mitochondria ('powerhouses') of the cells where it poisons energy production. The presence of mercury in the circulation and the effects on energy production lead to:

- Profound exhaustion and fatigue (chronic fatigue syndrome and fibromyalgia)
- Low body temperature
- Cold hands and feet
- Unexplained changes in weight
- Changes in appetite
- Excessive thirst
- Headaches and migraines
- Anemia – both iron deficiency and pernicious (B vitamin)
- Difficulty getting to sleep
- Early waking

Illnesses Linked With Mercury Toxicity

- Fibromyalgia
- Cancer
- Chronic fatigue syndrome (CFS)
- Rheumatoid arthritis (RA)
- Multiple sclerosis (MS)
- Parkinson's disease
- Alzheimer's disease
- Colitis
- Crohn's disease
- Autoimmune diseases
- Attention deficit hyperactivity disorder (ADHD)
- Autism

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