

# A FAMILY'S GUIDE TO THE LEAD CRISIS IN FLINT, MICHIGAN





## **Our Vision**

The Focus for Health Foundation is dedicated to ensuring that every individual has access to the information necessary to make optimal health decisions for themselves and their families.

## **Mission Statement**

The mission of the Focus for Health Foundation (FFH) is to promote advocacy, education, and research to combat the rise of chronic illness occurring around the world. We support efforts that increase public awareness of the connection between hazardous environmental exposures and the immune system, and address how social determinants of health and inequality within populations creates vulnerability to disease.

[focusforhealth.org](http://focusforhealth.org)



The Sean Michael Anderson Foundation is a 501(c)3 tax exempt Michigan nonprofit corporation organized on May 24, 2012 for charitable and educational purposes. The inspiration behind the foundation is derived from its name sake Sean Anderson, a recording artist raised in Detroit, and his unwavering commitment to improve the quality of life for children and families in his hometown.

[seanandersonfoundation.org](http://seanandersonfoundation.org)

# WHAT TO DO NOW:

## ADVICE FOR FLINT RESIDENTS FROM THE EPA

- ❗ **DO NOT** drink unfiltered water. It's not safe!
- ❗ **DO NOT** cook or brush teeth with unfiltered water
- ❗ **DO NOT** allow babies and children to drink bathwater
  
- ✅ **DO** use an NSF-certified water filter rated to remove lead
- ✅ **DO** run cold water throughout the house for 2 minutes every morning to flush pipes
- ✅ **EVERYONE CAN** wash hands, bathe, or shower with unfiltered water

The Environmental Protection Agency (EPA) and the Centers for Disease Control and Prevention (CDC) agree that there is **no known safe blood lead level in children.**

Until sufficient information is gained to determine when the water is safe to drink, EPA and CDC recommend that people only consume bottled or filtered water.

It is important to have an approved water filter installed in your home, however:

**Bottled water (not filtered tap water) is the safest choice for pregnant or breastfeeding women and children under 6 years of age.**

Have your water tested for free: Email [flintwater@cityofflint.com](mailto:flintwater@cityofflint.com) or call the Flint Water Plant: 810-787-6537

*Source Information: (<http://www.epa.gov>)*



## TESTING FOR LEAD: WHAT THE NUMBERS MEAN

Children, especially young children, may require multiple blood tests to check for lead. According to the CDC, there is no safe level of lead exposure. Any amount of lead in the blood could potentially cause harm.

LEAD LEVEL	DESCRIPTION
<b>Negative</b>	There is no lead in your blood.
<b>1-4</b>	<b>There are small amounts of lead in the blood.</b> Finding and eliminating the source of lead is the best thing to do if blood levels are between 1 and 4. Talk to your doctor about nutritional interventions and follow-up testing.
<b>5-10</b>	<b>There are greater than average levels of lead in your blood.</b> Finding and eliminating the source of lead is the first step. A healthy diet with vitamin C, iron, and calcium is more important than ever. Your doctor may want to repeat the blood test again in a couple of months to make sure that the levels are going down.
<b>10 or more</b>	<b>A lead level greater than 10 is high.</b> Eliminating the source of lead may not be enough in this situation. Have a serious conversation with a health provider about a diet high in vitamin C, iron, and calcium, and potential medications and/or interventions that may help remove lead from the blood.

# HOW DO I KNOW IF MY CHILD WAS EXPOSED TO LEAD?

Lead is a heavy metal that can accumulate in the body and cause health problems. Lead poisoning is caused by drinking, eating or inhaling lead that can be in water, food, toys or paint.

**If you think your child may have been exposed to lead, see your doctor as soon as possible.**

## THE MICHIGAN DEPARTMENT OF HEALTH AND HUMAN SERVICES RECOMMENDS BLOOD LEAD LEVEL TESTING FOR:

- ✓ **ANY CHILD** who has lived in Flint
- ✓ **ANY CHILD** who has received any type of childcare in Flint
- ✓ **ANY CHILD** who has attended any type of school in Flint
- ✓ **ANY CHILD** who lives with or has lived with a person who had an elevated blood lead level test result

*Testing is mandatory for any child receiving WIC or Medicaid benefits.*

## MAKING SENSE OF THE RESULTS:

**Any level of lead can be a health risk.**

- Children can absorb up to half of the lead they ingest. Of that lead, up to 90% can be stored in bones and soft tissues (like muscles and fat).
- Testing for lead only reveals how much of the metal is in your blood at the time of the test. Lead slowly leaves your blood over the course of about a month after the exposure stops.
- Blood lead levels won't show any lead that has settled into bones or soft tissues.
- Lead that is stored in bones can slowly seep back into the blood stream, where it is the most dangerous, for as long as 15 years after exposure.
- Blood lead levels may not give a complete picture of lead exposure, or the amount of damage that has been, or will be, done.



## WATER MAY NOT BE THE ONLY SOURCE OF LEAD IN YOUR HOME.

Lead can be found in:



**Homes built before 1978:** Lead from paint, including lead-contaminated dust, is one of the most common causes of lead poisoning.



**Soil:** Soil can become contaminated from exterior lead-based paint when it flakes or peels off, or if the ground has ever been exposed to leaded gasoline.



**Metal products from other countries:** Pots and pans, candy, or medicine wrappers from outside the U.S. could contain lead.



**Old or imported toys and jewelry:** Older toys or toys from other countries may contain lead. If the child puts either the toy or their hands in their mouth, they could ingest lead.



**Worksites:** Construction workers, plumbers, and car mechanics could be exposed through the work that they do and the materials they use.

## SOME EASY WAYS TO PREVENT LEAD CONTAMINATION IN YOUR HOME:

- Wash your hands, and wash your child's hands, frequently.
- Don't put potentially leaded material near your mouth or face. Try to handle those materials outside. Watch children closely.
- Take your shoes off at the door.
- Check for peeling or chipping paint in homes built before 1978.
- Keep your home free of dust by wiping weekly with a wet paper towel and then throw away that paper towel.

Source Information: (<http://www.epa.gov/lead/protect-your-family-exposures-lead>)

# WHAT DOES LEAD POISONING LOOK LIKE?

## SYMPTOMS OF LEAD POISONING:

- Trouble talking, walking, or understanding
- Trouble paying attention or sitting still
- Being impulsive or easily distracted
- Trouble solving problems
- Headaches or stomachaches
- Vomiting
- Irritability
- Trouble eating or sleeping

## YOU MAY NOT OBSERVE ANY CHANGES IN YOUR CHILD RIGHT AWAY.

**Many children do not show any immediate signs of lead poisoning.** These children may not appear sick at all.

**Lead poisoning during pregnancy** can lead to miscarriages and low birth weight, as well as neurological and developmental delays in the child.

## MOVING FORWARD:

Positive early childhood experiences can help limit the effects of lead on kids and improve their behaviors and readiness for school. Preschool and supportive homes are important because early education, having fun and spending time with caring adults helps kids succeed!

### Three ways you can help your child:

1. Talk with your child's doctor about potential lead exposure and have blood lead levels checked.
2. Enroll your child in an early childhood program such as Head Start or Great Start Readiness.
3. Read with your child every day!

For more information, visit Michigan State University and Hurley Children's Hospital's Pediatric Public Health Initiative at <http://www.humanmedicine.msu.edu/pphi/>

Source Information: ([http://www.humanmedicine.msu.edu/pphi/MSUE\\_Fight\\_Lead\\_With\\_Activities\\_WEB.PDF](http://www.humanmedicine.msu.edu/pphi/MSUE_Fight_Lead_With_Activities_WEB.PDF))



# NUTRITION IS KEY.

**GOOD NUTRITION IS EXTREMELY IMPORTANT FOR ANY PERSON WHO MAY HAVE BEEN EXPOSED TO LEAD.**

Vitamin C, calcium, and iron are nutrients that can reduce how much lead is absorbed by your child's body. Try to include foods high in these vitamins and minerals in your child's diet.

## FOODS HIGH IN:

### Vitamin C

Tomatoes

Peas

Leafy greens

Fruit

### Calcium

Leafy greens

Milk

Yogurt

Cheese

### Iron

Lean Meat

Nuts

Spinach

Taking supplements with these three nutrients (like a multivitamin with iron) can be an important intervention if your child is not able to get enough through diet alone.

Making sure to include enough of these nutrients in your child's diet may be necessary for years to come.

## NUTRITION FOR INFANTS AND CHILDREN:

Breastfeeding is a good way to protect infants from lead exposure because powdered infant formula needs to be mixed with water. If breastfeeding isn't an option for you, try to use ready-to-feed infant formula whenever possible. If powdered formula is your only option, make sure that it is mixed with lead-free water.

**Never mix formula with tap water, even if it has been filtered.** The EPA states: Bottled water is the safest choice for pregnant or breastfeeding women and children under 6 years of age.

[http://www.epa.gov/sites/production/files/2016-02/documents/flint\\_unified\\_28.pdf](http://www.epa.gov/sites/production/files/2016-02/documents/flint_unified_28.pdf)





**The WIC Program is one way for infants and their mothers to receive nutritional help.**

WIC helps women who are breastfeeding, who have had a baby within the past 6 months, and children up to 5 years old who qualify by providing:

- Health screenings and nutritional counseling to help you and your children stay healthy.
- Food packages to help you purchase healthy nutritious food.
- Free lactation services to help you with your breastfed baby.

Due to the water crisis in Flint, WIC is now offering ready-to-feed infant formula to avoid the need to mix with water.

**For information on receiving WIC in Flint, call (810) 237-4537 or 1-800-942-1636**

## COMMUNITY SOLUTIONS:

### LEAD POISONING AFFECTS THE ENTIRE COMMUNITY.

**All members of the Flint community need to be vigilant for long-term damage caused by lead exposure.**

Parents may not see symptoms now, but thousands of Flint's children are at risk and may need special school-based services and behavioral support in the years to come.

Programs providing for the continuing needs of affected children must be put in place now.

Citizens need to make themselves aware of all available assistance programs.

### THE FLINT COMMUNITY DESERVES GOVERNMENT-FUNDED SUPPORT SYSTEMS SUCH AS:

- Aggressive screening for all Flint children
- Yearly evaluations to monitor progress and potential changes
- Nutritionally-based interventions allowing universal access to healthy, fresh, unprocessed foods
- Transportation to and from all therapy sessions and medical appointments
- Free medical insurance coverage (Medicaid) for anyone under 21 and all pregnant women
- Social Services initiatives to help families to find a qualified doctor and set up a medical home
- Instillation of water filters and education on routine maintenance of filters



# WHAT SHOULD I DO FOR MY FAMILY IN THE YEARS TO COME?

## **START NOW.**

Stop drinking contaminated water. Even if the water looks clear, the water might not be clean.

## **FIND A GOOD DOCTOR.**

Although blood lead level testing can be performed at different sites in the community, it is important to find a medical home where your child can receive ongoing, comprehensive health care. If you haven't done so already, finding a primary care provider can be an important first step.

## **TALK TO YOUR DOCTOR ABOUT FOLLOW-UP DEVELOPMENTAL AND NEUROLOGICAL TESTING.**

Deficits may not show up right away. Continue to monitor your child's developmental milestones and behavior and report any concerns to your pediatrician.

## **HAVE YOUR WATER TESTED.**

Clear water does not mean clean water. Insist on follow-up water tests to ensure accuracy.

## **INSTALL AN APPROVED WATER FILTER AND PROPERLY MAINTAIN IT.**

Most water filters need to be cleaned and changed. For more information on water filters, call the EPA hotline at 1-800-426-4791 or 2-1-1

### **When using tap water (even if it is filtered):**

- Flush taps for at least 2 to 3 minutes every morning. This can clear some deposits of lead from the pipes.
- Hot water from the tap increases lead due to leaching. Use cold tap water whenever possible.

## **PROTECT YOUR FAMILY WITH FOOD.**

Foods that have calcium, iron, and vitamin C can help prevent absorption of lead. This is especially important for young children and pregnant mothers.





# WHO CAN HELP MY CHILD?

Parents are the primary advocates for their children. Parents need to remain vigilant and learn about all services and resources available:

## **MOTT CHILDREN'S HEALTH CENTER**

Offering pediatric primary care, dentistry, and mental health services from birth through adolescence.

**806 Tuuri Place  
Flint, MI 48503**

<http://www.mottchc.org/> (810) 767-5750

## **GENESEE COUNTY CHAP (CHILDREN'S HEALTHCARE ACCESS PROGRAM)**

CHAP is a collaborative, community-based medical home improvement model intended to improve the health outcomes of low-income children covered by Medicaid insurance.

**Part of the Greater Flint Health Coalition**

<http://gfhc.org/chap/> (810) 953-CHAP or (810) 953-2427

## **HURLEY PEDIATRIC CLINIC AT FLINT FARMERS' MARKET**

The clinic combines health care, education, and community collaboration, providing both primary care and specialty doctors in one location.

**300 E. First St.  
2nd Floor  
Flint, MI**

<http://www.hurleymc.com/services/childrens-hospital/> (810) 262-9773

## **GENESEE HEALTH SYSTEM**

Mental health based services supporting recovery, prevention, health, and wellness of the body, the mind, and the community. Stress reduction counseling available.

**420 W. Fifth Avenue  
Flint, MI 43503**

<http://www.genhs.org/> (810) 257-3705 (866) 211-5455

**Crisis line: (810) 257-3740**

# FLINT COMMUNITY RESOURCES:

## GENERAL INFORMATION:

Both of these resources can provide you with up-to-date information about where to pick-up free water bottles, water filters, replacement cartridges, and water testing kits.

Michigan's 211	Call: 2-1-1	<a href="http://centralmichigan211.org/">http://centralmichigan211.org/</a>
Taking Action on Flint Water		<a href="http://www.michigan.gov/flintwater">http://www.michigan.gov/flintwater</a>

## CRISIS COUNSELING:

### Genesee Health System

This helpline can provide immediate confidential counseling to anyone who needs assistance. This 24 hours-a-day, seven-days-a-week resource is provided by the Substance Abuse and Mental Health Services Administration.

810-257-3740	<a href="http://www.gencmh.org/">http://www.gencmh.org/</a>
--------------	---

Disaster Distress Helpline	(800) 985-5990 or text "talkwithus" to 66746	
----------------------------	--	--

## WATER TESTING:

Flint Water Department	(810) 787-6537	
------------------------	----------------	--

## LEAD TESTING AND MEDICAL SUPPORT:

Call your primary care provider. If you do not have a primary care provider contact:

Genesee CHAP (Children's Healthcare Access Program)	(810) 953-2427	<a href="http://www.gfhc.org/chap">http://www.gfhc.org/chap</a>
---	----------------	---

# FLINT COMMUNITY RESOURCES:

## MENTAL HEALTH:

At no charge if you need to talk. They are also available at the Community Action Neighborhood Safe House and Christ Enrichment Center.

Genesee Health System	(810) 257-3705	
-----------------------	----------------	--

## NUTRITIONAL SUPPORT:

### WIC

WIC provides “health screenings and nutritional counseling to help you, your baby and your children stay healthy, food packages to help you purchase healthy nutritious food, and free lactation services to help you with your breastfed baby.”

810-237-4537	<a href="http://www.wicprograms.org/li/genesee_county_wic_office_48529">http://www.wicprograms.org/li/genesee_county_wic_office_48529</a>	
--------------	---	--

WIC-Project Fresh	(810) 237-4537 or MSU Extension at (810) 244-8500	
-------------------	---	--

## EARLY EDUCATION:

“Early On Michigan offers early intervention services for infants and toddlers, birth to three years of age, with developmental delay(s) and/or disabilities, and their families.”

Early On	1-800-327-5966	<a href="https://1800earlyon.org/index.php">https://1800earlyon.org/index.php</a>
----------	----------------	---

Great Start Readiness		<a href="http://www.geneseeisd.org/index.aspx?NID=537">http://www.geneseeisd.org/index.aspx?NID=537</a>
-----------------------	--	---

## NOTES:

---



---



---



# REFERENCES:

- [http://www.wicprograms.org/li/genesee\\_county\\_wic\\_office\\_48529](http://www.wicprograms.org/li/genesee_county_wic_office_48529)
- <https://www.health.ny.gov/publications/2526.pdf>

## MICHIGAN DEPARTMENT OF HEALTH AND HUMAN SERVICES:

- <http://www.mi211.org/news/water-resource-sites-established-flint-bottled-water-filters-and-testing-kits>
- <http://www.michigan.gov/flintwater/>
- <http://www.cdc.gov/nceh/lead/>
- <http://www.epa.gov/flint>
- <http://www.epa.gov/lead/protect-your-family-exposures-lead>
- [http://www.epa.gov/sites/production/files/2016-02/documents/flint\\_unified\\_28.pdf](http://www.epa.gov/sites/production/files/2016-02/documents/flint_unified_28.pdf)
- <https://www.health.ny.gov/publications/2584/>

Rudolph, C., Rudolph, A., Lister, G., First, L., Gershon, A. (2011). Rudolph's Pediatrics (22ed). McGraw-Hill Companies, Inc.

### Presented By:

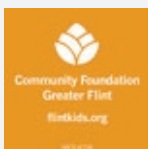


(908) 279-7881  
[focusforhealth.org](http://focusforhealth.org)



[seanandersonfoundation.org](http://seanandersonfoundation.org)

### In Partnership with:



Community Foundation of Greater Flint and the Flint Child Health and Development Fund

(810) 767-8270

[flintkids.org](http://flintkids.org)