# Per- and Polyfluoroalkyl Substances (PFAS) in Drinking Water Wells Near the Former Wurtsmith Air Force Base

Updated April 2017

Perfluorinated chemical contamination has entered drinking water wells near the former Wurtsmith Air Force Base (WAFB) in Oscoda Township, Michigan. The main affected area is near Van Etten Lake. Other areas near WAFB are also being investigated.



WAFB is located in losco County. Detailed map on back of this sheet.

# What are per- or polyfluoroalkyl substances (PFAS)?

PFAS (sometimes known as perfluorinated chemicals or PFCs) are a group of chemicals that are fire resistant, and repel oil, stain, grease, and water. PFAS are used in fire-fighting foams, nonstick cookware, fast food wrappers, as well as in industry and manufacturing. Firefighting foams that contained PFAS were used and sometimes spilled at WAFB when the base was in operation.

## Were any of the PFAS found in drinking water wells above health advisory levels?

- The U.S. Environmental Protection Agency (EPA) has set a lifetime health advisory (LTHA) level for two PFAS in drinking water: perfluorooctanoic acid (PFOA) and perfluorooctane sulfonate (PFOS). The LTHA level is 70 parts per trillion (ppt) for PFOA and PFOS combined.
- Nearly all of the drinking water wells tested near WAFB have been below the LTHA.
- There were other PFAS (not PFOA or PFOS) found in the water well samples. The EPA has not set health advisory levels for the other PFAS because not enough is known about them.

## Are there PFAS in the municipal water?

- Extremely low levels of PFAS were found in the municipal water supply, which is drawn from Lake Huron. The PFAS levels in the municipal water supply are considered safe to drink.
- PFAS are found in the environment worldwide. We expect to find PFAS in most surface waters, such as lakes and rivers.

## Why is MDHHS giving advice if PFAS levels are not an immediate health concern?

- Levels of PFOA and PFOS in the groundwater at WAFB are up to **10,000 times** higher than the LTHA.
- Groundwater with high levels of PFAS might be moving off-base toward people's drinking water wells.
- We know that the PFAS from WAFB are found at low levels in some private drinking water wells. We don't know if the PFAS in the drinking water wells will stay at low levels. Also, we do not know how long PFAS may have been in the drinking water wells.
- PFAS can build up in the human body.

#### What are the possible PFAS related health concerns?

- Studies in people who were exposed to PFAS found links between the chemicals and increased cholesterol, changes in the body's hormones and immune system, decreased fertility, and increased risk of certain cancers.
- Animals given high levels of PFAS showed changes to the thyroid, liver, and immune system, and harmful effects in fetal and newborn animals. Animal studies help scientists understand what could happen in people.

#### Will I get sick if I have been drinking PFAS-contaminated water from my well?

- No one can say for sure if drinking water that has PFAS in it will harm you.
- If you have been notified that PFAS in your well test results are likely coming from WAFB or that your well is in an area that has PFAS from WAFB, the Michigan Department of Health and Human Services (MDHHS) recommends:
  - Do not use your well water for drinking, cooking, making baby formula or food, or washing fruits and vegetables.
  - Touching the water will not harm you. You can bathe, do your dishes, launder your clothes, and clean with your water.

#### What is being done about this issue?

- Affected well owners can get bottled water systems, reverse-osmosis filters, or assistance with municipal water hookup. Call District Health Department No. 2 at 989-362-6183 for more information.
- MDHHS will continue to evaluate drinking water data as it is collected.
- MDHHS will notify well owners of their drinking water results and any recommendations.
- MDHHS is looking into other ways people could be exposed to PFAS from the WAFB.
- MDHHS has issued PFAS guidelines for eating fish from area water bodies.



Image of area near WAFB. Map data: Google, NOAA

## Where can I find more information?

The federal Agency for Toxic Substances and Disease Registry has a website for these chemicals. Go to www.atsdr.cdc.gov/pfc/index.html

Visit the MDHHS page, www.michigan.gov/wurtsmith or contact Christina Bush at bushc6@michigan.gov or 1-800-648-6942.

