



TRAIL AREA

Health & Environment Program

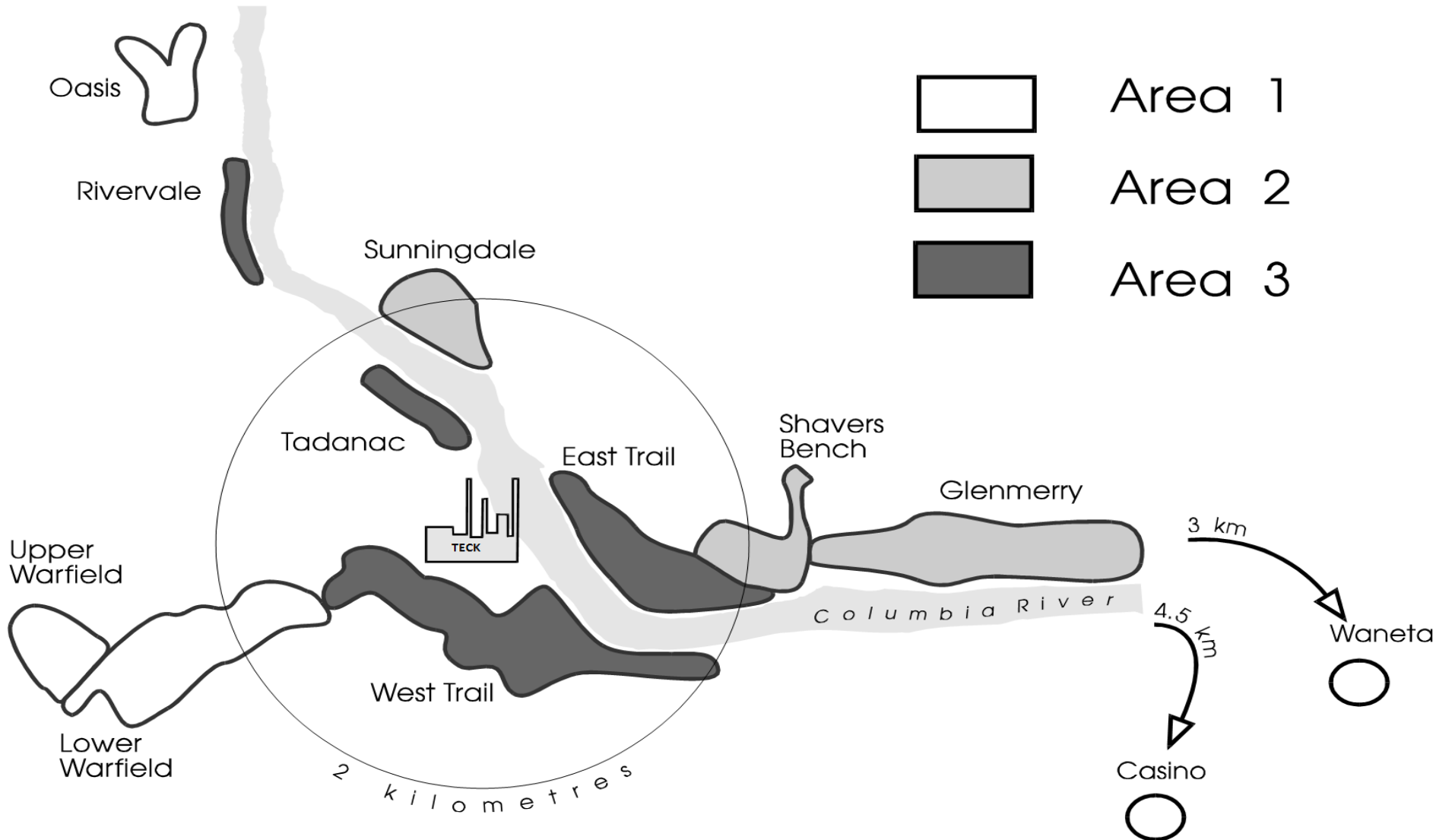
Fall 2017 Lead Clinic Results



Who Was Tested in 2017?

- Target group:
 - Children aged 6-36 months, living in City of Trail or Rivervale (Area 2/3)
- Also included are:
 - Children new to the area, up to age 5 years old
 - Previous case management clients for follow-up
 - Parents who requested testing for their child from any area

“Areas” & Neighbourhoods



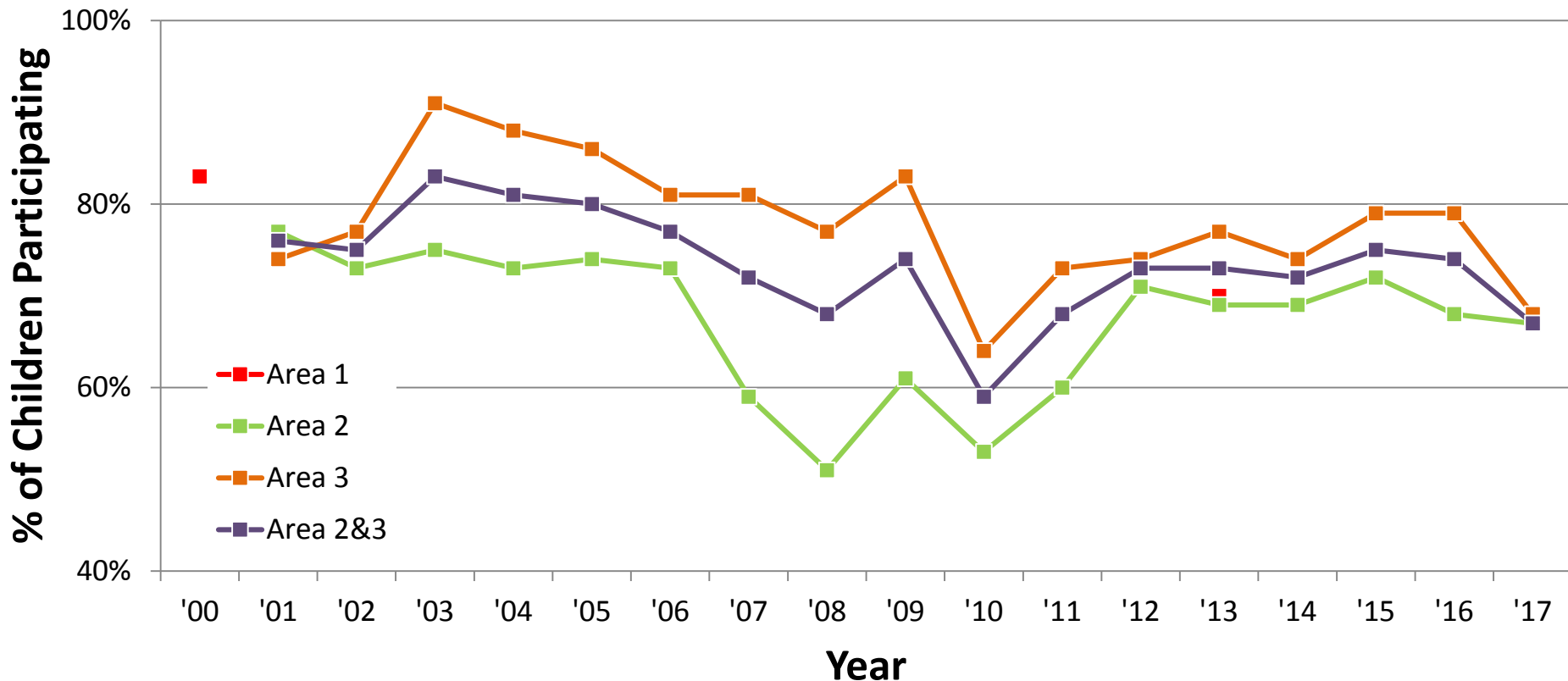


Fall 2017 Total Participation By Target Areas | 6-36 Months

Participation Breakdown By Areas

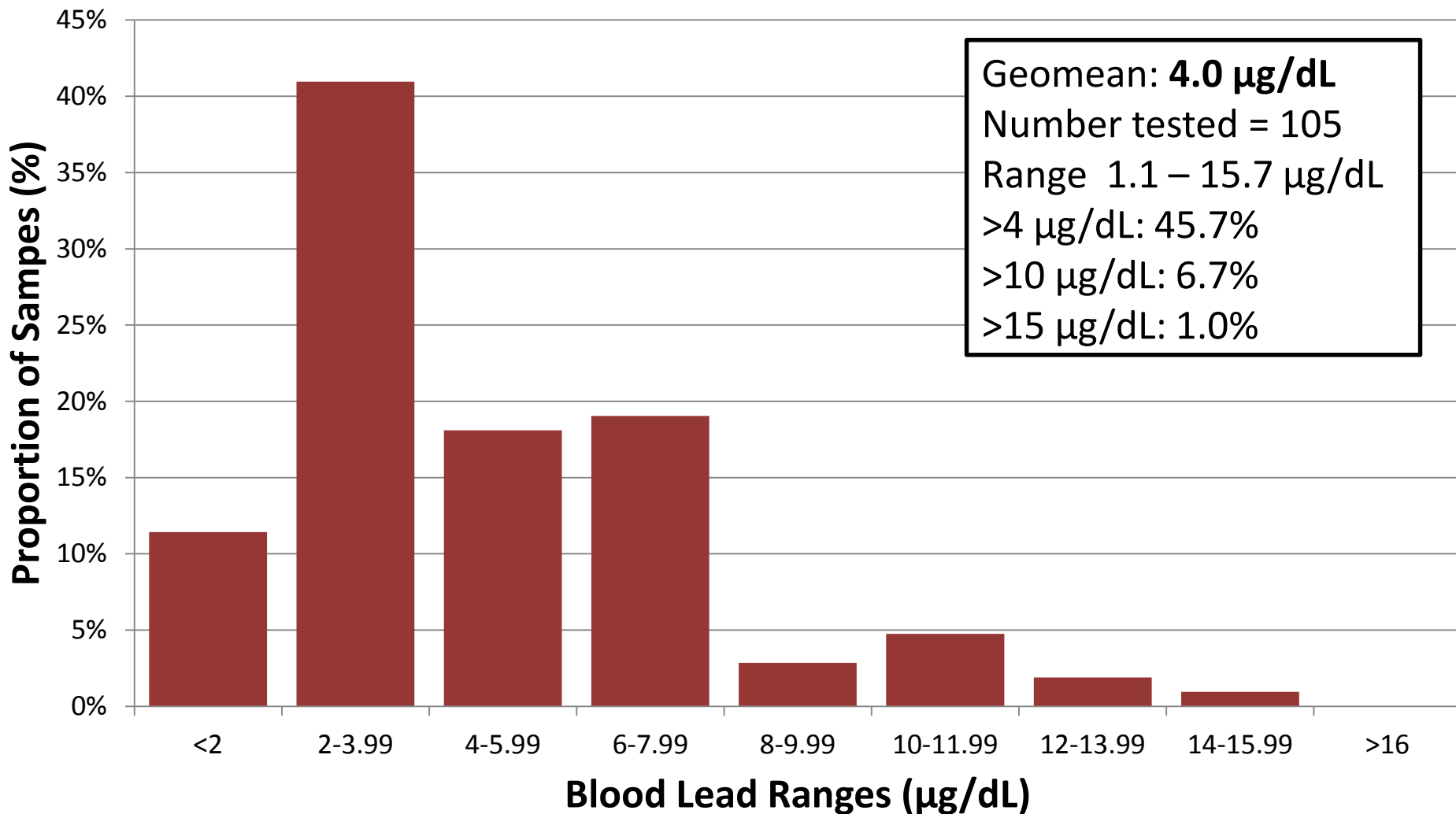
| | 2017 | | | 2016 |
|------------|----------------------|--------------------------|--------------------------|------------------------------|
| Area | # Children Contacted | # Children Participating | % Children Participating | # (%) Children Participating |
| Area 2 | 80 | 54 | 67% | 54 (68%) |
| Area 3 | 75 | 51 | 68% | 57 (79%) |
| Area 2 & 3 | 155 | 105 | 67% | 111(74%) |

Percent Participation by Area (Year 2000 – 2017 | Age 6-36 Months)

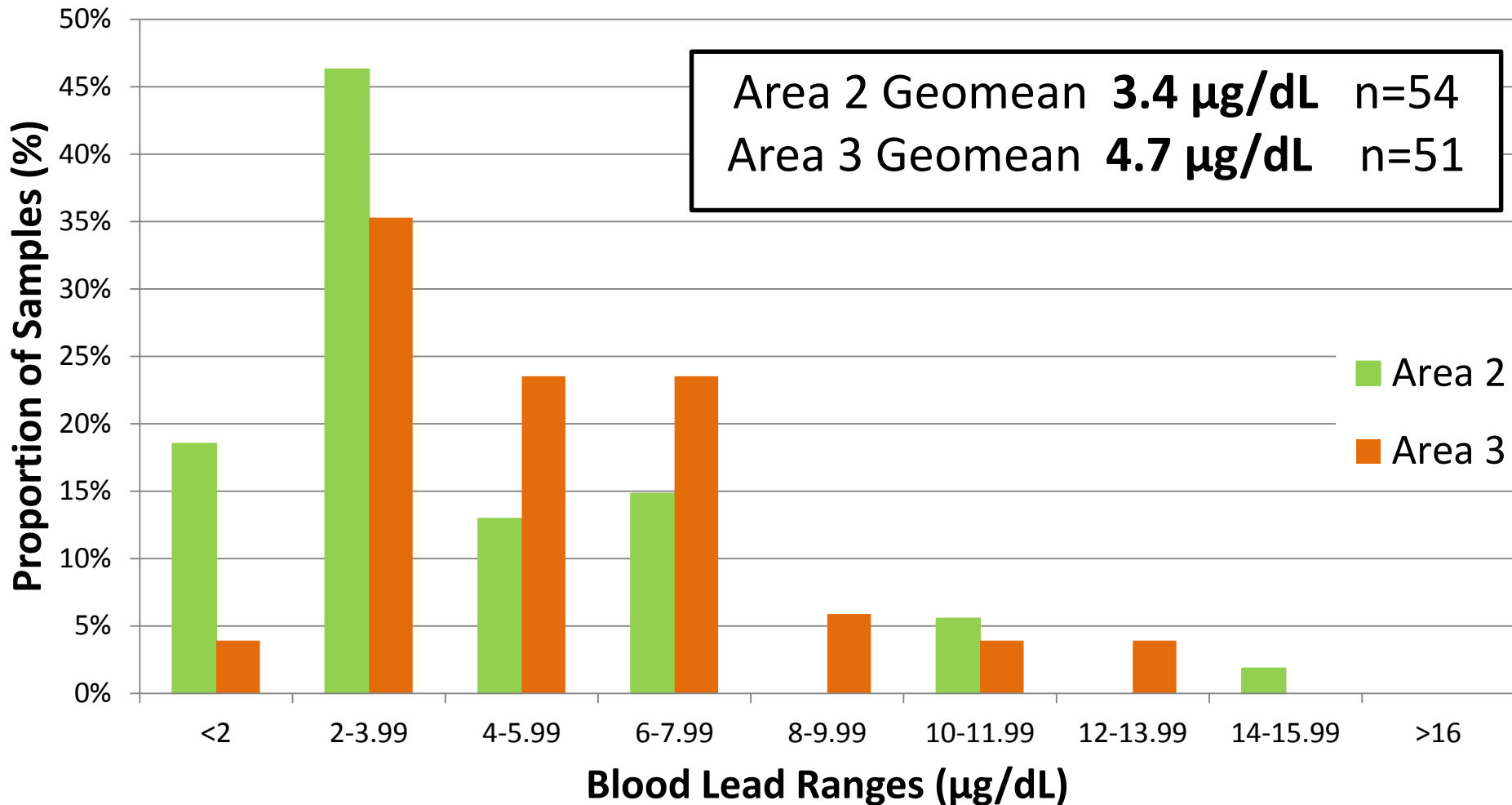


Venous Blood Lead Range

(Year 2017 | Area 2/3 | Age 6-36 months)

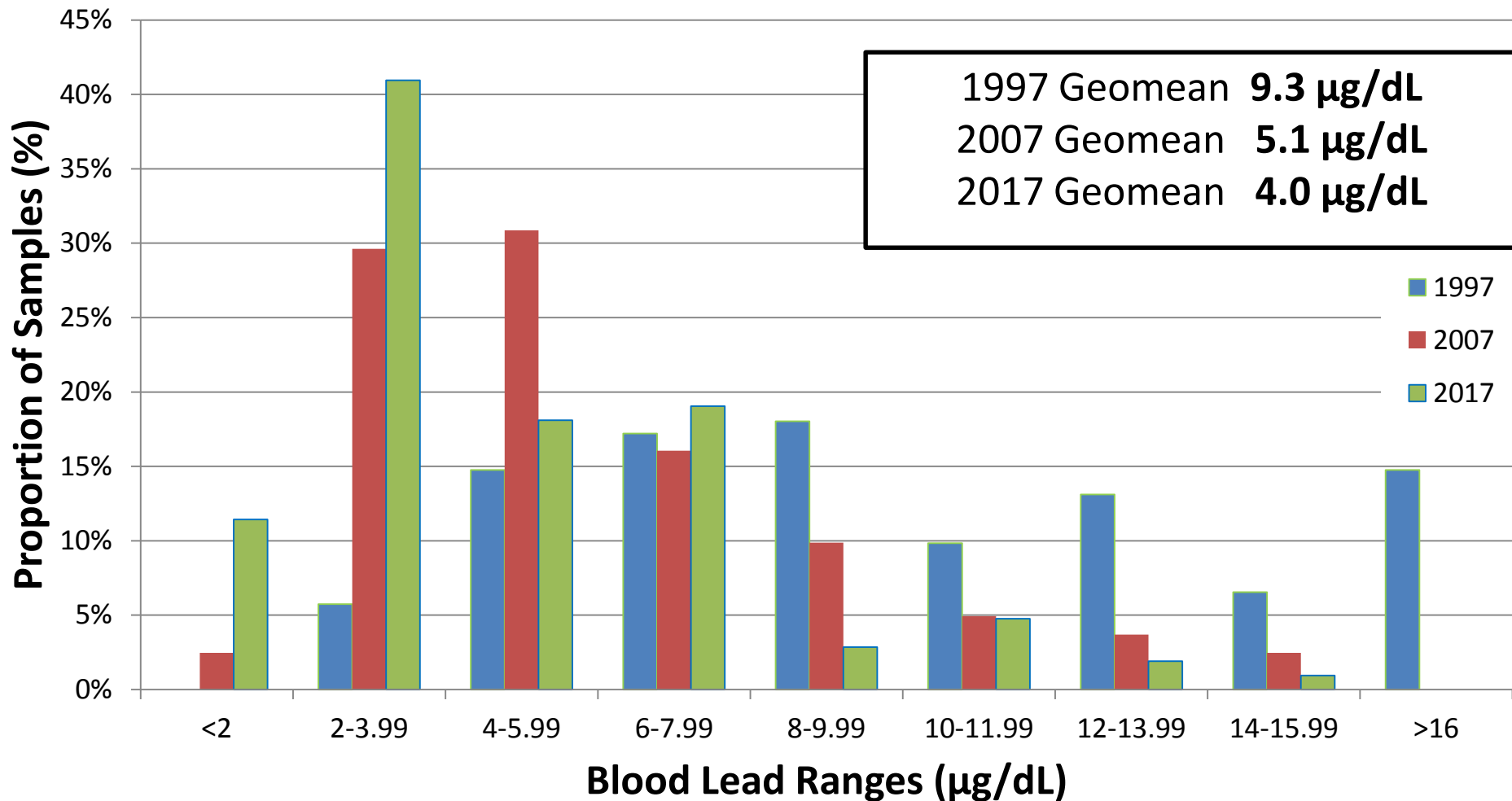


Venous Blood Lead Range by Area (Year 2017 | Age 6-36 Months)

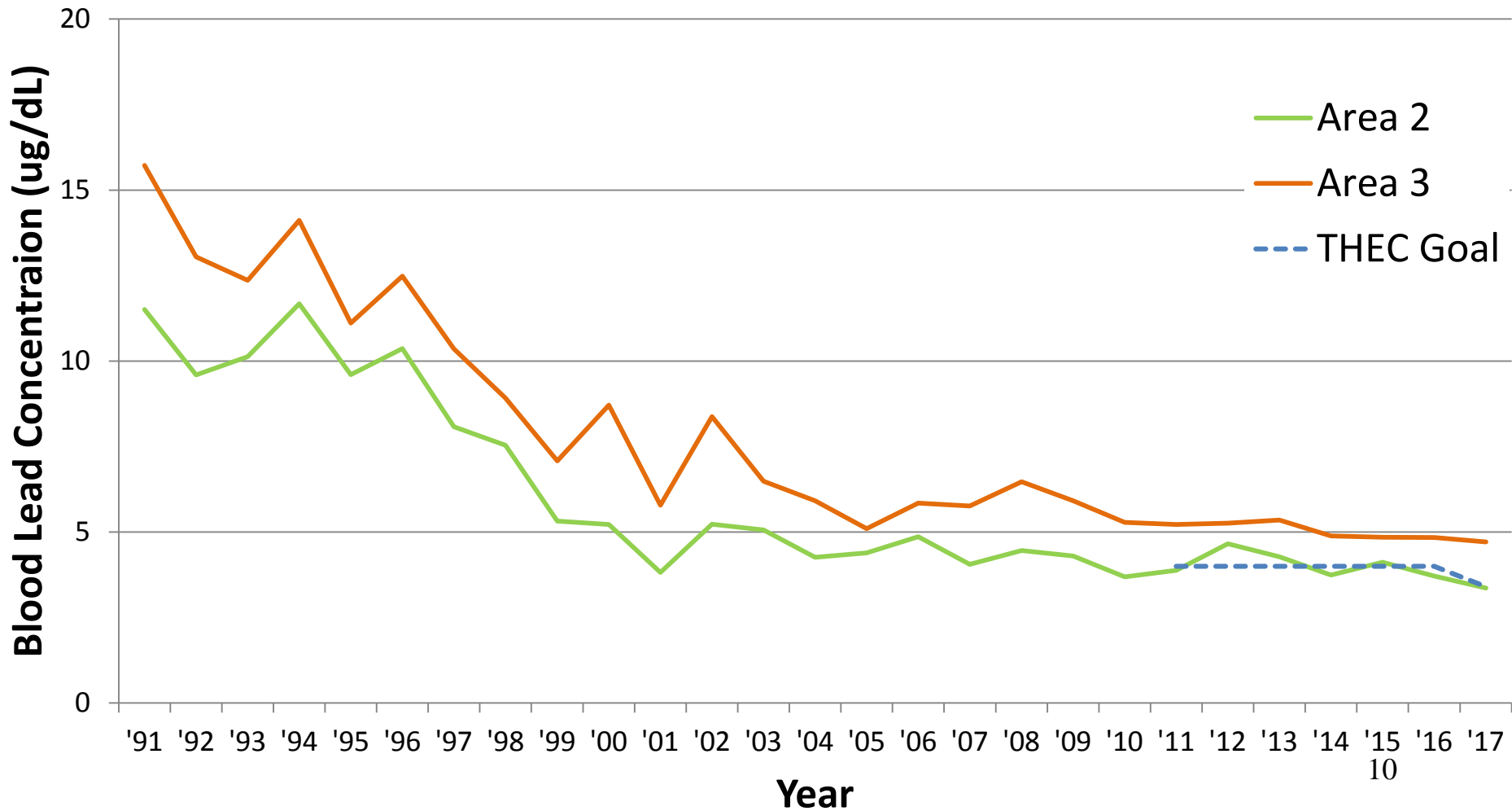


Venous Blood Lead Range

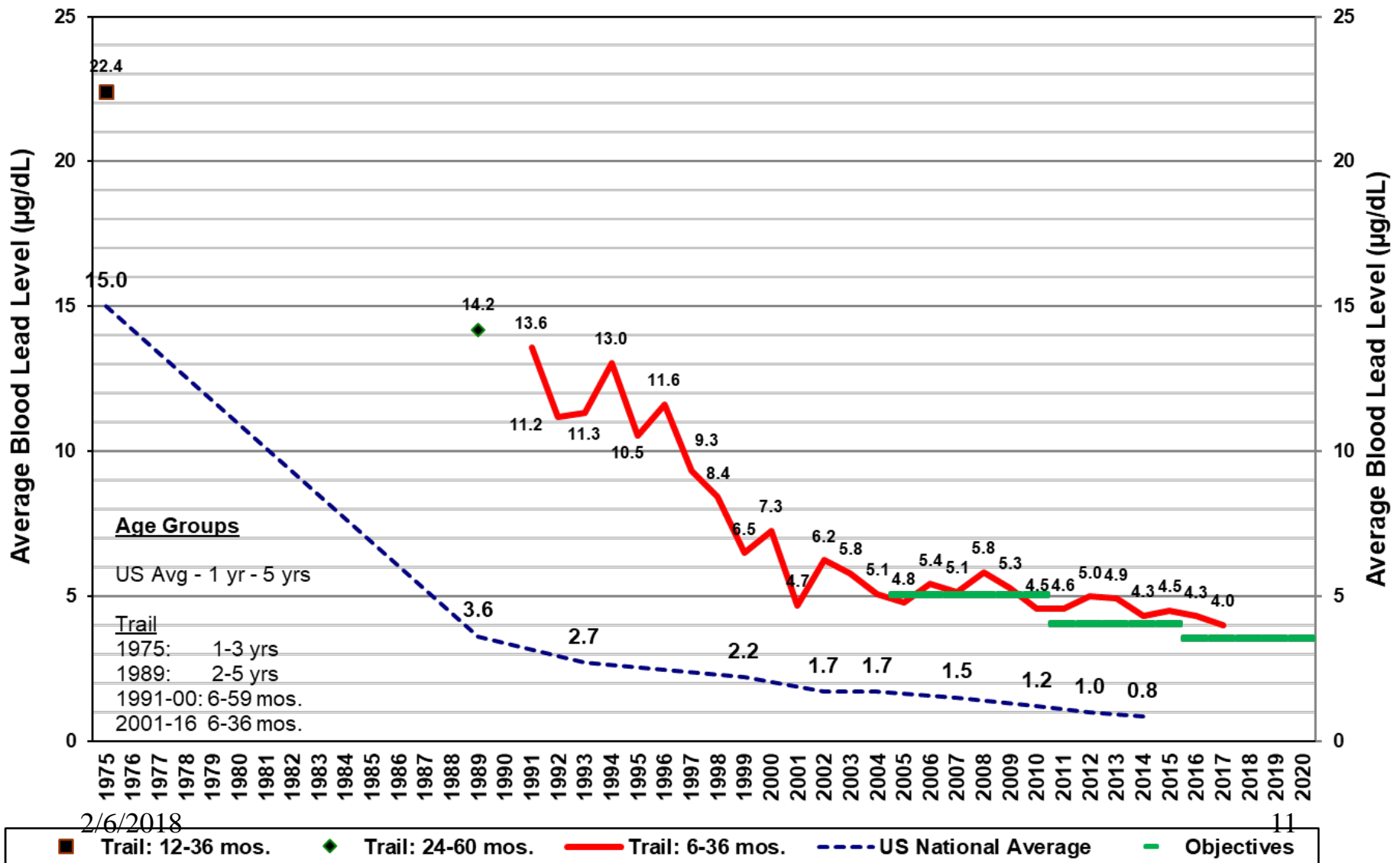
(Year 1997, 2007, 2017 | Age 6-36 Months)



Venous Blood Lead Geomean by Area 1991 – 2017 (Age 6-36 Months)



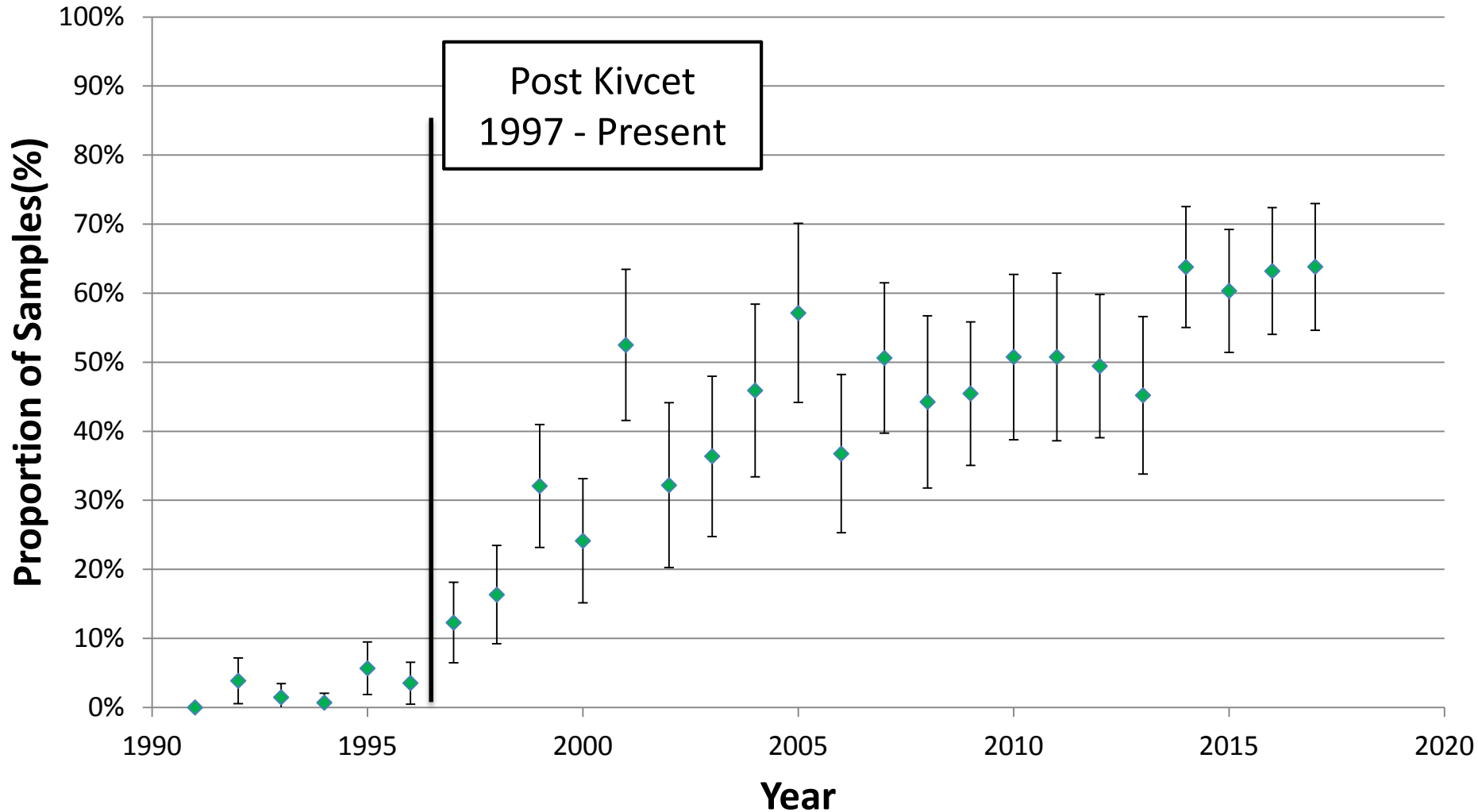
History of Children's Blood Lead Levels



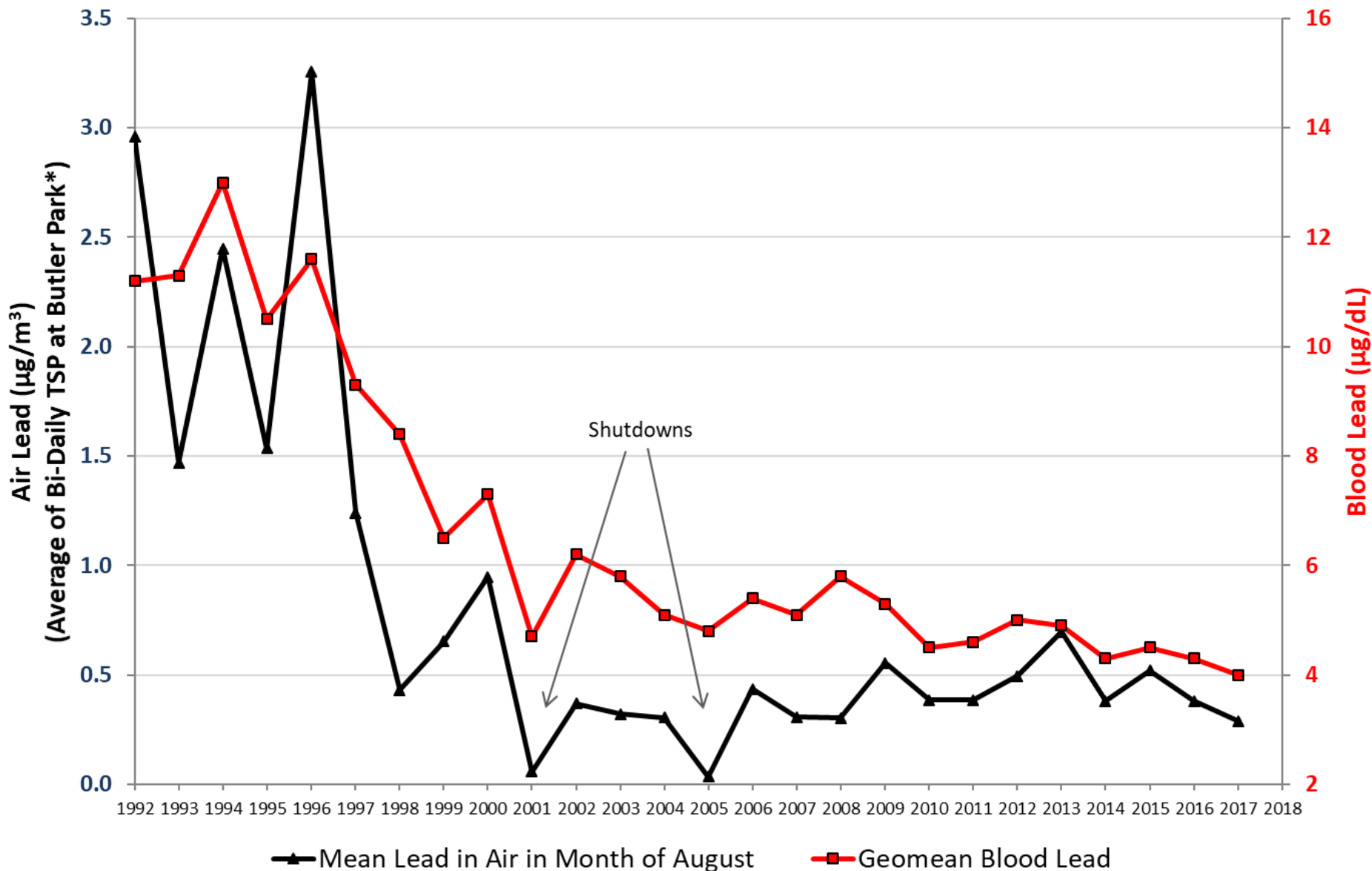
Blood Lead Levels Around the World

| City/Region | Country | Nature of site | Age of kids tested | Year | Geomean Blood Lead Level ($\mu\text{g/dL}$) |
|-----------------------|---------------|-----------------------------|---------------------|-------------|---|
| La Oroya | Peru | Pb smelter closed 2009 | < 6 yrs | 2011 | ~10 |
| Hercalaneum | U.S.A. | Primary Pb smelter -closed | < 6 yrs | 2003 | 8.0 |
| Hoboken (Moretusburg) | Belgium | Secondary Pb smelter | 4 - 5 yrs | 2016 | 6.5 |
| Broken Hill | Australia | Pb mining | 1 - 4 yrs | 2015 | 5.8 |
| Rouyn-Noranda QC | Canada | Primary Cu smelter | 6 mos to 5 yrs | 1999 | 5.2 |
| Port Pirie | Australia | Primary Pb smelter | <5 yrs | 2017 | 4.6 |
| Torreón | Mexico | Primary Pb smelter | <6 yrs | 2016 | 4.2 median |
| Trail BC | Canada | Primary Pb smelter | 0.5 to 3 yrs | 2017 | 4.0 |
| Belledune, NB | Canada | Pb smelter, industry | 3 - 6 yrs | 2005 | 3.5 |
| Mount Isa | Australia | Primary Pb smelter/mine | 1 - 5 yrs | 2015 | 3.2 |
| Hamilton, ON | Canada | Urban/city centre | < 6 yrs | 2008 | 3.0 |
| Flin Flon, MB | Canada | Closed Cu smelter | 0.5 - 6 yrs | 2011 | 1.4 |
| St Johns, Nfld | Canada | Urban | 1 - 5 yrs | 2011 | 1.2 |
| Nation-wide | U.S.A. | Urban/rural (NHANES) | 1 - 5 yrs | 2014 | 0.8 |
| Nation-wide | Canada | Urban/rural (CHMS) | 3 - 5 yrs | 2015 | 0.7 |
| Vancouver | Canada | Urban/city centre | 2 - 3 yrs | 1994 | 5.4 |
| Fraser Health | Canada | Urban/city centre | 0 - 5 yrs | 2014 | <2 |

Venous Blood Lead < 5 $\mu\text{g}/\text{dL}$ (Year 1991-2017 | Age 6-36 Months)



Geomean Lead Levels for Trail Children aged 6-36 Months and Air Lead Levels in Month of August



* Air data prior to 2003 were collected at West Trail; these data were multiplied by 1.7 to be equivalent to Butler Park

Concluding Messages

- The 2017 geomean for children's blood lead results is 4.0 micrograms per decilitre, the lowest level recorded to date
- While blood lead clinic participation declined slightly in 2017, there continues to be a high level of participation in this voluntary program

Concluding Messages

- There has been significant improvement in children's blood lead levels over the past 20 years
- Since 2001, the decline has slowed but blood lead levels in Trail have continued to decline
- There is no known level of lead exposure that is considered safe
- The lower the blood lead level, the better.

Concluding Messages

- The level of lead in community air continues to be correlated with blood lead levels
- In 2017, the level of lead in air was the lowest ever recorded (excluding shutdown years)
- Teck's Fugitive Dust Reduction Program is starting to show benefits; it offers the greatest opportunity for future emissions reductions

Concluding Messages

- The THEC offers a comprehensive integrated program of emissions reduction, soil remediation, lead safe renovation, and programs for families.
- With this program, the THEC aims to reduce blood lead levels to a geomean of 3.5 micrograms per decilitre by 2020 and lower levels in future.
- For more information on lead, its effects, and the supports available in the Trail area, please visit www.thep.ca

By 3 years 1

Baby Feeding Cues (signs)

EARLY CUES - "The Hungey"

MID CUES - "The Grumpy"

LATE CUES - "Cry me, Please Help me"

PRENATAL PROGRAM

Expecting a Baby? Get ready with Prenatal Classes.

Topics:

- What to expect during pregnancy
- How to prepare for labor and delivery
- How to care for your newborn baby
- How to breastfeed your baby
- How to soothe your baby
- How to take care of your baby's health
- How to take care of your baby's safety
- How to take care of your baby's nutrition
- How to take care of your baby's sleep
- How to take care of your baby's behavior
- How to take care of your baby's development
- How to take care of your baby's social skills
- How to take care of your baby's emotional health
- How to take care of your baby's mental health
- How to take care of your baby's physical health
- How to take care of your baby's overall health

TRAIL

Click Early, Click Often

ASQ
Information for Parents

Spokane Family Place Infant Development Program

