

Robinson, Mikelle (DHHS)

From: Peeler, Nancy (DCH)
Sent: Wednesday, September 23, 2015 5:33 PM
To: Travis, Rashmi (DHHS); Robinson, Mikelle (DHHS); Lasher, Geralyn (DHHS); Hertel, Elizabeth (DHHS)
Cc: Fink, Brenda (DHHS)
Subject: Childhood Lead Poisoning Prevention program documents
Attachments: Flint Testing and EBLLs_updated 092315_with notes.pdf; Pediatric Lead Exposure Flint Water.from Hurley.pdf

Importance: High

Hello – I'm going to send a series of emails with materials you have asked for, as a way to organize them.

The first document attached to this email is our CLPPP updated analysis of the blood lead testing data we have for children aged 0-16 in Flint. This is an update from what we sent to the Director's office earlier in the year, in that we added an additional year (2010-2011), and added data for May-August 2015 (per Geralyn's request in an email late last week).

Regarding this data:

- We are using the timeframe of May –April for this chart, because the water source change in Flint happened in April 2014. So, we started by looking at the 12 month time period from May 2014 – April 2015. Then we went back and compared that same time frame to the 4 previous years, to see if the pattern was similar, significantly different, etc.
- We included all children with a Flint address, which may not exactly conform to the city boundaries.
- We only included first time blood lead levels of ≥ 5 mcg/dL, not all subsequent tests a child may have received.
- We included all types of blood samples – venous blood draws, capillary samples, or unknown (e.g. not labeled as venous or capillary). Typically we would point to venous samples as the best, most reliable, but we had many non-venous samples, so to be inclusive added those in.

Looking at the charts, you can definitely see the seasonal impact associated with lead poisoning.

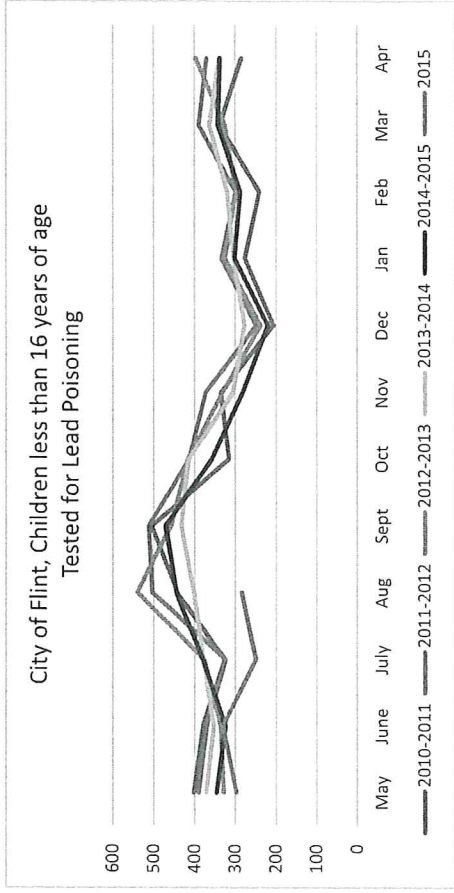
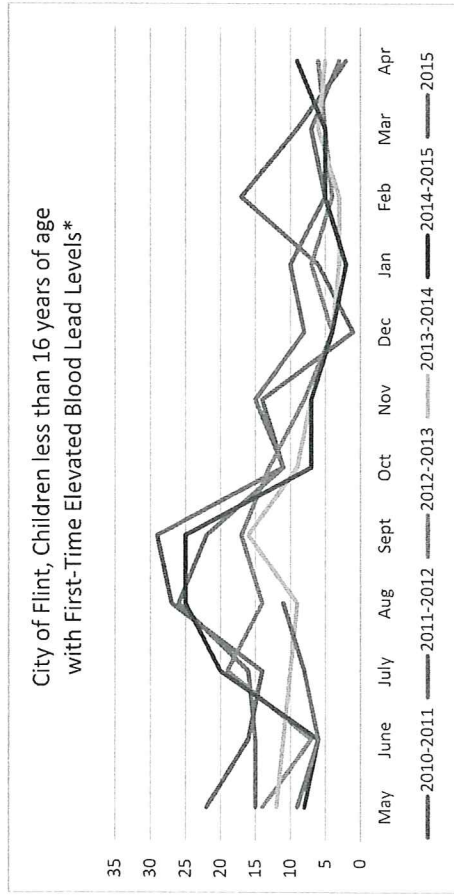
We do NOT see a different pattern of results for the 2014-2015 year, right after the change in water source. That year looks more like the data from 10-11, and 11-12.

For the full 5 years worth of data, testing rates were pretty consistent, so we don't think that is driving the data. However, note that testing levels for May-August 2015 appear to be lower than in the previous 5 years.

The second document I have attached is a presentation sent to us this morning by Dr. Mona Hanna-Attisha, from Hurley Medical Center. She shared this related to her data request that she sent to our program. In scanning it, we noted that she is using different data than we did (by age, by zip code, time frames, which years she included, etc.), so comparing our data chart to her results is like comparing apples and oranges. We have not run any analyses using her parameters. We did note some slides in her document that we might disagree with, for example her statement that water is the primary source of lead (in Michigan, it remains lead paint that is our primary source of lead exposure).

Please let us know if you have questions you have about the data charts we produced. Next email will be some of our program materials, that may be of use in the upcoming outreach effort. Also, Rashmi indicated who I should include on this email, and I trust you will share with others as appropriate.

Nancy



| | May | June | July | Aug | Sept | Oct | Nov | Dec | Jan | Feb | Mar | Apr |
|-----------|-----|------|------|-----|------|-----|-----|-----|-----|-----|-----|-----|
| 2010-2011 | 22 | 16 | 14 | 27 | 29 | 11 | 14 | 1 | 6 | 17 | 9 | 2 |
| 2011-2012 | 15 | 15 | 16 | 26 | 22 | 11 | 15 | 8 | 10 | 5 | 7 | 3 |
| 2012-2013 | 14 | 7 | 19 | 14 | 17 | 13 | 8 | 4 | 7 | 4 | 5 | 6 |
| 2013-2014 | 12 | 11 | 10 | 9 | 16 | 9 | 7 | 4 | 3 | 3 | 6 | 5 |
| 2014-2015 | 8 | 6 | 20 | 25 | 25 | 7 | 7 | 4 | 2 | 5 | 5 | 9 |
| 2015 | 9 | 6 | 8 | 11 | | | | | | | | |

| | May | June | July | Aug | Sept | Oct | Nov | Dec | Jan | Feb | Mar | Apr |
|-----------|-----|------|------|-----|------|-----|-----|-----|-----|-----|-----|-----|
| 2010-2011 | 402 | 379 | 325 | 442 | 504 | 315 | 335 | 206 | 276 | 240 | 338 | 285 |
| 2011-2012 | 390 | 370 | 324 | 503 | 512 | 413 | 372 | 248 | 333 | 298 | 389 | 370 |
| 2012-2013 | 328 | 335 | 376 | 540 | 458 | 416 | 331 | 237 | 325 | 298 | 325 | 397 |
| 2013-2014 | 371 | 353 | 378 | 401 | 432 | 414 | 305 | 277 | 304 | 319 | 363 | 339 |
| 2014-2015 | 346 | 324 | 379 | 445 | 471 | 357 | 281 | 219 | 301 | 287 | 342 | 337 |
| 2015 | 297 | 330 | 249 | 284 | | | | | | | | |

*Children whose address is listed as "Flint"--may not conform exactly to Flint city limits
 Less than 16 years of age at time of test
 Includes only first-time blood lead levels ≥ 5 ug/dL
 Includes sample type of venous, capillary or unknown

