FOLLOW-UP SCHEDULE

Blood Lead Levels for Children Under the Age of Six

For each initial blood lead level ≥ 3.5 µg/dL, perform a diagnostic test ASAP. If diagnostic test result falls within a lower category, follow the steps within that category.

If diagnostic or follow up test result falls within a higher category, conduct another diagnostic test.

All diagnostic (i.e., confirmation) tests should be performed as soon as possible (ASAP), but at a minimum within specified time periods.

- *Diagnostic tests* should be venous; however, capillary tests are accepted if a venous cannot be obtained.
- Diagnostic specimens *must* be sent to an outside reference laboratory for analysis.
- Point of care (POC) blood lead analyzers (i.e., LeadCare) *CANNOT* be used for diagnostic/confirmatory tests.
- *Follow-up (post-diagnostic) testing* can be capillary.
- CDC protocol for collecting capillary specimens should be followed (www.cdc.gov/biomonitoring/pdf/Lead-Fingerstick-Poster-508.pdf).

See https://nchealthyhomes.com/clinical-lead-resources/ for a list of clinical resources.

Please contact Children's Environmental Health at (919) 609-0877 or Dph.LeadHelpdesk@dhhs.nc.gov for further assistance.

*Children's Developmental Services Agency (CDSA)
**Care Management for At-Risk Children (CMARC)

NC DEPARTMENT OF HEALTH AND HUMAN SERVICES
Division of Public Health

https://publichealth.nc.gov • NCDHHS is an equal opportunity employer and provider. • 11/2024

INITIAL BLOOD LEAD LEVEL AND RESPONSE

< 3.50 µg/dL

- Report blood lead test results to parents and document notification
- Educate family about lead sources and prevention of lead exposure. Printable resources are available at https://nchealthyhomes.com/lead-poisoning/.
  - Retest at age 2, earlier if risk of exposure increases.

3.50 – 4.99 µg/dL — Perform diagnostic test ASAP

If diagnostic test result is **3.50 – 4.99 µg/dL**, take same action as previous category **AND**

- Provide clinical management
- Conduct nutritional assessment and refer child to the WIC Program
- Test other children under the age of six in same household
- Conduct follow-up testing every 3 months until 2 consecutive tests are < 3.50 µg/dL

5.00 – 9.99 µg/dL — Perform diagnostic test ASAP

If diagnostic test result is **5.00 – 9.99 µg/dL**, take same action as previous category **AND**

- Complete Form 3651: Exposure History of Child with Elevated Blood Lead Level to identify possible lead sources and fax a copy to Children's Environmental Health at (919) 841-4015
- Refer case to local health department to offer an environmental investigation
- Conduct follow-up testing every 3 months until 2 consecutive tests are < 3.50 µg/dL

10.00 – 44.99 µg/dL — Perform diagnostic test ASAP (but at the latest within 1 month at 10.00 – 19.99 µg/dL and within 1 week at 20.00 – 44.99 µg/dL)

If diagnostic test result is **10.00 – 44.99 µg/dL**, take same action as previous category **AND**

- Refer to local health department for required environmental investigation
- Refer child to CDSA* Early Intervention or CMARC**
- Refer to Social Services as needed for housing or additional assistance
- For 10.00 – 19.99 µg/dL: Conduct follow-up testing every 1-3 months until 2 consecutive tests are < 3.50 µg/dL
- For 20.00-44.99 µg/dL: Conduct follow-up testing every 2 weeks to 1 month until 2 consecutive tests are < 3.50 µg/dL and consider an abdominal X-ray to check for ingested object.

45.00 – 69.99 µg/dL — Perform diagnostic test ASAP (but at the latest within 48 hours at 45.00 - 59.99 µg/dL and within 24 hours at 60.00 - 69.99 µg/dL)

If diagnostic test result is **45.00 – 69.99 µg/dL**, take same action as previous category **AND**

- Consult with North Carolina Poison Control (800) 222-1222 for advice on chelation and/or hospitalization
- Perform an abdominal X-ray to check for ingested object
- Alert NC CLPPP by calling (919) 609-0877
- Conduct follow-up testing every 2 weeks to 1 month until 2 consecutive tests are < 3.50 µg/dL

≥ 70.00 µg/dL — Perform emergency diagnostic test immediately

If diagnostic test result is **≥ 70.00 µg/dL**, take same action as previous category **AND**

- Hospitalize child and begin medical treatment immediately
- Conduct follow-up testing every 2 weeks to 1 month until 2 consecutive tests are < 3.50 µg/dL

FOLLOW-UP SCHEDULE FOR PREGNANCY

Initial Blood Lead Level (BLL) Results	Frequency of Testing	Recommended Interventions According to BLL in Pregnancy
< 5 µg/dL	• No diagnostic or follow-up testing necessary	• Educate on lead exposure sources and risk reduction
5-9 µg/dL	• Conduct diagnostic testing within 1 month • Conduct follow-up testing every 3 months for the duration of the pregnancy until 2 consecutive BLLs are < 5.00 µg/dL • **Alert baby's healthcare provider to maternal elevated blood lead level. Collect an umbilical cord blood sample or neonatal sample prior to discharge to establish a baseline level for the newborn. Neonatal samples can be venous or capillary (heel stick).**	Above actions in addition to: • Provide case management • Refer case to local health department to offer an environmental investigation • Attempt to determine source of lead exposure (home, work, pica) • Counsel on strategies to reduce exposure • Assess for adequacy of patient's diet • Provide prenatal vitamins and nutritional guidance emphasizing adequate Calcium and Iron intake with Vitamin C to enhance absorption • For occupationally exposed patients (yes to question #6 on questionnaire); review safe work practices: hand washing, showering before going home, proper laundering of work clothes • Provide patient with the following: "Lead and Pregnancy Brochure" (2 sided) and "Keeping Lead at Work and Preventing Take Home Exposure" • If appropriate for occupation, encourage wearing a clean/well-fitted respirator • Consider contacting the employer about assistance with safe work practices
10-24 µg/dL	• Conduct diagnostic testing within 1 month • Conduct follow-up testing monthly for the duration of the pregnancy until 2 consecutive BLLs are < 5.00 µg/dL	Above actions in addition to: • Recommend removal from workplace lead exposure
25-44 µg/dL	• Conduct diagnostic test within 1-4 weeks • Conduct follow-up testing monthly for the duration of the pregnancy until 2 consecutive BLLs are < 5.00 µg/dL	Above actions in addition to: • **Advise not to breastfeed and discard breastmilk if BLL ≥ 40 µg/dL** • Testing milk is not recommended
≥ 45 µg/dL	• Conduct diagnostic test within 24 hours • Conduct follow-up testing at frequent intervals for the duration of the pregnancy depending on clinical interventions and trend in BLLs • Should be treated as a high-risk pregnancy. Patient may require transfer to a high-risk obstetrical practice.	Above actions in addition to: • Consult or transfer to a provider specializing in lead poisoning therapy before considering chelation for the patient

Testing Recommendations for Newly Arrived Refugees

Recommended Screening Measures	Population
Initial lead blood test	• All refugee infants and children ≤ 16 years of age • Refugee adolescents > 16 years of age if there is a high index of suspicion, or clinical signs/symptoms of lead exposure • All pregnant and lactating women and girls*
Follow-up blood test, 3-6 months after initial testing	• All refugee infants and children ≤ 6 years of age, regardless of initial test result • Refugee children and adolescents 7–16 years of age who had BLLs ≥ 3.5 µg/dL, and for any child older than 7 years of age who has a risk factor (e.g., sibling with BLL ≥ 3.5 µg/dL, environmental exposure risk factors) regardless of initial test result • Pregnant or lactating adolescents (<18 years of age) who had BLLs ≥ 3.5 µg/dL at initial screening

*All newly arrived pregnant or breastfeeding women should be prescribed a prenatal or multivitamin with adequate iron and calcium. Referral to a health care provider with expertise in high-risk lead exposure treatment and management may be indicated for EBLLs.

See Page 1 for clinical follow-up and case management of children with blood lead levels ≥ 3.5 µg/dL.