FORSYTH COUNTY BOARD OF HEALTH CHILDHOOD LEAD POISONING PREVENTION RULES

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Section I General Provisions

- 1. Authorization The Forsyth County Board of Health is authorized under the provisions of Chapter 130A 39 of the General Statutes of North Carolina, to adopt appropriate rules for the protection of the public health.
- 2. Purpose Consistent with the responsibility to protect and advance the public health, it is declared to be the policy of the Forsyth County Board of Health to require reasonable standards be set to protect the health of any child with a confirmed elevated blood lead level.
- 3. Scope No person who owns property shall maintain such property that is a lead hazard to children or that is in violation of these regulations and standards established by the Forsyth County Board of Health.
- 4. Conflict with other Laws and Rules Federal, state or municipal laws and regulations establishing standards which afford greater protection to the public welfare, safety and health shall prevail over the standards established in these rules.
- 5. Penalties Any person who willfully violates any of the provisions of these rules in Sections II, IV, V, VI, or VII, or any other provisions issued pursuant thereto, shall be guilty of a misdemeanor pursuant to GS 130A-25. The Health Director may also institute an action in the Forsyth County Superior Court for injunctive relief pursuant to G.S. 130A-18. All other remedies provided by state law, including Part 2 of Article 1 Chapter 130A of the North Carolina General Statutes shall be available to the Health Director. Section III of this rule is excluded from this section.
- 6. Appeals Appeals concerning the interpretation and enforcement of these rules by the Forsyth County Department of Public Health shall be conducted in accordance with the procedures established in G.S. 130A-24.

Section II Definitions

- 1. "Abatement" shall mean undertaking any of the following measures to eliminate a lead-based paint hazard:
 - a) Removing lead-based paint from a surface and repainting the surface.
 - b) Removing a component, such as a windowsill, painted with lead-based paint and replacing the component.
 - c) Enclosing a surface painted with lead-based paint with paneling, vinyl siding, or another approved material.

- d) Encapsulating a surface painted with lead-based paint with a sealant.
- e) Any other measure approved by the Health Director
- 2. "Bare Soil" shall mean soil or sand not covered with grass, sod, other vegetation or solid relatively impermeable materials such as pavement or concrete.
- 3. "Child" or "children" shall mean a person(s) less than 6 years of age.
- 4. "Child Occupied Facility" shall mean a building or portion of a building, constructed before 1978, regularly visited by a child who is less than six years of age. Child-occupied facilities may include, but are not limited to, child care facilities, preschools, nurseries, kindergarten classrooms, schools, clinics, or treatment centers including the common areas, grounds, any outbuildings, or other structures appurtenant to the facility.
- 5. "Clearance inspection" shall mean an inspection by the Health Director to determine compliance with an approved remediation plan or the Maintenance Standard method of remediation. A clearance inspection shall consist of a visual inspection and may include lead dust sampling, paint chip sampling, soil sampling, or water sampling.
- 6. "Confirmed Blood Lead Level of Concern" shall mean two consecutive blood lead tests, capillary, venous or a combination of both that have been documented by laboratory analysis within a twelve month period, the lowest of which is not less than 5 or greater than 7 micrograms/deciliter.
- 7. "Confirmed Elevated Blood Lead Level" shall mean two consecutive blood lead tests, capillary, venous or a combination of both that have been documented by laboratory analysis within a twelve month period, the lowest of which is not less than 8 or greater than 19 micrograms/deciliter.
- 8. "Confirmed lead poisoning" means a blood lead concentration of 20 micrograms per deciliter or greater determined by the lower of two consecutive blood tests within a six month period.
- 9. "Environmental investigation" shall mean an on-site evaluation by the Health Director to determine the existence, nature and location of lead hazards in a residence or child occupied facility. An environmental investigation shall include:
 - a) an investigation of the age, history, management and maintenance of the residential housing unit or child occupied facility;
 - b) identifying the number of children who reside in or regularly visit the unit or facility;

- c) a visual assessment;
- d) environmental sampling to include but not limited to dust sampling, paint chip sampling, water sampling, soil sampling or sampling of other materials suspected of meeting the definition of a lead hazard and accessible to children less than six years of age; and
- e) preparation of a report identifying lead hazards and approved remediation strategies.
- 10. "Health Director" means the administrative head of the Forsyth County Department of Public Health or the authorized representative.
- 11. "Lead hazard" shall mean any of the following:
 - a) Any lead-based paint or other substance that contains lead in an amount equal to or greater than 1.0 milligrams lead per square centimeter (mg/cm²) as determined by X-ray fluorescence or five-tenths of a percent (0.5%) lead by weight as determined by chemical analysis: (i) on any readily accessible substance or chewable surface on which there is evidence of teeth marks or mouthing; or (ii) on any other deteriorated or otherwise damaged interior or exterior surface.
 - b) Any substance that contains lead intended for use by children less than six years of age in an amount equal to or greater than 0.06 percent (0.06%) lead by weight as determined by chemical analysis.
 - c) Any concentration of lead dust that is equal to or greater than 40 micrograms per square foot (µg/ft²) on interior or exterior floors including porches and entryways, or 250 µg/ft² on interior windowsills, vinyl mini-blinds, bathtubs, kitchen sinks, or lavatories, or 400 µg/ft² on window troughs.
 - d) Any lead-based paint or other substance that contains lead on a friction or impact surface that is subject to abrasion, rubbing, binding, or damage by repeated contact and where the lead dust concentrations on the nearest horizontal surface underneath the friction or impact surface are equal to or greater than 40 µg/ft² on floors or 250 µg/ft² on interior windowsills or 400 µg/ft² on window troughs.

- e) Any concentration of lead in bare soil or sand in play areas, gardens, pet sleeping areas, and areas within three feet of a residential housing unit or child-occupied facility equal to or greater than 400 parts per million (ppm). Any concentration of lead in bare soil or sand in other locations of the yard equal to or greater than 1,200 ppm.
- f) Any ceramic ware generating equal to or greater than three micrograms of lead per milliliter of leaching solution for flatware or 0.5 micrograms of lead per milliliter for cups, mugs, and pitchers as determined by Method 973.32 of the Association of Official Analytical Chemists.
- g) Any concentration of lead in drinking water equal to or greater than 15 parts per billion.
- 12. "Lead safe work practices" shall mean methods used to avoid creating lead-based paint hazards during on-site work that disturbs paint that may contain lead. Such methods include:
 - a) taking precautions to prevent the spread of lead-contaminated dust by limiting access to the work area to workers only until final cleanup is completed and by having workers remove protective clothing such as gloves and shoes before leaving the work area;
 - b) covering the work area including doorways and sealing floors, closets and cabinets with heavy duty 4-6 mil polyethylene plastic secured with duct tape or the equivalent;
 - c) for exterior surfaces, securing heavy duty 4-6 mil polyethylene plastic on the ground from the foundation extending 10 feet beyond the perimeter of the work area per building floor;
 - d) shutting off the heating, ventilation and cooling system, and covering heating, ventilation and cooling registers with heavy duty 4-6 mil polyethylene plastic secured with duct tape or the equivalent;
 - e) protecting workers by providing necessary protective equipment, training and cleanup equipment and by not allowing eating, drinking, chewing gum or tobacco, or smoking in the work area;
 - f) protecting occupants that may include temporary relocation as necessary;

- g) protecting occupants' belongings by covering with heavy duty 4-6 mil polyethylene plastic secured with duct tape or by removing occupant's belongings from the work area;
- h) misting interior painted surfaces before disturbing or hand scraping all loose paint, wallpaper and plaster;
- i) wet sweeping, collecting, and containing visible debris and plastic sheeting in a secure container;
- j) performing specialized cleaning upon completion of work to remove residual dust and debris;
- k) removing all materials, tools and contained debris from the work area and the residential housing unit upon completion of maintenance activities; and
- 1) avoiding unsafe practices, including:
 - i.) Stripping paint on-site with methylene chloride-based solutions:
 - ii.) Torch or flame burning.
 - iii.) Heating paint with a heat gun above 1,100 degrees Fahrenheit.
 - iv.) Covering with new paint or wallpaper unless all readily accessible lead based paint has been removed;
 - v.) Uncontrolled abrasive blasting, machine sanding, or grinding, except when used with High Efficiency Particulate Air (HEPA) exhaust control that removes particles of 0.3 microns or larger from the air at ninety-nine and seven-tenths percent (99.7%) or greater efficiency;
 - vi.) Uncontrolled water blasting;
 - vii.) Dry scraping, unless around electrical outlets;
- 13. "Maintenance standard" shall mean the following:
 - a) Using lead safe work practices, repairing and repainting areas of deteriorated paint on the interior and exterior of a residential housing unit or child occupied facility;

- b) Cleaning the interior of the unit to remove dust that constitutes a lead hazard;
- c) Adjusting doors and windows to minimize friction or impact on surfaces:
- d) Cleaning any carpets;
- e) Taking such steps as are necessary to ensure that all interior surfaces on which dust might collect are readily cleanable; and
- f) Providing the occupant or occupants all information required to be provided under the Residential Lead-Based Paint Hazard Reduction Act of 1992, and amendments thereto;
- g) Taking such steps as necessary to ensure that all lead contaminated soil is made inaccessible to children.
- 14. "Play area" shall mean an area indicated by the presence of play equipment, toys or other children's possessions, observations of play patterns, or information provided by parents or guardians.
- 15. "Readily accessible substance" shall mean any substance containing lead at a level that constitutes a lead hazard which can be ingested or inhaled by a child under 6 years of age. These substances include deteriorating paint that is peeling, chipping, chalking, cracking, flaking, or blistering to the extent that the paint has separated from the substrate.
- 16. "Regularly visits" means the presence of a child at a residential housing unit or child-occupied facility on at least two different days within any week, provided that each day's visit lasts at least three hours and the combined weekly visits last at least six hours, and the combined annual visits last at least 60 hours.
- 17. "Remediation" shall mean the elimination or control of lead hazards through using the maintenance standard, abatement or any other method approved by the Health Director.
- 18. "Responsible party" shall mean any person who has charge, care, or control of a building.
- 19. "Specialized cleaning" shall mean the use of cleaning protocols that have been shown to be effective in removing lead-contaminated dust as specified by the U.S. Department of Housing and Urban Development (HUD) in the

- Guidelines for the Evaluation and Control of Lead-Based Paint Hazards in Housing and any updates and revisions.
- 20. "Supplemental address" means a residential housing unit or child-occupied facility where a child with a confirmed elevated blood lead level regularly visits or attends. Supplemental address also means a residential housing unit or child-occupied facility where a child resided, regularly visited, or attended within the six months immediately preceding the determination of confirmed elevated blood lead level.
- 21. "Visual inspection" shall mean an on-site visual review by the Health Director to determine compliance with the approved remediation plan.

Section III Blood Lead Testing

- 1. The Forsyth County Board of Health, in recognition: (1) that a growing body of evidence indicates that blood lead levels below 10 micrograms/deciliter are harmful to young children; (2) that the disproportionately greater age of the housing stock in Forsyth County places children at increased risk of lead exposure; and (3) that an effective housing-based program to reduce risk of lead exposure to children is not in place, recommends as an optimal standard of care for children in Forsyth County that all licensed primary care physicians providing well child care in Forsyth County should conduct blood lead screening on all children at 1 year and again at 2 years of age during their well child examinations. Children not tested at one of these times should be tested at least once before the age of 6 years.
- 2. The Forsyth County Board of Health further directs the Health Director to revise existing tools or develop and implement a new tool to be used by each child care center, child care home, preschool, nursery school, or other child care facility, in Forsyth County and licensed or approved by the State of North Carolina, to include an information field or fields to elicit information about previous lead screening for each child admitted to the facility. The information solicited should include date(s) and result(s) of such lead testing. The Health Director will develop policies and procedures by which such forms are reviewed annually by appropriate health department or facility staff and parents of un-tested children are notified of the need for testing.

Section IV Environmental Investigation to Identify Lead Hazards

- 1. When the Health Director learns of a confirmed lead poisoning, the requirements of N.C.G.S. 130A- Article 4. Lead Poisoning and 15A NCAC 18A.3100 Childhood Lead Poisoning Prevention Program shall apply.
- 2. When the Health Director learns of a confirmed elevated blood lead level, the Health Director shall conduct an investigation to identify the lead hazards to children. The Health Director shall investigate the residential housing unit where the child with the confirmed elevated blood lead level resides. The Health Director shall also investigate any supplemental addresses of the child who has a confirmed elevated blood lead level, if deemed necessary.
- 3. When the Health Director learns of a Confirmed blood lead level of concern, the Health Director, shall, upon informed consent from the tenant, investigate the residential housing unit where the child with the confirmed blood lead level of concern resides. If consent to investigate is denied, the child with the confirmed blood lead level of concern cannot be located, or the child's parent or guardian fails to respond, the Health Director shall contact the property owner or responsible party to offer an environmental investigation.
- 4. In conducting an environmental investigation, the Health Director may take environmental samples of surface materials, or other materials suspected of containing lead, for analysis and testing. If environmental samples are taken, chemical determination of the lead content of the samples shall be by atomic absorption spectroscopy or best practices as recommended by State and Federal Authorities.

Section V Notification

Upon determination that a lead hazard exists, the Health Director shall give written notice of the lead hazard to the owner or responsible party of the residential housing unit or child-occupied facility and to all persons residing in, attending, or regularly visiting the unit or facility. The written notice to the owner or responsible party shall include a list of possible methods of remediation

Section VI Remediation

1. When the Health Director learns of a confirmed lead poisoning, the requirements of N.C.G.S. 130A- Article 4. Lead Poisoning and 15A NCAC 18A.3100 Childhood Lead Poisoning Prevention Program shall apply.

- 2. Upon determination that a child has a confirmed elevated blood lead level and that child resides in a residential housing unit containing lead hazards, the Health Director shall require remediation of the lead hazards. The Health Director shall also require remediation of the lead hazards identified at the supplemental addresses of a child less than six years of age with a confirmed elevated blood lead level.
- 3. When remediation of lead hazards is required under subsection 2 of this section, the owner or responsible party shall submit a written remediation plan to the Health Director within 10 business days of receipt of the lead hazard notification and shall obtain written approval of the plan before initiating remediation activities. The remediation plan shall comply with subsections 7, 8, 9 and 10 of this section.
- 4. If the remediation plan submitted fails to meet the requirements of this section, the Health Director shall issue a notice of violation requiring submission of a modified plan. The notice of violation shall indicate the modifications that shall be made to the remediation plan and the date that the modified plan shall be submitted to the Health Director.
- 5. If the owner or responsible party does not submit a remediation plan within 10 business days of the receipt of the notice of violation, the Health Director shall issue a notice of violation requiring submission of a remediation plan within five business days of receipt of the notice of violation.
- 6. The owner or responsible party shall notify the Health Director and the occupants of the dates of remediation activities at least three business days before commencement of the activities.
- 7, Remediation of the lead hazards shall be completed within 60 days of the Health Director's approval of the remediation plan. If the remediation activities are not completed within 60 days, the Health Director shall issue a notice of violation requiring completion of the activities. An owner or responsible party may apply to the Health Director for an extension of the deadline. The Health Director may extend the deadline for 30 days upon proper written application by the owner or responsible party.
- 8. All of the following methods of remediation of lead-based paint hazards are prohibited:
 - a) Stripping paint on-site with methylene chloride-based solutions;
 - b) Torch or flame burning;
 - c) Heating paint with a heat gun above 1,100 degrees Fahrenheit;

- d) Covering with new paint or wallpaper unless all readily accessible lead-based paint has been removed;
- e) Uncontrolled abrasive blasting, machine sanding, or grinding, except when used with High Efficiency Particulate Air (HEPA) exhaust control that removes particles of 0.3 microns or larger from the air at ninety-nine and seven-tenths percent (99.7%) or greater efficiency;
- f) Uncontrolled water blasting;
- g) Dry scraping, unless used in conjunction with heat guns, or around electrical outlets, or when treating no more than two square feet on interior surfaces, or no more than 20 square feet on exterior surfaces;
- 9. All lead-containing waste and residue shall be removed and disposed of in accordance with applicable federal, state, and local laws and rules.
- 10. All remediation plans shall require that the lead hazards be reduced to levels that do not constitute a lead hazard.
- 11. The Health Director shall verify by visual inspection that the approved remediation plan has been completed. There shall be no deteriorated lead based paint or dusty/dirty floors, windowsills, or window troughs at the time of the inspection. Once remediation plan completion has been verified by visual inspection, the Health Director shall perform a clearance inspection and notify the owner or responsible party of the results.
- 12. When owners of residential housing units choose the maintenance standard for remediation, the Health Director shall conduct an annual clearance inspection to verify continued compliance with the Maintenance Standard. The Health Director may also conduct on-site monitoring at any other time that he/she deems necessary to carry out the provisions of these rules. Annual clearance inspections shall be conducted at least 12 months from the date of the last clearance inspection. Clearance inspections shall be discontinued after five consecutive years of passed clearances provided there are no intermittent failures of the clearance inspection.

Section VII Resident Responsibilities

1. In any residential housing unit occupied by a child less than six years of age who has a confirmed elevated blood lead level or Confirmed blood lead level of concern, the Health Director shall advise, in writing, to the resident

the importance of carrying out routine cleaning activities in the unit they occupy. The cleaning activities shall include all of the following:

- a) Cleaning of all windowsills with an all-purpose cleaner and disposable single use cloth or paper towel at least weekly.
- b) Regularly washing all surfaces accessible to children;
- c) In the case of a leased residential housing unit, identifying any deteriorated paint in the unit and notifying the owner or responsible party of the conditions within 72 hours of discovery;
- d) Identifying and understanding potential lead hazards in the environment of each child in the unit (including toys, vinyl miniblinds, playground equipment, drinking water, soil, and painted surfaces), and taking steps to prevent children from ingesting lead such as encouraging children to wash their faces and hands frequently and especially after playing outdoors.

Section VIII Effective Date

Adopted by the Forsyth County Board of Health on December 3, 2008 shall be in full force and effective January 1, 2009.

Mrs. Vera S. Robinson, Chair Forsyth County Board of Health

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C. Timothy Monroe, MD, MPH Health Director

Date

Date