FLEETWOOD DANIELS GROUP L.L.C.
PO Box 1144 Waynesville, NC 28786

XRF Limited Lead-Based Paint Inspection

January 16, 2024

Conducted At:
Graham County Jail
11 Court Street
Robbinsville, NC 28771

Prepared For:
Graham County, North Carolina
Jason Marino
Construction Project Manager
196 Knight Street
Robbinsville, NC 28771

Provided by:
Fleetwood Daniels Group, L.L.C.
NC Certified Lead-Based Paint Firm No. FPB-0323
Suzanne Hinson: NC Certified Lead-Based Paint Inspector/Risk Assessor No. 120217
Project # FDG240113

PROJECT INFORMATION

Fleetwood Daniels Group, L.L.C. (FDG) is pleased to present this limited report of the property survey to identify lead-based paint at the Graham Count Jail located in Robbinsville, North Carolina. The scope of work included interior surfaces in the jail and associated jail office areas in the lower level of the building. The client has indicated that they intend to remove paint from surfaces and repaint these areas. It should be noted that suspect asbestos-containing materials exist in the scope of work and should be tested prior to any disturbance as lead-based paint abatement does not supersede the requirements related to asbestos-containing materials. This survey was not intended to comply with all HUD standards as it was limited to the scope of work. This inspection report includes analytical methods and limitations, discussion of XRF procedures, summary of findings, and recommendations. Suzanne Hinson and Clay Hinson performed the lead-based paint survey at the subject property on January 11, 2024.

INSPECTION

The lead-based paint survey began with our inspectors/risk assessors walking the subject property and documenting room equivalents, testing combinations, and selecting test locations. The walls/sides of the property are distinguished by Side A, B, C, or D. Wall or Side A is facing the street, moving clockwise would be wall/side B, C, or D. After the testing strategy was determined, FDG used a Viken Pb 200e Lead Paint Spectrum Analyzer (XRF) to determine the lead content (mg/cm^2) of painted surfaces at the subject residence. For the purpose of this survey, paints with concentrations of 1.0 mg/cm^2 or greater were considered lead-based paint.

During the inspection the paint was identified as intact or deteriorated. The table below is the HUD/EPA guideline for assessing paint conditions under Title X of the 1992 Housing and Community Development Act (Revision 1/2004).

HUD and EPA
Categories of Paint Film Quality

Type of Building Component [1]	Intact	Deteriorated [2]
Exterior components with large surface areas	Entire surface is intact or less than or equal to 20 ft^2	Damage to more than 20 ft^2
Interior components with large surface areas (wall, ceilings, floors, doors)	Entire surface is intact or less than or equal to 2 ft^2	Damage to more than 2 ft^2
Interior and exterior components with small surface areas (window sills, baseboards, soffits, trim)	Entire surface is intact or less than or equal to 10% of the total surface area of the component	Damage to more than 10% of the total surface area of the component

1. "Building Component" in this table refers to each individual component or side of building, **not** the combined surface area of all similar components in a room (e.g. a wall with three ft^2 of deteriorated paint is considered "deteriorated", even if the other 3 walls in a room have no deteriorated paint).

2. Surfaces in "deteriorated" condition are considered to be "lead-based paint hazards" as defined in Title X and should be addressed through abatement or interim controls.

LIMITED LEAD-BASED PAINT SURVEY RESULTS

Below you will find a chart summarizing painted surfaces tested at the property. However, detectable lead quantities less than 1.0 mg/cm^2 may constitute a lead dust hazard even though it is not a lead-based paint as defined by Federal Standards. FDG recommends that if a building component tests positive for lead-based paint, all similar building components should be considered positive for lead-based paint.

Room Equivalent	Testing Combination	Location	Condition	Result mg/cm^2
Calibration				1.00
Calibration				1.01
Calibration				1.01
Calibration				0.00
Calibration				0.00
Calibration				0.00
Jail Office Areas	Wall – Plaster – Green	Throughout	Deteriorated	0.7
Jail Office Areas	Wall – Plaster – White	Throughout	Deteriorated	0.1
Jail Office Areas	Floor – Concrete – Gray	Throughout	Deteriorated	0.0
Jail Office Areas	Window Sill – Concrete – Green	Throughout	Deteriorated	0.6
Jail Office Areas	Window Sill - Concrete – Green	Throughout	Deteriorated	0.8
Jail Office Areas	**Window Casing – Wood – Green**	**Throughout**	**Deteriorated**	**5.6**
Jail Office Areas	**Window Sash – Wood – Green**	**Throughout**	**Deteriorated**	**3.5**
Jail Office Areas	**Window Sill – Wood – Green**	**Throughout**	**Deteriorated**	**5.5**
Jail Office Areas	Door Casing – Metal – Green	Office/ Laundry	Deteriorated	0.1
Jail Office Areas	Door Jamb – Metal – Green	Office/ Laundry	Deteriorated	0.1
Jail Office Areas	Door – Metal – Green	Office/ Laundry	Deteriorated	0.1
Jail Office Areas	**Door Casing – Wood – Green**	**Closet**	**Deteriorated**	**4.8**
Jail Office Areas	**Door Jamb – Wood – Green**	**Closet**	**Deteriorated**	**2.6**
Jail Office Areas	**Door – Wood – Green**	**Closet**	**Deteriorated**	**4.3**
Jail Office Areas	Window Bars – Metal – Green	Throughout	Intact	0.1
Jail Office Areas	Wall – Plaster – White	Throughout	Deteriorated	0.3
Jail Office Areas	Wall – Plaster – Green	Throughout	Deteriorated	0.2
Jail Office Areas	**Door Casing – Wood - Green**	**Jailer Office**	**Deteriorated**	**6.3**
Jail Office Areas	**Door Jam – Wood – Green**	**Jailer Office**	**Deteriorated**	**4.3**
Jail Office Areas	Window Sill - Concrete – Green	Throughout	Deteriorated	0.7
Jail Office Areas	**Window Casing – Wood – Green**	**Throughout**	**Deteriorated**	**5.7**
Jail Office Areas	**Window Sash – Wood – Green**	**Throughout**	**Deteriorated**	**5.6**
Jail Office Areas	**Window Sill – Wood – Green**	**Throughout**	**Deteriorated**	**5.5**

Room Equivalent	Testing Combination	Location	Condition	Result mg/cm^2
Jail Corridor	Wall – Plaster – Green	Throughout	Deteriorated	0.7
Jail Corridor	Wall – Plaster – White	Throughout	Deteriorated	0.1
Jail Corridor	Door – Wood – Varnish	Corridor/ Jailer	Intact	0.0
Jail Corridor	Door – Metal – Tan	Corridor/ Cells	Deteriorated	0.1
Jail Corridor	Door – Metal – Blue	Corridor/ Cells	Deteriorated	0.1
Jail Corridor	Door Casing – Metal – Green	Corridor/ Cells	Deteriorated	0.1
Jail Corridor	Door Casing – Wood – Green	Corridor/ Probation	Intact	0.1
Jail Corridor	Door – Wood - Varnish	Corridor/ Probation	Intact	0.1
Jail Corridor	Door – Metal – Gray	Entrance/ Exit	Deteriorated	0.0
Jail Corridor	Door Casing – Metal – Gray	Entrance/ Exit	Deteriorated	0.0
Jail Corridor	Door Casing – Metal – Green	Office/ Foyer	Deteriorated	0.0
Jail Corridor	Door – Metal – Green	Office/ Foyer	Deteriorated	0.0
Laundry	Window Casing – Metal – White	Laundry	Intact	0.1
Laundry	Window Sash – Metal – White	Laundry	Intact	0.1
Laundry	Window Sill – Concrete – White	Laundry	Intact	0.5
Laundry	Wall – Plaster – White	Throughout	Intact	0.4
Jail	Wall – Block – White	Throughout	Intact	0.0
Jail	Wall Cap – Metal – White	Throughout	Intact	0.1
Jail	Door Casing – Metal – Gray	To Gen Pop	Deteriorated	0.1
Jail	Door Jamb – Metal – Gray	To Gen Pop	Deteriorated	0.1
Jail	Door – Metal – Gray	To Gen Pop	Deteriorated	0.1
Jail	Floor – Concrete – Gray	Throughout	Deteriorated	0.0
Jail	Door – Metal – Gray	Entrance/ Exit	Deteriorated	0.1
Jail	Wall – Plaster – White	Throughout	Intact	0.0
Jail	Cased Opening – Metal – White	Corridor	Intact	0.5
Jail	Viewing Port Door – Metal – White	Corridor	Intact	0.0
Jail	Door – Gray – Metal	Drunk Tank	Deteriorated	0.0
Jail	Cell – Gray – Metal	Drunk Tank	Deteriorated	0.1
Jail	**Window Sill – Concrete – White**	**Drunk Tank**	**Intact**	**1.3**

Jail	Window Grate – Metal – White	Drunk Tank	Intact	0.0
Jail	Door – Metal – Gray	To Courthouse	Intact	0.2
Jail	Ceiling – Concrete – White	Throughout	Intact	0.3
Jail	Column – Concrete – White	Throughout	Intact	0.3
Jail	Cell – Metal – Gray	Cell Block	Deteriorated	0.0
Jail	Cell – Metal – Gray	Cell Block	Deteriorated	0.0
Jail	Cell – Metal – Gray	Cell Block	Deteriorated	0.1
Jail	Wall – Block – White	Cell Block	Deteriorated	0.0
Jail	Floor – Concrete – Gray	Cell Block	Deteriorated	0.0
Jail	Pipe – Cast – White	Throughout	Intact	0.0
Jail	Wall – Plaster – White	Throughout	Deteriorated	0.1
Jail	Window Panel – Metal – Gray	Cell Block	Deteriorated	0.1
Jail	Window Sill – Concrete – Gray	Cell Block	Deteriorated	0.8
Jail	Pipe – Cast – Green	Cell Block	Deteriorated	0.1
Jail	Header – Concrete – White	Cell Block	Intact	0.3
Jail	Wall – Plaster – White	Throughout	Deteriorated	0.6

Several window components in the jail side were inaccessible due to the metal window covers. The radiators were hot and FDG was not able to test them.

RECOMMENDATIONS (If Applicable)

Painted surfaces tested during the course of this inspection were considered to be "intact" to "deteriorated" condition. Surfaces in "deteriorated" condition are considered to be "lead-based paint hazards" as defined in Title X and should be addressed through abatement or interim controls.

FDG recommends the following options for treatment of identified lead-based hazards or the prevention of future lead-based paint hazards. Any or all of the options listed below will reduce or eliminate the hazard.

Interim Controls: Measures designed to temporarily reduce human exposure or possible exposure to lead-based paint hazards.

1. Paint Film Stabilization
    - **a.** Complete any repairs to control existing moisture or substrate problems if applicable.
    - **b.** Removal of all loose surface material through wet scraping or wet sanding.
    - **c.** Remove surface contaminants with chemical degreasing and washing with TSP.
    - **d.** Application of paint using an appropriate primer.
    - **e.** Application of top coat paint from the same manufacturer.

2. Friction and Impact Reduction Treatments
    - **a.** Cover the surface with an abrasion resistant material.
    - **b.** Repairing the component (e.g. door or window) to good working condition.

3. Dust Removal
    - **a.** Smooth and intact surfaces - HEPA Vacuuming + Wet Washing

b. Upholstery - HEPA Vacuuming
c. Rugs - Cleaned

Abatement: A measure or measures designed to permanently eliminate lead-based paint hazards.

1. Replacement of LBP Coated Building Components
   a. Doors
   b. Windows
   c. Mini-Blinds

2. Enclosure
   a. Rigid, durable barrier to LBP building components
   b. Edges and Seams Sealed

3. Paint Removal
   a. Off-Site using chemical stripping dipping
   b. On-Site using heat guns (for limited areas only)
   c. On-Site-Mechanical removal (HEPA sanding, wet scraping, HEPA vacuum blasting, HEPA vacuum needle gun)
   d. On-Site-Chemical removal

4. Encapsulation
   a. Liquid applied or adhesively bonded covering
   b. Manufacturer must provide a 20 year warranty
   c. Property Owner must conduct periodic visual monitoring
   d. Certified risk assessors must approve the use of encapsulants for a specific surface.

Additionally, FDG recommends that activities that cause the disturbance of lead-based paint be performed by North Carolina Certified workers and supervisors.

RE-EVALUATION

Since lead-based paint is present, the owner or owner's representative should monitor the condition of all painted surfaces.

DISCLOSURE

According to the Federal Law (24 CFR part 35 and 40 CFR part 745) a copy of this summary must be provided to new tenants and purchasers of this facility/property, before they become obligated under a lease or sales contract. The entire report must also be provided to new purchasers and be made available to new tenants. Landlords (lessors) and sellers are also required to distribute an educational pamphlet, including standard warning language in their leases or sales contracts to ensure that parents have the information necessary to protect their children from lead-based paint hazards.

The Occupational Safety and Health Administration (OSHA) Lead in Construction Standard states that "negative" readings (i.e. those below the HUD/EPA definition of what constitutes LBP) **does not** relieve contractors from performing exposure assessments (personal air monitoring) on their employees per the OSHA Lead Standard, and should not be interpreted as lead free. Although a reading may indicate "negative", airborne lead concentrations still may exceed the OSHA Action Level or the OSHA Permissible exposure limit (PEL) depending on the work activity.

QUALIFICATIONS

This report summarizes FDG's evaluation of the conditions observed at the subject property during the course of the survey to identify lead-based paints. Our findings are based upon our observations at the facility and XRF testing performed at the time of this survey. Additional lead-based paints may exist in other portions of the facility but were undetected due to inaccessibility or due to an imperceptible change in paints. Any conditions discovered which deviate from the data contained in this report should be presented to us for our evaluation.

FDG appreciates the opportunity to have provided these services. We would be glad to discuss any of the results contained in this report, at your convenience. If there are any questions concerning this report or results, please contact us.

Sincerely,
FLEETWOOD DANIELS GROUP, L.L.C.

Suzanne Hinson

Suzanne Hinson
Project Principal
N.C. Lead Inspector/Risk Assessor No. 120217