

April 2024

The decision to close playgrounds at the 5 parks was made out of an abundance of caution, through collaboration with NCDEQ, and the encouragement of the Public Community Working Group.

Over the next several months, the existing 14”-18” of playground materials (mulch, soil and rock) were removed, and the deeper soils underneath each playground were tested.

March 2025

The results of those deeper soil tests for each playground are provided in 5 separate park reports, as follows:

Summary for every playground at each park

- Dust particles and air monitoring were conducted for every playground site while the excavation activity took place, and no samples collected exceeded the laboratory method detection limits.

- Once the existing 14”-18” of mulch, soil, and gravel were removed, evidence of waste debris, such as brick, asphalt, glass, and plastic was found underneath every location.

- Playground Soil Sampling – each site was analyzed for the following:
 - Volatile Organic Compounds
 - Semi-Volatile Organic Compounds
 - Metals
 - Mercury
 - Hexavalent Chromium
 - 1,4-Dioxane
 - Ammonia
 - Nitrate-N & Sulfate

Specific Park Report Summary:

Northgate Park

- 3 playground areas were categorized and evaluated as follows:
 - **1-SB** – Small play area, next to the shelter
 - **2-SB** – Largest play area
 - **3-SB** – Swing sets, next to parking lot

- Playground 2-SB - Lead at or exceeding the USEPA health-based screening level of 200 milligrams per kilogram was identified in 3 of the 14 samples.

Playground 2-SB – Initial analysis found levels of the naturally occurring metal, manganese, in one sample that exceeds normal levels. Since manganese occurs naturally in this environment, background sampling is currently being conducted to determine if any further action should be taken.

- Playgrounds 1-SB & 3SB – No exceedances for lead or other risk characteristics that would exceed residential use were found

Lyon Park

- 2 playground areas were categorized and evaluated as follows:
 - **1-SB** – Swing Set area
 - **2-SB** – Larger playground, nearest the parking lot, off of W. Lakewood Ave.
- Playgrounds 1-SB & 2SB – No exceedances for lead or other risk characteristics that would exceed residential use were found

East Durham Park

- There is only 1 playground area on site, and it is categorized as **1-SB**
- Playground 1-SB - Lead at or exceeding the USEPA health-based screening level of 200 milligrams per kilogram was identified in 6 of the 14 samples.
- Playgrounds 1-SB – No exceedances for other risk characteristics that would exceed residential use were found

East End Park

- 2 playground areas were categorized and evaluated as follows:
 - **1-SB** – Small play area, closest to parking lot
 - **2-SB** – Larger playground
- Playground 1-SB - Lead at or exceeding the USEPA health-based screening level of 200 milligrams per kilogram was identified in 2 of the 6 samples.
 - No exceedances for other risk characteristics that would exceed residential use were found
- Playgrounds 2SB – No exceedances for lead or other risk characteristics that would exceed residential use were found

Walltown Park

- There is only 1 playground area on site, and it is categorized as **1-SB**
- Playground 1-SB - Lead at or exceeding the USEPA health-based screening level of 200 milligrams per kilogram was identified in 1 of the 11 samples.

- No exceedances for other risk characteristics that would exceed residential use were found

Next Steps & Anticipated Timeline:

1. Above and below the surface air, vapor and water monitoring analysis will take place at each park, using gas probes and monitoring wells. This process may be repeated over the next 6-9 months to make sure there's an adequate amount of sample readings.

a. Gas samples will be analyzed for:

- i. Volatile organic compounds
- ii. Methane
- iii. Hydrogen Sulfide
- iv. Mercury

b. Groundwater, surface water, and sediment samples will be analyzed for:

- i. Volatile organic compounds
- ii. Semi-volatile organic compounds
- iii. 1,4 Dioxane
- iv. Metals(17)
- v. Ammonia
- vi. Nitrate-N & Sulfate

c. Data from this analysis will further inform us on the conditions (above and below the surface) of each playground and the entirety of each park.

d. East Durham Park air and water monitoring will begin March 2025. It's anticipated to take approximately 2 weeks, with a findings report to be made available sometime in May 2025.

- i. Estimated timelines for all other parks are forthcoming.

e. We anticipate receiving the same findings report for the remaining 4 parks sometime in July 2025.

2. Waste Delineation Activities reports

a. In December 2024, we received the East Durham Waste Delineation Report. This report provided:

- i. The estimated boundary of the waste
- ii. The thickness of waste throughout the boundary
- iii. A reduction of the waste boundary and identified areas of no waste or lead exceedances or other risk factors that were previously identified.

b. We anticipate receiving the same report for the remaining 4 parks by the end of March 2025

3. May-June 2025

- a.** We anticipate having reports for all 5 parks that will inform us of:
 - i.** The estimated boundary of the waste
 - ii.** The thickness of waste throughout the boundary
 - iii.** Risk data for above or below ground air, vapor, or water concerns
 - iv.** Background sample data reports that provide site-specific background levels for chemicals that will be used to evaluate the cover soils for all 5 parks. Background data will also be used to evaluate the borrow soils before importing them to the sites.

- b.** Why are these tests, analysis, and reports needed, and how will they inform our community conversations to consider any action we can take?
 - i.** Potentially re-open areas of some of the parks
 - ii.** Potentially re-open some playgrounds and/or relocate
 - iii.** Inform NCDEQ if waste goes beyond City of Durham properties and into adjacent private properties.