Welcome

• Thank you for joining us this evening. We will get started shortly.

• We will be discussing the Former Conbraco Industries, Inc. property located at 701 Matthews-Mint Hill Rd

• If you have any questions, please place into the Q&A thread.
Site History

- From approximately 1957 through 1998 Conbraco maintained a brass foundry operation.

- 1986 - 2021: DEQ and EPA involved for generator compliance related to hazardous waste management.

- 1986-1989: Documents show use of TCE as a degreaser.

- 2019 - Present: Site closure work including TCE assessment.
What is Vapor Intrusion?

- Underground vapor entering the home
- Radon is most commonly recognized example

Source: “Overview of Vapor Intrusion” Fact Sheet, Agency for Toxic Substances and Disease Registry
What is TCE?

• TCE = Trichlorethylene or Trichloroethene

• TCE can turn into a gas easily (known as volatile), and it is colorless, nonflammable, and has a sweet odor (at higher concentrations).

• Industrial solvent (ex: metal degreaser)

• Some possible household sources:
  • Wood stains, varnishes, and finishes,
  • Adhesives,
  • Typewriter correction fluids,
  • Paint removers, and
  • Cleaners.
Possible human health risks for TCE

• Fetal heart malformations (change in heart growth and development)
  • Fetal heart develops during the first trimester
  • Short-term exposure – heart formation happens over an approximately three-week period

• Immune system effects
  • Long-term exposure (many years to a lifetime)

• Certain types of cancer
  • Kidney, liver, non-Hodgkin’s lymphoma
  • Long-term exposure (many years to a lifetime)
Assessment Activities

- 1988 to 1990 - TCE originally detected in Groundwater Monitoring Wells
- 2004 – Consent Agreement between Conbraco and EPA for Site closure work related to Foundry sand waste
- 2020 (Dec.) – Reinstall monitoring wells
- 2021 (Jan.) – TCE identified in monitoring wells. TCE now a priority and focus of work at the site.
- 2021 (Aug.) – Additional monitoring wells installed. TCE found at elevated levels in groundwater
- 2021(Sept. 15th) – Indoor air testing for occupied areas of the building
- 2021(Sept-Oct) – Preliminary results for indoor air received and shared with building occupants
  - 16 of 17 samples were above action level of 8.8 ug/m3
  - Results ranged from 7.6 to 256 ug/m3

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Next Steps and Interim Measures

Short-term solutions:
- Install Air Filter/Purification Units
- Resample Indoor Air
- Results below the action level will allow occupants to use the building again

Long-term solutions:
- Investigate TCE vapors below the building to develop a remediation plan.

Department of Environmental Quality
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