DOAN BROOK | REGIONAL STORMWATER MANAGEMENT PROGRAM

Doan Brook's Shaker Lakes are the result of two earthen dams built nearly two centuries ago: Horseshoe Lake Dam and Lower Shaker Lake Dam, currently operated and managed by the cities of Cleveland Heights and Shaker Heights.

The Ohio Department of Natural Resources has designated these dams as Class I High Hazard Dams and has determined that they do not meet the safety requirements of this classification. ODNR has directed the cities to address these deficiencies. The Regional Stormwater Management Program has the ability to support the communities in doing so, addressing flooding, erosion, and water quality. Here is where both projects stand today.



Doan Brook Restoration at Horseshoe Park, 90% design conceptual rendering, 2024



The Lower Shaker Lake Dam shown here in 2021 is out of compliance with ODNR Class I High Hazard Dam safety requirements. The dam is owned by the City of Cleveland and managed by the cities of Cleveland Heights and Shaker Heights.

Doan Brook Restoration at Horseshoe Park

STATUS: Final design nearing completion. Construction expected to begin 2026.

The Doan Brook Restoration at Horseshoe Park is the result of technical analysis and thousands of community voices that will become a 60+ acre restoration of the Brook to a more natural state. Open streams and wider floodplains will support healthier stream function and will benefit from community investments in greater accessibility, connectivity, and spaces for engagement. Learn more about the planning process, project history, and how residents helped shape this solution.

UPDATES: neorsd.org/DoanBrook

Lower Shaker Lake Project

STATUS: Updated recommendations presented to dam operators Shaker Heights and Cleveland Heights in August 2025. We continue to engage the cities and stakeholders regarding our recommendation.

Lower Shaker Lake's Dam does not meet ODNR Class I High Hazard Dam safety standards. Our 2025 recommendation to remove the dam and restore the Doan Brook has been presented publicly and we look forward to engaging stakeholders further.

UPDATES: neorsd.org/LowerLake

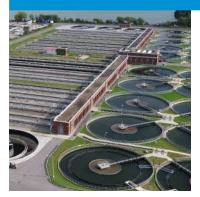


Our programs at work

PROJECT CLEAN LAKE | REGIONAL STORMWATER MANAGEMENT

The Northeast Ohio Regional Sewer District manages stormwater, collects and treats wastewater, and reduces combined sewer overflows. We do this work through two separate programs. Let's take a look at these programs, how they differ, and how both are improving the **Doan Brook watershed**.

PROJECT CLEAN LAKE



Our 24-year commitment to reduce discharges from combined sewers into Lake Erie, the Cuyahoga River, and streams. **This work is funded by sewer fees.**

WHY: To address water quality problems and to comply with the Clean Water Act.

BENEFITS: Reduce combined sewage discharges into the environment by more than 4 billion gallons a year between 2011 and 2034. Includes wastewater treatment plant expansion, such as our Easterly plant shown here, and construction of seven new storage tunnels totaling more than 20 miles of tunnel. This also includes nine large green infrastructure projects constructed in the combined sewer area to reduce the volume of stormwater entering the combined sewer system.

Learn more: neorsd.org/CleanLake

REGIONAL STORMWATER MANAGEMENT PROGRAM



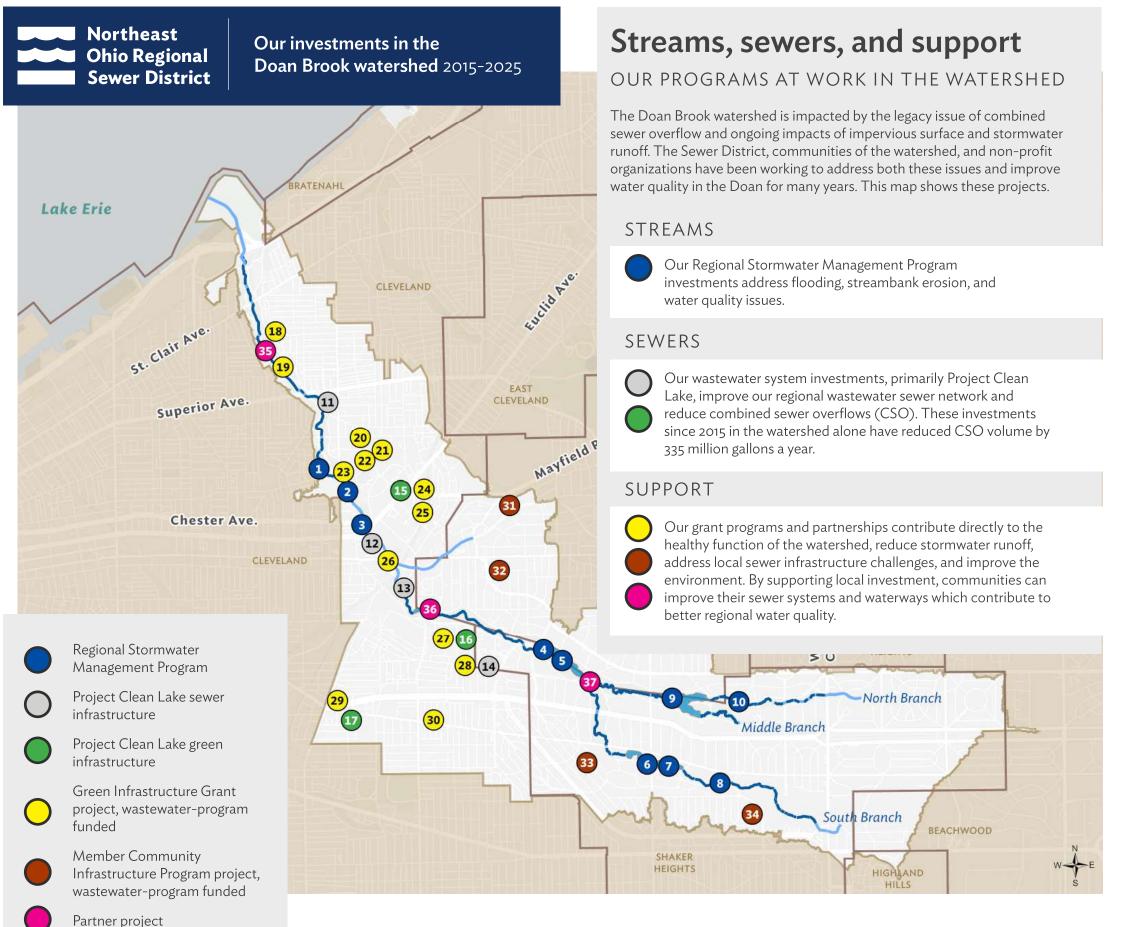
Addresses watershed problems of flooding, streambank erosion, and water quality impacts caused by stormwater runoff. This work is funded by impervious surface fees.

WHY: To address stormwater management problems from a regional perspective, as the causes of flooding, streambank erosion, and water quality concerns cross community boundaries and the solutions must be watershed based.

BENEFITS: Reduce flooding of homes and streets, erosion of streambanks, and non-point source pollution into Lake Erie and local waterways. These benefits are realized both locally and regionally.

Learn more: neorsd.org/stormwater

INSIDE: Visualizing NEORSD investments across both Project Clean Lake and the Regional Stormwater Management Program in the Doan Brook watershed.



Regional Stormwater Management Program

- Doan Brook Stream Enhancement in Cleveland
- 2. Doan Brook Stream and Bank Stabilization
- 3. Doan Brook Culvert Debris Removal
- 4. Lower Shaker Lake Project
- 5. Shaker Lakes Dam Rehabilitation Phase 1: Lower Shaker Lake Dam
- 6. Shaker Lakes Dam Rehabilitation Phase 1: Green Lake Dam
- 7. Shaker Green Lake Dredging
- 8. Doan Brook Stream Stabilization at Shaker Heights Country Club
- 9. Doan Brook Restoration at Horseshoe Park
- 10 Doan Brook Structural Repair at Eaton Road

Project Clean Lake, Sewer Infrastructure

- Doan Valley Relief & Consolidation Sewer
- 12 Doan Valley Regulators & Relief Sewers
- 13. Doan Valley Tunnel
- 14. Kendall Cheshire Regulator & Flood Relief

Project Clean Lake, Green Infrastructure

- 15. University Circle Green Infrastructure
- 16. Fairhill/MLK Green Infrastructure
- 17. Buckeye Green Infrastructure

Green Infrastructure Grant, available in combined sewer area only

18. Stonebrook-White Montessori Campus Stormwater Retention & Education Plan Project

- 19. Centennial Peace Plaza Green Infrastructure Project
- 20. UCI Headquarters Site and Parking Lot Project
- 21. Cleveland History Center
- 22. Sustainable Landscape
 Improvements Phase 2
- 23. West Garden Stormwater Basin at The Cleveland Museum of Natural History
- 24. Intesa (Centric)
- 25. Cozad Bates House Green Infrastructure Project
- 26. MLK Carnegie/RTA Cedar-University Rapid & Bus Station
- 27. Fairhill Partners Campus Green Infrastructure Project
- 28. Kendall and Larchmere Green Infrastructure Parking Lot Renovation
- 29. Ubuntu Gathering Place Project
- 30. Providence House East Campus Parking Lots Project

Member Community Infrastructure Program

- 31. Hampshire Road Illicit Connection and SSO Control
- 32. Delamere Drive Basement Flooding Relief
- 33. SSO V1BX Control Project
- 34. Shaker SSO VA9 Fernway Control Project

Partner Project

- 35. Doan Brook Sowinski Park Floodplain Connection
- 36. Doan Brook Debris Rack Design and Construction in Cleveland Heights
- 37. Nature Center at Shaker Lakes Stream & Wetland Restoration Project

NEORSD investments in the Doan Brook watershed between 2015 and 2025 total more than \$245 million.