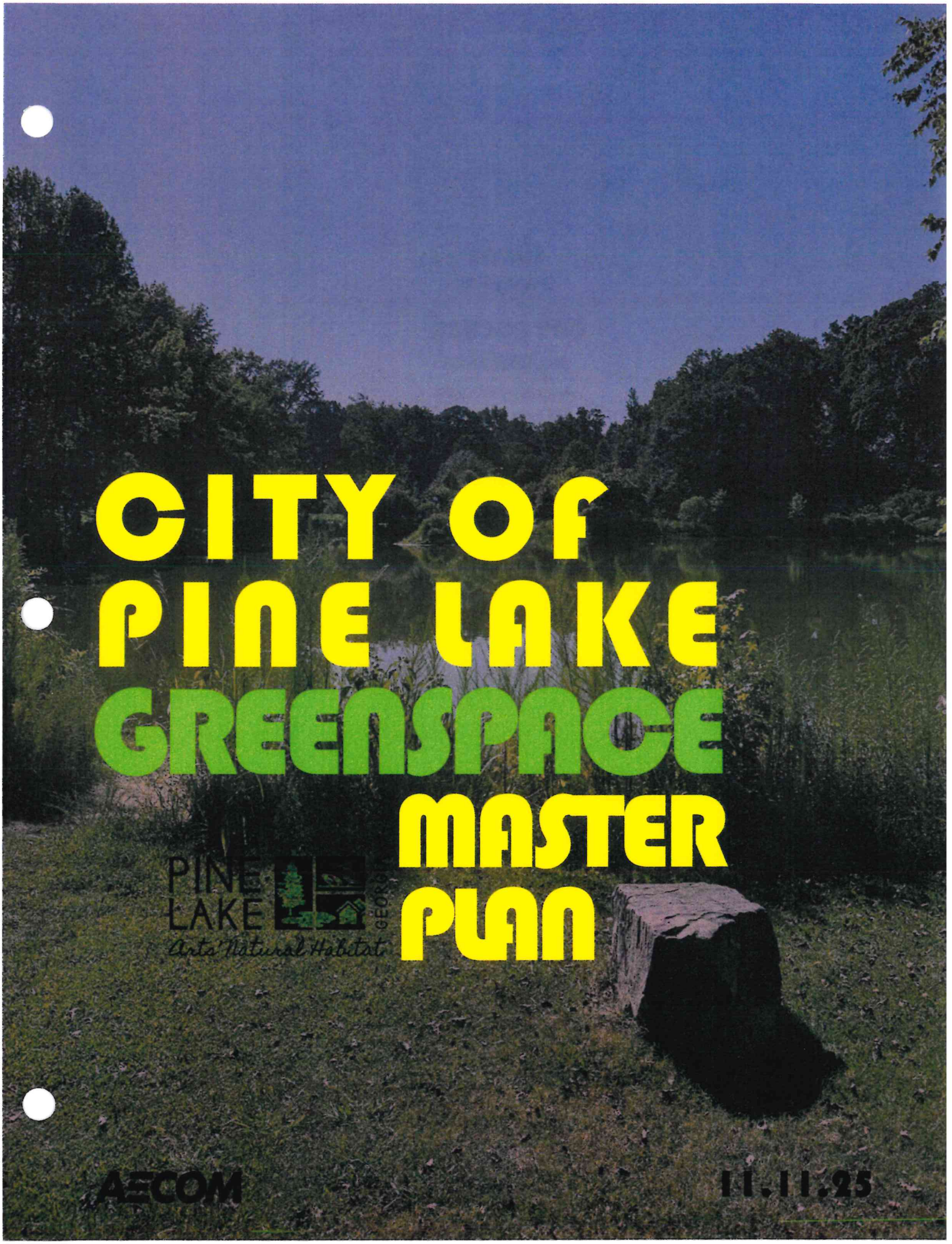
CITY OF
PINE LAKE
GREENSPACE
MASTER
PLAN
PINE
LAKE
GEORGIA
Arts Natural Habitat
AECOM
11.11.25

MAYOR
Brandy Hall

CITY COUNCIL
Jean Bordeaux
Augusta Woods
Jeff Goldberg
Thomas Torrent
Tom Ramsey

PINE LAKE GEORGIA
Arts' Natural Habitat

CONSULTANT TEAM

Shahid Jamil P.E., PMP - AECOM Project Manager
Daniel Rodriguez - AECOM
Mickey O'Brien PLA, LEED AP - AECOM

AECOM

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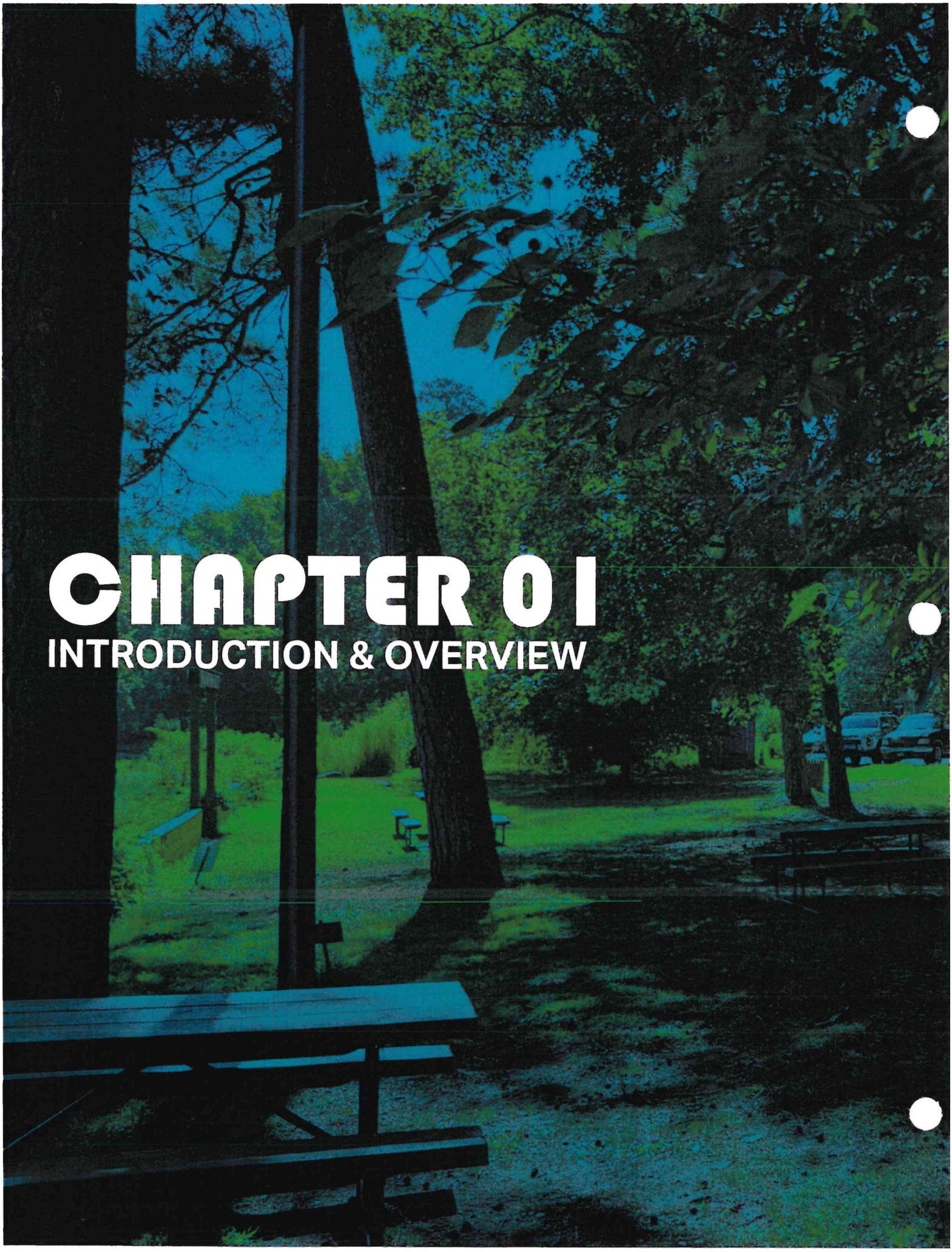
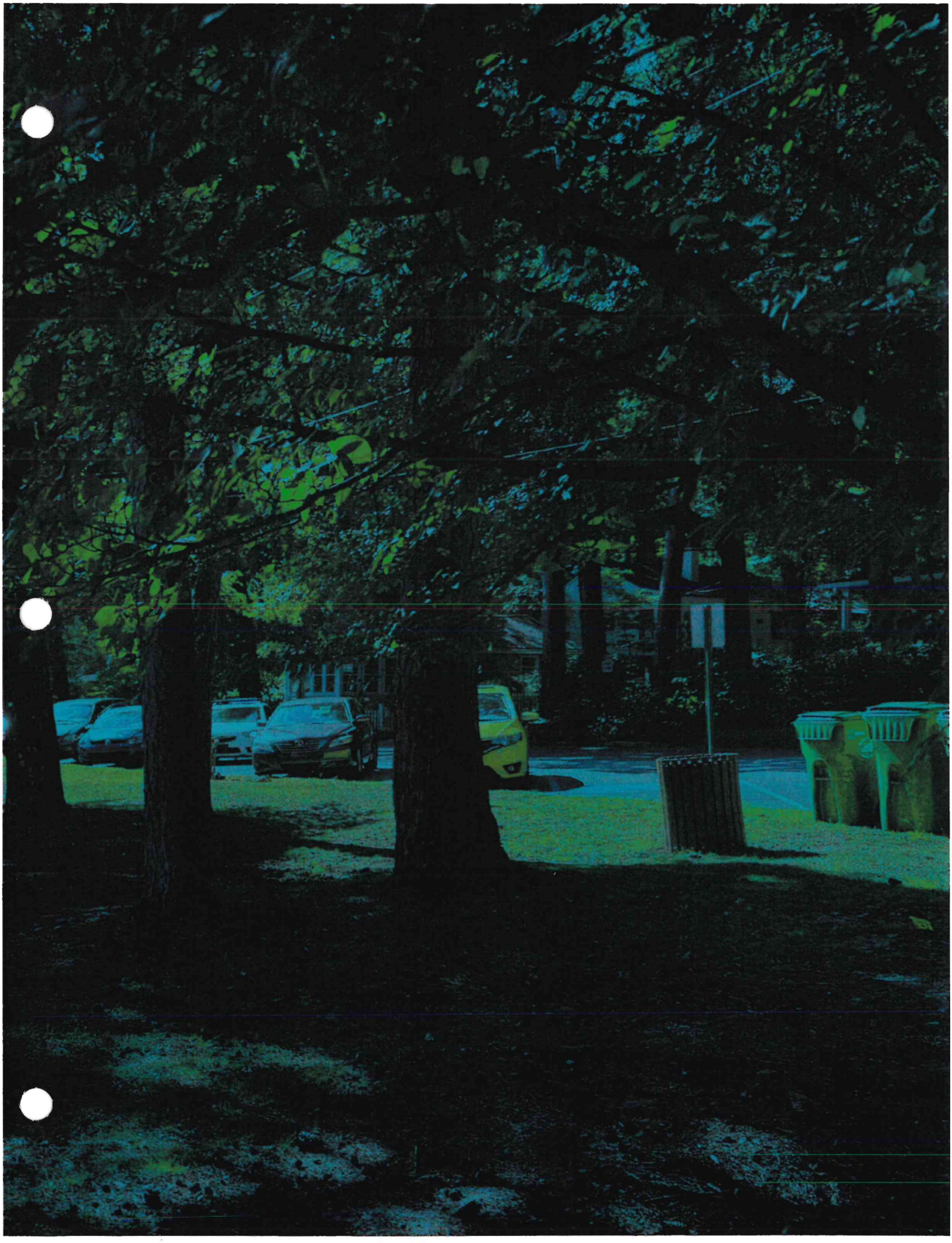


CHAPTER 01
INTRODUCTION & OVERVIEW

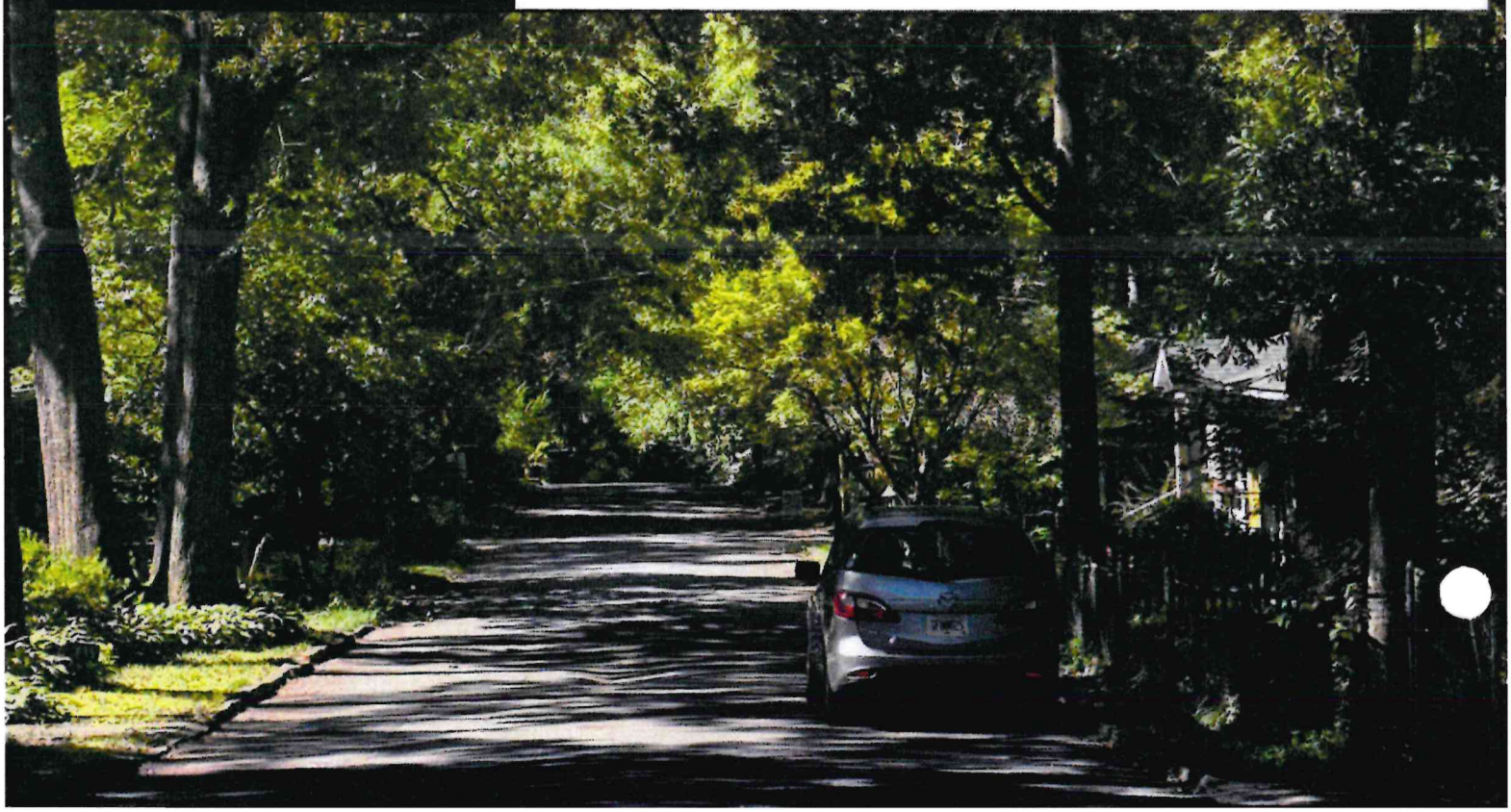


At just 0.25 square miles, Pine Lake proves that small cities can lead with environmental integrity and community connection. Its green spaces create a sense of place where art, nature, and civic life come together.

From the lake and wetlands to trails, pocket parks, and community gardens, this Greenspace Master Plan builds on Pine Lake's legacy of stewardship and inclusive design. It provides a phased framework to enhance accessibility, manage stormwater, and improve public safety through resilient, people-centered landscapes.

PINE LAKE GEORGIA
Arts' Natural Habitat

This plan reaffirms Pine Lake's commitment to ecological health and belonging, ensuring every resident can share in the city's natural beauty and creative spirit.



The City of Pine Lake has long held an environmentalist reputation

This Greenspace Master Plan builds upon Pine Lake's unique legacy. Founded in 1937 as a small resort community built around its namesake lake, the city has evolved from a collection of cabins, tents, and trailers into a vibrant, year-round community. Today, with fewer than 800 residents and less than a quarter square mile of land, Pine Lake holds the distinction of being the smallest city in DeKalb County, yet its history has always been defined by a deep connection to nature, a strong environmental ethic, and a spirit of creativity.

The master plan continues this tradition, crafting a shared vision that protects and enhances Pine Lake's natural assets while improving accessibility, safety, and ecological resilience for all residents and visitors. Developed through a collaborative process between AECOM, city leadership, and the community, the plan outlines a holistic approach to shaping and maintaining the city's greenspaces and streets.

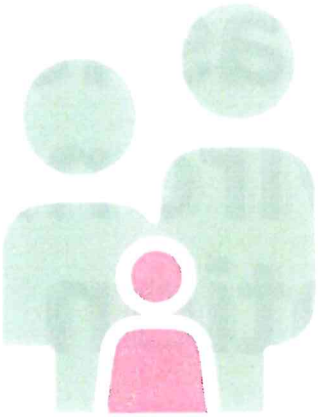
It emphasizes stormwater treatment and water quality improvements as central priorities, using green infrastructure to capture and filter runoff, reduce flooding, and protect the health of Pine Lake's watershed. Equally important, the plan calls for improved maintenance and safer public streets that slow vehicle speeds, support pedestrian movement, and create natural "eyes on the street" through landscaping, lighting, and active public spaces.

Accessibility remains a key principle throughout. The plan establishes ADA-compliant connections to parks, trails, and civic spaces, ensuring that all residents can safely and comfortably experience Pine Lake's green network. These improvements also strengthen neighborhood connectivity, making it easier for residents to walk, roll, or bike between destinations.

Together, these strategies reflect Pine Lake's enduring commitment to ecological preservation, recreation, inclusion, and long-term care. The result is a clear, actionable framework that advances ADA access, erosion control, stormwater management, and public safety, guided by best practices in sustainable park and street design.

Through this effort, the City of Pine Lake reaffirms its legacy as a leader in small-city sustainability, creating a healthy, vibrant, and resilient natural environment that balances environmental stewardship with the everyday needs of its community.

A Thriving Community



20%
Households with Children

The City of Pine Lake Community Survey engaged a broad cross-section of residents, offering insight into the demographics and priorities shaping the future of local greenspaces.

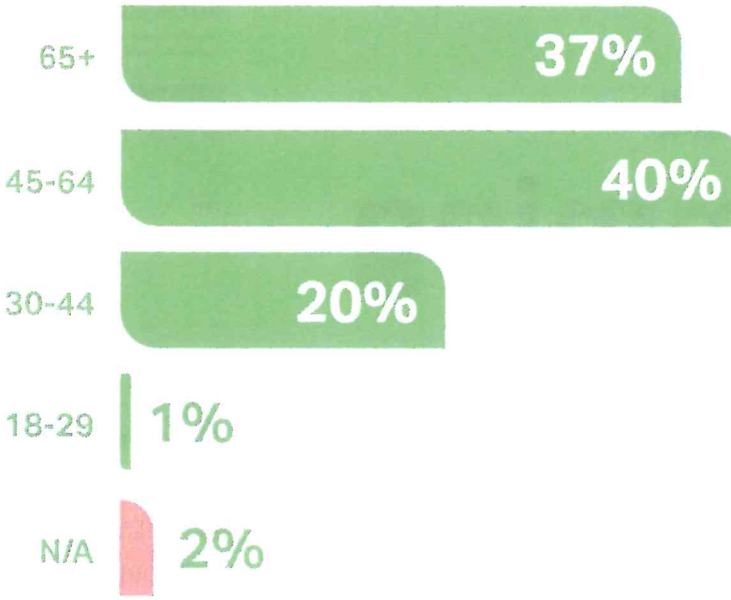
Age and Generations:
The largest share of respondents were between 45 and 64 years old (39%), followed by 30 to 44 years old (30%). Seniors aged 65 and older (18%) and younger adults under 30 (13%) round out the mix. This distribution points to a community that is largely middle-aged yet balanced by a meaningful presence of both retirees and younger residents, an intergenerational blend that brings varied perspectives to planning.

Housing and Stability:
Homeownership stands out as a defining feature of Pine Lake. A strong 81% of respondents own their homes, compared to 19% who rent. This suggests a rooted population with a long-term stake in the quality of local environments, and a vested interest in improvements that support property values, environmental health, and neighborhood livability

Household Composition:
While most households are adult-only, 20% of respondents reported children under 18 living at home. This indicates that family needs, such as safe play areas, child-friendly amenities, and family-oriented

City of Pine Lake Home Ownership

City of Pine Lake Resident Age Distribution

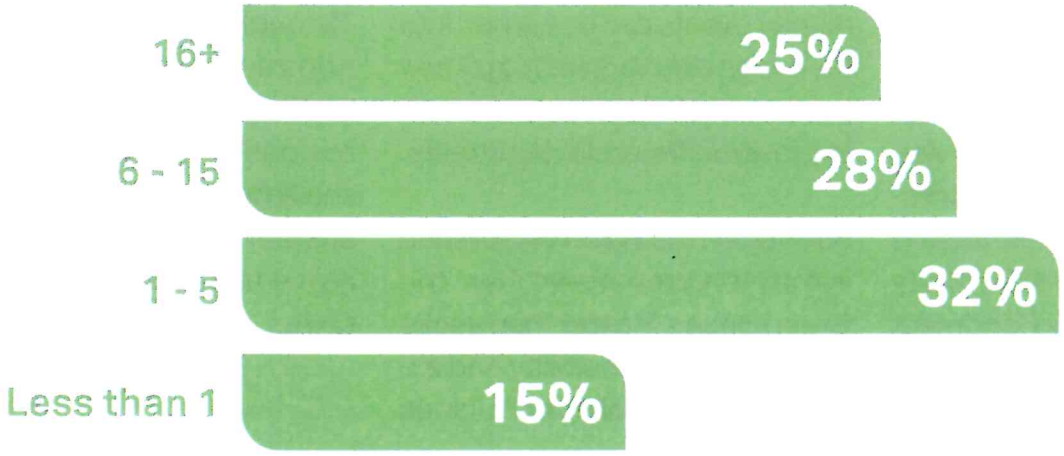


programming, should be thoughtfully integrated into greenspace improvements. Household sizes range widely, with many reporting one to two people but a notable share reflecting larger households.

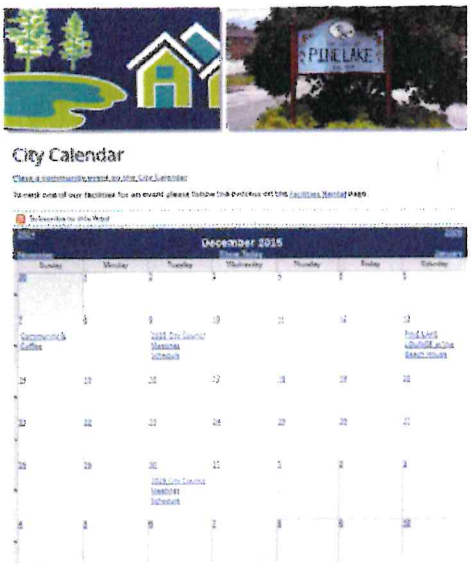
Length of Residency:
Pine Lake's community profile also reflects both stability and renewal. Roughly 32% of respondents have lived in the city for 1 to 5 years, while 28% have been residents for 6 to 15 years, and 25% for 16 years or more. Meanwhile, 15% are newcomers with less than a year of residency, underscoring steady growth and the importance of ensuring new neighbors are integrated into community life.

Key Takeaway:
The demographic data reveals Pine Lake as a stable, homeowner-based community, grounded by long-term residents while welcoming a steady flow of newcomers. The result is a population that balances preservation-oriented values with an openness to new recreational opportunities, a mix that will shape green space priorities for years to come.

Years of Residency in City of Pine Lake



Events & Programming



City of Pine Lakes' 2025 Event Calendar

The community of Pine Lake, Georgia, clearly demonstrates a deep passion for events and programming that is woven into the city's identity. The municipal calendar shows a steady rhythm of gatherings that bring residents together throughout the year. Regular activities such as "Community & Coffee" mornings and the "Pine Lake Lounge at the Beach House" reflect the city's ongoing commitment to connection, creativity, and shared experience.

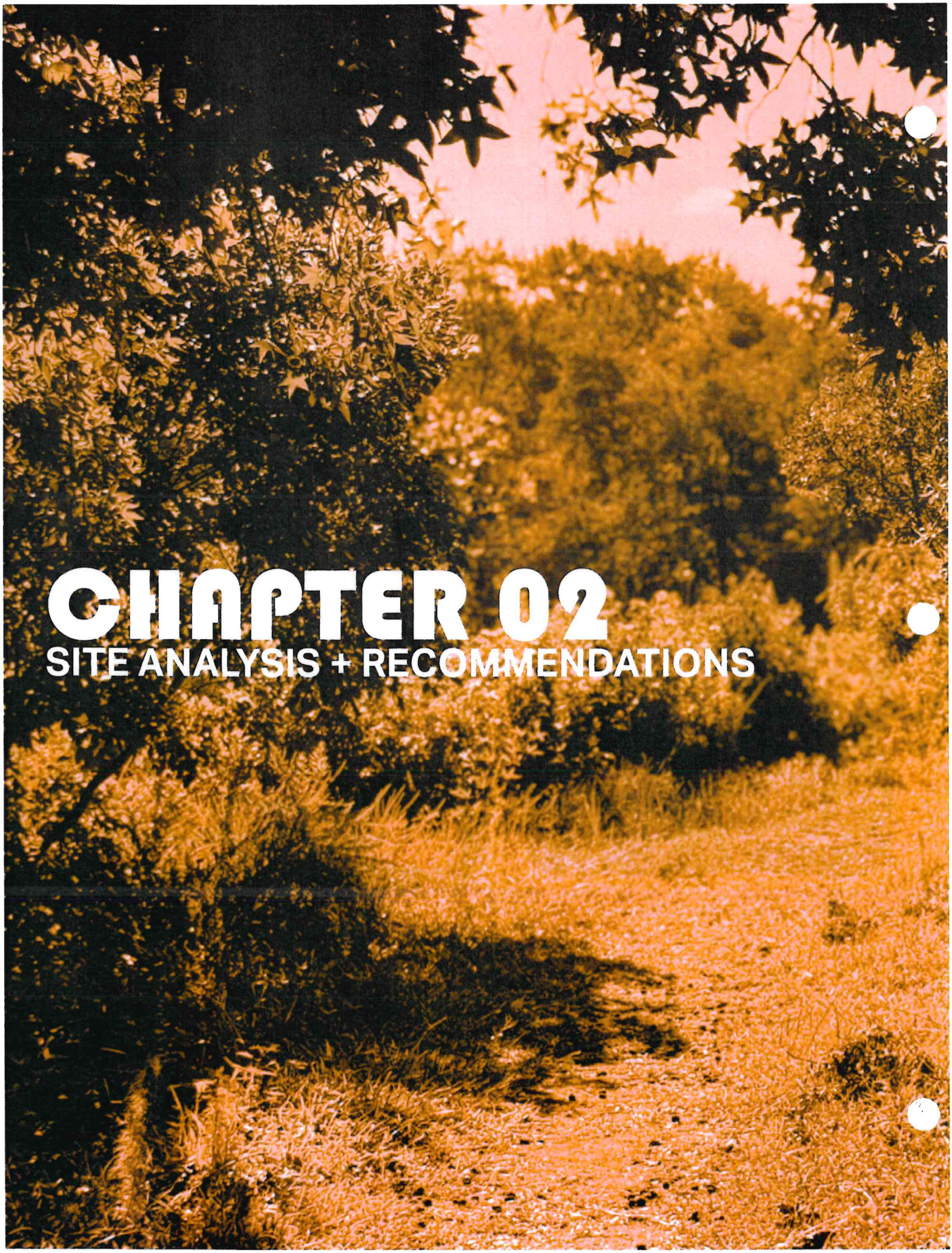
The City's Community Events webpage highlights signature celebrations like LakeFest, held each October, which blends art, music, food, and environmental awareness into a weekend that attracts both residents and visitors. As noted in the 2021 Comprehensive Plan, the lake itself is a focal point for many community events and a defining landmark of civic life. Pine Lake's identity as an arts- and environment-first city is reinforced through programming that brings people together to celebrate creativity, ecology, and belonging. The plan also identifies community activities, friendly neighbors, and the arts as major local assets, underscoring the city's culture of engagement and volunteerism.

This consistent culture of events provides valuable insight for the Park and Open Space Master Plan. Pine Lake does not view its green spaces as static parks, but as dynamic stages for gathering, learning, and cultural expression. The same energy that fuels community events can be carried into the design and programming of new pocket parks, rain gardens, lakefront improvements, and living streets.

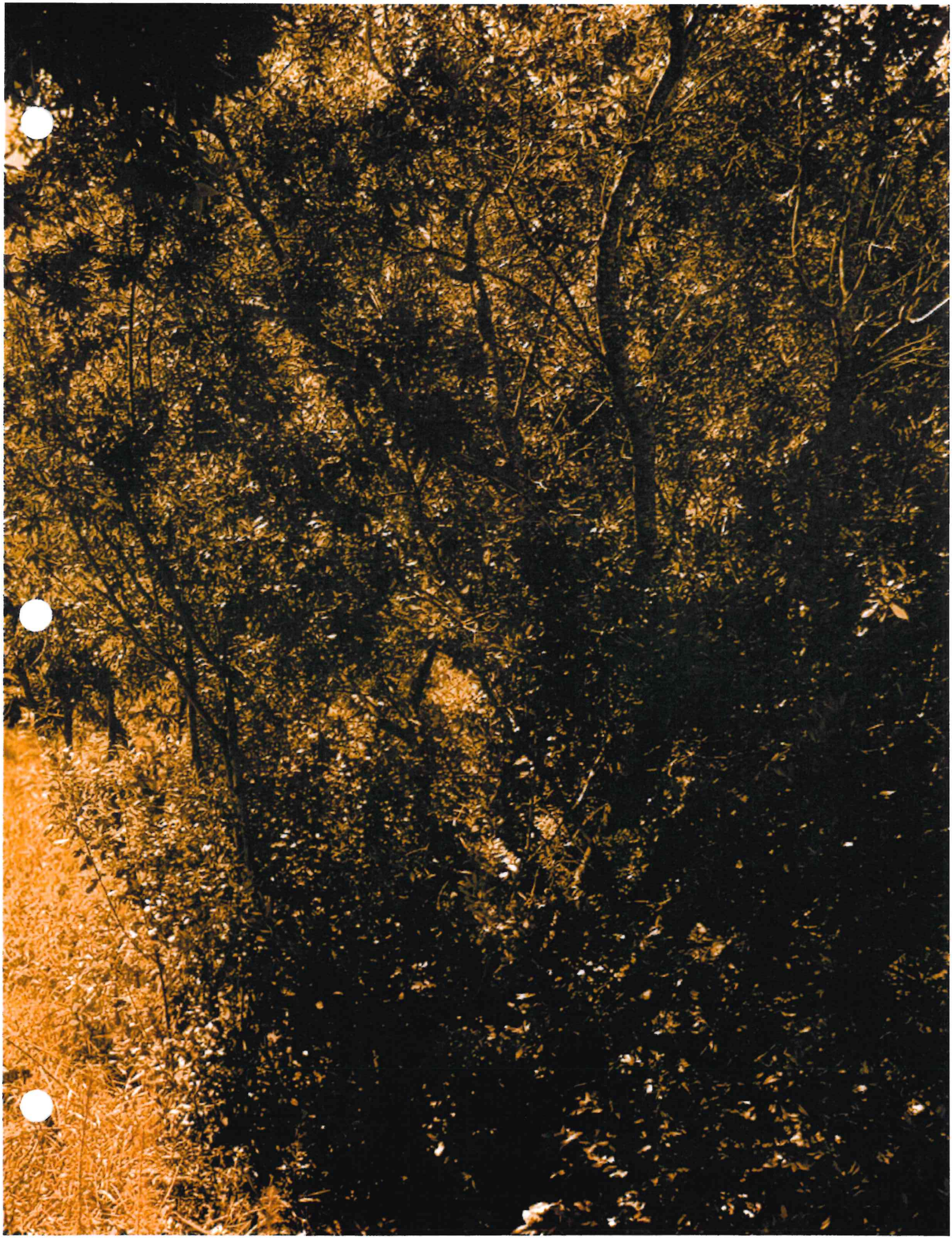
Building on the vision established in the Comprehensive Plan, the Green Space Master Plan seeks to enhance accessibility and expand recreational opportunities for both residents and visitors. By improving pathways, crossings, and connections between key gathering areas, the plan will create a safer, more connected network that supports year-round activities. Flexible open spaces, lakefront areas, and shaded nodes will allow fc both structured and spontaneous programming—whether it be art markets, performances, outdoor education, or volunteer clean-ups.

Ultimately, this plan builds upon Pine Lake's legacy of civic participation and artistic expression by ensuring that its natural and cultural landscapes work together. Through thoughtful design and community stewardship, Pine Lake's green spaces will continue to host events that strengthen social bonds, foster creativity, and sustain the city's proud identity as a small community with a big spirit.

Past event flyers as seen on the City of Pine Lake's website.



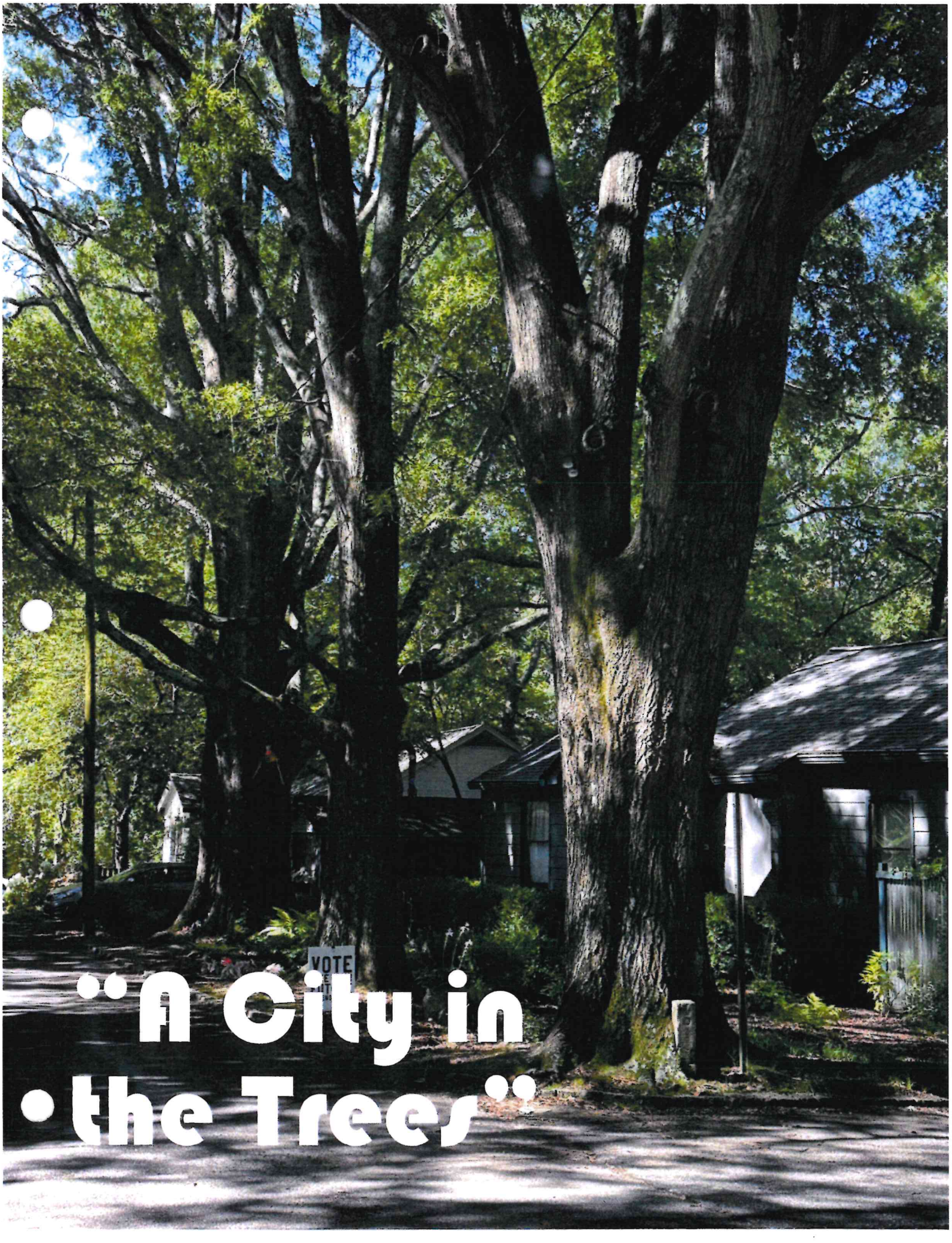
CHAPTER 02
SITE ANALYSIS + RECOMMENDATIONS



These maps illustrate existing conditions revealing key site opportunities

A clear baseline for understanding Pine Lake's natural systems, infrastructure, and recreation areas forms the foundation for future improvements aligned with community priorities identified in the survey. The Existing Conditions Map highlights core features such as the lake, wetlands, community garden, playgrounds, and civic buildings, showing where activity is concentrated and where gaps remain. Survey results confirm that most residents use walking trails and visit the lake and beach regularly, underscoring the importance of investing in these destinations. Topography and Hydrology Maps reveal elevation, drainage, and flood-prone areas, including Snapfinger Creek. Since many residents emphasized better flood and stormwater management, protecting wetlands and improving drainage are key to long-term resilience. Circulation Maps illustrate pedestrian and vehicular patterns, linking directly to feedback on safety and access. Residents supported sidewalk and trail expansion, infrastructure repairs, and living streets that calm traffic while improving connections between green spaces. Together, these findings show that the plan must balance maintenance, connectivity, and ecological function with Pine Lake's small-city character.

With an estimated **75% tree canopy—far exceeding Atlanta's 47% and the national urban average of 26%**—Pine Lake holds a distinctive ecological identity. Trees enhance air quality, manage heat and stormwater, support biodiversity, and improve health property values, and community well-being.



"A City in the Trees"

City of Pine Lake Greenspace Master Plan: Existing Conditions

Legend

- Pine Lake
- Existing Greenspace
- Existing Beach
- Existing Park Space
- Existing Buildings
- Parcel Line
- Existing Road
- Existing Permeable Trail
- Existing Impermeable Tra
- Snapfinger Creek

Park Spaces

- (A) Tennis Court
- (B) Pocket Park
- (C) West Wet Lands
- (D) Interactive Sculpture
- (E) Playground
- (F) Pine Lake Beach
- (G) Community Garden
- (H) Monarch Butterfly Garden
- (I) East Wet Lands
- (J) Turtle Island
- (K) Mini Library
- (L) Berm/Trail
- (M) Pine Dr. Park
- (N) Poplar Park

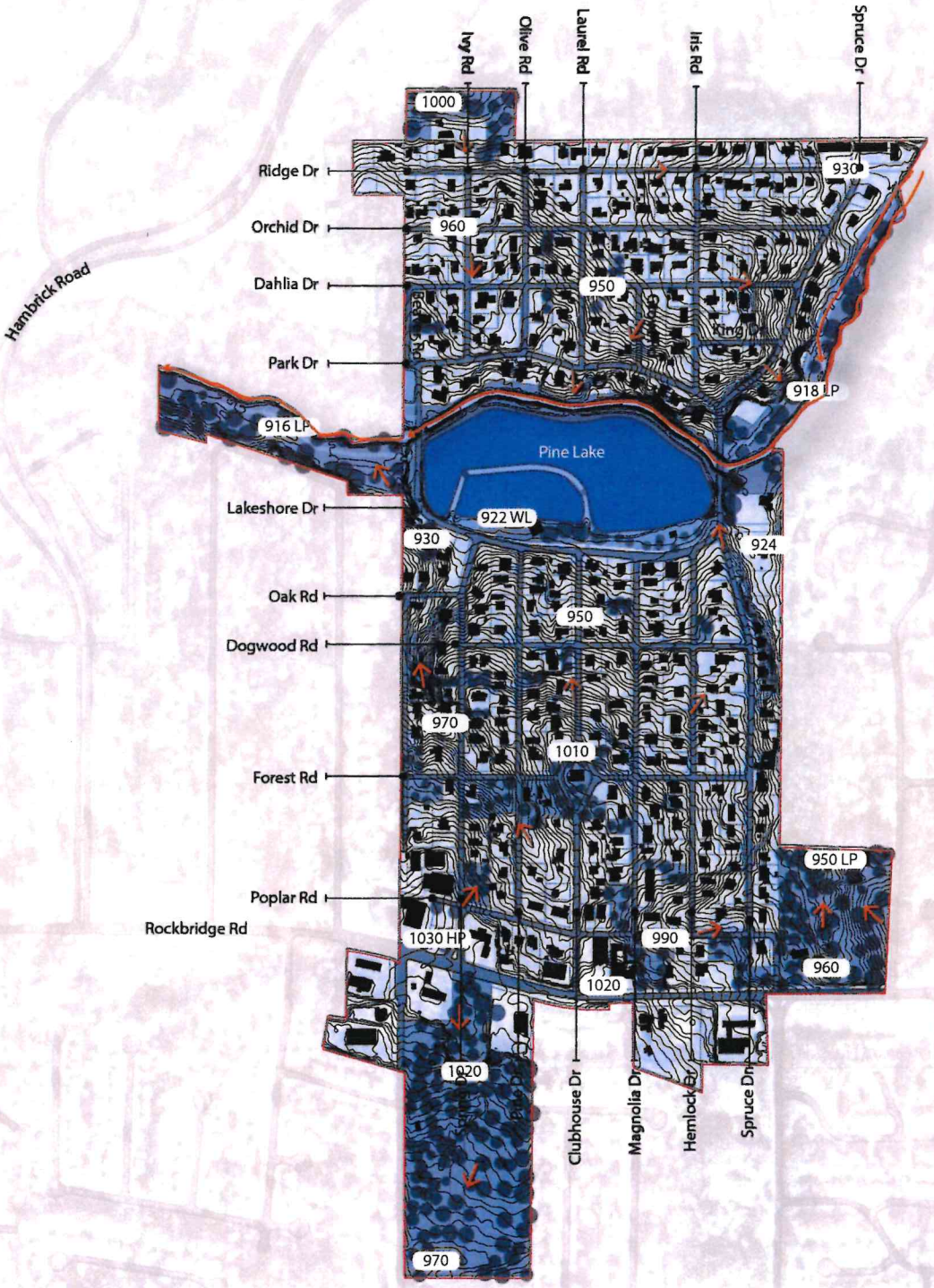
Important Buildings

1. City Hall
2. Clubhouse
3. Beach House
4. Post Office
5. Court House & Council Chambers

N

0 0.1 0.2 Miles

Pine Lake Greenspace Master Plan: Topographic Features



Legend

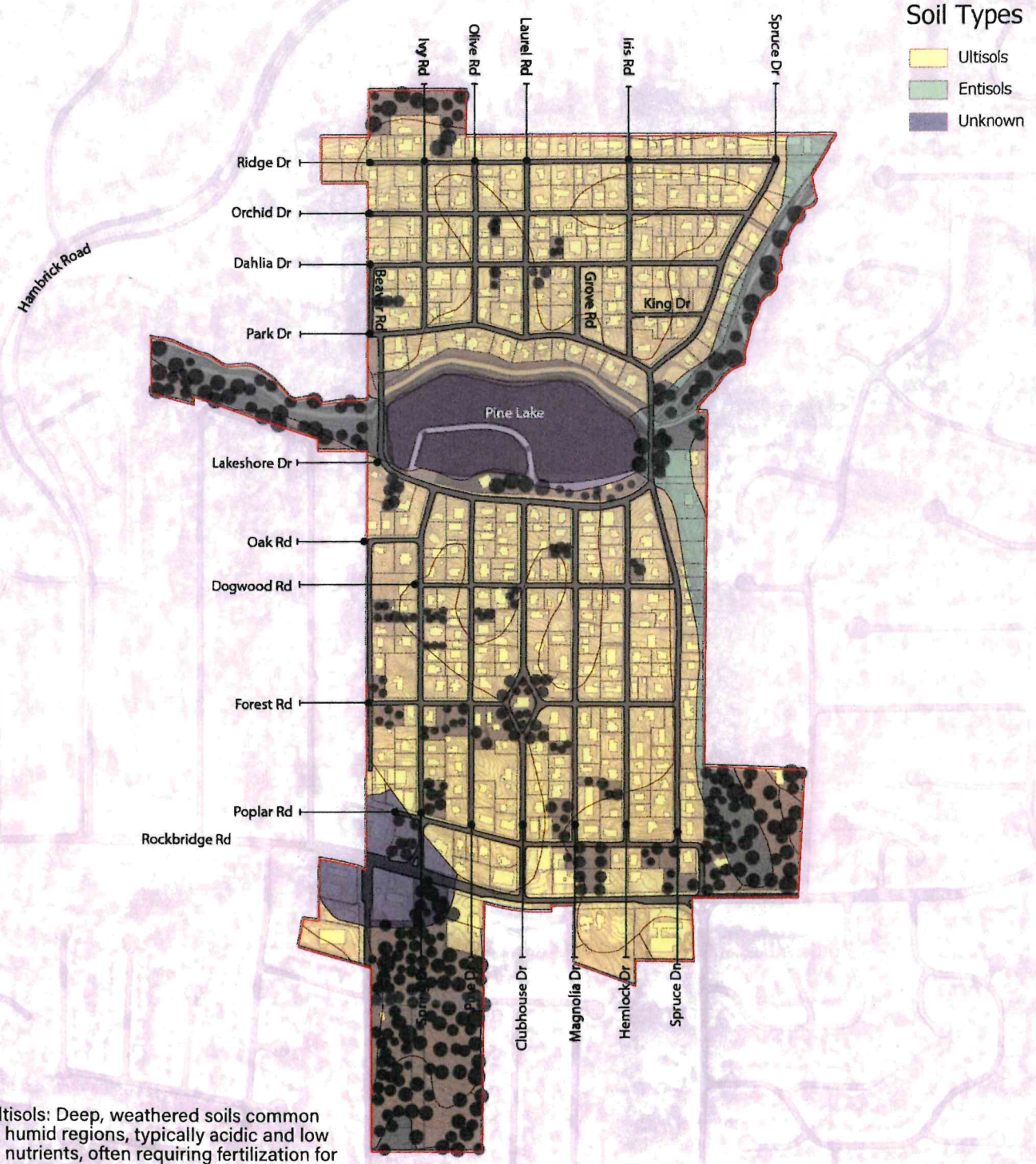
Topography

- Contour
- Flow Direction
- ### Spot Grade
- #HP High Point
- #LP Low Point
- #WL Water Line
- Pine Lake

N

0 0.1 0.2 Miles

Pine Lake Greenspace Master Plan: Soils



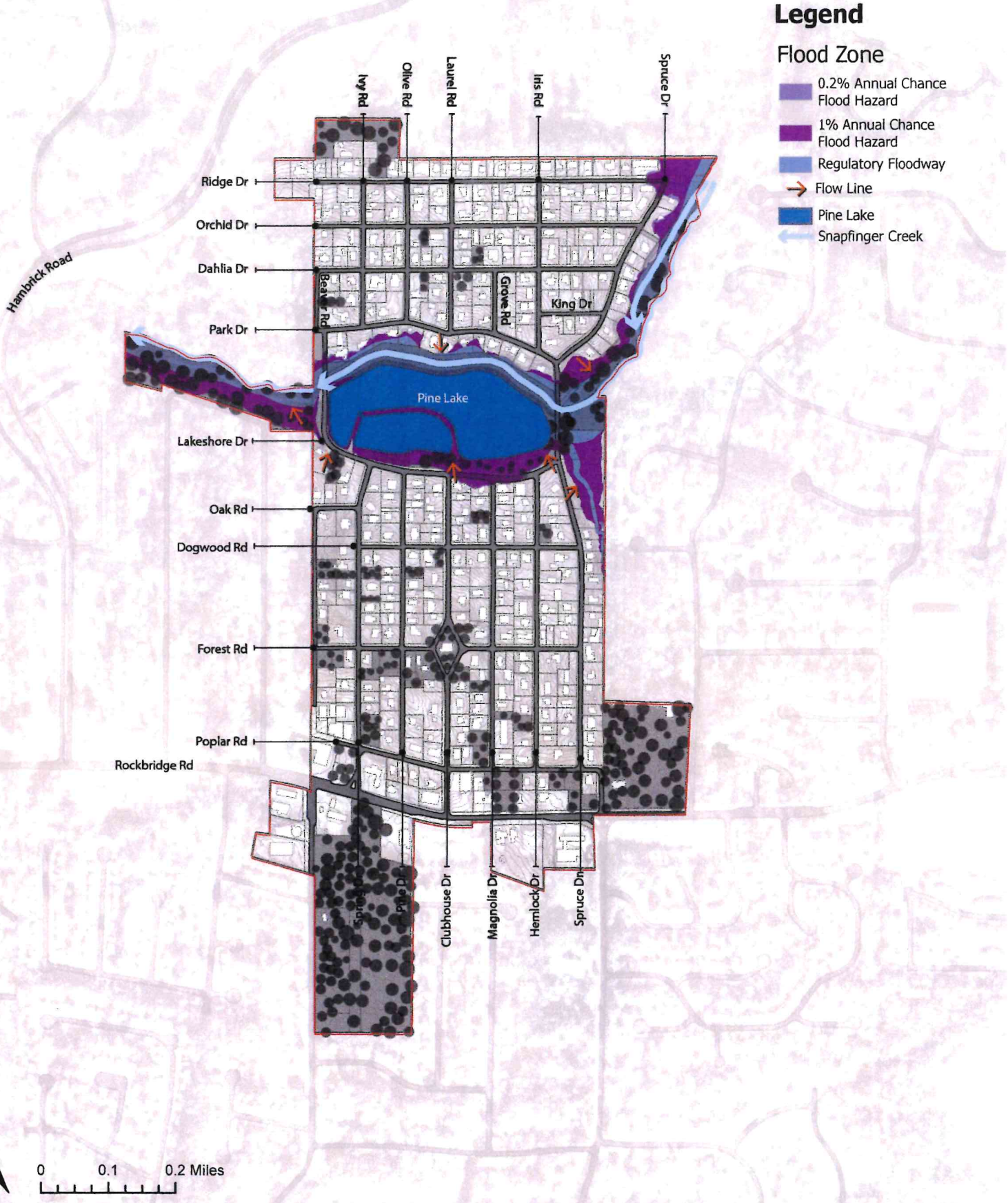
Ultisols: Deep, weathered soils common in humid regions, typically acidic and low in nutrients, often requiring fertilization for agriculture.

Entisols: Young soils with little profile development, found in areas like floodplains, dunes, or steep slopes, often sandy or rocky.

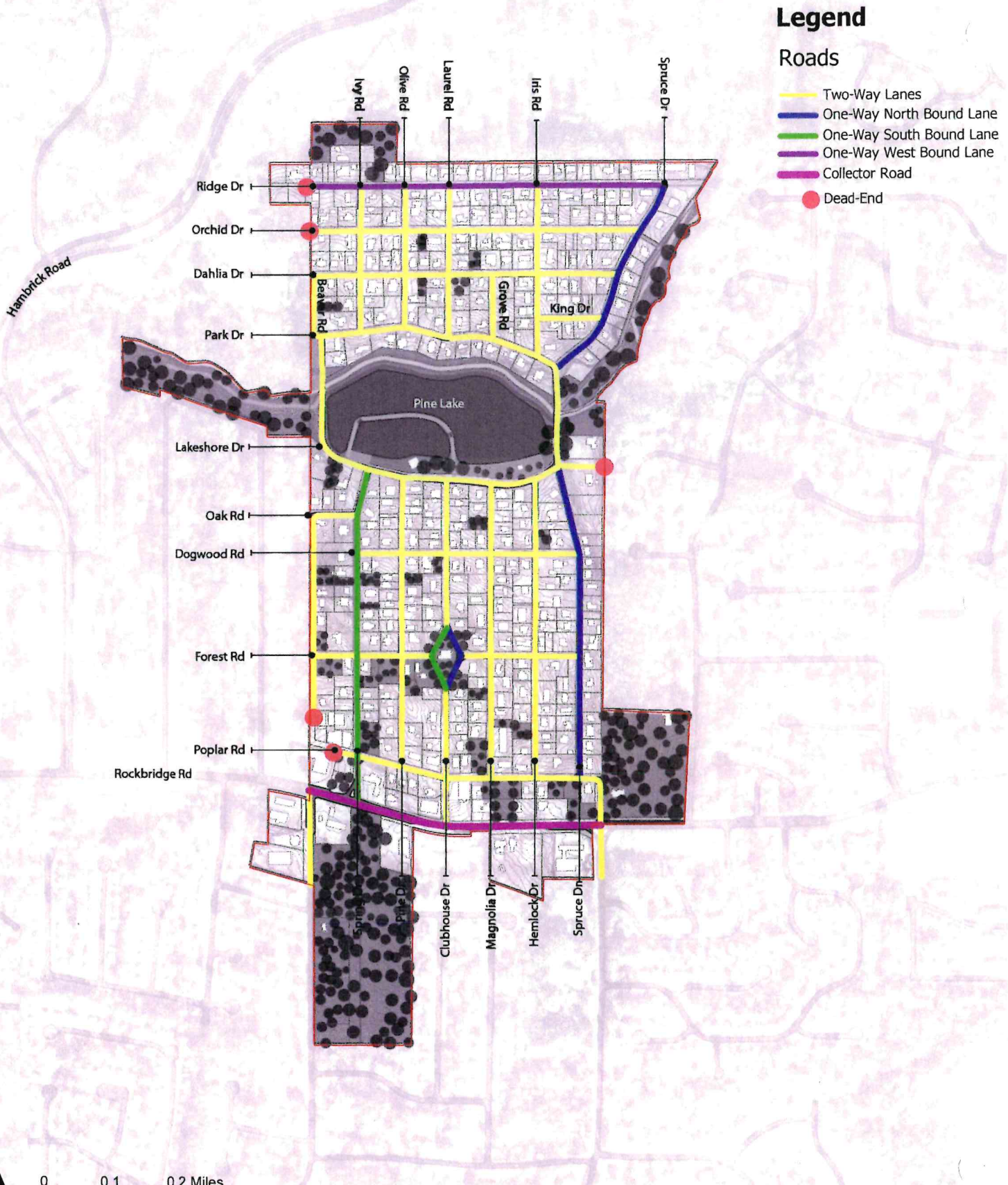
N

0 0.1 0.2 Miles

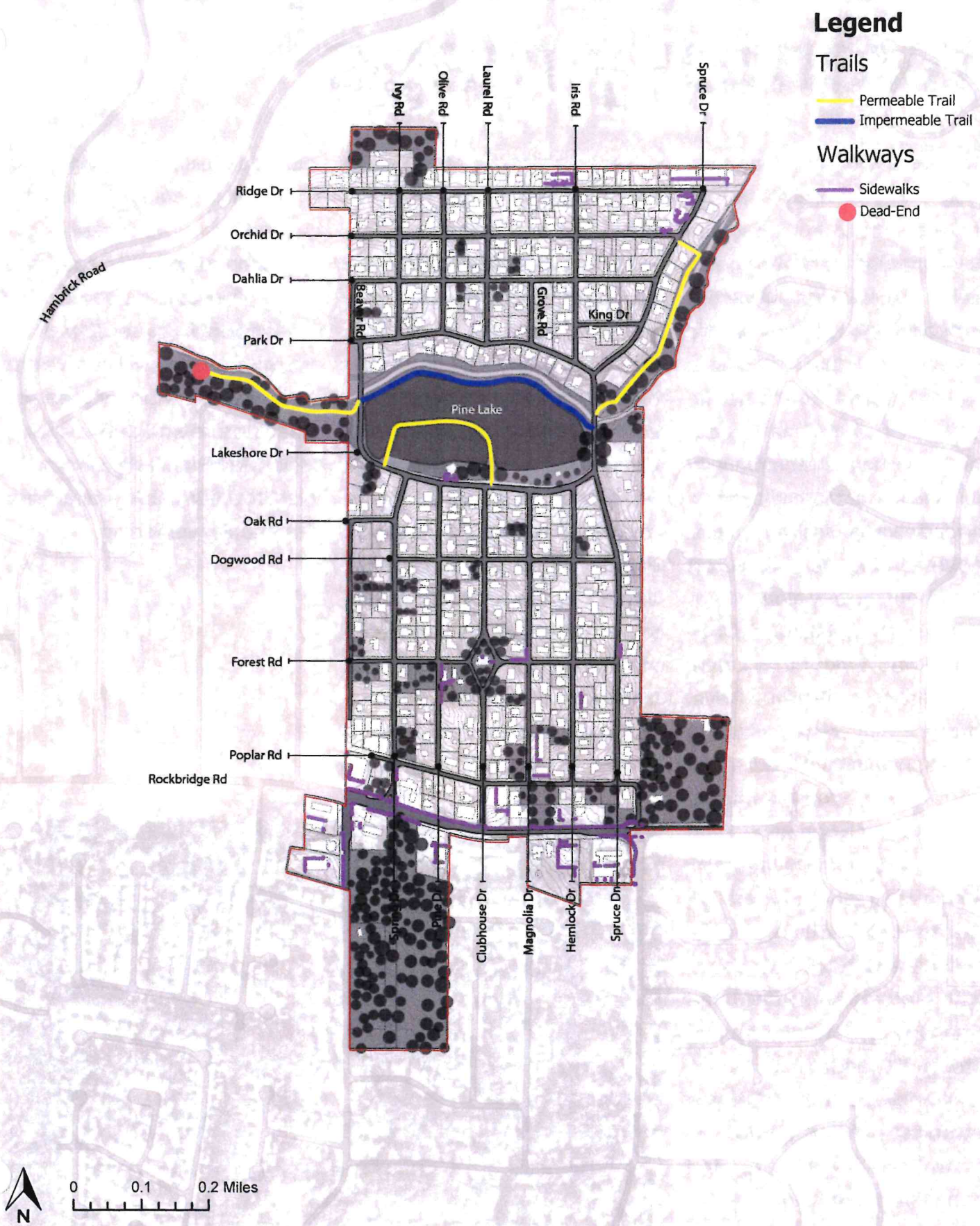
Pine Lake Greenspace Master Plan: Hydrology



Pine Lake Greenspace Master Plan: Vehicular Circulation

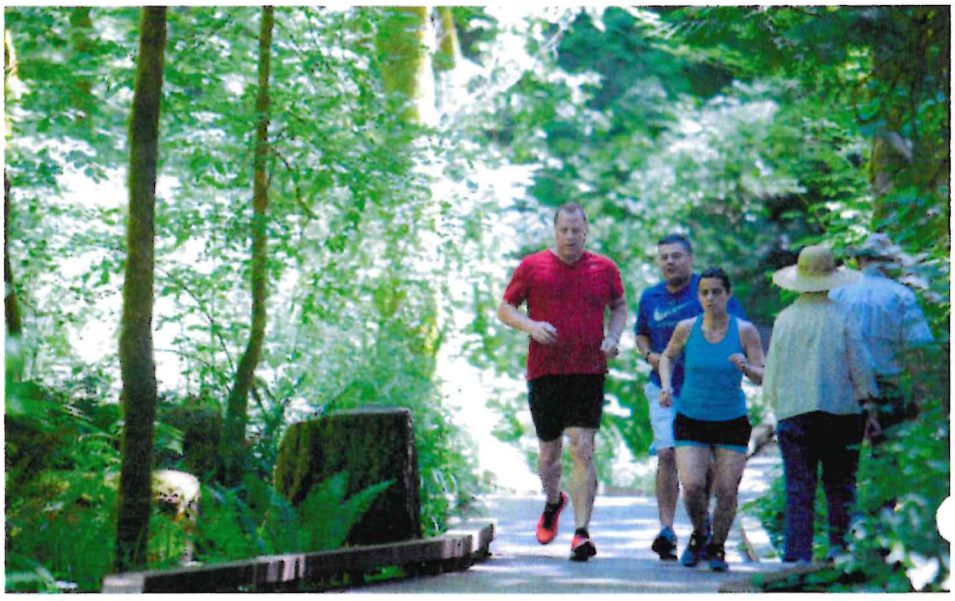


Pine Lake Greenspace Master Plan: Pedestrian Facilities



Greenspace project inventory maps

A total of 22 city-owned parcels across Pine Lake present opportunities to expand and strengthen the community's green space network. Because these properties are publicly owned, they can be activated quickly for public benefit, transforming underused land into a cohesive system of parks, ecological corridors, and community gathering spaces that improve both environmental and social outcomes. These parcels are distributed throughout the city along major streets such as Oak Road, Dogwood Road, Lakeshore Drive, Magnolia Drive, and Park Drive. Many are located near existing recreational amenities, trails, and community nodes, creating a foundation for a connected and resilient green space system. Rather than treating each parcel as an isolated park, this plan envisions them as strategic pieces of an integrated network designed to manage stormwater, improve water quality, and enhance community access. Many sites are well suited for bioretention areas, wet meadow planting, and permeable paving, allowing rainwater to infiltrate naturally and filter pollutants before reaching Pine Lake and nearby creeks. In addition to these parcels, the plan identifies six key streets for green infrastructure retrofits, including bioswales, tree canopy expansion, and permeable intersections, that will calm traffic and create safe greenway corridors for pedestrians and cyclists. These routes will link neighborhoods directly to the city's parks, trails, and community destinations, forming an accessible, low-impact mobility network that doubles as functional stormwater infrastructure. Together, these improvements position Pine Lake to achieve multiple goals: enhancing watershed health, increasing walkability, promoting climate resilience, and expanding public access to nature. Over time, the coordinated investment in these 22 parcels and six corridors will evolve into a citywide network of green infrastructure and public space, reflecting Pine Lake's commitment to sustainability, safety, and community well being.

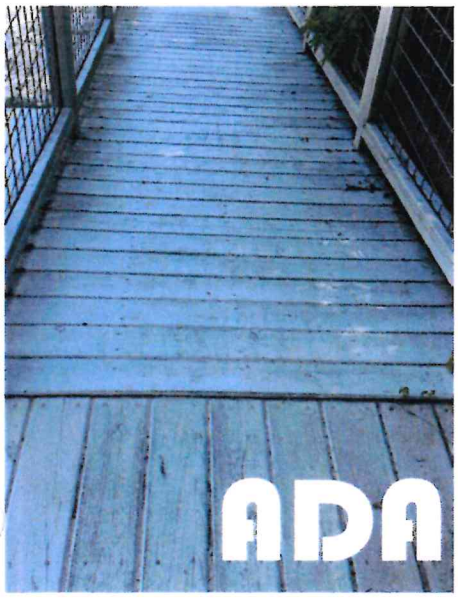



Erosion


Maintenance


Accessibility


Design
Language

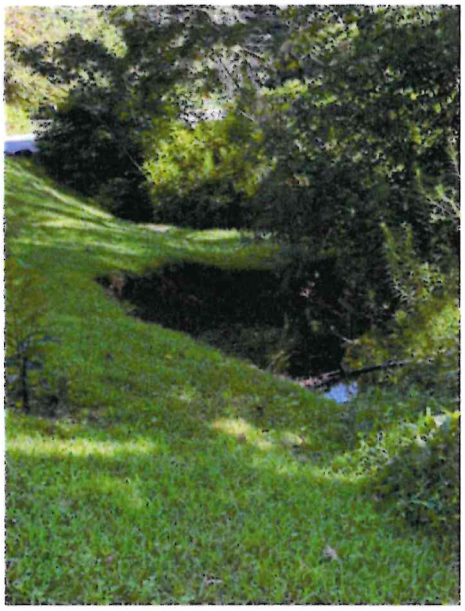

ADA

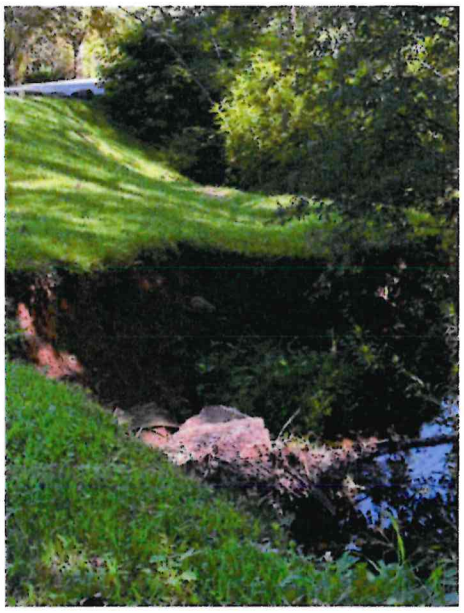
Stream Bank & Lake Erosion Treatment

This streambank and shoreline stabilization strategy outlines a long-term approach for protecting Pine Lake's edge and adjacent stream corridors. By combining structural stability with native vegetation, the design creates a self-sustaining system that prevents erosion, improves water quality, and strengthens the lake's ecological resilience.

Interventions are proposed at Lots 3,5, 6, 7, 9, and 10, where active stream channels and steep slopes contribute to erosion and sedimentation in the western and northern wetlands. Restoring these banks will stabilize soil, filter stormwater runoff, and improve aquatic habitat conditions throughout the watershed.

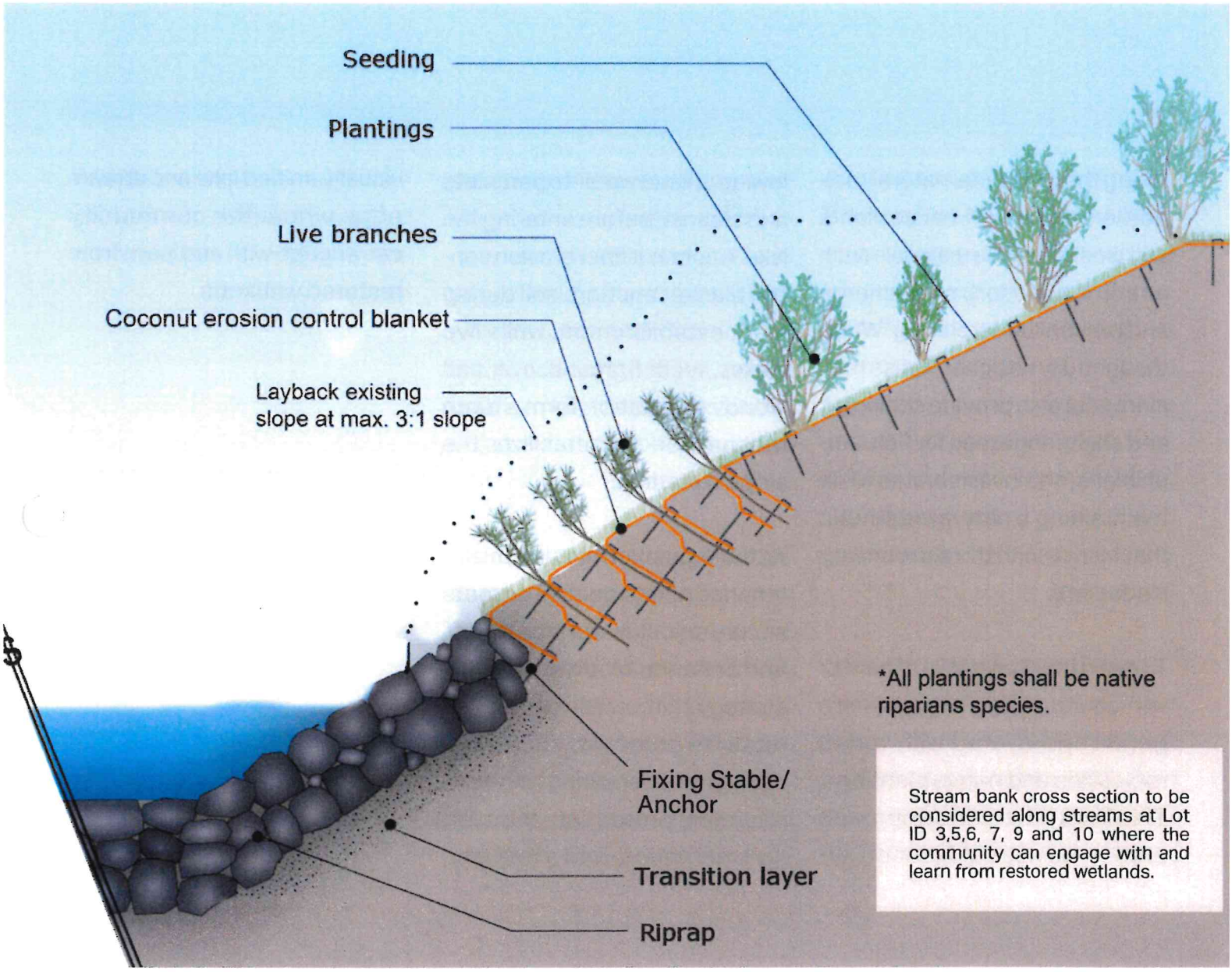
At both stream and lake edges, the design begins by regrading slopes to a stable 3:1 ratio, reducing runoff velocity and soil loss.





Existing Erosion at Lot ID 6

Shoreline erosion treatment as needed

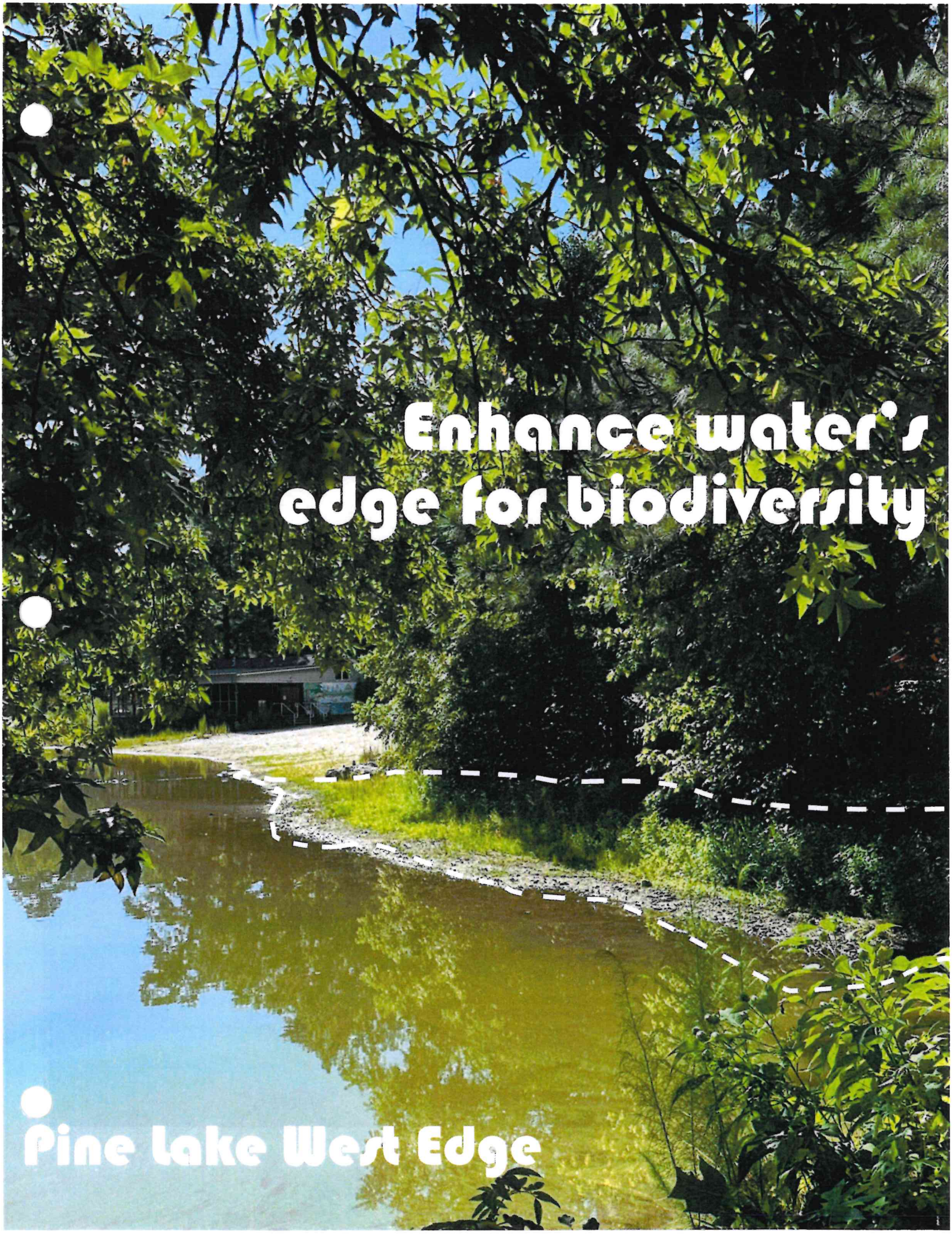


Stream bank erosion treatment section.

Along the shoreline, natural rock borders paired with native plants and biodegradable materials such as coir logs absorb wave energy and prevent undercutting. When thoughtfully designed, these rock elements also provide spawning and sheltering areas for fish, amphibians, and invertebrates while maintaining a natural aesthetic that blends with the surrounding landscape.

To avoid the drawbacks of hard or vertical structures, slopes remain gentle and layered with varied rock sizes and native plantings. This living shoreline approach preserves natural filtration, allowing upland water to percolate and cleanse before entering the lake. A coconut fiber erosion control blanket anchors soil during plant establishment, while live stakes, seeded groundcover, and woody vegetation form a deep root network that stabilizes the slope over time.

As the vegetation matures, maintenance needs decline as roots secure soil, slow surface runoff, and enhance biodiversity. This strategy shifts care from erosion repair to proactive ecological management, ensuring long-term shoreline protection, reduced sedimentation, and a resilient, visually unified lake and stream edge where the community can engage with and learn from restored wetlands.


Enhance water's edge for biodiversity
Pine Lake West Edge

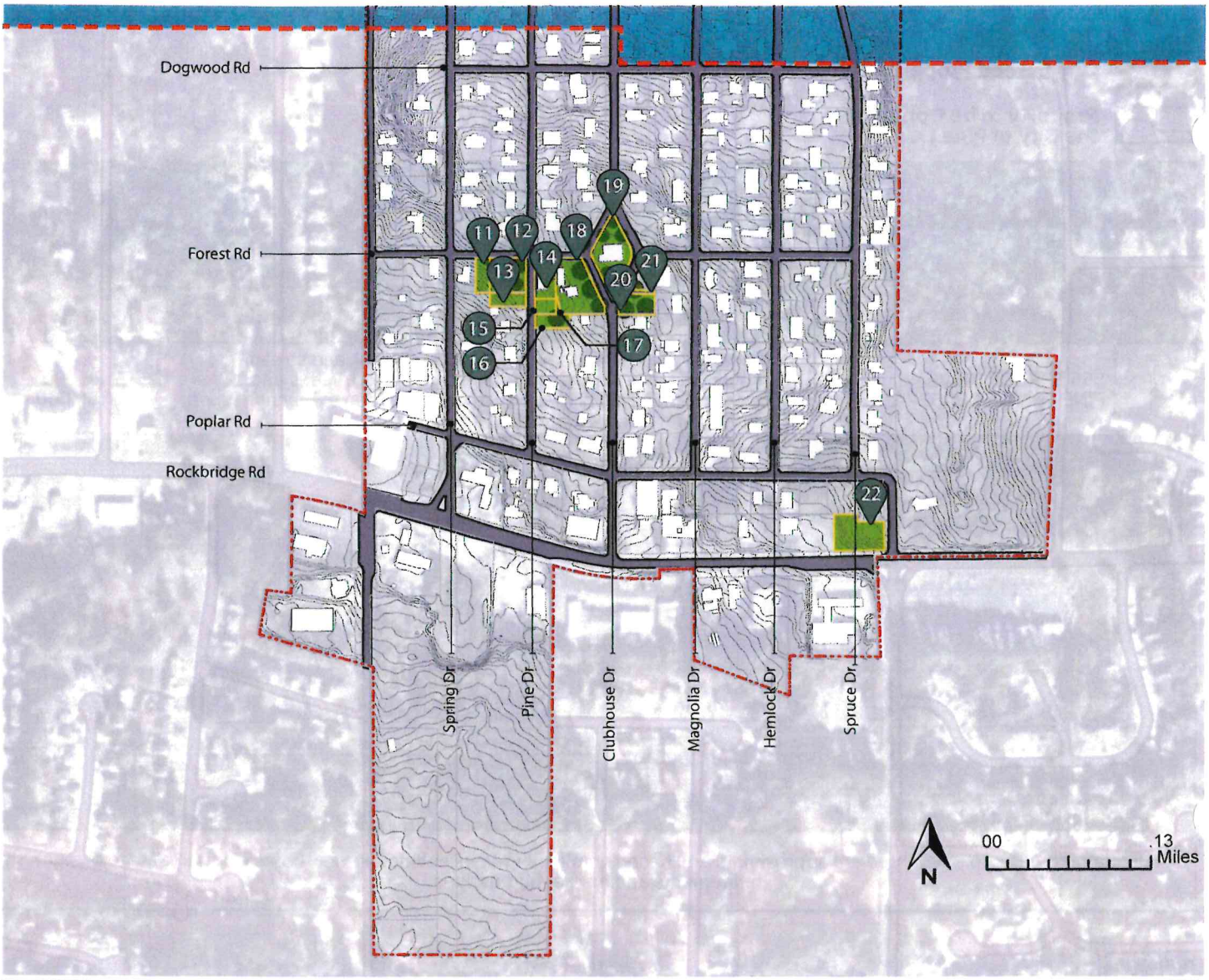
ID	Address	Area sf	Recommendations	Cost Estimate Range
1	4583 DAHLIA DRIVE PINE LAKE, GA 30072	26,388	Extend existing park and tennis area with community garden features, native plant buffers, and trail network connection. Improve grading, stormwater infiltration, and maintenance access.	$150,000 - $225,00
2	4583 DAHLIA DRIVE PINE LAKE, GA 30072	3,987	Currently used as a community garden. Enhance with wet meadow planting treatments, mowed paths, and interpretive signage. Space to be passive and designed to manage runoff and support pollinators.	$45,000 - $60,000
3	4580 LAKESHORE DRIVE PINE LAKE, GA 30072	656,048	Improve accessibility and amenities at the playground and Beach House/Community Center with new surfacing, ramps, inclusive play features, furniture, and riparian planting. Add a flexible market plaza for events.	$1,500,000 - $2,000,000
4	571 SPRUCE DRIVE PINE LAKE, GA 30072	11,178	Develop small park with shade canopy trees, rain garden, and seating area for recreation and stormwater benefits.	$100,000 - $150,000

City Owned Property

Property to be Donated to the City of Pine Lake

ID	Address	Area sf	Recommendations	Cost Estimate Range
5	599 SPRUCE DRIVE PINE LAKE, GA 30072	44,476	At this lakeside location, wetland edge planting, a short boardwalk connector, overlooks for bird watching and a managed habitat meadow can all be integrated with existing butterfly garden.	$450,000 - $575,000
6	555 SPRUCE DRIVE PINE LAKE, GA 30072	7,002	Stream buffer enhancements, erosion control, and stream restoration with integrated educational opportunities and boardwalks should be paired with a rain garden to manage runoff, improve water quality, and diversify site use.	$128,000 - $160,000
7	565 SPRUCE DRIVE PINE LAKE, GA 30072	34,097	Stream buffer enhancements, erosion control, and stream restoration with integrated educational opportunities and boardwalks should be paired with a rain garden to manage runoff, improve water quality, and diversify site use. Identify community programming for existing building, such as a Pine Lake education center.	$375,000 - $460,000
8	EASEMENT	26,588	The easement should maintain a greenway trail with integrated stream restoration, and basic lighting and wayfinding to ensure safe, connected access, with interpretive signage.	$350,000 - $500,000
9	623 SPRUCE DRIVE PINE LAKE, GA 30072	36,458	Establish native tree grove, interpretive kiosk, and small pocket meadow to support pollinators and provide educational space.	$400,000 - $500,000
10	649 SPRUCE DRIVE PINE LAKE, GA 30072	13,994	Program site as pollinator garden with shaded seating area and simple neighborhood gathering node.	$150,000 - $200,000

Disclaimer: All costs presented are approximate and based on planning-level estimates. Final costs may vary due to design refinements and market fluctuations.



ID	Address	Area sf	Recommendations	Cost Estimate Range
11	4554 FORREST ROAD PINE LAKE, GA 30072	3,943	A pocket park and small stormwater garden with shaded seating, native understory planting.	$70,000 – $95,000
12	4565 FORREST ROAD PINE LAKE, GA 30072	10,133	Develop an amphitheater-style community park and a native wet meadow edge for stormwater filtration and seasonal interest.	$160,000 – $210,000
13	454 PINE DRIVE PINE LAKE, GA 30072	4,114	Enhance this pocket park with shaded seating, a pollinator garden, and amphitheater-style gathering space bordered by a wet meadow rain garden to capture runoff and improve site drainage.	$95,000 – $125,000
14	459 PINE DRIVE PINE LAKE, GA 30072	7,196	Improve this sites open space with passive programming: seating, garden space, informational kiosks.	$45,000 – $65,000
15	455 PINE DRIVE PINE LAKE, GA 30072	2,400	Introduce a mid-story tree canopy with shaded benches, native planting, and wayfinding art installation.	$45,000 – $65,000
16	451 PINE DRIVE PINE LAKE, GA 30072	3,999	Develop a pocket park with shaded benches, flowering understory trees, and a simple play area for families.	$40,000 – $60,000

City Owned Property

ID	Address	Area sf	Recommendations	Cost Estimate Range
17	453 CLUB HOUSE DRIVE PINE LAKE, GA 30072	440	Establish a liminal garden space that acts as a soft transition between lots, using low-maintenance planting.	$2,000 – $5,000
18	462 CLUB HOUSE DRIVE PINE LAKE, GA 30072	17,324	A pocket park with shaded picnic areas, and a small gathering space for community center attendees.	$150,000 – $200,000
19	470 EAST CLUB HOUSE CIRCLE PINE LAKE, GA 30072	14,881	Enhanced pocket park amenities, a small parking area redesign, and a permaculture demonstration zone near the existing mini-library. Artistic integration, through stonework, murals, and sculptural elements that reflect Pine Lake's unique cultural identity.	$180,000 – $230,000
20	455 CLUB HOUSE DRIVE PINE LAKE, GA 30072	5,699	Improve mid-story canopy and planting. Include wayfinding elements.	$55,000 – $80,000
21	457 EAST CLUB HOUSE CIRCLE PINE LAKE, GA 30072	801	Program as a micro park with shaded seating, simple native landscaping, and low-maintenance design	$12,000 – $18,000
22	4642 ROCKBRIDGE ROAD STONE MOUNTAIN, GA 30083	13,635	Poplar Park is an existing neighborhood green space. It is recommended to provide enhanced maintenance, native planting to strengthen the tree canopy and understory, and improved pedestrian connectivity to the internal park network. The addition of a small fenced dog park would offer dedicated space for pet owners while balancing ecological restoration and community use.	$250,000 – $325,000

Disclaimer: All costs presented are approximate and based on planning-level estimates. Final costs may vary due to design refinements and market fluctuations.

The Living Streets of Pine Lake will connect residents to all greenspaces and improve water quality

The community listed water quality as one of the top concerns.

The **Living Street** achieves this through a reimagined integrated system of corridors that promote road safety and prioritize people, water, and ecological health as much as vehicle movement.

By slowing traffic, calming intersections, and reclaiming space for stormwater treatment and public life, these redesigned streets strengthen connections between neighborhoods, parks, and community spaces. Each Living Street integrates stormwater management features such as bioretention planters, rain gardens, and permeable paving to capture and filter runoff before it reaches the lake. These features reduce flooding, cool the urban microclimate, and create shaded, walkable environments for residents of all ages. Together, they form a living infrastructure network that treats water as an asset and supports safe mobility. This approach avoids costly reconstruction by adapting existing asphalt wherever possible. Curb extensions, painted crossings, planters, and green buffers define safer, slower streets that protect pedestrians and cyclists while improving visibility and comfort. Where feasible, vegetated bump-outs and bioswales guide stormwater into planted areas, reducing ponding and erosion along road edges. Two levels of investment are recommended. Tactical improvements using paint, planters, and modular materials allow the city to test traffic calming and drainage concepts quickly and at low cost. Over time, these pilot projects can evolve into permanent improvements with durable surfaces, continuous tree canopy, and built in stormwater infrastructure. Six corridors **(Ridge Drive, Ivy Road, Spruce Drive, Park Drive, Lakeshore Drive, and Spring Drive)** are identified as priority routes to connect residents safely to every park, trail, and lakefront amenity in Pine Lake. When implemented, these Living Streets will not only slow cars and improve safety, but also clean stormwater, enhance resilience, and celebrate the city's natural character through design that is both functional and beautiful.

Pine Lake Greenspace Master Plan: Living Streets

Legend

Living Street Projects

- Ridge Drive
- Ivy Road
- Spruce Drive
- Park Drive
- Lakeshore Drive
- Spring Drive
- Project Boundary

N

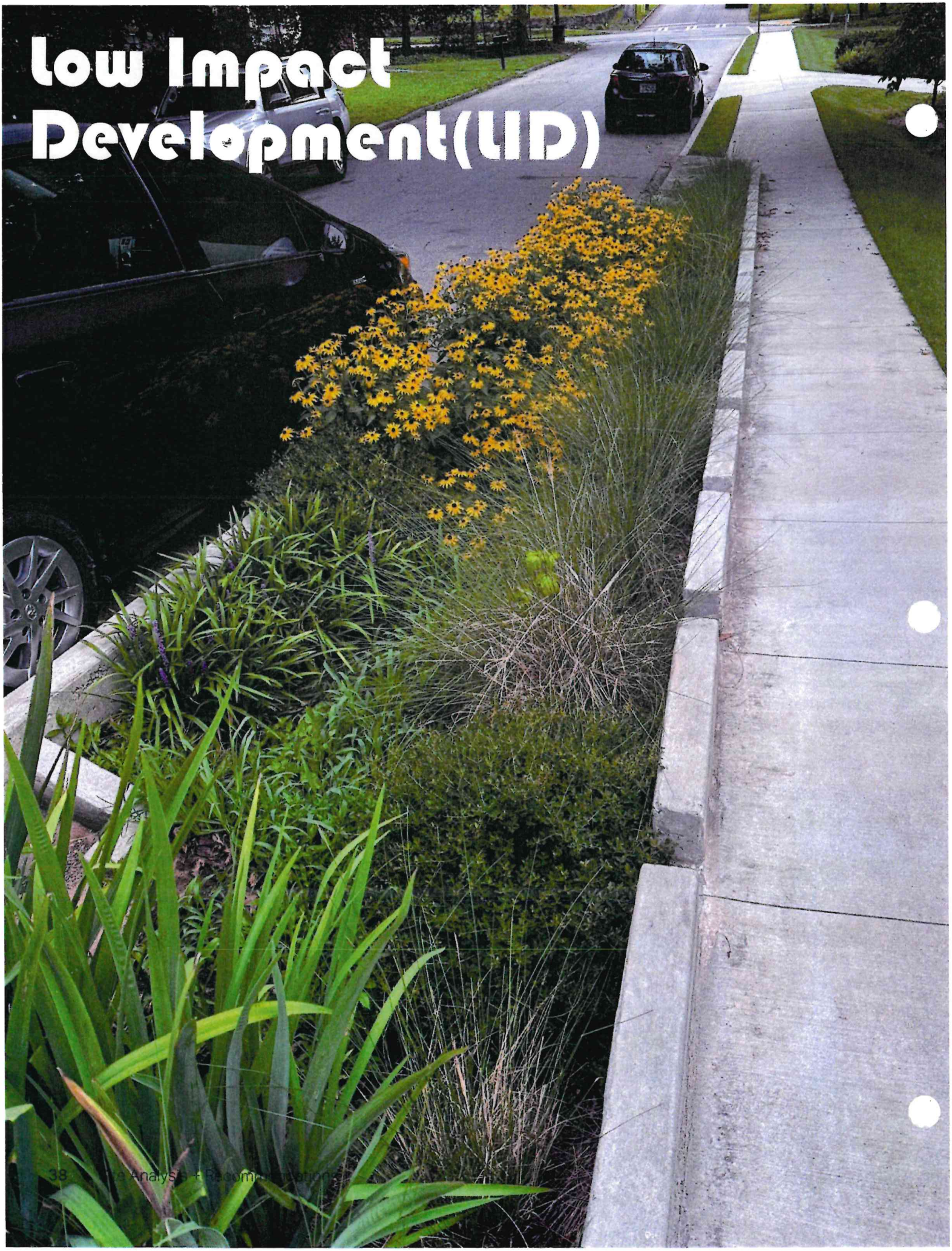
0 0.1 0.2 Miles

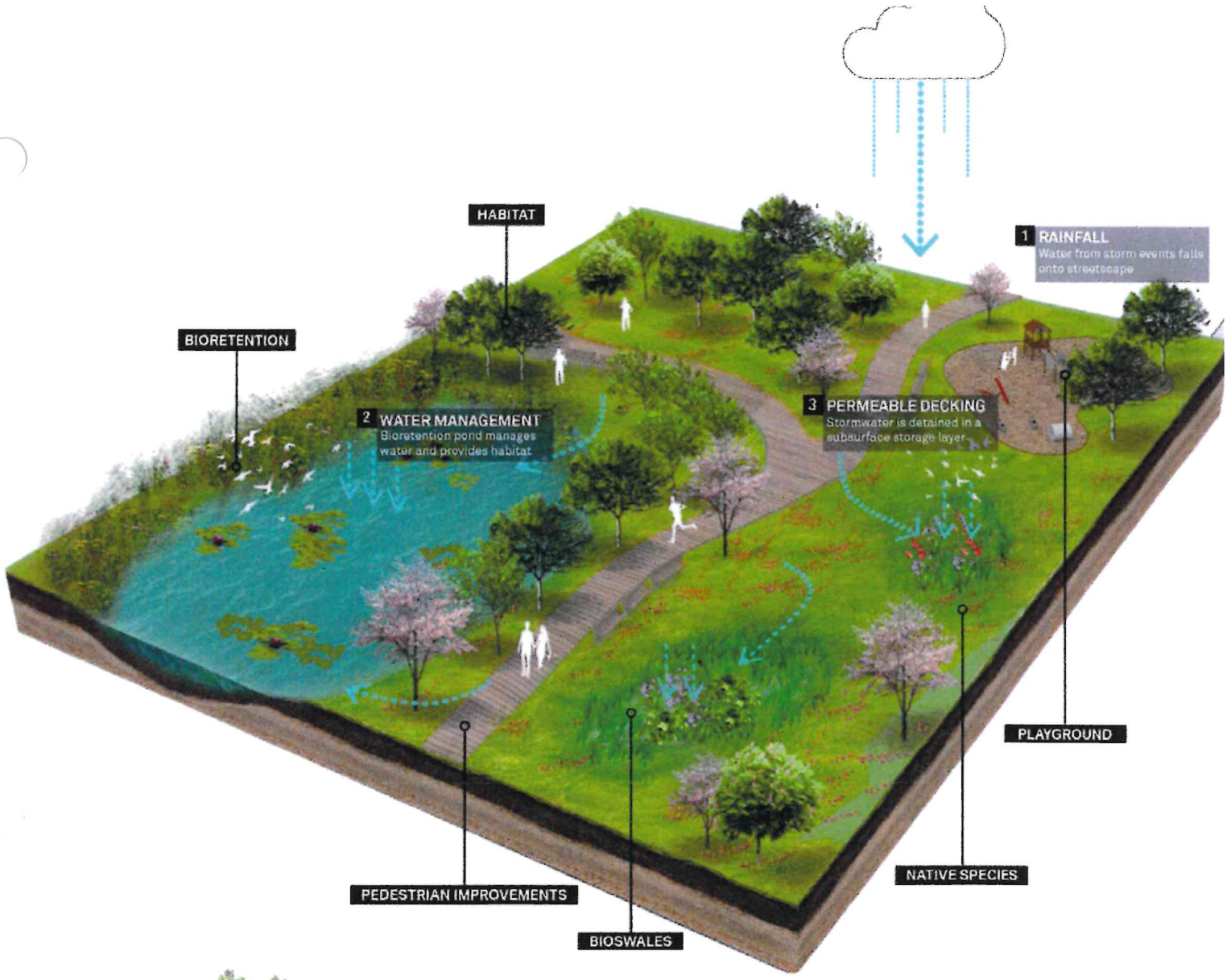
ID	Linear Feet	Recommendations	Tactical Retrofit (Paint, Planters, Bollards, Benches)	Full Living Street Build (Curbs, Paving, Stormwater, Green Buffers)
Ridge Drive	2,130	Ridge Drive is a long east–west corridor at the northern edge of the city, serving as a key connector. Here we recommend painted chicanes, landscaped bump-outs, and narrowed travel lanes to slow vehicles while maintaining access for emergency services. Mountable curbs or vehicle-graded permeable paving can provide traffic calming without blocking fire and service vehicles. Planters, benches, and bollards should be incorporated selectively to protect pedestrians and reinforce Ridge Drive as a safe, green corridor.	$213,000 – $320,000	$533,000 – $745,000
Ivy Road	910	Ivy Road is a smaller residential street where slower speeds reinforce its quiet neighborhood character. Tactical interventions such as painted curb extensions, planters, and small bump-outs are recommended to clearly signal shared use. The addition of bollards and low-profile planters can define pedestrian space while ensuring the road remains accessible to larger vehicles when needed.	$91,000 – $137,000	$228,000 – $318,000
Spruce Drive	3,900	Spruce Drive is a north–south spine that carries traffic into the heart of Pine Lake. A living street approach here would include alternating bump-outs, vegetated curb extensions, and painted gathering nodes designed to calm traffic and provide safe pedestrian spaces. Mountable curbs and permeable paving can ensure the corridor remains accessible for emergency vehicles, while planters and benches create a more welcoming and human-scaled environment. This street has the potential to become Pine Lake's model living street.	$390,000 – $585,000	$975,000 – $1.37M
Park Drive	1,500	Park Drive borders the lake and functions as a major recreational edge. Recommendations emphasize pedestrian priority, with stormwater planters to filter runoff, painted curb extensions at crossings, and shaded seating areas. This corridor could serve as an extension of the lakefront park itself, with careful design ensuring permeability and access for service and emergency vehicles.	$150,000 – $225,000	$375,000 – $525,000
Lakeshore Drive	2,200	Lakeshore Drive is the city's signature edge, wrapping around Pine Lake and linking multiple parks and greenspaces. Treatments should highlight the lake as a focal point by introducing painted pedestrian plazas at intersections, landscaped buffers, and continuous green edges. Mountable curbs and permeable paving would maintain vehicle access while giving pedestrians and visitors a stronger sense of safety. Benches, planters, and art features can further reinforce its role as a gathering and recreation space.	$220,000 – $330,000	$550,000 – $770,000
Spring Drive	1,500	Spring Drive provides an important neighborhood connection and an opportunity for incremental improvements. Tactical elements such as painted bottlenecks, planters, and bollards can quickly establish slower speeds and safer crossings. Over time, these measures could be upgraded into permanent green curb extensions and stormwater features. The use of vehicle-friendly permeable paving at key points would preserve emergency access while strengthening Spring Drive as a safe, livable street.	$150,000 – $225,000	$375,000 – $525,000

Disclaimer: All costs are approximate only based on planning level estimates. All costs are subject to change pending design refinements and market fluctuation.

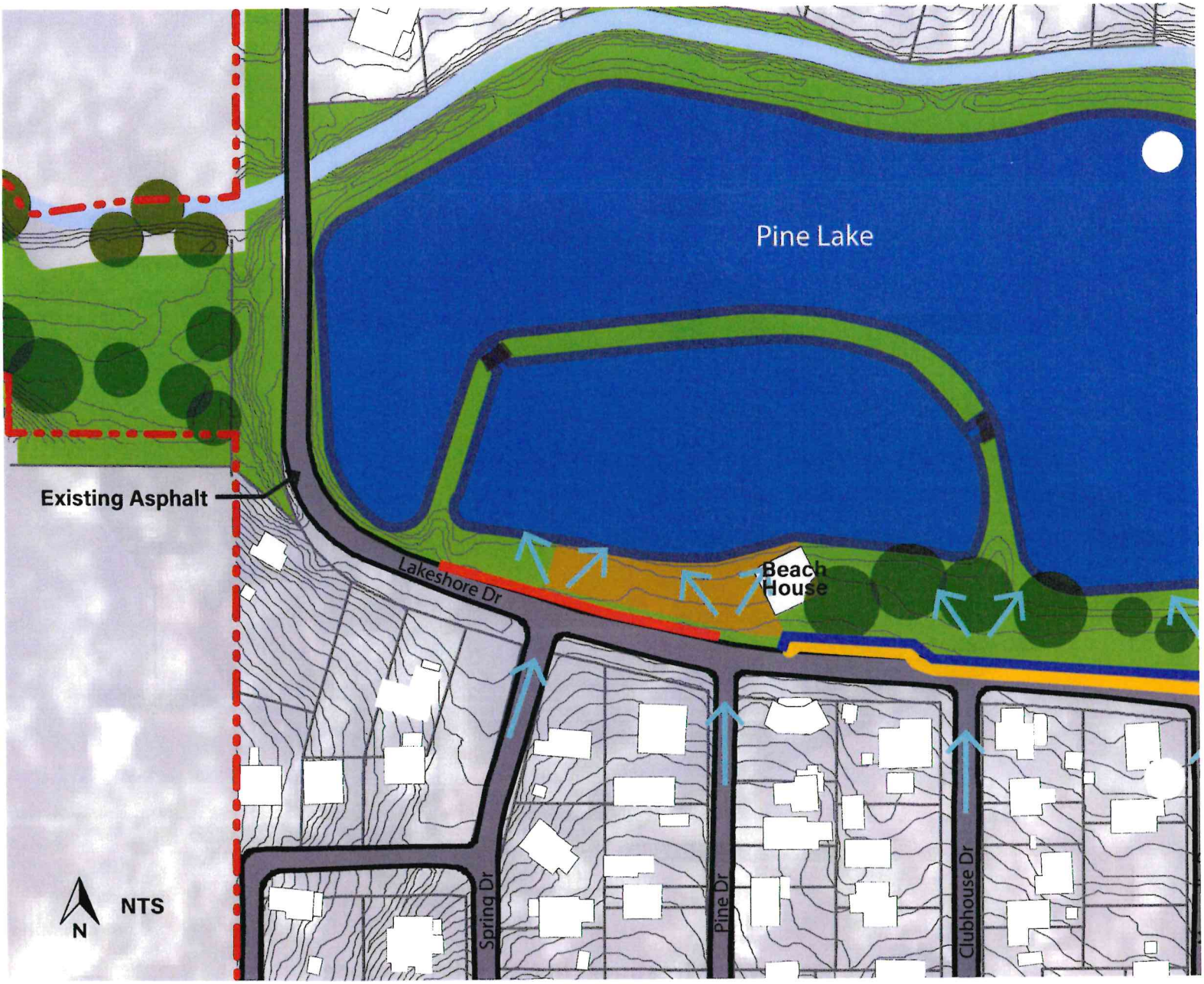

20'
View East on Park Dr
Changing these roads to one-way circulation and incorporating a 5-foot permeable zone within the chicane will allow stormwater to infiltrate while creating pedestrian-friendly spaces that support safer movement throughout the neighborhood.
Vegetated Treatment
Overflow Runoff
Dissipate with Stone
Permeable Walking Surface

Low Impact Development(LID)





Stormwater Treatment in Naturalized Setting

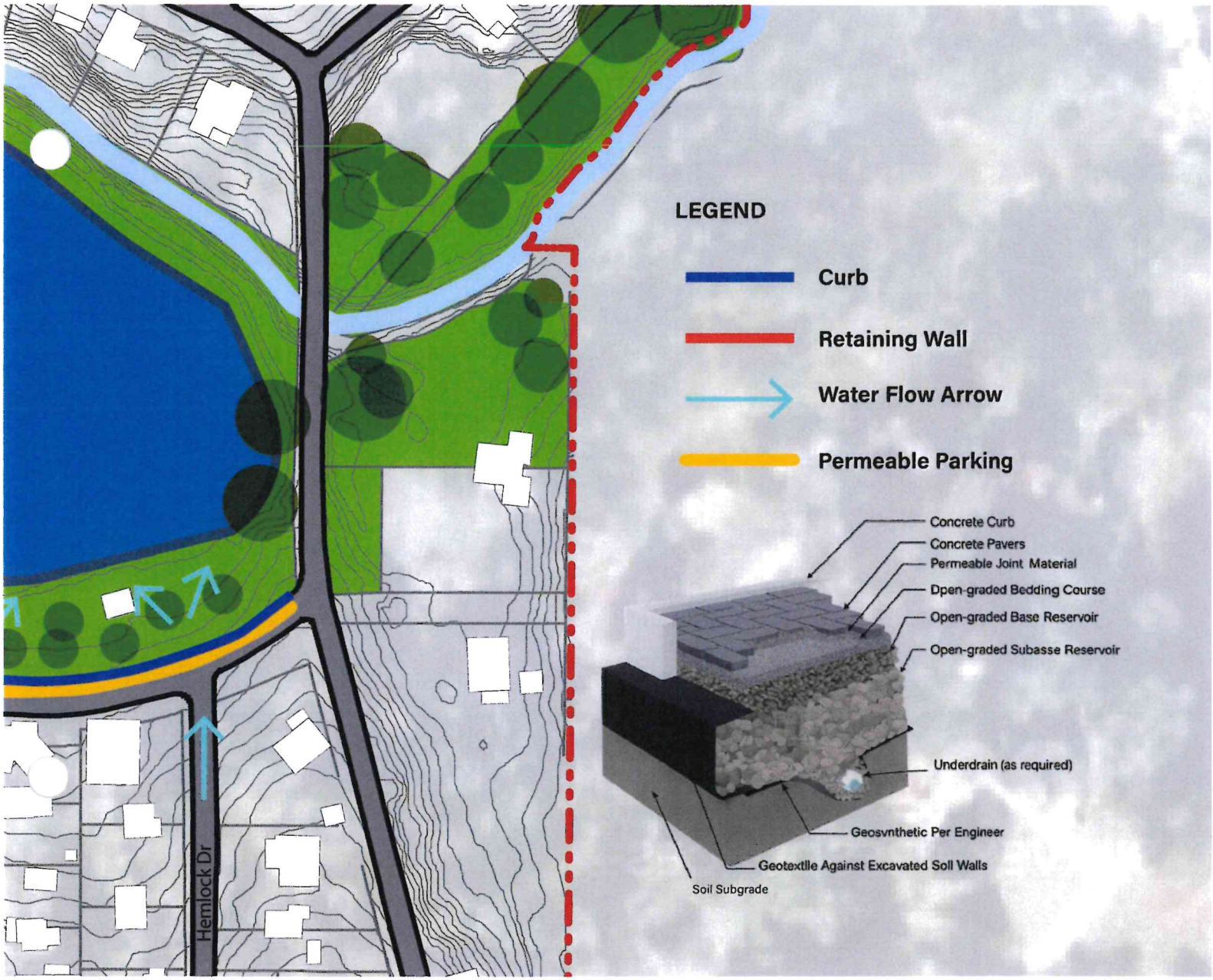


Lakeshore Drive Permeable Pavement Concept

The proposed improvements along Lakeshore Drive are intended to enhance water quality and reduce runoff into Pine Lake through the use of permeable paving systems. Permeable parking bays will allow stormwater to slowly infiltrate into the ground, filtering pollutants before reaching the lake.

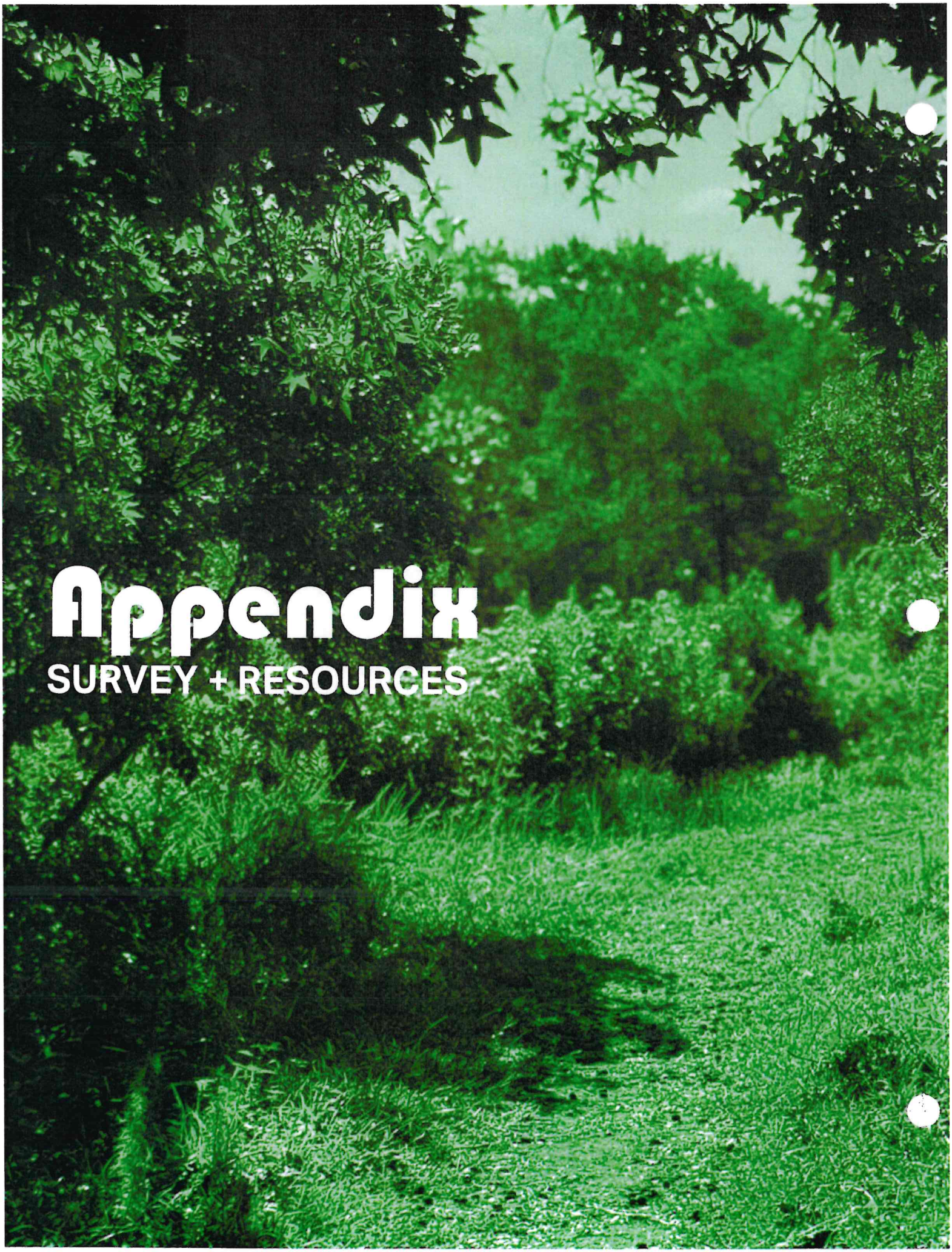
Performance and effectiveness: Permeable pavers are highly effective at infiltrating water, with initial rates often exceeding 100 inches per hour, and some systems achieving over 1,000 inches per hour under ideal conditions. Manufacturer specifications frequently report minimum infiltration rates above 500 inches per hour, particularly for open joint designs. Although infiltration rates decrease over time due to clogging from debris, properly maintained systems can retain a long term in-service infiltration rate of 10 inches per hour or greater, ensuring continued stormwater performance.

Design and maintenance considerations:
The system's success depends on proper installation and maintenance. The underlying soil must



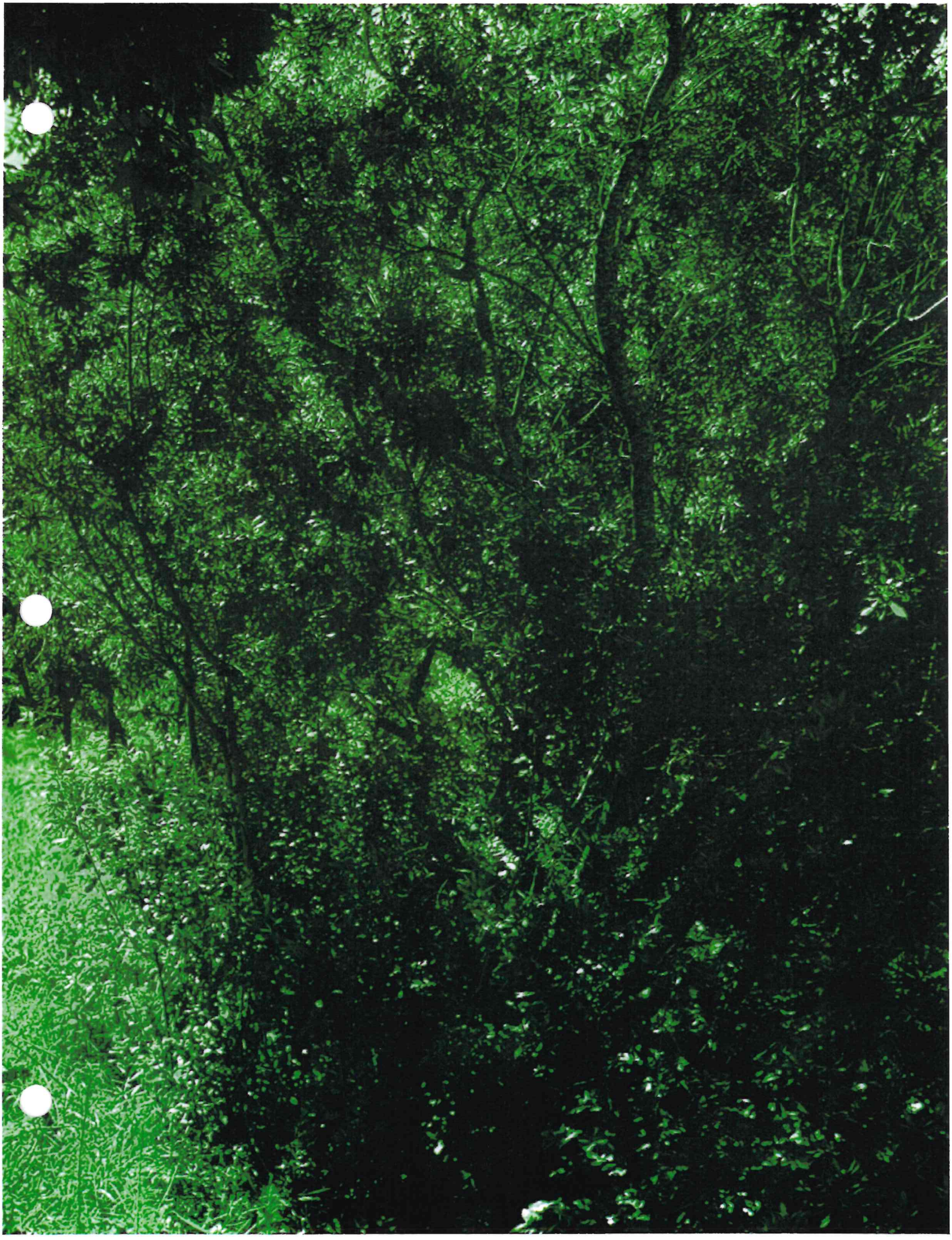
be sufficiently permeable to accept infiltrated water, or an infiltration sump or underdrain can be integrated in areas with low permeability soils. Regular maintenance such as vacuum sweeping and inspection of joints is essential to prevent clogging and sustain hydraulic function. Systems are considered underperforming if infiltration rates fall below the 10 inches per hour threshold.

Environmental impact:
The design directs surface flow from adjacent streets and driveways into these permeable areas, where natural infiltration and biofiltration occur within the subsurface system. This green infrastructure strategy not only mitigates flooding and erosion along the southern edge of the lake but also supports long term stormwater management, groundwater recharge, and ecological restoration. In combination with targeted curb and retaining wall improvements, this approach creates a more resilient and sustainable streetscape that balances infrastructure function with environmental protection.



Appendix

SURVEY + RESOURCES



Community Priorities & Greenspace Vision

There is strong support for **climate resilience and ecological stewardship**, with interest in rain gardens, stormwater management, and native plantings that strengthen the city's natural systems. Respondents also expressed a desire for more gathering spaces and programming such as dog parks, picnic areas, performance spaces, and improvements to the lake for recreation and swimming.

On funding, residents favor a mix of **grants and partnerships**, with limited willingness to increase household costs. Together, these priorities point to green spaces that are well-maintained, safe, and resilient, while also serving as vibrant places for community life.

The community survey revealed clear themes about what residents value most in Pine Lake's green spaces. **Maintenance of existing facilities** emerged as the top priority, with many emphasizing the need for consistent upkeep, repair of equipment, and attention to overgrown areas. Residents also called for greater **safety and accessibility**, including improved lighting, security measures, and expanded ADA compliance.

Given the absence of a formal Parks Department and limited city resources, implementation of the Green Space Master Plan will rely on **active volunteerism** and local partnerships. The SEED Group, or Stewards of Environmental Education and Design, will be central to these efforts.

Created in 2018 by Mayor Melanie Hammet, **SEED** promotes environmental education, policy, and engagement that reflect Pine Lake's identity as an environment- and arts-first city. Their ongoing work with native plantings, pollinator habitats, and community programming provides a foundation for maintaining and creating small projects such as pocket parks, rain gardens, and gathering areas.

The Pine Lake Association of Interested Neighbors **(P.L.A.I.N.)** is another volunteer group the community can organize around to implement these improvements.

What is your age range?

Response	Count
45-64	56
65+	50
30-44	29
18-29	1

How long have you lived in Pine Lake?

Response	Count
6-15 years	66
1-5 years	37
16+	29
Less than 1 year	4

Do you rent or own a home?

Response	Count
Own	118
Rent	17

ey

Most common response

How many people live in your household?

Response	Count
2 people	64
1 person	42
3-4 people	29
5+ people	1

Do you have any children under 18 in your household?

Response	Count
No	106
Yes	28

How often do you or your family use Pine Lake's green space?

Response	Count
Daily	68
2-3 times per week	33
Weekly	20
Monthly	9
A few times per year	7

Which Pine Lake green spaces do you use most frequently? (Select all that apply)

Greenspace	Count
Walking Trails/Nature Areas	45
Beach/Lake Area;Walking Trails/ Nature Areas	27
Beach/Lake Area;Picnic Area;Walking Trails/Nature Areas	11
Beach/Lake Area;Playground;Picnic Area;Walking Trails/Nature Areas	7
Beach/Lake Area;Playground;Walking Trails/Nature Areas	7
Beach/Lake Area;Community Garden;Picnic Area;Walking Trails/ Nature Areas	6
Picnic Area;Walking Trails/Nature Areas	4
Beach/Lake Area;Community Garden;Walking Trails/Nature Areas	3
Beach/Lake Area;Walking Trails/ Nature Areas;Sports Fields/Courts	2
Playground;Picnic Area;Walking Trails/ Nature Areas	2
Beach/Lake Area	2
Walking Trails/Nature Areas;Sports Fields/Courts	2

Greenspace	Count
Beach/Lake Area;Picnic Area;Walking Trails/Nature Areas;Sports Fields/ Courts	2
Playground;Walking Trails/Nature Areas	2
Picnic Area;Walking Trails/Nature Areas;Beach house garden	1
Community Garden;Picnic Area;Walking Trails/Nature Areas	1
Where are the sports fields/courts that one might use?	1
Beach/Lake Area;Sports Fields/ Courts;Walk streets/lake	1
Playground;Walking Trails/Nature Areas;Sports Fields/Courts	1
Beach/Lake Area;Playground;Community Garden;Picnic Area;Walking Trails/ Nature Areas	1
Picnic Area	1
Beach/Lake Area;Playground;Community Garden;Picnic Area;Walking Trails/ Nature Areas;Sports Fields/Courts	1
Beach/Lake Area;Picnic Area	1
Beach/Lake Area;Playground	1
Walking Trails/Nature Areas;Where are the sports fields?	1
Beach/Lake Area;Playground;Walking Trails/Nature Areas;PL Dogs use the former 'tennis court' to play, run around , chase tennis balls ... grandkids play soccer and with dog ... how is it now pickle ball? Dogs and soccer kids excluded?	1
Beach/Lake Area;Walking Trails/ Nature Areas;I'd like to use the tennis court but it's been locked since renovations!	1

Key

Most common response

What Activities Do You Currently Enjoy In Pine Lake's Green Spaces?

Activity	Mentions
Walking/Jogging	124
Nature Observation/Birdwatching	87
Dog Walking	69
Community Events	67
Social Gatherings	59
Exercise/Fitness Activities	51
Swimming	36
Picnicking	29
Kayaking/Paddle Boarding	27
Playing with Children	23
Bicycling	18
Gardening	16
Sports & Recreation	14

Which new program elements would you most like to see added to Pine Lake's green spaces by 2030? (Select 5 Top Program Elements)

New Program	Mentions
Additional walking/biking trails	72
Art Installations	62
Community pavilions/shelters	57
Dog park	46
Performance stage/amphitheater	42
Fitness equipment/outdoor gym	31
Better Lighting	30
Community Garden expansion	30
Sports courts (pickleball, basketball, bocce ball)	21
Improved playground equipment	17
Splash Pad/water feature	15

What days and times would you be most likely to participate in green space programming? (Select all that apply)

Day	Count
Weekday evenings	75
Saturday mornings	67
Sunday afternoons	67
Sunday mornings	64
Saturday afternoons	64
Weekday mornings	51
Saturday evenings	50
Sunday evenings	44

What is your preferred approach to green space development?

Response	Count
Focus on improving existing spaces first	74
Balance between improving existing and creating new	58
Unsure	4
Prioritize creating new green spaces	1

Key

Most common response

What age groups should programming primarily focus on? (Select all that apply)

Survey respondents overwhelmingly supported multi-generational or all-ages programming, with 83 responses indicating a desire for activities that engage diverse age groups together. This strong preference suggests that community members value inclusive spaces that foster interaction among children, adults, and seniors.

Smaller response groups expressed interest in programming for specific demographics, including middle-aged adults (ages 36–64), seniors (65+), and school-aged children (6–12)—each appearing in 2–6 responses. A few respondents highlighted needs for early childhood (0–5) and teen (13–17) programming, often in combination with broader multi-generational contexts.

Overall, the data underscores a community-wide priority for intergenerational recreation and education opportunities—spaces that encourage shared experiences rather than age-segregated activities.

How often would you like to see major community events in Pine Lake's green spaces?

Response	Count
Quarterly (4 times per year)	49
Seasonally (2-3 times per year)	43
Monthly	29
Less frequently	9
Annually	2

What types of community events would you most like to see? (Select all that apply)

Event	Count
Farmers markets	97
Seasonal celebrations	79
Music concerts/performances	77
Movie nights	66
Community swap meets	65
Craft fairs/artisan markets	65
Food festivals	62
Educational fairs	41
Fitness challenges/fun runs	25

Several respondents provided additional comments emphasizing a desire for community events that celebrate Pine Lake's unique character through creativity, sustainability, and inclusivity. Many suggested environmental and educational programs such as wetlands cleanups, kudzu removal, and senior fitness walks that promote stewardship and health.

Others expressed interest in locally driven arts and cultural activities, including participatory art-making, art exhibits, and musical performances by Pine Lake residents.

Some respondents proposed smaller, neighborhood-focused gatherings like pancake breakfasts, community swap meets, and dog park playdates to encourage informal social interaction.

A few noted concerns about over-programming and stressed the importance of balancing community events with environmental preservation, suggesting that new activities should align with Pine Lake's ecological and artistic values. Overall, these open-ended responses highlight a strong preference for sustainable, creative, and community-led events that strengthen local identity while maintaining the city's natural character.

Key

Most common response

Would you be interested in participating as a vendor, performer, or volunteer at community events?

Response	Count
Maybe, depending on the event	67
Yes, as a volunteer	31
No	22
Yes, as a performer	8
Yes, as a vendor	5

Are there specific areas in Pine Lake that need better pedestrian access or feel unsafe?

Several residents emphasized the need for better lighting, clear signage, and ADA-accessible routes, including ramp access to the back of the western wetlands and improved maintenance of inner walking loops. Others highlighted issues with speeding and unsafe driving on neighborhood streets—particularly Poplar Road, Rockbridge Road, and Spruce Drive—and urged for lower speed limits, more stop signs, and visible enforcement to protect pedestrians crossing or walking along these corridors.

Beyond safety, respondents also conveyed a desire to enhance the aesthetic and experiential quality of walking in Pine Lake. They envisioned a connected, well-maintained trail system with boardwalks, lighting, and native landscaping that balance ecological restoration with recreation. Some suggested the addition of security cameras or active monitoring in isolated areas, while others called for community volunteer days to assist with maintenance and cleanup.

Overall, the feedback reflects a shared goal to make Pine Lake's pedestrian network safer, more accessible, and more welcoming—a system that supports mobility for all ages while preserving the city's natural beauty and ecological integrity.

Which funding approach would you prefer for green space improvements?

Response	Count
Combination of approaches	73
Grant-funded only	19
Unsure	18
Public-Private Partnerships	12
User Fees for premium amenities	9
Property Taxes	3

What is the maximum amount per year you would be willing to pay in additional taxes/ fees to support green space improvements?

Amount	Count
$0	**36**
$51-100	27
$1-25	22
$101-200	21
$26-50	15
$200+	10

Key

Most common response

How important is it that green space improvements support local economic development?

Response	Count
Very important	57
Somewhat important	48
Not important	26

How important is climate change adaptation in green space planning?

Response	Count
Very important	97
Somewhat important	24
Not important	11

Which climate-related features should be prioritized? (Select all that apply)

Climate Feature	Count
Flood management/stormwater systems	101
Native plant restoration	80
Water conservation systems	78
Heat island reduction (shade/cooling)	61
Renewable energy integration	53
Carbon sequestration landscaping	42

How supportive would you be of converting some roadways into "living streets" that prioritize pedestrians and better connect to green spaces?

Response	Count
Very supportive	51
Need more information	38
Somewhat supportive	22
Neutral	13
Very opposed	9
Somewhat opposed	2

In 5 years, how do you expect your use of Pine Lake's green spaces to change?

Response	Count
Stay about the same	55
Use them somewhat more	37
Use them much more	25
Unsure	17
Use them somewhat less	3

What three words best describe what you want Pine Lake's green space to feel like? (Word Cloud)

What is the most important thing missing from Pine Lake's outdoor spaces today? (Word Cloud)

Please share any additional ideas, concerns, or comments about Pine Lake's 5-year green space development plan.

Community feedback on Pine Lake's 5-year Green Space Plan reflects strong civic engagement with residents offering thoughtful input on ecological health, public access, and fiscal accountability. While opinions vary on scope and priorities, the overall sentiment emphasizes stewardship, transparency, and the preservation of Pine Lake's small-town identity.

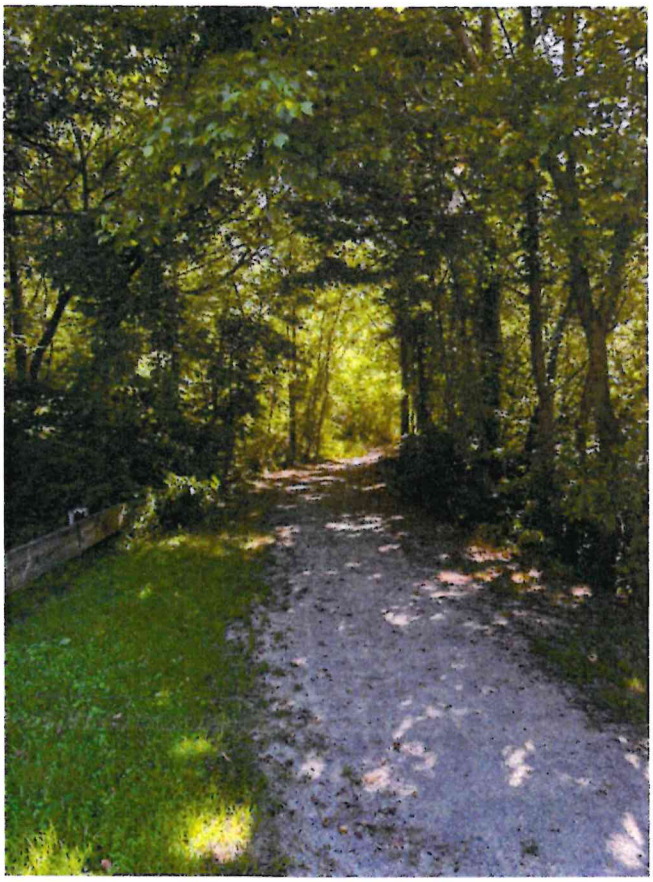
Funding:
A recurring theme was concern over increasing property taxes and a perception that maintenance does not reflect the amount paid in local taxes. Many respondents expressed skepticism toward new capital projects or green space expansions, arguing that existing spaces should be improved first. Several residents felt that additional projects might drive up housing costs and unintentionally displace long-term residents. There were calls for financial transparency and prioritization of essential repairs—such as trail maintenance, signage, and stormwater improvements—over aesthetic enhancements.

Recreation and Access:
Residents expressed interest in low-impact recreational opportunities, including fishing, walking trails, and nature observation. Several suggested re-stocking the lake with fish fingerlings, improving accessibility for swimming or kayaking, and adding small community gathering areas such as seating terraces or event lawns. Others cautioned against over-programming parks with large events or food trucks, emphasizing that Pine Lake should remain a tranquil, nature-centered retreat rather than an event venue.

Design Character:
There is a strong desire to maintain Pine Lake's natural aesthetic and ecological integrity. Respondents supported sustainable landscape practices—such as native planting, reduced chemical use, and habitat restoration—and discouraged the use of synthetic fertilizers, herbicides, and gas blowers. There was widespread support for environmentally sensitive design solutions, including nature-based stormwater systems, bioswales, and low-maintenance native meadows. Residents also encouraged planners to consider accessibility, aesthetics, and biodiversity equally in future improvements.

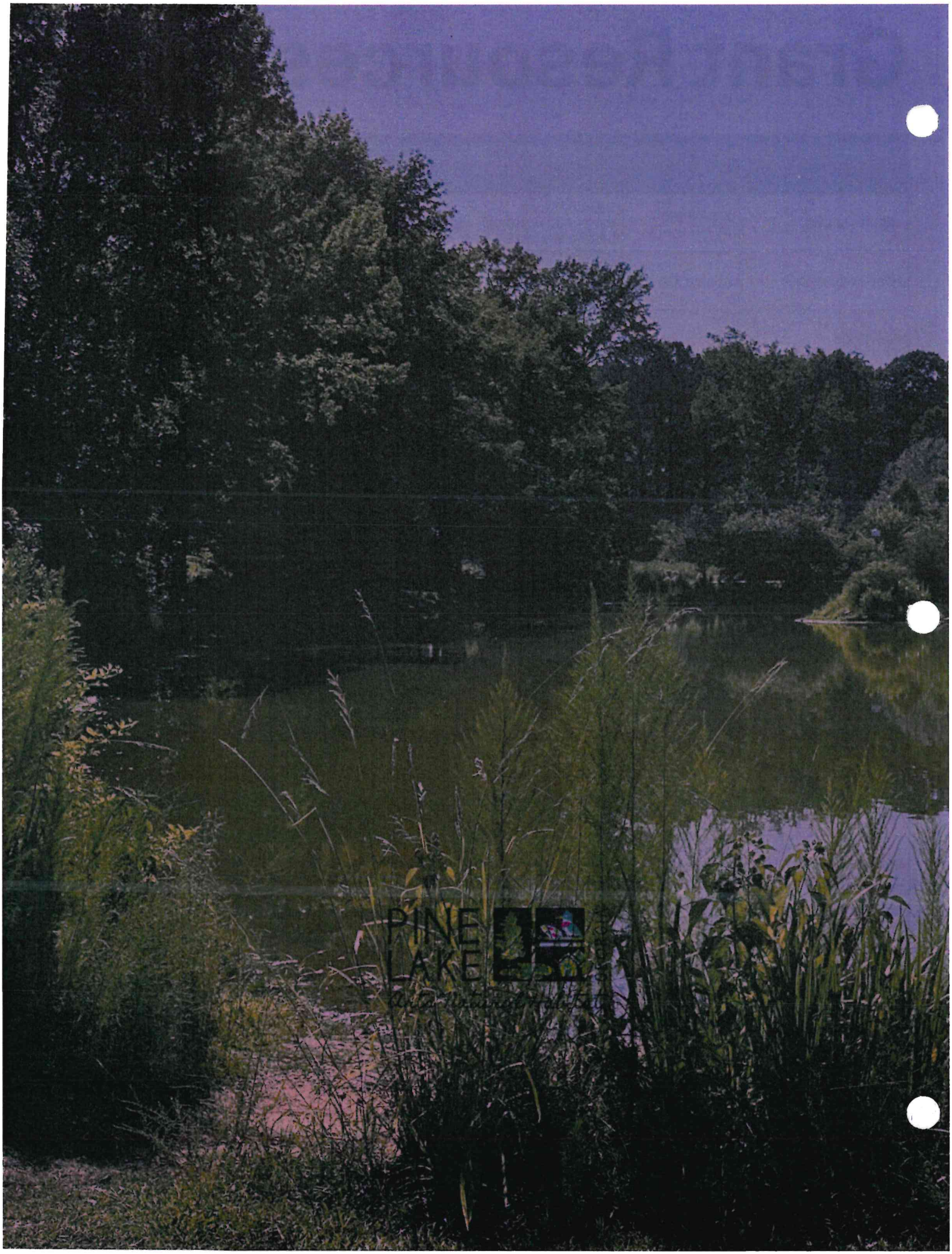
Overall Sentiment:
The tone of responses blends optimism with caution. Residents value the city's unique natural setting and artistic culture, yet feel the success of the Green Space Plan depends on consistent upkeep, ecological sensitivity, and fiscal prudence. Many expressed appreciation for the opportunity to participate in the survey and optimism that continued collaboration

between city staff, volunteers, and residents will result in a cleaner, safer, and more resilient park system that honors Pine Lake's character while addressing its long-term maintenance challenges.



Grant Resources

Organization	Location	Focus Area	Website	Contact Info
Nature Sacred	Washington, DC	Sacred Places, therapeutic gardens, healing spaces	https://naturesacred.org/	Contact form on website
Food Well Alliance	Atlanta, GA	Community gardens, urban food systems	https://www.foodwellalliance.org/	info@foodwellalliance.org
Park Pride	Atlanta, GA	Park equity, community park improvements	https://parkpride.org/	info@parkpride.org
Community Foundation for Greater Atlanta	Atlanta, GA	Various community projects including green spaces	https://cfgreateratlanta.org/	404.688.5525
The Garden Club of Georgia	Georgia (Statewide)	Garden therapy, therapeutic gardens	https://gardenclubofgeorgia.org/	Contact through website
Georgia Department of Natural Resources	Georgia (Statewide)	Parks, trails, outdoor recreation	https://gadnr.org/	Contact through website
National Garden Bureau	National	Therapeutic gardens across North America	https://ngb.org/	Contact through grant application page
American Horticultural Therapy Association (AHTA)	National	Therapeutic horticulture, healing gardens	https://www.ahta.org/	Contact through website
KABOOM!	National (DC presence)	Playgrounds and play spaces for kids	https://kaboom.org/	Contact through website
Casey Trees	Washington, DC	Urban forestry, tree canopy restoration	https://caseytrees.org/	Contact through website
The Trust for Public Land	National (DC office)	Park creation, land conservation	https://www.tpl.org/	Contact through website
Levitt Foundation	National	Activating underused public spaces	https://levitt.org/	Contact through website
Heroic Gardens	National	Therapeutic gardening for veterans	https://heroicgardens.org/	Contact through website
Arthur M. Blank Family Foundation	Atlanta, GA	Community development including green spaces	https://blankfoundation.org/	Contact through website


PINE
LAKE