

HOLLYGROVE- DIXON

GREEN INFRASTRUCTURE LOOKBOOK

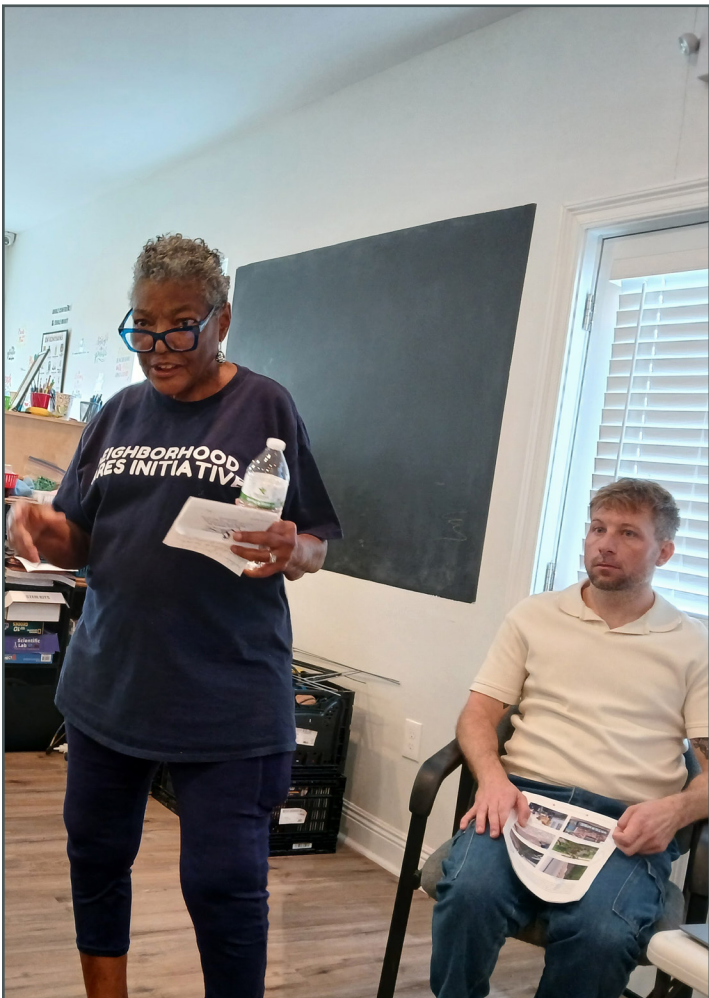


LOOKBOOK PREPARED BY WATER WISE HOLLYGROVE-DIXON



CONTENTS

Water Wise Background	1
Neighborhood Champions	7
Community Outreach Events.....	11
Hollygrove-Dixon	21
Next Steps	29
Green Infrastructure 101	33
Appendix	45





WATER WISE BACKGROUND

In 2016, I began hearing the term “green infrastructure.” Being the curious person I am, I started researching it on the internet. I came across quite a bit of information on the subject from a website in Florida, which detailed various GI interventions but did not necessarily define green infrastructure comprehensively.

Later, I received an email from Water Wise Gulf South offering a class on green infrastructure, which came with a small stipend. More people submitted applications than there were available slots, so the next emails asked if those without stipends would still want to attend. I wanted to learn, so naturally, I said yes, and I was one of the ones selected to attend this course.

The Green Infrastructure 101 Workshop opened up a world of fascinating information for me, and I was smitten with the topic of green infrastructure. At the end of the workshop, Water Wise Gulf South accepted proposals from attendees for implementing GI interventions in their neighborhoods. My project proposal won first place in the 2018 Water Wise Gulf South Green Infrastructure Challenge.

Our first project was a rain garden and permeable parking pads at the Life Transformation Community Center. We submitted the project because, after even a mild rain, there would be standing water at the center—a place where the entire community, including children, could gather. The floodwaters made the area dangerous and quite inaccessible. We needed a way to deal with that. When we saw the green infrastructure practice work right in our community, I was astounded and became a firm believer.

Later that year, Hollygrove-Dixon was included as a collective under Water Wise Gulf South. Since then, we have implemented various GI interventions throughout the neighborhood on residential properties, such as rain gardens and permeable pavements, and we are continuing to do more. These projects have significantly reduced flooding and improved the overall resilience of our community. Our efforts directly impacted our residents and their quality of life.

Green infrastructure has not only transformed our physical environment but has also brought our community closer together. It has been incredibly rewarding to see the positive impact of these projects on the lives of my neighbors.



Brenda Lomax-Brown

Immediate Past President 2015 to 2023

Hollygrove-Dixon Neighborhood Association

HOLLYGROVE-DIXON NEIGHBORHOOD ASSOCIATION

The Hollygrove-Dixon Neighborhood Association (HGDNA) represents all the residents of Hollygrove-Dixon (HGD), homeowners and renters alike, who are automatically members of the association. We affirm our intent to build active consensus, broaden participation, act collectively, capitalize on opportunities, and manage problems.

The HGDNA's purpose is to support the people, organizations, and partnerships who are committed to creating and maintaining a thriving neighborhood. They achieve this using multiple methods. The HGDNA promotes open discussion of neighborhood issues and public policies significant to HGD. They enhance the environment of the neighborhood by encouraging the development and growth of beneficial business opportunities and facilitating the beautification of public areas. Through the efforts of volunteers, the HGDNA works to improve the neighborhood's quality of life.

HGDNA VISION FOR THE FUTURE

The Hollygrove-Dixon Neighborhood Association envisions a future where their neighborhood contains:

- Safe, walkable streets
- Neighborhood-oriented and neighborhood-friendly businesses and services
- Public and private green spaces
- Respect for and recognition of ethnic, family, socio-economic, and cultural diversity
- Diversity of architectural styles, and a well-maintained neighborhood
- A quality of life for the residents and care and concern for the elderly and disabled
- A sense of community and security by encouraging responsibility, involvement, and pride among all residents and owners
- Healthy and active relationships with other neighborhood groups, civic organizations, and government agencies
- Active implementation and maintenance of strategic and cost-effective green infrastructure technologies that protect, preserve, enhance, and restore the natural hydrologic function of our watersheds

WATER WISE MISSION

COLLABORATION – EDUCATION – IMPLEMENTATION – ADVOCACY

Water Wise Gulf South collaborates with Community-Based Organizations to advance green infrastructure. Together, we raise awareness and provide education on green infrastructure. We grow a network of community advocates, known as the Water Wise Neighborhood Champions. We install green infrastructure projects at the homes of Water Wise Neighborhood Champions, at small businesses, churches, community centers, on vacant lots, and in public rights-of-way. With the Water Wise Neighborhood Champions and Community-Based Organizations, we advocate for the implementation of large-scale green infrastructure installations to improve our communities.

WHY GREEN INFRASTRUCTURE?

Many communities in the Gulf South are plagued by chronic flooding and climate change is exacerbating this issue. Green infrastructure is a tool to improve stormwater management and reduce the risk of localized flooding. Green infrastructure provides many benefits:

- Improves drainage and lessens localized flooding
- Reduces Soil Subsidence
- Protects the Water Quality of Local Waterways
- Enhances Air Quality
- Improves Public Health Outcomes
- Cools the Urban Environment
- Beautifies Our Neighborhoods
- Strengthens Community Livability

WATER WISE GOALS

A MODEL FOR COMMUNITY-DRIVEN GREEN INFRASTRUCTURE

The Water Wise Gulf South Model is founded on the fact that residents have a rich knowledge of their own communities. Therefore, residents need to be in the driver's seat when advancing green infrastructure in their communities.

The Water Wise Gulf South Model began in 2016 when Water Wise launched its first Water Wise Neighborhood Champions Training. The training was open to any resident in New Orleans, Louisiana, who had already attended one of the Water Wise Green Infrastructure 101 Workshops. In addition to the 101 Workshop, residents participated in a bus tour of different green infrastructure projects in New Orleans and Visioning Sessions to identify green infrastructure projects in their neighborhoods.

Since then, the Water Wise Gulf South Model has expanded to include a formalized partnership with local community-based organizations. Together, we train residents to become Water Wise Neighborhood Champions in neighborhoods experiencing chronic flooding challenges, we implement green infrastructure projects (at many different scales), and we advocate for the implementation of community-driven green infrastructure projects proposed by the Water Wise Neighborhood Champions.

Currently, Water Wise Gulf South partners with the following community-based organizations:

- Greater Tremé Consortium, est. 2016
- Healthy Community Services, est. 2017
- Upper 9th Ward Bunny Friend Neighborhood Association, est. 2019
- Hollygrove-Dixon Neighborhood Association, est. 2020
- New Orleans East Green Infrastructure Collective, est. 2021
- Lower 9th Ward Homeownership Association, est. 2022





NEIGHBORHOOD CHAMPIONS



NEIGHBORHOOD CHAMPIONS

Collectively, there are over 200 Water Wise Neighborhood Champions in our network. Residents are already experts on the issues that affect their communities. When they marry the expertise of their community with newly learned information about green infrastructure, they become champions for advancing green infrastructure in their neighborhoods in a way that authentically serves their communities. The Water Wise Neighborhood Champions have envisioned over 130 medium to large-scale green infrastructure projects in their communities.



To become a Water Wise Neighborhood Champion, residents must complete the following:

- **Water Wise Green Infrastructure 101 Workshop:** This 1.5-hour workshop provides an introductory understanding of the current stormwater drainage system and introduces green infrastructure and the types, components, and benefits of green infrastructure systems.
- **Water Wise Green Infrastructure Tour:** The Water Wise Green Infrastructure Tour allows residents to see green infrastructure in action. The tour usually includes a visit to a pumping station followed by different green infrastructure sites across New Orleans. Residents meet with experts along the way describing how the projects function.
- **Water Wise Green Infrastructure Visioning Session:** The Green Infrastructure Visioning Session requires residents to identify flood-prone areas and come up with nature-based solutions to help alleviate flooding while providing other benefits. These solutions are compiled into “Look Books” and the community organizations use these “Look Books” to advocate for the implementation of these nature-based solutions.



The logo for Waterwise Golf South is a large, light blue graphic in the background. It features a stylized water drop shape on the left, with a curved line extending from its base to form a partial circle on the right. The text "WATERWISE" is written in a large, light blue, sans-serif font across the middle, and "GOLF SOUTH" is written in a smaller, light blue, sans-serif font below it.

COMMUNITY OUTREACH EVENTS

OUTREACH EVENTS

Community outreach events—such as tabling at health fairs, hosting meet-and-greets, participating in First Fridays, and presenting at churches—are vital for introducing green infrastructure and highlighting its importance to the community. These efforts are also a key strategy for encouraging residents to become Water Wise Neighborhood Champions.

To take on this role, residents must first attend a Green Infrastructure 101 class to learn the foundational concepts. They then participate in a tour to see real-life examples and explore the possibilities for their own neighborhoods. Finally, they attend a visioning workshop, where they can share their ideas for creating a more sustainable and environmentally friendly community based on what they've learned.

Water Wise Meet and Greet

Date: 09/12/2020

Location: Life Transformation Community Center
8606 Marks Street

Engagements: 20

Brook Shaw Temple UMC Outreach Day

Date: 06/25/2022

Location: Brook Shaw Temple United Methodist Church , 8819 Pear Street

Engagements: 15

Back to School Rally

Date: 07/30/2022

Location: Life Transformation Community Center
8606 Marks St

Engagements: 15

City of New Orleans Office of Neighborhood Engagement Community Cares

Date: 10/08/2022

Location: Brook Shaw Temple United Methodist Church , 8819 Pear Street

Engagements: 18

Hollygrove-Dixon Neighborhood Association Meeting

Date: 05/08/2023

Location: Life Transformation Community Center
8606 Marks St

Engagements: 20

First Friday in Hollygrove-Dixon

Date: 03/01/2024

Location: Life Transformation Community Center
8606 Marks St

Engagements: 60

First Friday in Hollygrove-Dixon

Date: 04/05/2024

Location: Community Garden

Engagements: 45

First Friday in Hollygrove-Dixon

Date: 05/03/2024

Location: Life Transformation Community Center
8606 Marks Street

Engagements: 70

First Friday in Hollygrove-Dixon

Date: 09/06/2024

Location: Life Transformation Community Center
8606 Marks Street

Engagements: 55

First Friday in Hollygrove-Dixon

Date: 10/04/2024

Location: Life Transformation Community Center
8606 Marks Street

Engagements: 50

Night Out Against Crime

Date: 10/08/2024

Location: Job Corps New Orleans
8825 Airline Hwy

Engagements: 60

Harvest Fest

Date: 10/31/2024

Location: Life Transformation Community Center
8606 Marks Street

Engagements: 130

First Friday in Hollygrove-Dixon

Date: 11/1/2024

Location: Garden of Hope Community Garden and
Brook Shaw Temple United Methodist Church



101 WORKSHOP

A Water Wise Green Infrastructure 101 workshop is a 2-hour educational program in a classroom setting designed to introduce participants to the concept of grey infrastructure and how it uniquely functions in New Orleans. The workshop introduces green infrastructure, its benefits, and its applications. These workshops are tailored for community members. This is a mandatory event to become a Water Wise Neighborhood Champion.

Workshop 1: 10/13/2020

Location: Brook Shaw Temple United Methodist Church
Participants: 14

Workshop 2: 09/24/2022

Location: Life Transformation Community Center
Participants: 18

Workshop 3: 04/22/2023

Location: Life Transformation Community Center
Participants: 3

Workshop 4: 09/30/2023

Location: Life Transformation Community Center
Participants: 14

Workshop 5: 09/07/2024

Location: Life Transformation Community Center
Participants: 31



GREEN INFRASTRUCTURE TOUR

A Water Wise Green Infrastructure Tour is an interactive educational program where participants go on a bus tour to learn more about the concepts of grey infrastructure and how it uniquely functions in New Orleans. This is done by taking a tour of a New Orleans Sewerage and Water Board Pumping Station. The tour includes stops at various green infrastructure sites across New Orleans to learn how they are built and how they function. These tours last about 4 hours and is a mandatory event to become a Water Wise Neighborhood Champion.



Virtual Green Infrastructure Tour due to COVID-19

Date: 01/16/2021

Participants from Hollygrove-Dixon: 5

Fall Water Wise Green Infrastructure Bike or Ride Tour

Date: 10/21/2022

Participants from Hollygrove-Dixon: 3

Spring Water Wise Green Infrastructure Tour

Date: 6/03/2023

Participants from Hollygrove-Dixon: 8

Fall Water Wise Green Infrastructure Tour

Date: 11/09/2024

Participants from Hollygrove-Dixon: 5



VISIONING WORKSHOPS

A Water Wise Visioning Session is a gathering of residents in a specific neighborhood to identify flooding hot spots in these areas and to propose green infrastructure solutions to address flooding, run-off, subsidence and urban heat islands. The sites identified by residents and the proposed green infrastructure solutions are ranked and prioritized based on what is important to the community. This is the first step to develop “shovel-right” and “shovel-ready” green infrastructure projects for the community. These projects are compiled and placed in this Look Book.



Water Wise Visioning Session

Date: 01/07/2023

Location: Life Transformation Community Center

Airline Highway Bioswale Design Visioning Session

Date: 03/30/2023

Location: Life Transformation Community Center

Hollygrove-Dixon Neighborhood Demonstration Project

Date: 03/11/2024

Location: Life Transformation Community Center

Demonstration Project Meeting with Immediate Stakeholders

Date: 04/14/2024

Location: Brooks Shaw Temple United Methodist Church

Overall Neighborhood Vision and Tree Planting Discussion

Date: 10/28/2024

Location: Life Transformation Community Center

Overall Neighborhood Vision

Date: 11/11/2024

Location: Life Transformation Community Center



WORK-N-LEARNs AND RAIN BARREL EVENTS

A Water Wise Work N Learn is a community event where residents gain knowledge through hands-on learning. This includes installing green infrastructure projects together or performing maintenance of green infrastructure projects.

Water Wise Green Infrastructure Challenge Work N Learn in Partnership with Dana Brown and Associates and Xavier University

Date: October 11-12, 2019

Location: Life Transformation Community Center

Activity: Permeable Parking Pad and Rain Garden Installation

Participants: Dana Brown & Associates, Xavier University, Community members

Rain Barrel Workshop Led by Recharge NOLA

Date: 11/23/2019

Location: Life Transformation Community Center

Participants: 10

Rain Barrel Workshop Led by Recharge NOLA

Date: 12/12/2020

Location: Life Transformation Community Center

Participants: 6

Work N Learn in Partnership with Louisiana Green Corps Workforce Training

Date: December 6-9, 2021

Location: 8700 Block of Heaton Street

Activity: Permeable Parking Pad, Rain Garden, and French Drain Installation

Participants: 15

Work N Learn in Partnership with Louisiana Green Corps Workforce Training

Date: February 21-24, 2022

Location: 8700 Block of Pear Street

Activity: French Drain Installation

Participants: 10

Rain Barrel Workshop Led by Recharge NOLA

Date: 10/22/2022

Location: Life Transformation Community Center

Participants: 8

Work N Learn in Partnership with Tulane University School of Architecture

Date: 04/19/2024

Location: Brook Shaw Temple United Methodist Church

Activity: Stormwater Planter Box Installation

Participants: 12

Problem Sites

- ✓ Airline Hwy - a lot of runoff
Between Palmetto/Monroe
 - Curb extensions; Bioswale or Green Space (DOTD)
- ✓ 4000 Block of Hamilton - sidewalks
sidewalk - permeable sidewalk to parking lot/s
- ✓ Job Corps - a lot of concrete
 - Curb extensions; permeable pavement; green
 - grassy area from rearing gardens; green roofs (solar) Space
- ✓ Dixon Street - street floods
- Curb extensions at school & Job Corps Water flowing from airline
- ✓ Marks St - Residents' storm drains not working
- ✓ Rea St @ Portchartrain Expressway
flooding from expressway Bioswale green space by
- ✓ Leonidas St. - ditches fill up with water - bioswale between patches in rain gardens in ditches & tree lining
- ✓ Portchartrain Blvd
wall/sidewalks - permeable sidewalk
Rain garden in public right of way! 3900 Gen Ogden
- 4200 General Ogden: between sidewalks
4300 - drain 10 ft - permeable sidewalks
- Cherry St. - ducks swimming
- Mistletoe St. & Palmetto
Rain garden? - around country club! - drains clogged
- Intnt. School - is there green space?





HOLLYGROVE-DIXON



HOLLYGROVE-DIXON NEIGHBORHOOD DEMOGRAPHICS BY CLIMATE AND ECONOMIC JUSTICE SCREENING TOOL

Source: <https://screeningtool.geoplatform.gov/en/#14.02/29.97155/-90.11377>

Census Tract Number: 22071007605

Population: 1,466

Identified as disadvantaged?:

(as defined by the Climate and Economic Justice Screening Tool)

- YES

Race:

- Black or African American- 86%
- Hispanic or Latino- 6%
- White- 5%
- American Indian and Alaska Native- 1%

Projected Flood Risk:

(Projected risk to properties from projected floods, from tides, rain, riverine and storm surges within 30 years)

- 99th Percentile

Expected Building Loss Rate:

(Economic loss to building value resulting from natural hazards each year)

- 99th Percentile

Low Income:

(People in households where income is less than or equal to twice the federal poverty level, not including students enrolled in higher ed)

- 96th Percentile

GREEN INFRASTRUCTURE INTERVENTIONS COMPLETED IN HOLLYGROVE-DIXON

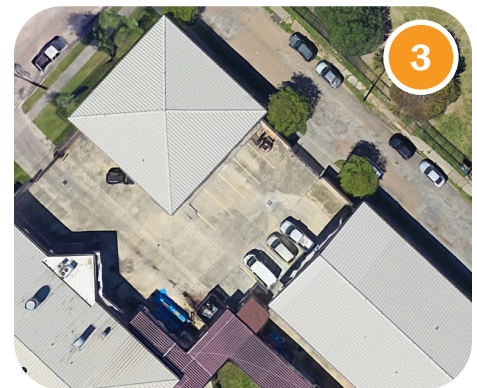
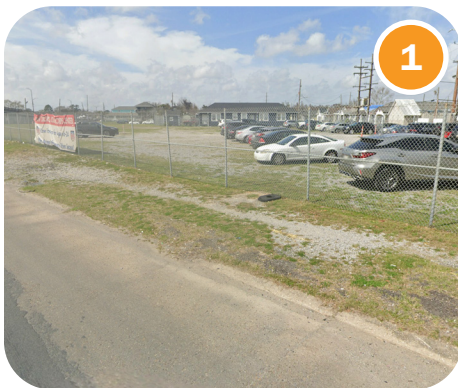
Demonstrating how green infrastructure works is another piece of the Water Wise Hollygrove-Dixon model. Throughout Hollygrove-Dixon, we have implemented many types of examples of green infrastructure including: rain gardens, bioswales, tree plantings, stormwater planter boxes, concrete removal, French drains and rain barrels.

#	Location	Intervention	SW Capacity
1	8686 Marks St	permeable parking; rain garden	625 gal
2	4225 Eagle St	permeable parking	750 gal
3	4301 Hamilton St	permeable walkway; french drain; rain barrel	528 gal
4	8722 Pear St	permeable pavers and parking; french drain; rain barrel	2796 gal
5	4666 Pontchartrain Blvd	rain garden; french drain; stormwater planter; rain barrel	539 gal
6	8718 Heaton St	french drain; rain garden	589 gal
7	8722 Heaton St	rain garden; french drain	556 gal
8	8613 Pear St	french drain	3600 gal
9	4009 Hamilton St	rain garden; french drain	8800 gal
10	4318 Hamilton St	rain garden; french drain	9000 gal
11	4318 General Ogden St	french drain	17000 gal
12	3924 General Ogden St	french drain	4400 gal
13	8819 Pear St	stormwater planter	160 gal
14	8606 Marks St	rain barrels	200 gal



HOLLYGROVE-DIXON FUTURE PROJECTS

#	Location	Issue	Owner	Possible Intervention
1	Airline Highway between Palmetto and Monroe	Runoff	State	Curb extensions; bioswales; greenspace
2	4000 Block of Hamilton Sidewalk	Sidewalk	City	Permeable sidewalk; parking lot
3	Job Corps	Excessive concrete	Federal	Curb extensions; permeable pavers; greenspace; rain gardens; green roofs
4	Marks Street	Storm drains not working	City	Fix drains
5	Pear Street at Pontchartrain Expressway	Flooding from expressway	City/State	Bioswale; greenspace by expressway
6	3900 to 4300 General Ogden Street	Drainage issues between sidewalk and street	City	Permeable sidewalk
7	Mistletoe Street and Palmetto Street	Drains clogged	City	Raingardens around country club
8	International School of Louisiana	Excessive concrete and Impervious surfaces	School Board	Greenspace
9	Monroe Street and Airline Highway	Flooding from expressway	City/State	Bioswale
10	I-10 and Airline Highway	Flooding from expressway	State	Bioswales





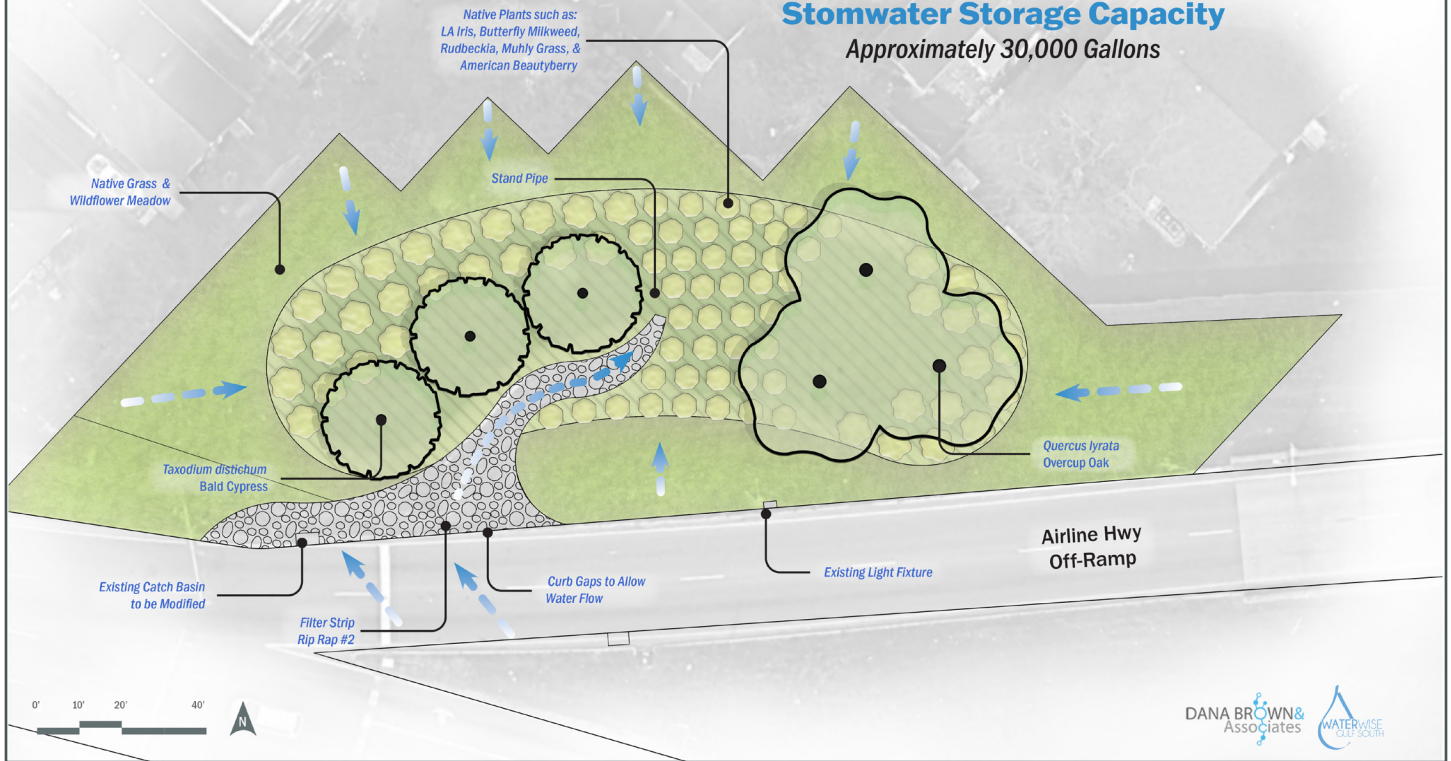
Water Wise Technical Support

Hollygrove - Dixon Neighborhood Project

9

Stomwater Storage Capacity

Approximately 30,000 Gallons



DANA BROWN & Associates
WATERWISE
OUT SOUTH





NEXT STEPS

NEXT STEPS

- Continue to recruit residents in Hollygrove-Dixon to become Neighborhood Champions. The more educated our community is the better personal decisions they will make on their own or rental property.
- Gather more detailed data on community flooding by working with experts like engineers, the Army Corps of Engineers, and landscape architects. This will help us better understand the flooding and identify effective Nature-Based Solutions to address the issues.
- Collect more videos and pictures from our community members to help tell our story.
- Install more Green Stormwater practices on residential property to help keep water off the streets to reduce flooding and subsidence.
- Advocate for the government to install larger Green Infrastructure practices in our neighborhood.
- Maintain our relationship with Water Wise Gulf South and the Water Wise Collective to work collaboratively to access and share resources and knowledge to make a better Hollygrove-Dixon and City of New Orleans.

HOW TO GET INVOLVED

The most important way to get involved is to become a Water Wise Neighborhood Champion. To become a Water Wise Neighborhood Champion, residents must complete the following:

- **Water Wise Green Infrastructure 101 Workshop:** This 1.5-hour workshop provides an introductory understanding of the current stormwater drainage system and introduces green infrastructure and the types, components, and benefits of green infrastructure systems.
- **Water Wise Green Infrastructure Tour:** The Water Wise Green Infrastructure Tour allows residents to see green infrastructure in action. The tour usually includes a visit to a pumping station followed by different green infrastructure sites across New Orleans. Residents meet with experts along the way describing how the projects function.
- **Water Wise Green Infrastructure Visioning Session:** The Green Infrastructure Visioning Session requires residents to identify flood-prone areas and come up with nature-based solutions to help alleviate flooding while providing other benefits. These solutions are compiled into “Look Books” and the community organizations use these “Look Books” to advocate for the implementation of these nature-based solutions.

Once Water Wise Neighborhood Champions complete the 3 activities, they may qualify for funding to receive a green infrastructure project on their own property.

If you live in the Hollygrove-Dixon Neighborhood send us an email at info@hollygrovedixon.org and we'll make sure we keep in touch with you.

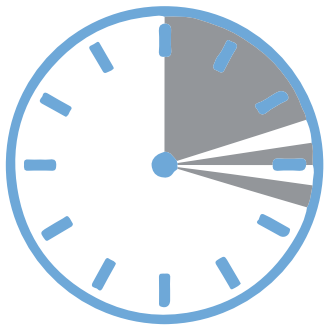




GREEN INFRASTRUCTURE 101

TYPES OF GREEN INFRASTRUCTURE

Green infrastructure is a term that includes different features and facilities that manage stormwater by mimicking natural processes, whether they involve plants or not. Typical green infrastructure that utilizes plants and soil to slow, detain, and filter stormwater are rain gardens, bioswales, stormwater planters, and trees. French drains, infiltration columns, and infiltration pits are filled with coarse gravel and, although not planted, can be covered with lawn grass and still function. Pervious or permeable paving includes several different types of surfacing for patios, driveways, and sidewalks that allows water to enter the subsurface soil through the paving. Rain barrels are also a type of green infrastructure, one which collects stormwater runoff from roofs for reuse in irrigating vegetable and flower gardens, trees, and shrubs.



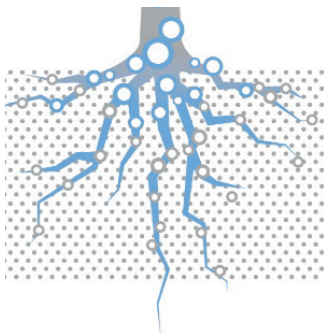
DETENTION

Detaining stormwater allows water to be absorbed by plants and soils rather than run directly into the storm drains. This decreases flooding by preventing the drainage system from being overloaded with rainwater.



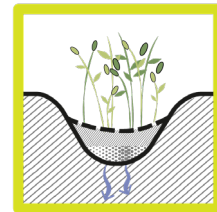
INFILTRATION

Allowing water to infiltrate into the soil helps to balance the groundwater, which reduces the constant expanding and shrinking of our clay and rich organic soils and reduces subsidence.



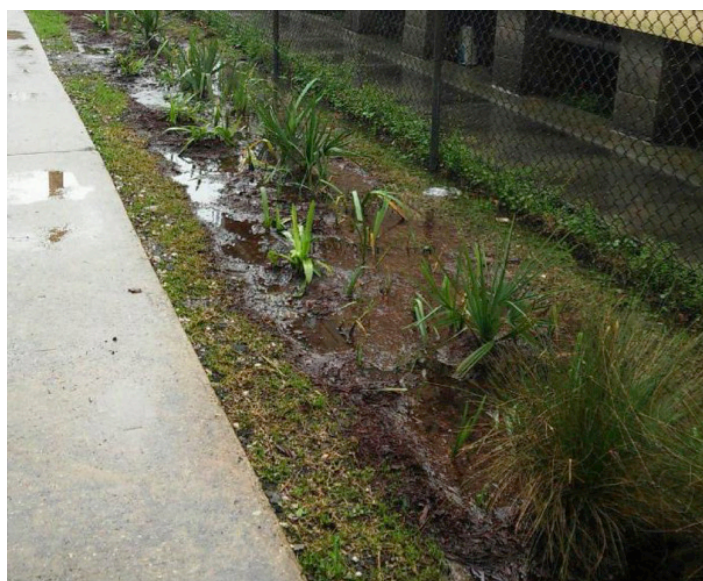
FILTRATION

Plants roots absorb polluted water and filter out pollutants before they reach pipes. This means our lakes, bayous, and streams would receive cleaner water, benefiting public health, recreation, wildlife, and more.



BIOSWALES

Bioswales are shallow, linear channels with side slopes used to convey water from one place to another, often toward a larger green infrastructure type. They use suitable plants to slow stormwater moving through the bioswale and filter out pollutants.

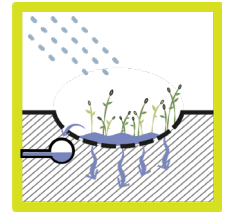




RAIN GARDENS

Rain gardens reduce runoff by capturing rain and allowing stormwater to soak directly into the ground rather than flowing into storm drains. This in-turn decreases the amount of water-related issues such as subsidence, pollution, and flooding. Typical planting includes Louisiana Irises and other native plants.

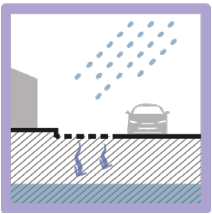




DETENTION BASINS

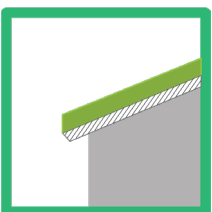
A detention basin or dry pond is used to capture large amounts of stormwater and release it slowly into the ground as well as the drainage system. This slow release mitigates the intensity of storm-induced flooding on neighboring properties and roadways. Detention basins also help clean and filter the stormwater prior to entering the drainage system.





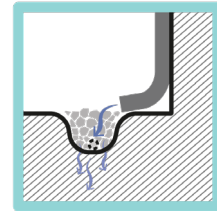
PERVIOUS PAVEMENT

Pervious pavement is any surface that allows stormwater to infiltrate through the paving into the subsurface. Pervious concrete is a type of pavement that has between 15-25% of void space to allow water and air to infiltrate. Pervious pavers are solid interlocking pavers that allow water to flow through joints between them.



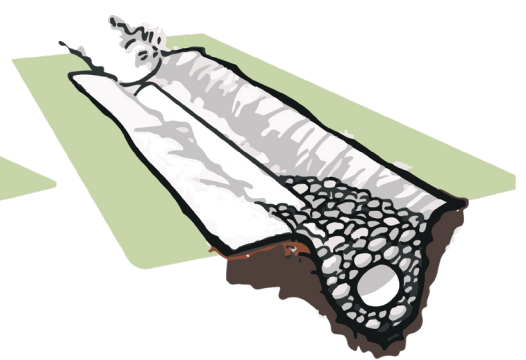
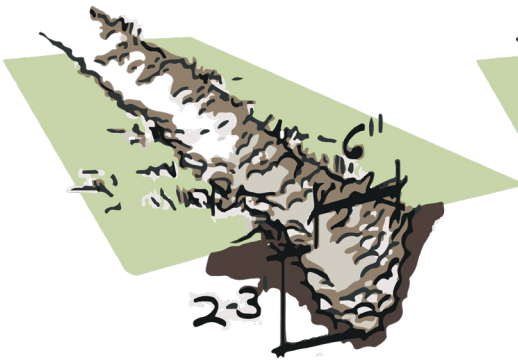
EXTENSIVE GREEN ROOF

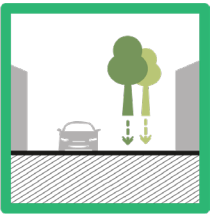
A green roof is a multi-layered roof system that is partially or entirely covered with vegetation. Extensive green roofs have a maximum depth of 6 inches containing growing media (bioretention soil,) drainage, irrigation, and a waterproofing membrane. The systems can support groundcovers and shallow plant roots, so they require less structural support and maintenance.



FRENCH DRAIN

French drains are long excavated channels filled with coarse rock or stone that is 1-1/2" to 2" in size. The purpose of an infiltration trench is to direct stormwater along a path typically away from your home and into a rain garden. In addition, infiltration trenches clean and filter the water while allowing it to soak into the soil and replenish the groundwater.





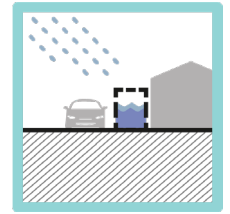
STREET TREES

Adding street trees to a corridor not only boosts aesthetic and property values, but provides air and water quality benefits, reduces stormwater runoff, sequesters carbon, and reduces urban heat island effect, and provide wildlife habitat. For proper tree health, tree species should be chosen based on site specific conditions including root zone space and potential for stormwater to infiltrate into the root zone space.



GREEN OPEN SPACE

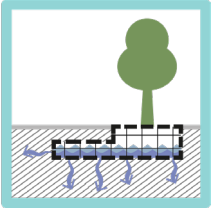
Green open spaces slow down and treat stormwater runoff, allow for infiltration, provide wildlife habitat, reduce heat island effects, and sequester carbon. Green spaces are vital to urban environments maintaining some ecological functionality.



CISTERNS AND RAIN BARRELS

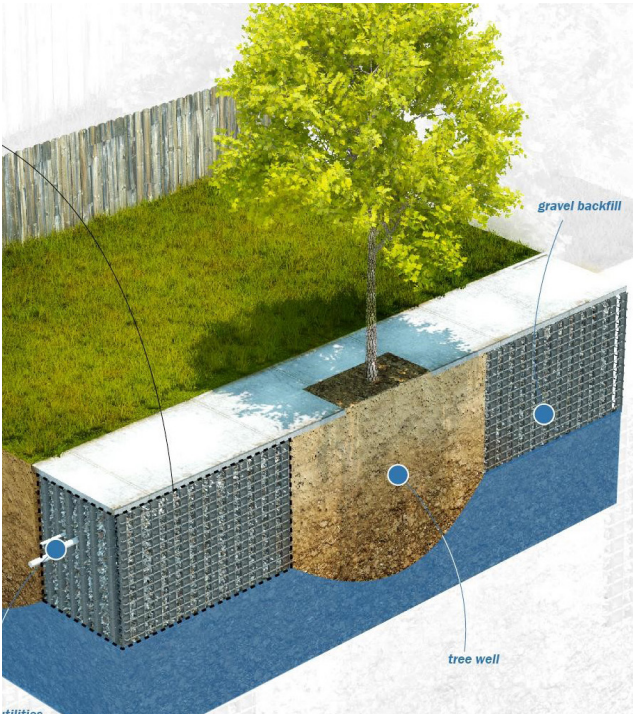
Rain barrels collect rain runoff from the roof of a structure, which can be stored for later use or held and released slowly back into the ground. Common uses for stormwater stored in rain barrels include watering gardens, irrigating agriculture, and washing cars.

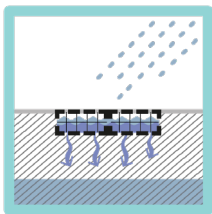
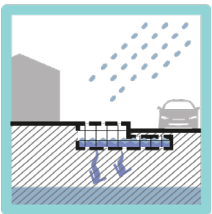




TREE CELLS

Tree cells are modular suspended pavement systems that provide substantial subsurface space for loose soil, water, and air, which provide an ideal growing medium for tree roots, while also structurally supporting paving above. Tree cells are an ideal type of GI for a highly urban environment.





BIORETENTION CELLS AND CURB EXTENSIONS

Bioretention cells are defined land areas, usually surrounded by pavement, planted with water tolerant plants. They are designed to detain stormwater to allow both infiltration and filtration. “Bioretention” refers to the biological processes plants use to uptake and retain pollutants.



The logo for 'Waterwise Gulf South' is a large, light blue graphic in the background. It features a stylized water drop shape on the left, with a curved line extending from its base to form a partial circle on the right. The words 'WATERWISE' and 'GULF SOUTH' are written in a light blue, sans-serif font, stacked vertically and centered within the graphic. Overlaid on this graphic is the word 'APPENDIX' in a bold, dark blue, sans-serif font.

APPENDIX

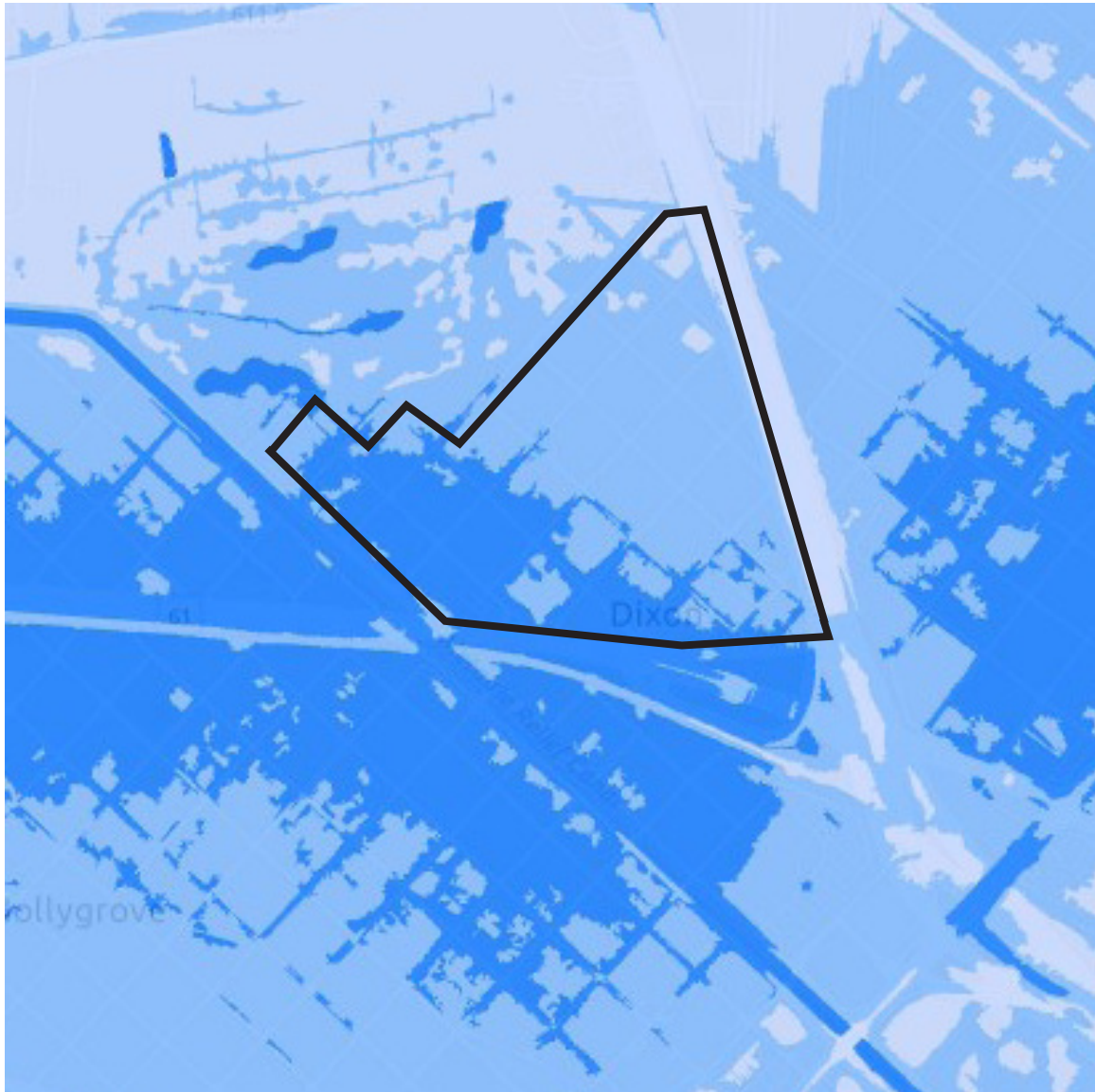
These context maps of the Hollygrove-Dixon study area show the need for green infrastructure. The maps were made using the Trust for Public Land's Climate Smart Cities Tool.



RECURRING FLOODING

This map shows in blue the depths of flooding anticipated by 2-year, 5-year, and 10-year floods. More flooding occurs in areas of lower elevation.

Image Source: The Trust for Public Land.



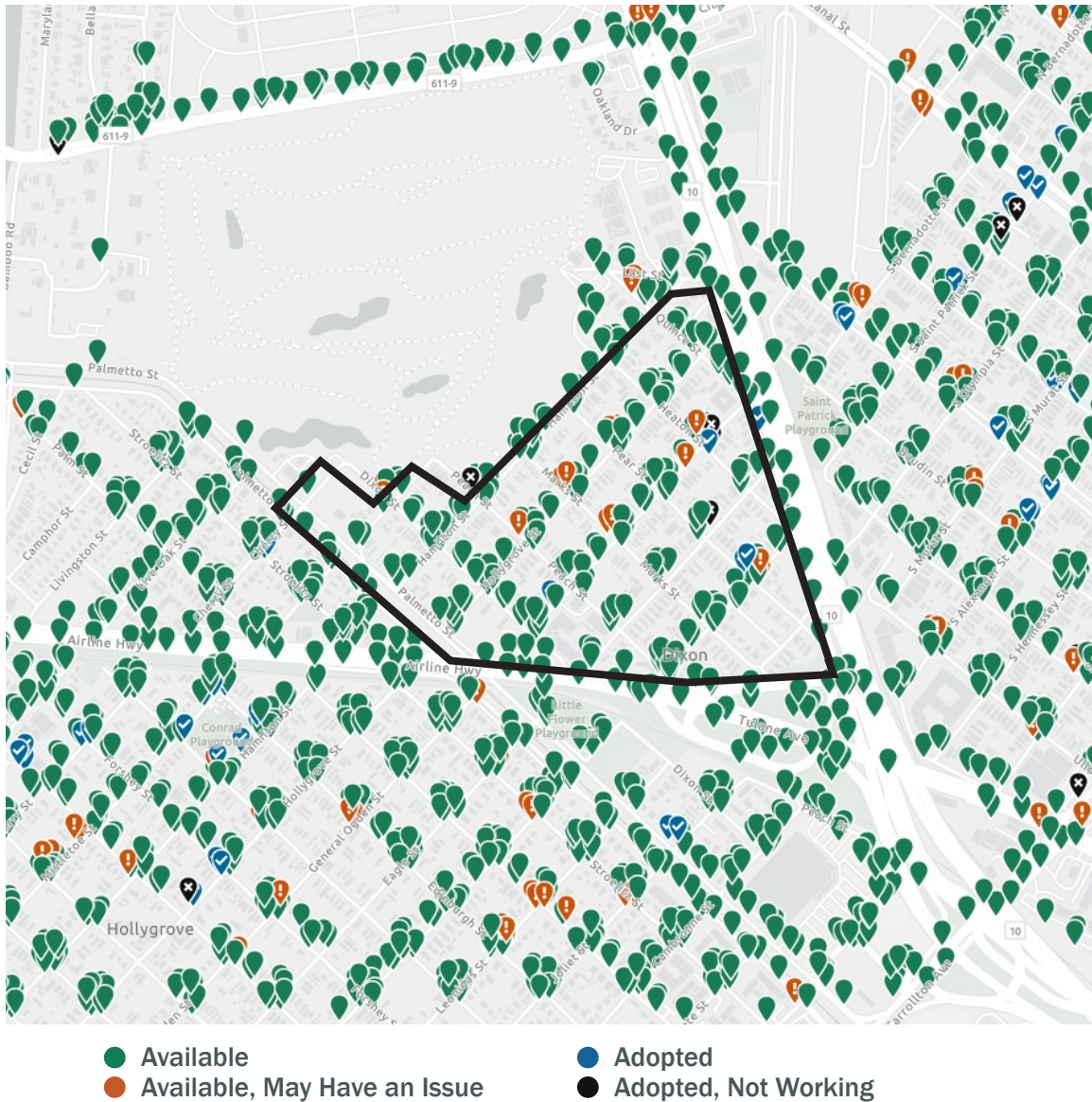
 **1% Annual Chance of
Flood Hazard**

 **0.2% Annual Chance of
Flood Hazard**

 **Area with Reduced
Risk due to Levee**

FEMA FLOOD ZONES

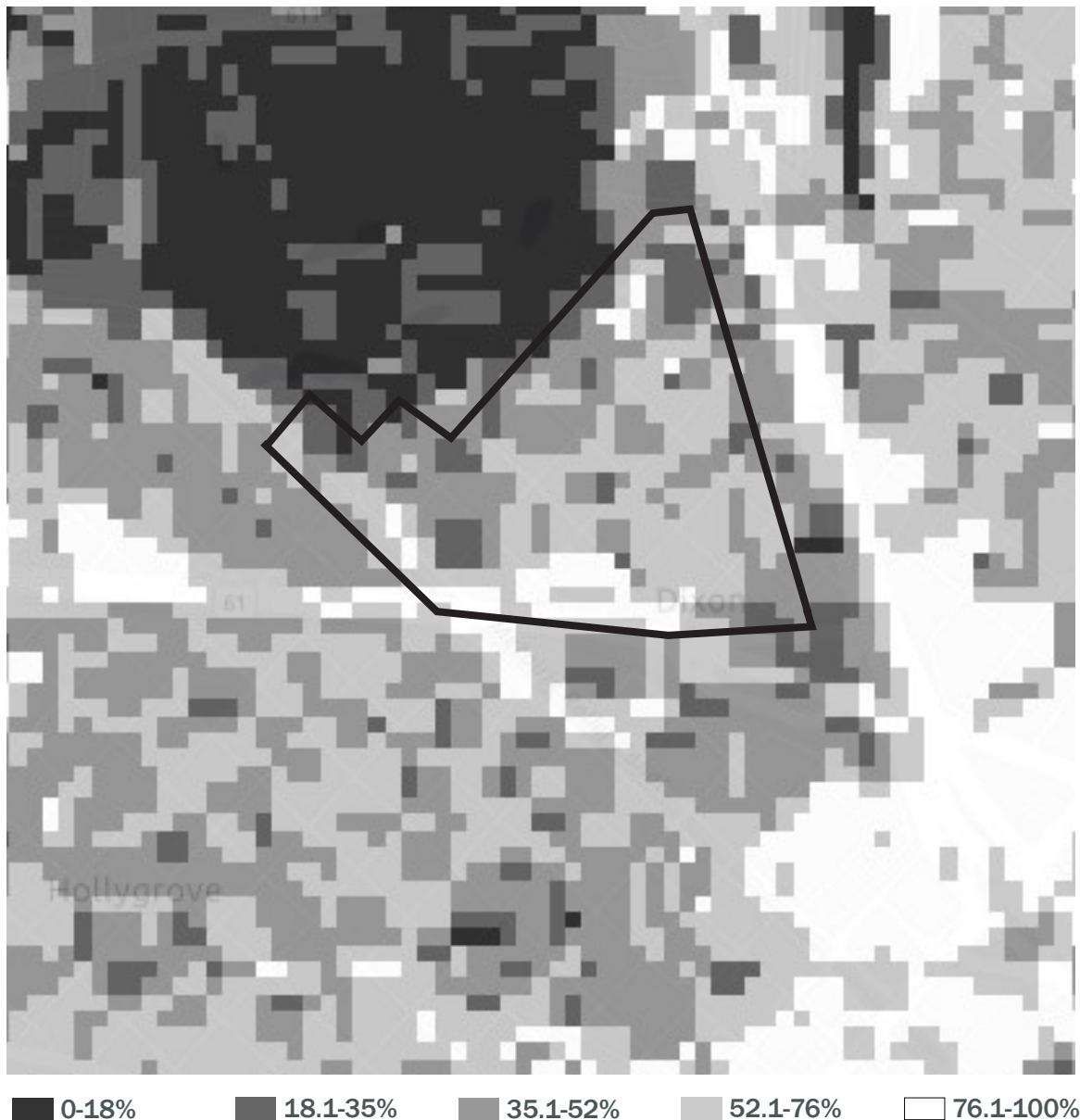
Flood zones are determined by the probability of flooding each year. Areas in blue are deemed by FEMA to have minimal risk. Whereas, areas in light blue have a 0.2% chance of a flood hazard and those in blue have a 1% chance of a flood hazard.



CATCH BASINS

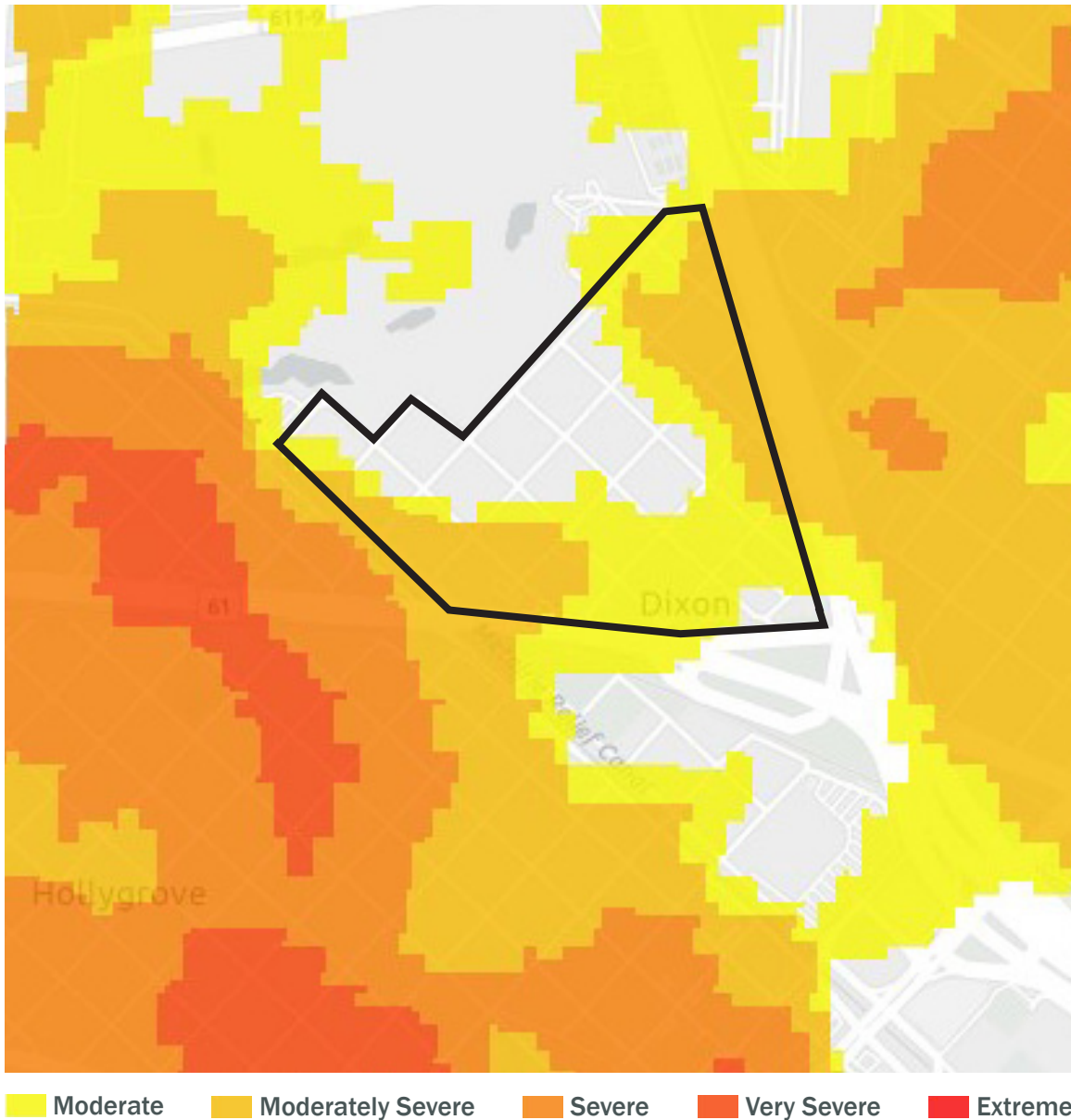
Locations of catch basins and their adoption status are depicted on the map above. All the runoff that enters the catch basins is carried out to Lake Pontchartrain. You can “adopt” a catch basin through the City’s Adopt-a-Catch Basin program to become responsible for cleaning out debris before storms and notifying the City of any issues with its function. For more information on how to adopt your own catch basin please visit catchbasin.nola.gov

Image Source: City of New Orleans Adopt-A-Catchbasin



PERCENTAGE OF IMPERVIOUS SURFACE

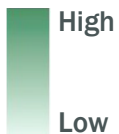
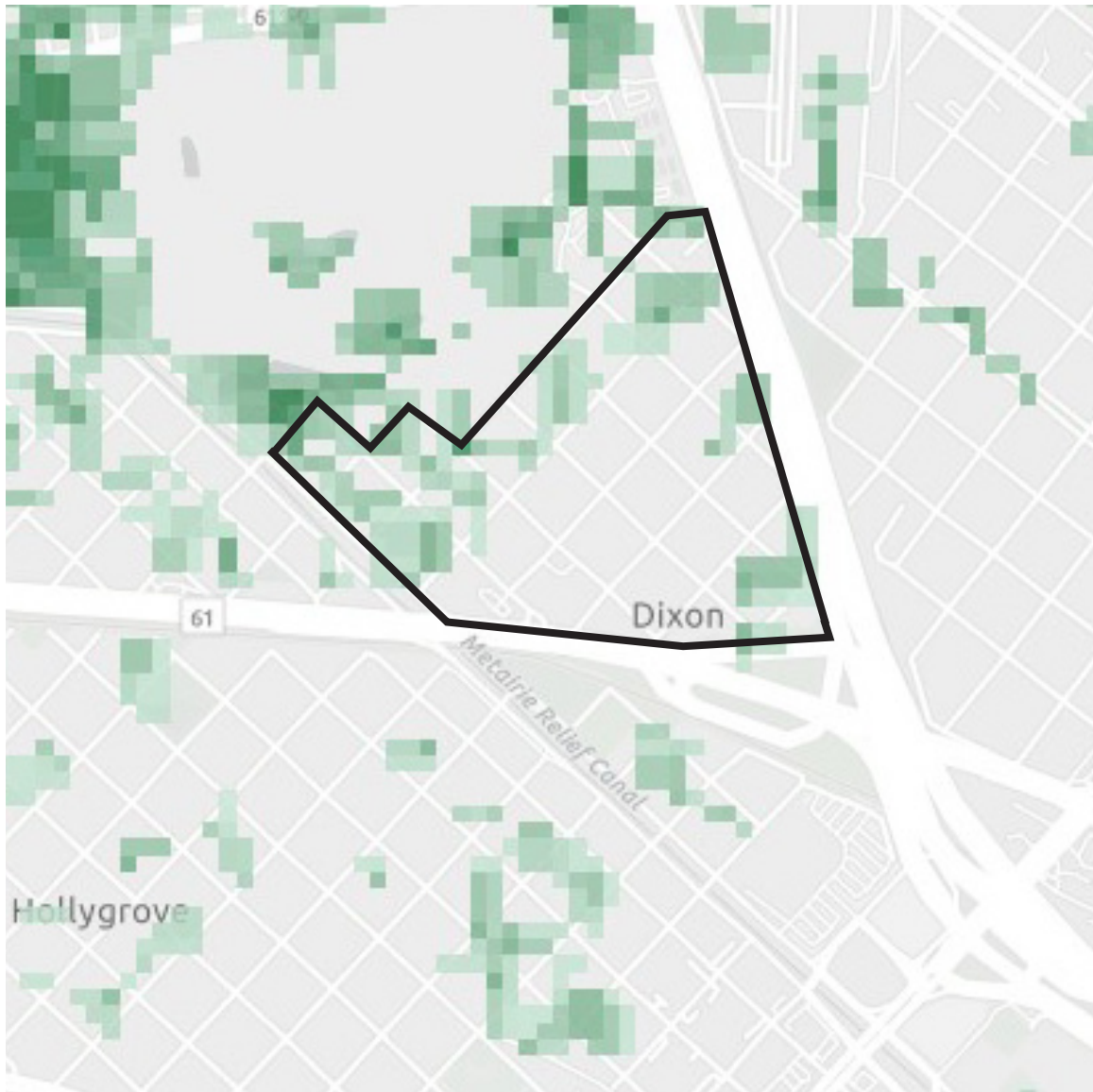
Impervious surfaces are shown on the map as a range from black to white. The lightest color represents surfaces that are 76.1-100% impervious, examples may include concrete sidewalks or parking lots. These surfaces prevent water from reaching the soils beneath where they could be absorbed and infiltrated into the earth.



URBAN HEAT ISLAND

This map shows urban heat island severity from moderate (yellow) to extreme (red). Urban heat island effect occurs over large amounts of heat-absorbing surfaces such as buildings, roads, and other pavement.

Image Source: The Trust for Public Land.



TREE CANOPY

This map shows the existing tree canopy from high (dark green) to low (light green). The urban tree canopy helps to offset urban heat island effect and improve air quality.