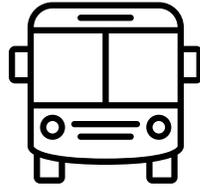
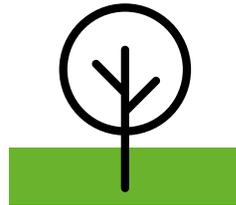


Move



Restore



Energize



Thrive



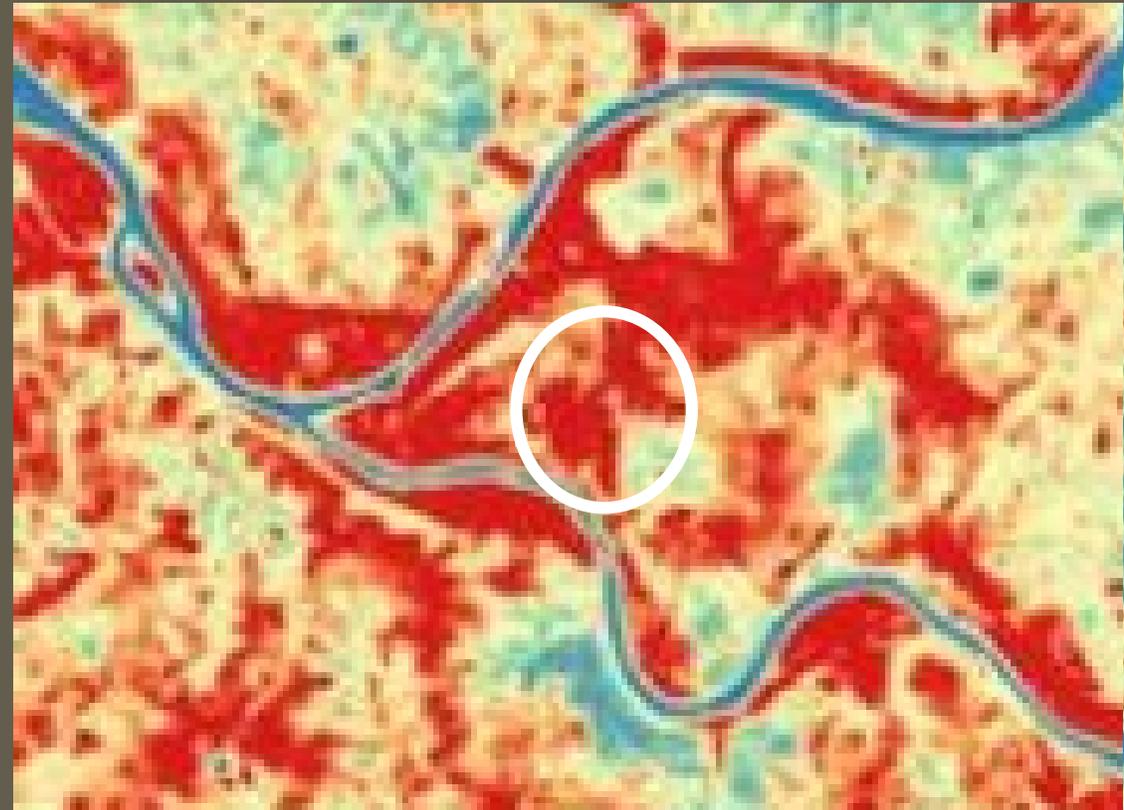
Planning Education Series

OAKLAND NEIGHBORHOOD PLAN EDUCATION SERIES

restore

Department of City Planning
Pittsburgh Water and Sewer Authority
Pittsburgh Parks Conservancy
Tuesday, August 6th

OUR URBAN ENVIRONMENT



RESTORE: NATURE IN THE CITY



BIOPHILIC DESIGN



ECOLOGICAL DESIGN



USING VEGETATION FOR SEASONAL SHADE

TRELLIS, OR PERGOLA,
OVER DOORWAY



TRANI HOUSE
APULIA, ITALY



WIRE LATTICE USED
AS A TRELLIS FOR
VINES SHADING COURT

SHADED COURT, GRANADA, SPAIN

NORTH



TREES

AN OLD NEW ENGLAND
TRADITION IS TO PLANT
HUSBAND AND WIFE
TREES TO GIVE
SUMMER SHADE TO
THE HOUSE'S SOUTH
SIDE WHEN IT IS MOST
VULNERABLE IN THE MORNING AND EVENING.



FARMHOUSE
NEW HAMPSHIRE



MULTI-FUNCTIONAL LANDSCAPES



URBAN FORESTRY

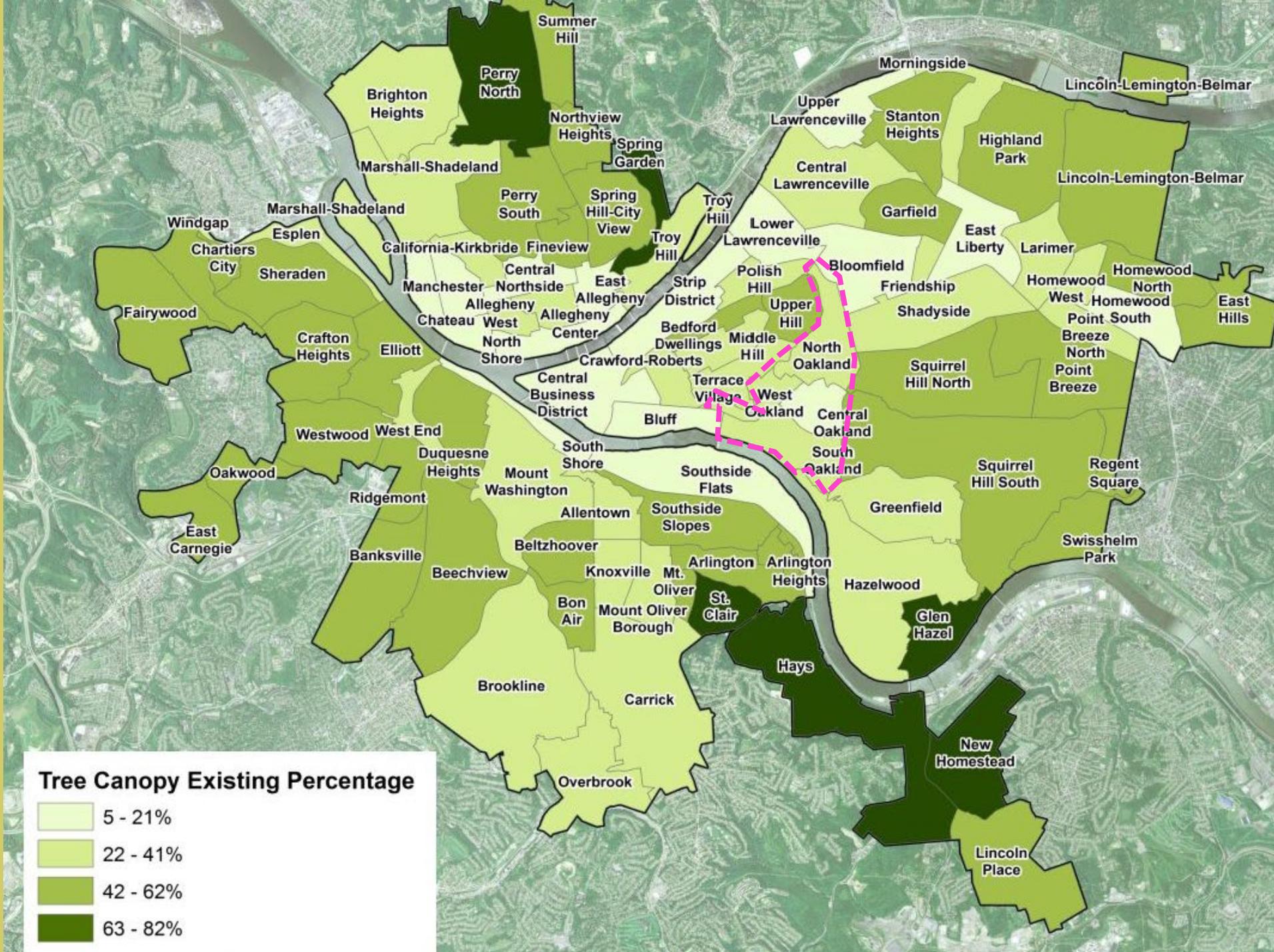
Canopy Coverage

N. Oakland: 26%
33% possible

C. Oakland: 20%
33% possible

W. Oakland: 24%
39% possible

S. Oakland: 27%
38% possible



PLANTING FOR SUCCESS



PUBLIC VS. PRIVATE OPEN SPACE

*public space, private space, or
privately-owned public space?*



FROM IDEA TO REALITY: WHO & HOW?

Planning



Design



Construction



Operation & Maintenance

Programming



PARTNERSHIPS & COORDINATION



City Depts: City Planning, Public Works, Mobility & Infrastructure, CitiParks, Permits Licenses Inspections

Authorities: Pittsburgh Water & Sewer Authority, Urban Redevelopment Authority, Port Authority

Non-profits: Pittsburgh Parks Conservancy, Neighborhood Orgs, Business Improve Dists., Foundations

Private Developers & Institutions: Universities, UPMC, Phipps, developers

Residents & Stakeholders: YOU!!!

PLANNING – COMPREHENSIVE / CITY-WIDE AND AREA PLANS



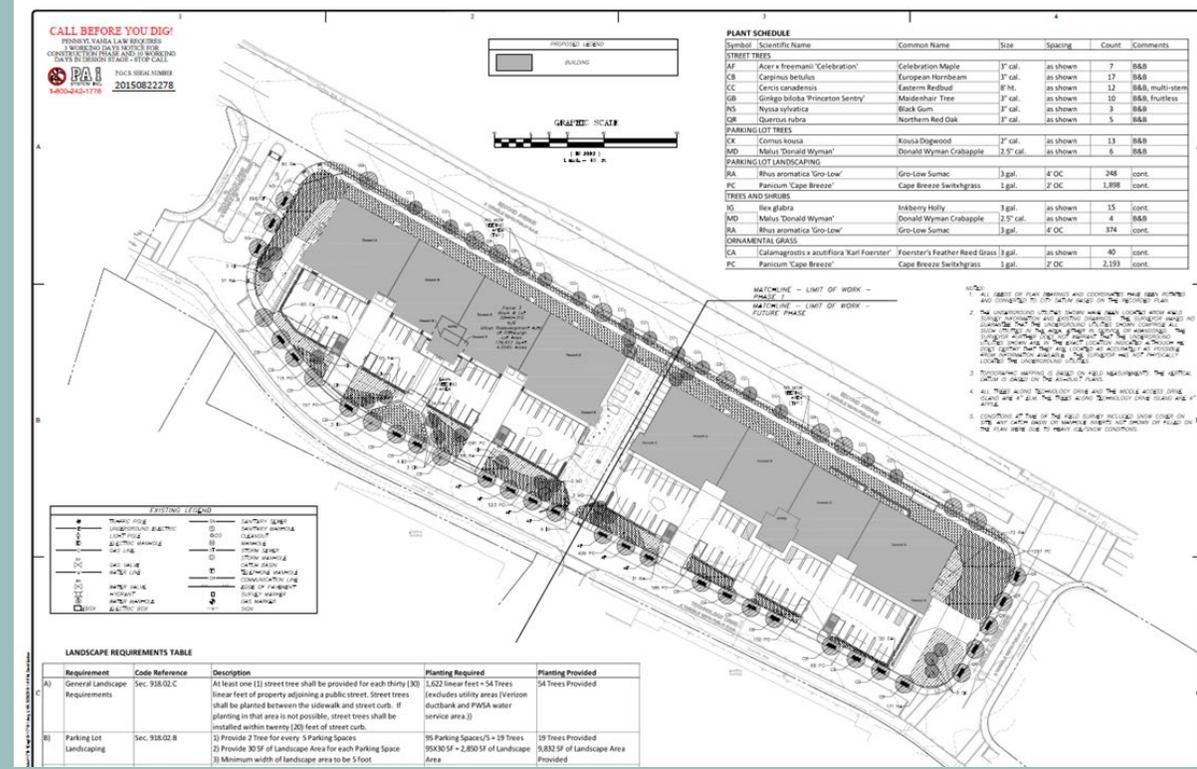
PITTSBURGH URBAN FOREST MASTER PLAN
A Road Map for the Effective Management of our Urban Forest



- Comprehensive Plan
- Open Space Plan
- Neighborhood Plans
- Park Master Plans
- Urban Forestry MP
- OnePGH
- Vacant Lot Toolkit
- Greenways for PGH
- Complete Streets

PLANNING – DEVELOPMENT REGULATIONS, PROJECT SUPPORT

- Zoning Code, Building Code, Stormwater Management Code
- Institutional Master Plans
- Policy & Inter-agency Agreements
- Shepherding individual projects from plan → design



DESIGN, CONSTRUCTION, O&M, PROGRAMMING



- *Conceptual design, cost estimating, phasing*
- *Budgeting, grants, fundraising, contracting*
- *Design, engineering, public engagement*
- *Construction documentation, permitting*
- *Construction, occupancy, establishment*



- *Operation & Maintenance*
- *Inspections, Repairs, Renovations*
- *Programming – CitiParks at parks, Healthy Active Living Centers, pools*

PREVIOUS / RELATED PLANS

- Oakland 2025 Plan (2012)
- Innovation Oakland (2010)
- Future of Oakland Plan (2002)
- A Green Scan for Oakland
- Institutional Master Plans:
 - University of Pittsburgh
 - Carlow University
 - UPMC (2014)
- Open Space PGH (2013)
- Schenley Park Regional Master Plan (2000, 2015)

Pitt's Campus Master Plan



The Oakland 2025 Master Plan

A vision for sustainable living and mobility

August 2012



THANK YOU!

Department of City Planning
<https://pittsburghpa.gov/dcp>

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Martina Battistone: martina.battistone@pittsburghpa.gov

Ose Akinlotan: ose.akinlotan@gov

Derek Dauphin: derek.dauphin@pittsburghpa.gov

Andrew Dash: andrew.dash@pittsburghpa.gov

WHO WE ARE

The Pittsburgh Parks Conservancy

\$112+ million raised

22 active work sites

20 major capital projects

277 free public programs in 2017

11,000 trees planted

5,000 children educated annually

**We are your nonprofit
partner in the parks.**



PARTNERSHIP

A STRONG PUBLIC INTEREST PARTNERSHIP TO SUPPORT & ENHANCE PITTSBURGH PARKS



The City of Pittsburgh

Public Works Budget
Parks & Rec Public Safety
Planning Mobility and Infrastructure

FUNDING SOURCES:

- General fund
- Allegheny County Regional Asset District*
- Various trust funds
- Grants and sponsorships
- Various fees



Pittsburgh Parks Conservancy

Capital Projects
Educational Programming
Public Programs & Events
Restoration & Ecology Work

FUNDING SOURCES

- Grants and corporate gifts
- Individual donations
- Endowments
- Rental income
- Fundraising events

OTHER GREENSPACE PARTNERS



ALLEGHENY
LAND TRUST



PARK BENEFITS

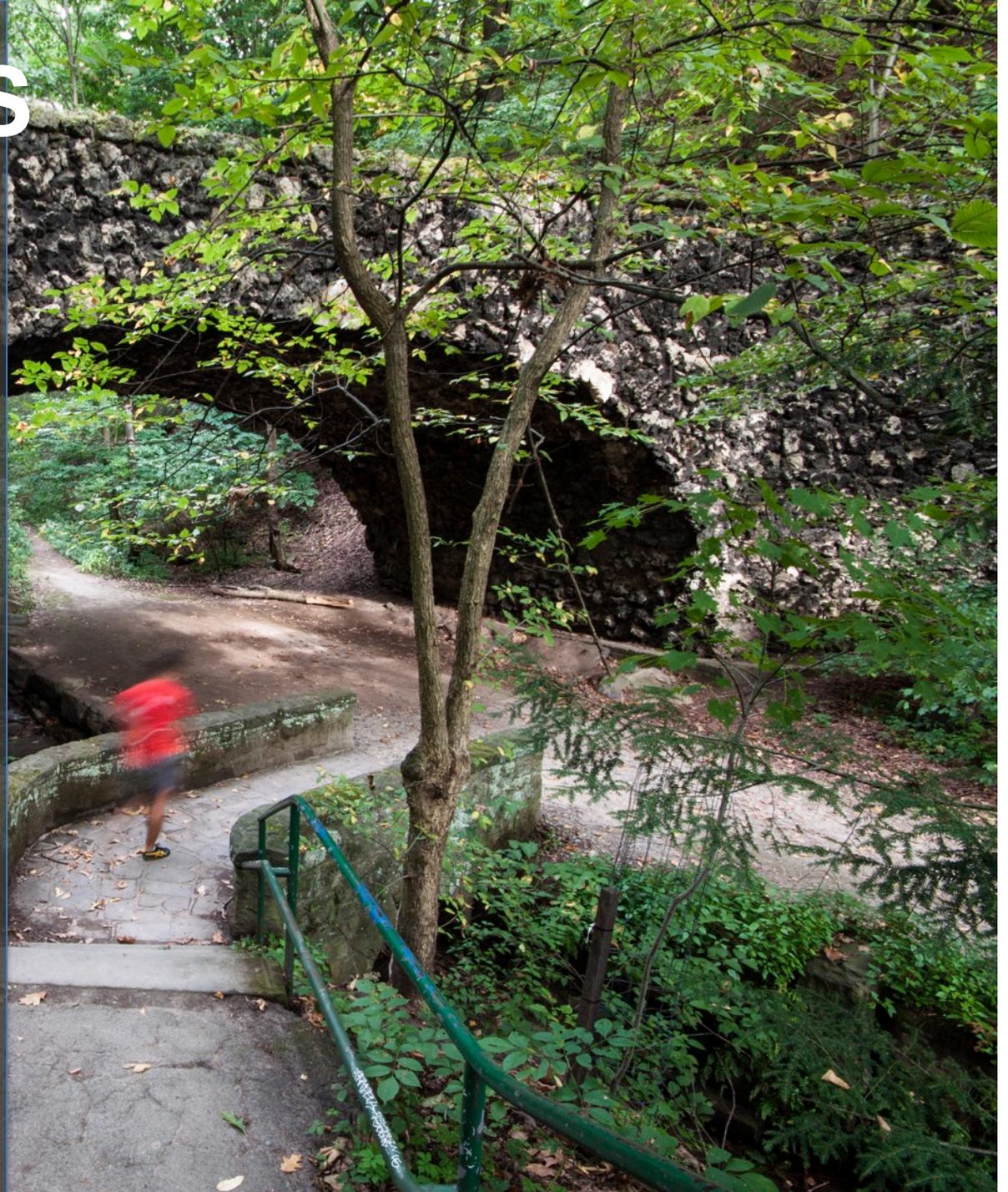
Healthy minds and bodies

Clean air and water

Stronger communities

Biodiversity

Beauty



ORIGINS



ORIGINS



ORIGINS



RESTORATION



RESTORATION



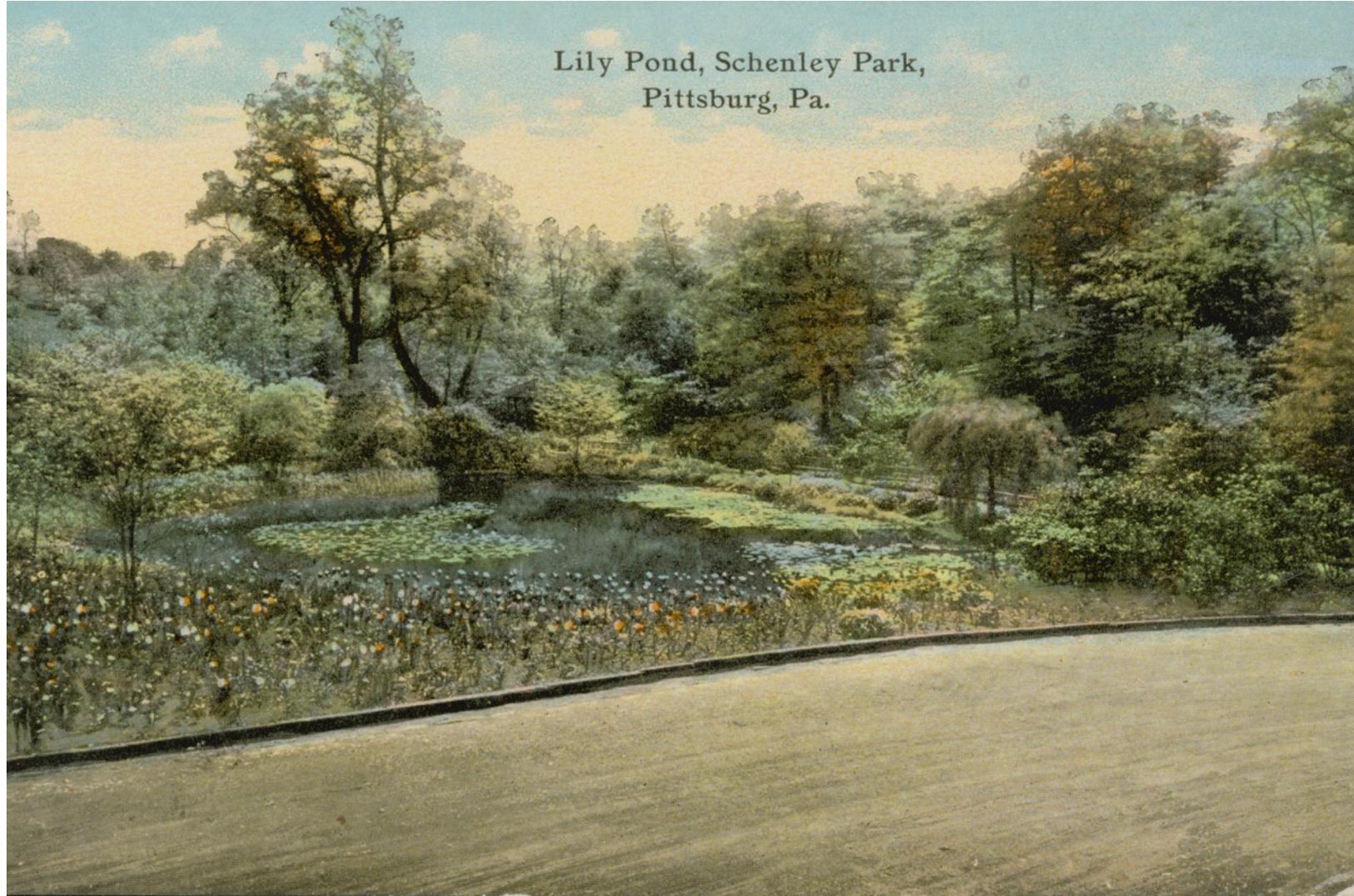
RESTORATION



RESTORATION



RESTORATION



RESTORATION



FUTURE

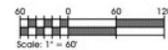


FUTURE



FLAGSTAFF HILL - SCHENLEY PARK
City of Pittsburgh
Allegheny County, Pennsylvania

MASTER PLAN



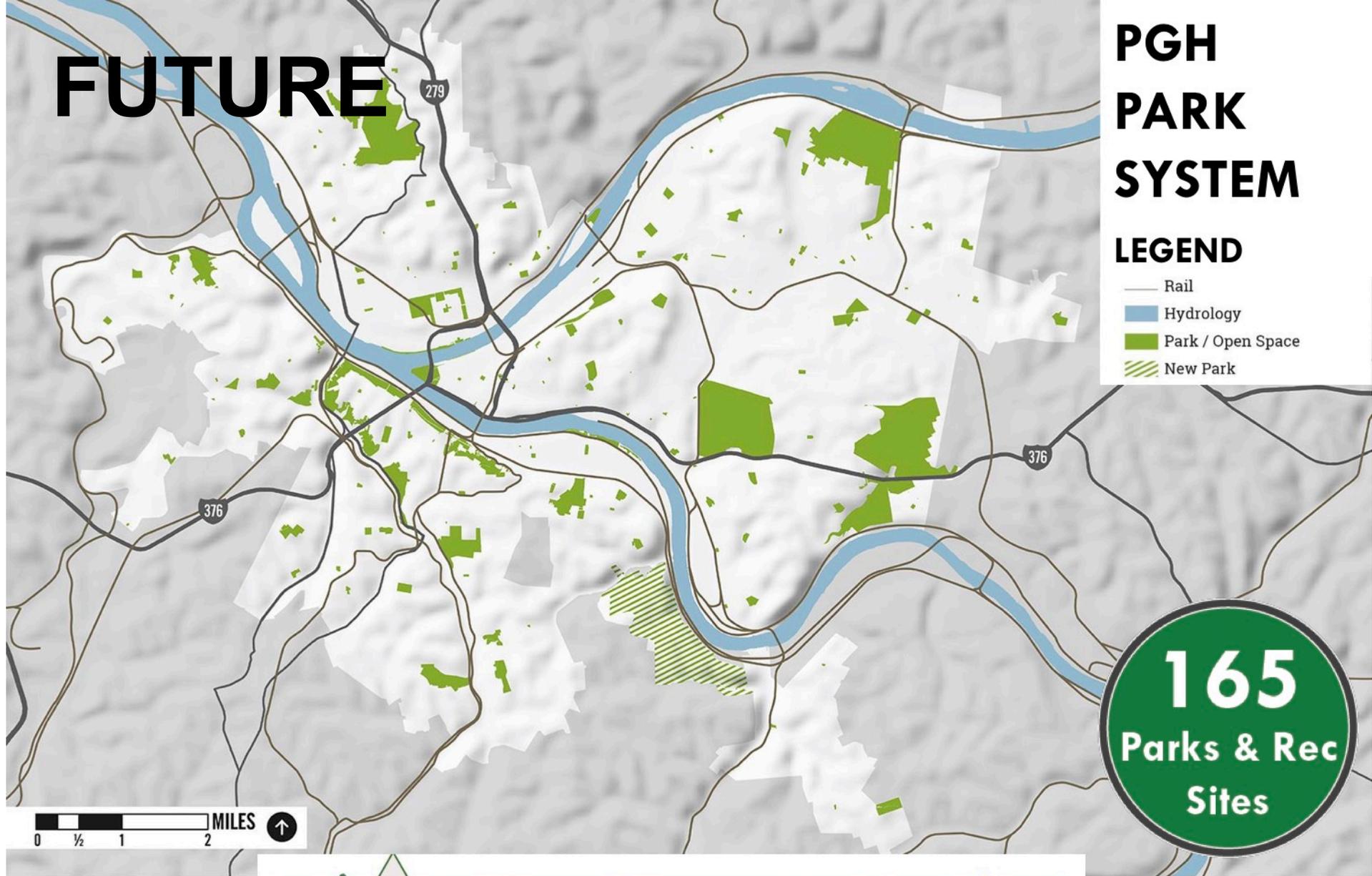
PASHEK MTR
611 East Ohio St.
Pittsburgh, PA 15212
pashek.com
412.321.6400

FUTURE

PGH PARK SYSTEM

LEGEND

- Rail
- Hydrology
- Park / Open Space
- New Park



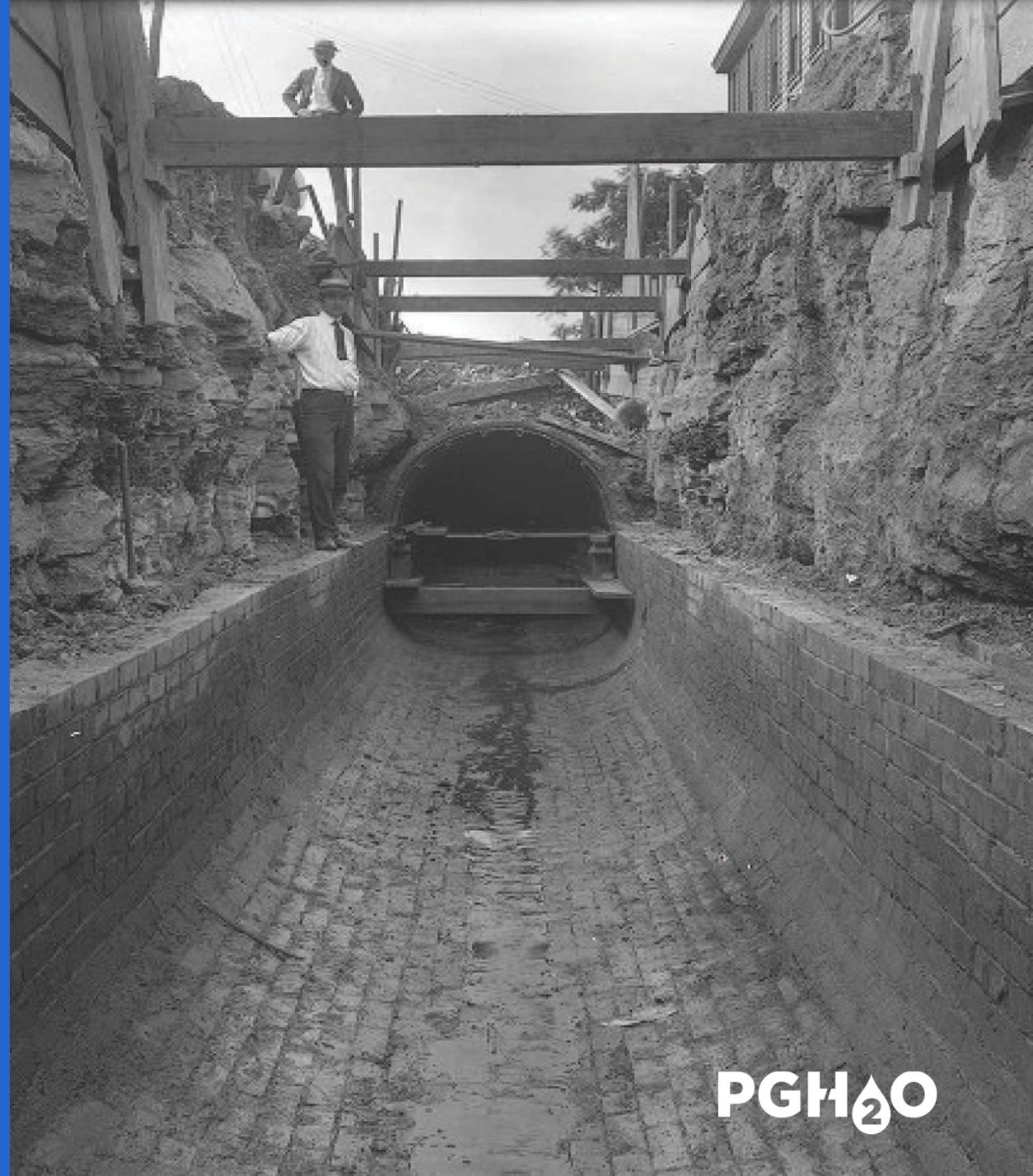


PWSA's City-Wide Green First Plan

August 6, 2019

PGH₂O

At the turn of the 20th century, Pittsburgh embarked on its biggest infrastructure improvement campaign, building sewers, water lines, roads, power lines that created the city we know today.



COMBINED SEWER SYSTEM

Dry Weather

Residential Wastewater

Business Wastewater

Wastewater Treatment Facility

Roof & Area Drains

Street Storm Drains

Roof & Area Drains

Facility



Combined Sewer

B

Treated Water

Public Waterway

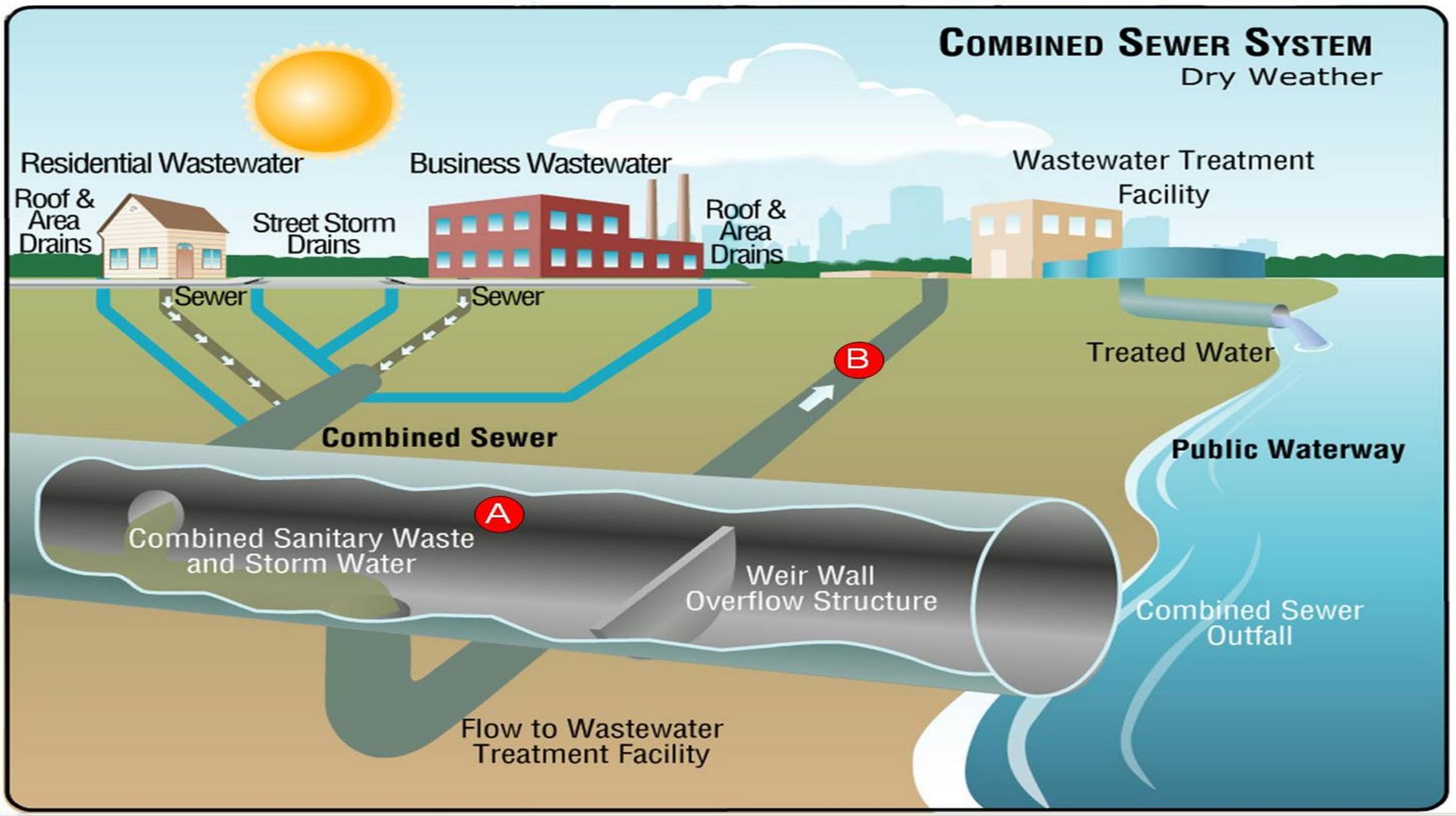
Combined Sanitary Waste and Storm Water

A

Weir Wall Overflow Structure

Combined Sewer Outfall

Flow to Wastewater Treatment Facility



COMBINED SEWER SYSTEM

Wet Weather

Residential Wastewater

Business Wastewater

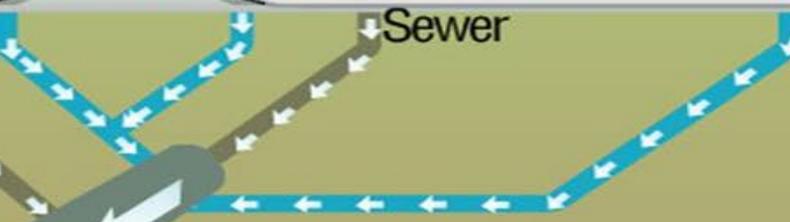
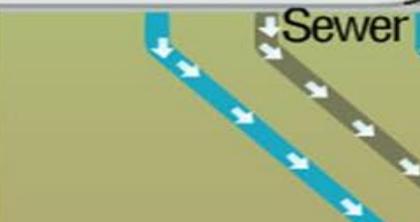
Wastewater Treatment Facility

Roof & Area Drains

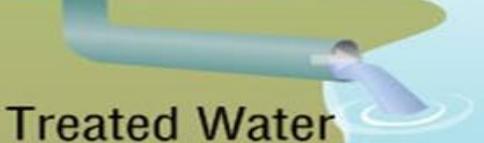
Street Storm Drains

Roof & Area Drains

Treated Water



Combined Sewer



Public Waterway



THE PROBLEM TODAY:

We have a **STORMWATER MANAGEMENT** problem

- Poor Water Quality
- CSOs/SSOs
- Illicit Discharges – sewage in storm sewers
- Surface Flooding
- Basement Sewage Flooding
- Sewers that are 80 – 100+ years old

We need an **AFFORDABLE PLAN** to address **ALL OF THESE ISSUES**

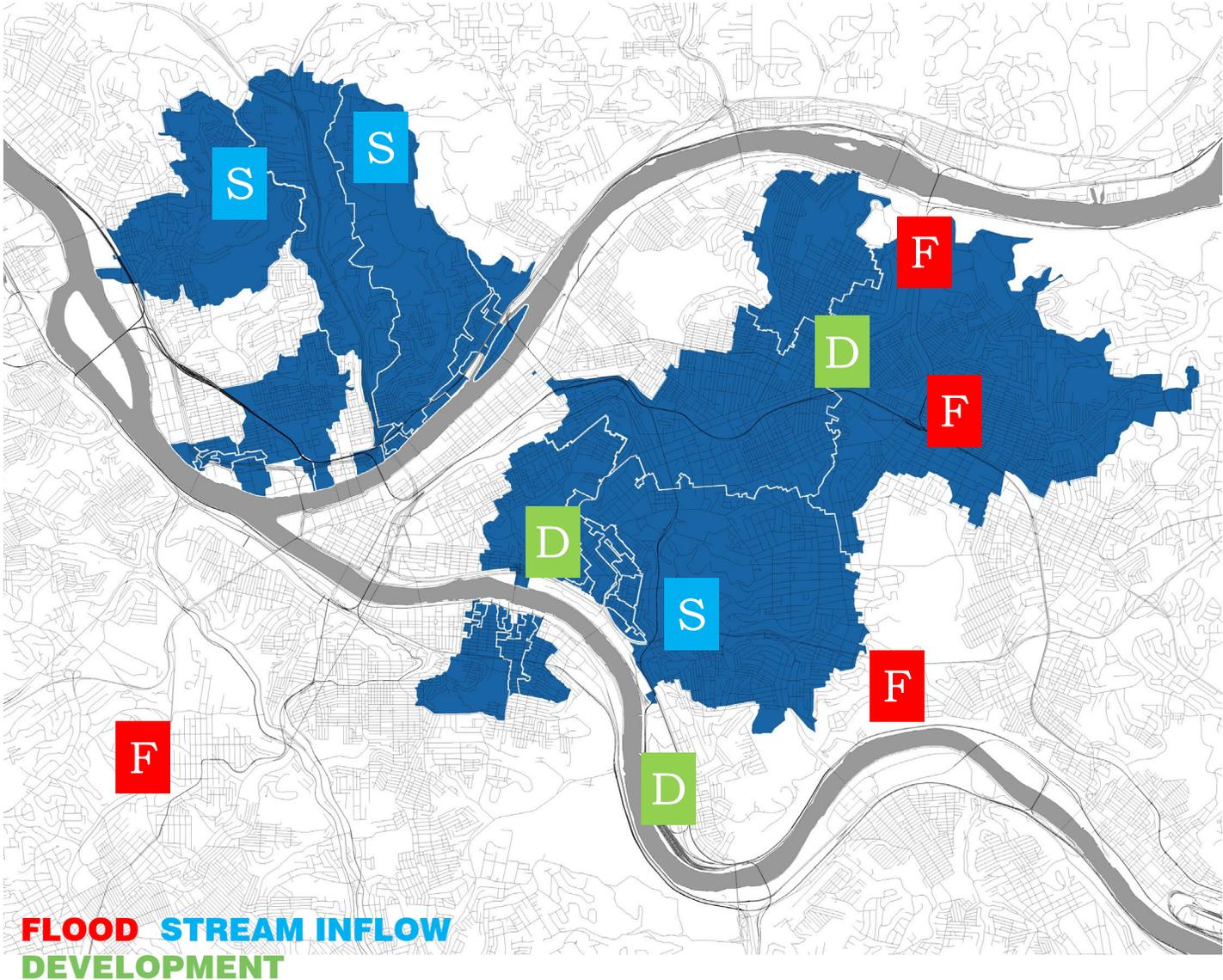


Green First Plan: PROCESS

We need to keep rainwater out of the system. We can be most effective by focusing efforts on the SEWERSHEDS that contribute the most to the system.

We identified the **top 30 sheds** and overlaid other criteria:

RISK	LOWER RISK
OPPORTUNITY	EASE OF IMPLEMENTING
DEVELOPMENT	HIGH ACTIVITY
SYNERGIES	MULTIPLE BENEFITS



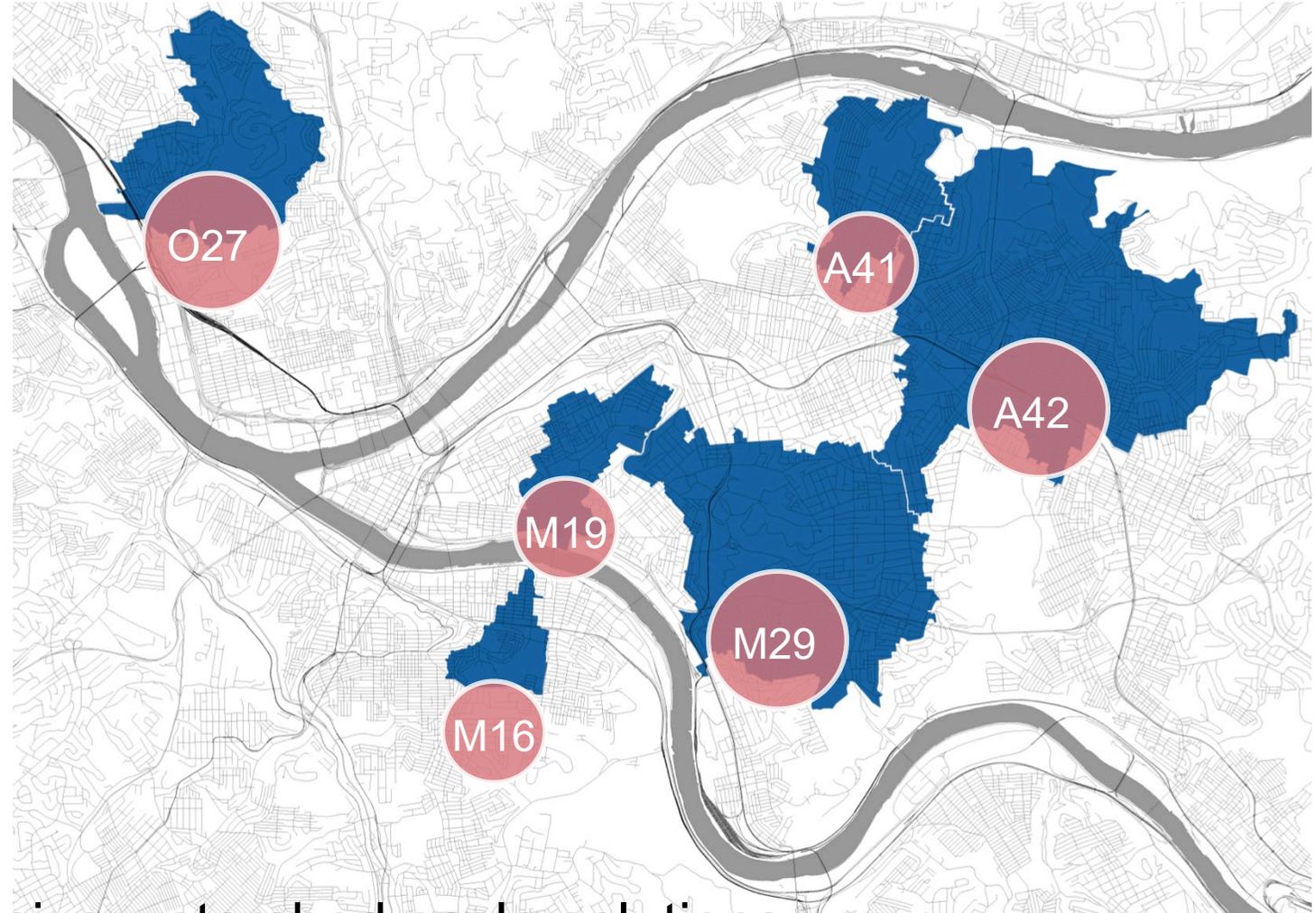
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and chose **6 priority sheds**.



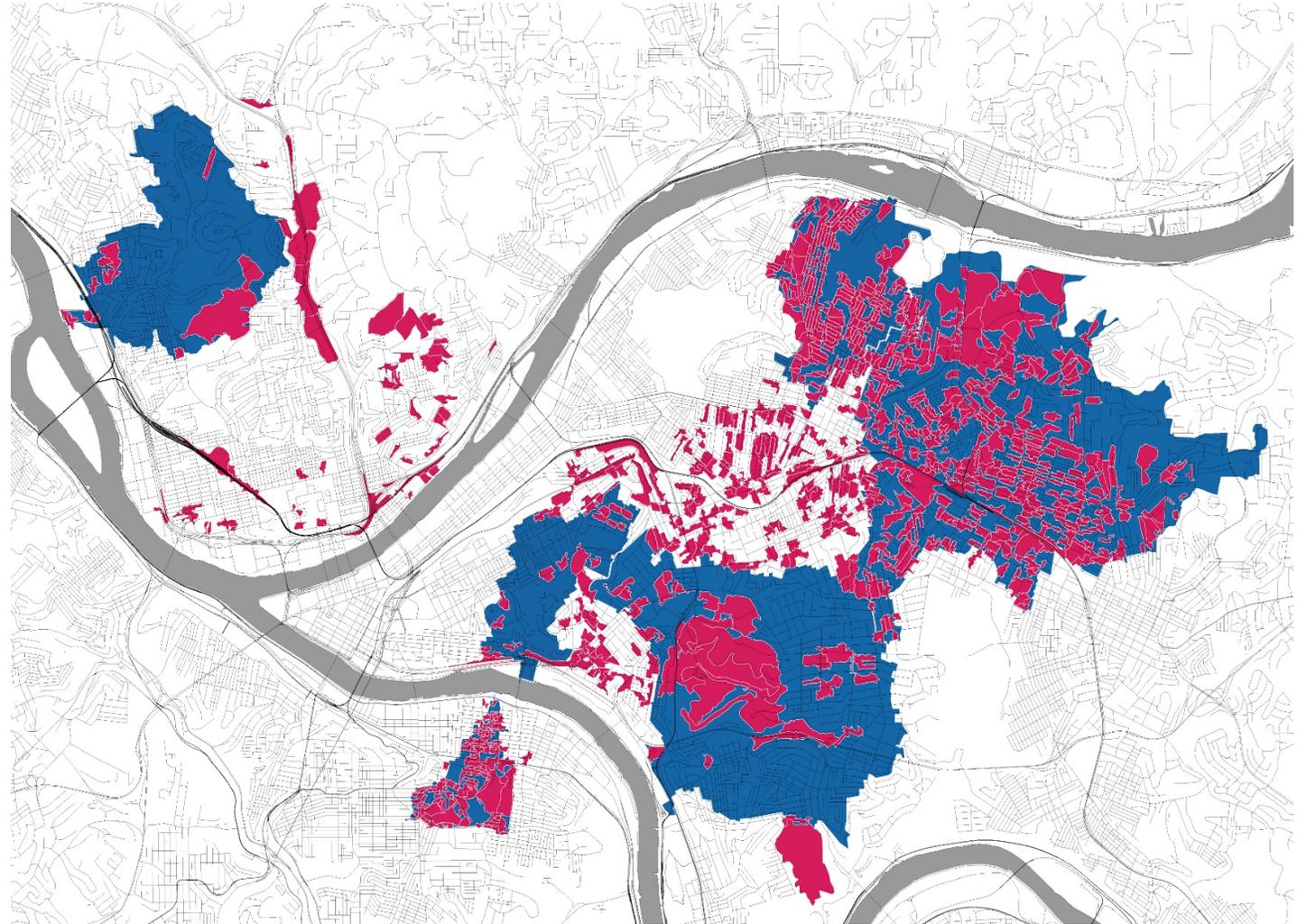
GOAL: Comprehensive watershed-scale solutions

The Green First Plan is **ENGINEERED**

Identify **highest contributing** PWSA
Stormwater inlets based on total impervious
area.

Prioritize how we select locations for
green infrastructure implementation projects.

This approach addresses the city's stormwater
issues with **one investment.**



We need to create
next century
green infrastructure.

PGH₂O



FUNCTIONAL COMMUNITY ASSETS

Hillcrest Project, Garfield, A-22



1,176,000 GALLONS
ESTIMATED RUNOFF
MANAGED PER YEAR



936,400 GALLONS
ESTIMATED COMBINED SEWER
OVERFLOW REDUCED PER YEAR

1.51 ACRES
IMPERIVOUS AREA MANAGED

FUNCTIONAL COMMUNITY ASSETS

Centre & Herron Project, Upper Hill, M-19



1,018,900 GALLONS
ESTIMATED RUNOFF
MANAGED PER YEAR



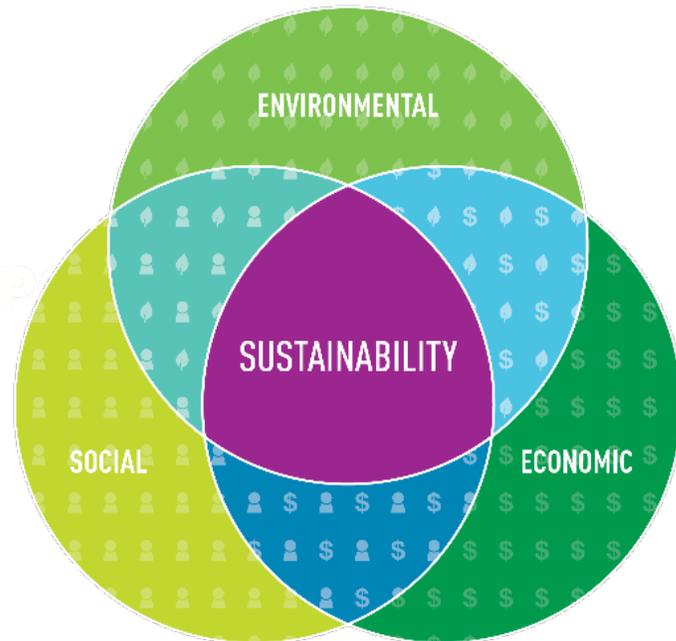
882,800 GALLONS
ESTIMATED COMBINED SEWER
OVERFLOW REDUCED PER YEAR



1.25 ACRES
IMPERVIOUS AREA MANAGED

The Green First Plan is **BENEFICIAL**

TRIPLE BOTTOM LINE



MULTIPLE BENEFITS

- Local Flood Mitigation
- Property Value Increase
- Recreational Value Added
- Economic Water Quality
- Air Pollution Reduction
- Heat Island Effect Reduction
- Carbon Reduction



Ruari Egan
regan@pgh2o.com

City-Wide Green First Plan:
<http://pgh2o.com/City-Wide-Green-Plan>

