

# Urban Forest Carbon Registry

## Carbon Credits for City Trees

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# Drafting Group and Board

## Protocol Drafting Group

- **Skip Swenson**, Forterra, Seattle
- **Darren Morgan**, Seattle DOT
- **Zach Baumer**, City of Austin, Texas
- **Rich Dolesh**, National Parks and Rec Assn
- **Jenny McGarvey**, Chesapeake Bay Alliance
- **Ian Leahy**, American Forests
- **Scott Maco**, Davey Institute, Kirkland, WA
- **Greg McPherson**, US Forest Service
- **Mark McPherson**, Urban Carbon Registry
- **Walter Passmore**, City of Palo Alto
- **Shannon Ramsay**, Trees Forever, IA and IL
- **Misha Sarkovich**, Sacramento Utility
- **Andy Trotter**, West Coast Arborists

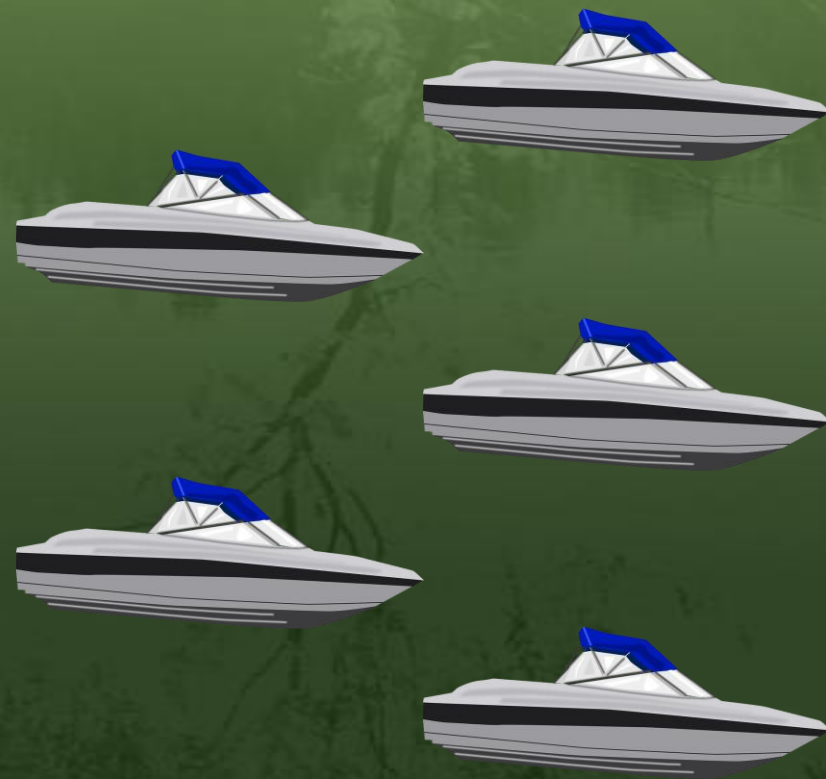
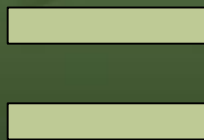
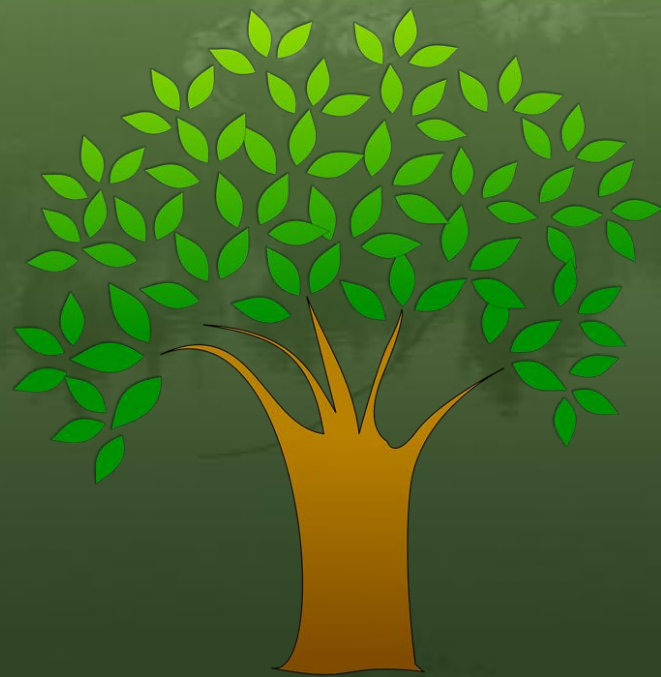
## Board

- **Forterra** - Skip Swenson, Managing Director
- **The Nature Conservancy** - Bill Toomey, Director of Urban Forest Programs
- **American Forests** - Ian Leahy, Director of Urban Forest Programs
- **Arbor Day Foundation** - Jared Carlson, Director of Strategy
- **Gerry Gray**, Consultant and Research Co-Chair, Sustainable Urban Forest Coalition

\$700,000,000

Purchases of carbon credits in U.S.

Carbon Credit = 1 metric tonne of carbon dioxide removed from the atmosphere





# Microsoft buys Carbon Credits from Forests in Indonesia and Madagascar

# What If....

- Our Under-Funded City and County Parks
- Industrial areas, waterways, brown fields
- Disadvantaged communities

# Disparity between wealthy and disadvantaged cities and neighborhoods

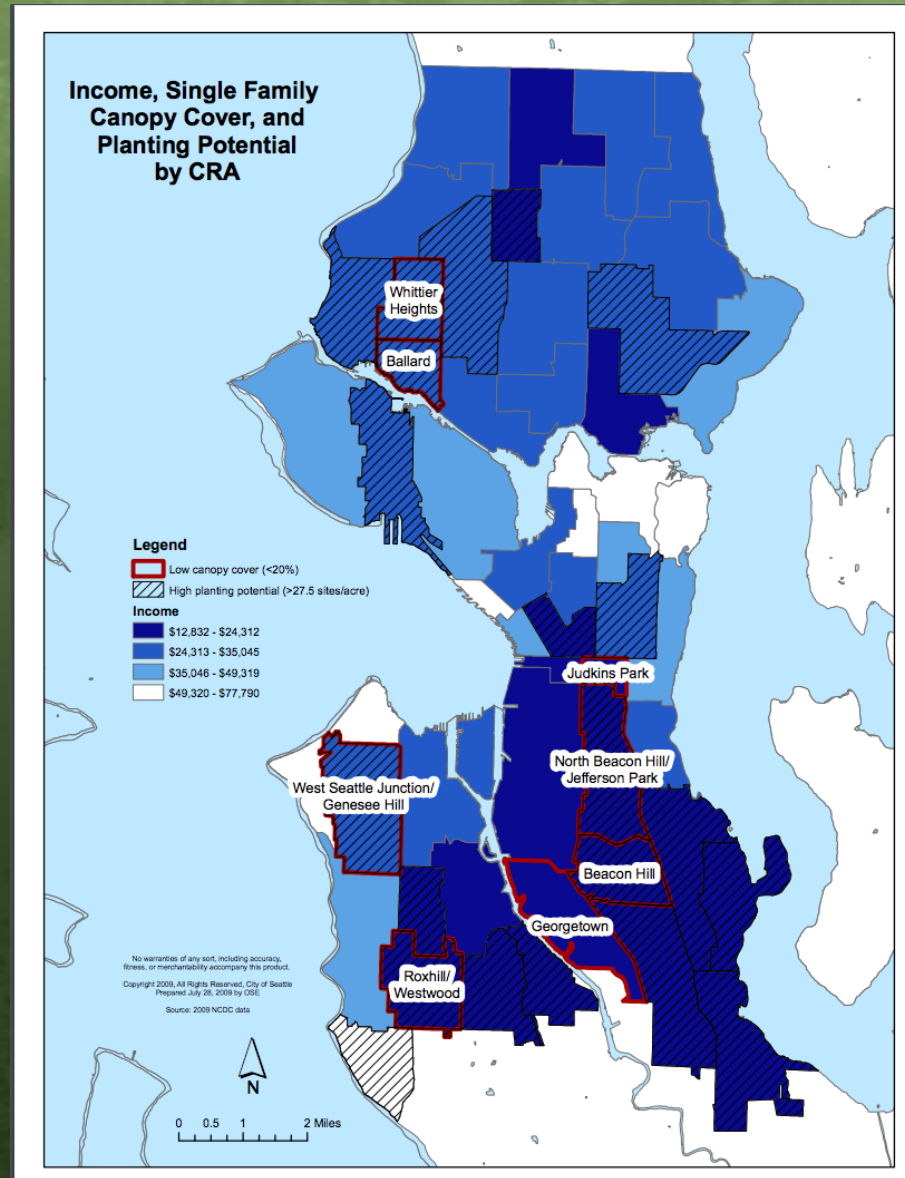


Royal City, Washington



Walla Walla, Washington

# Seattle Tree Cover and Income





# Biggest Clear-Cut in WA?

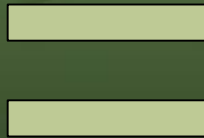


# But...

- 80% of people live in cities and towns
- Urban land area increasing the size of Montana by 2050



# Benefits of City Trees



# This Organization



**\$700,000,000**



**UFCR**



# Three-Phase Plan

- Protocol: finished Feb. 2017. Available now for comments at:

[www.ufregistry.org](http://www.ufregistry.org)

- Registry Functions: website, databases, forms, staff: Dec. 2017

- Promote and facilitate projects

# Two Types of UF Carbon Projects

- Tree Planting
- Tree Preservation: trees preserved from removal (Avoided conversion model)
- Bundled credits: carbon plus storm water, energy savings, air quality

# What is “urban?”

- Projects must be located within at least one of the following:

- The Urban Area boundary (“Urban Area”), per United States Census Bureau (<https://www.census.gov/geo/maps-data/maps/2010ua.html>);

- The boundary of any incorporated or unincorporated city or town created under the law of its state;

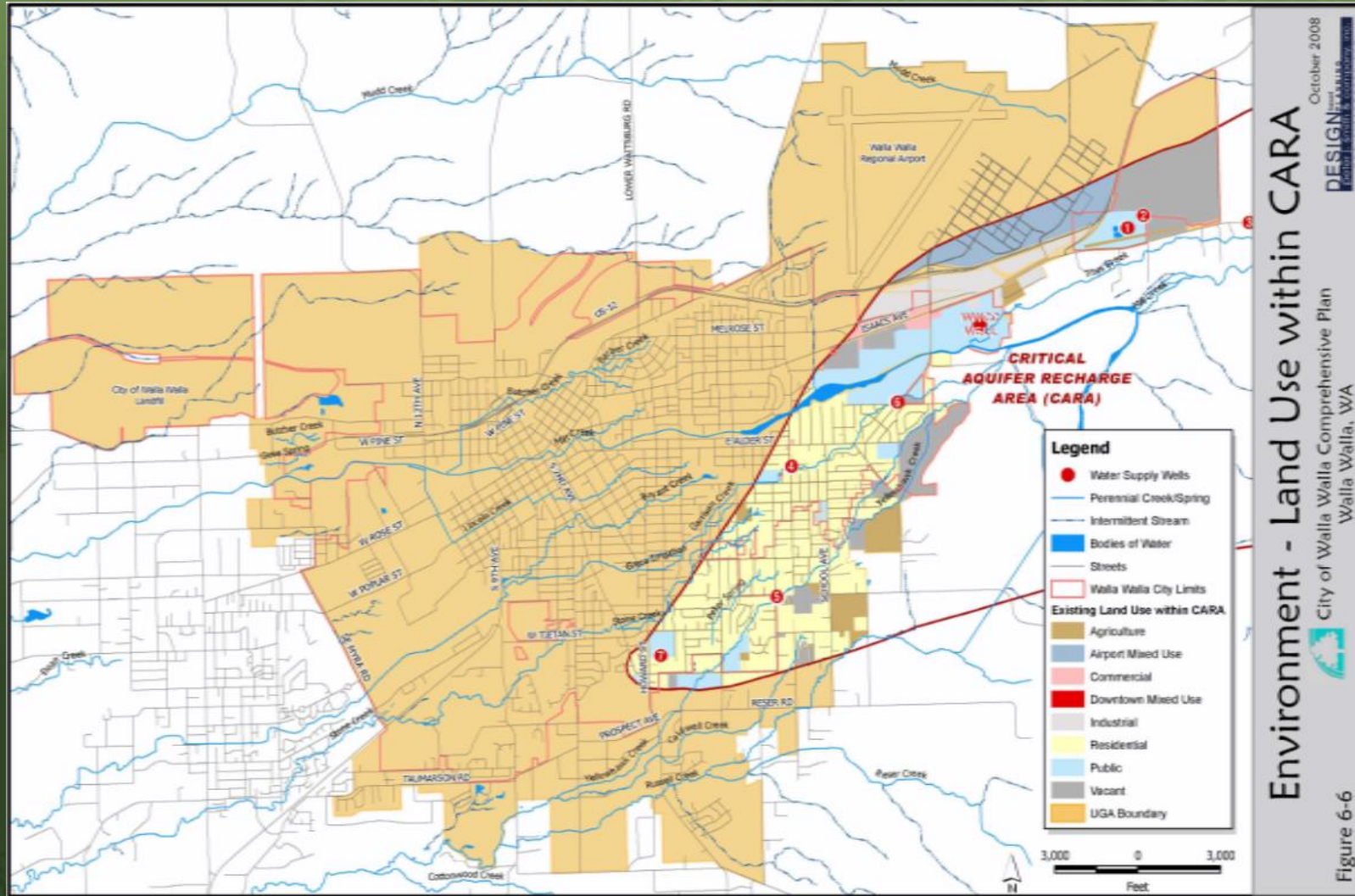
- Watershed or source water protection zone overlapping above;

- A transportation, power transmission, or utility right of way, beginning or ending in above.





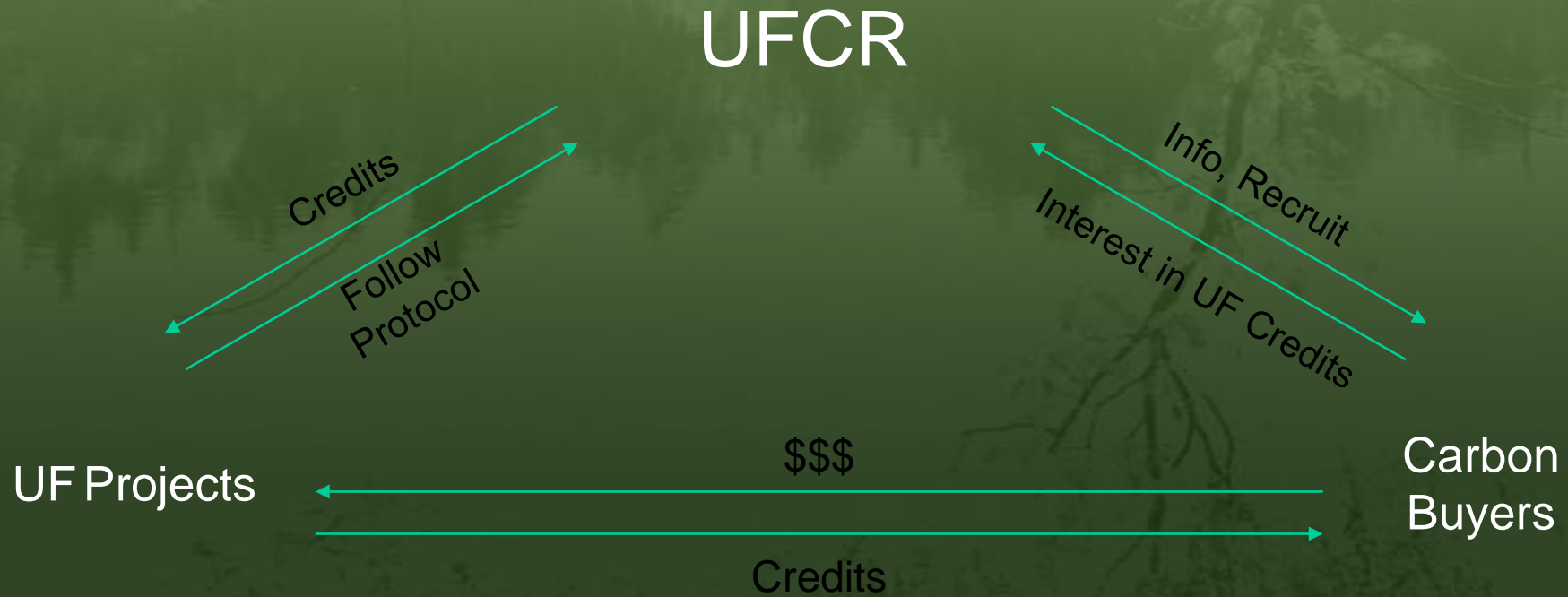
# Aquifer Recharge Area



# Who Does Projects?

- Cities and towns
- Utilities and special districts
  - In Seattle, SPU owns the watershed and urban reservoirs
- Schools and colleges (128,000)
- Water shed, riparian
- Rights of way
- Parks, golf courses, hospitals, cemeteries, arboretums
- Neighborhood councils

# How Does This All Work?



# Example 1: Planting

- Potential Revenues

- 500 trees, 25 years
- Carbon: \$5,000 to \$22,000
- Co-benefits: \$14,000
- Totals: \$19,000 to \$36,000

- Or: charge a higher flat fee to buyers that includes these credits, plus naming rights, PR etc.

# Example 2

- Hays Woods, Pittsburgh: 660 acres
- Preservation project:
  - Had trees
  - Threatened with development
  - Trees will be protected with easement or covenant
- Quantification by project and verification by UFCR

## Example 2 (cont.)

- Potential carbon revenues
  - 660 acres = approx. 300 tonnes/acre: 198,000 tonnes
  - $198,000 \times \$8/\text{tonne} = \$1,584,000$
  - Deduction for baseline (not developed yet, but estimate 5-20%), and paid over time
- Small urban parcels command higher price?  
 $300 \text{ tonnes} \times 15 \text{ acres} \times \$30 = \$135,000$

# Marketing UF Credits

- Multiple and documented ecosystem services and benefits
- To 80% of pop. living in cities and towns
- Best PR of all carbon project types:
  - Over time, before and after
  - Local communities
  - Can watch the projects grow

# Watershed Opportunities

- Planting more trees: carbon \$\$ supplement program \$\$
- Preserve trees: stack carbon \$\$ with other incentives to protect land
- New funding sources: TDR example
- Attract new funders/partners with innovative, high-profile projects:  
Co-benefits = Charisma carbon



# Help By Reading and Commenting on Protocols

- Go to [www.ufregistry.org](http://www.ufregistry.org)
- You know your communities, trees, stakeholders, climate, potential carbon buyers
- Ask: Is your potential project covered by the protocols?

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