

# Data Driven Approaches to Measuring and Tracking Environmental Justice

September 2022

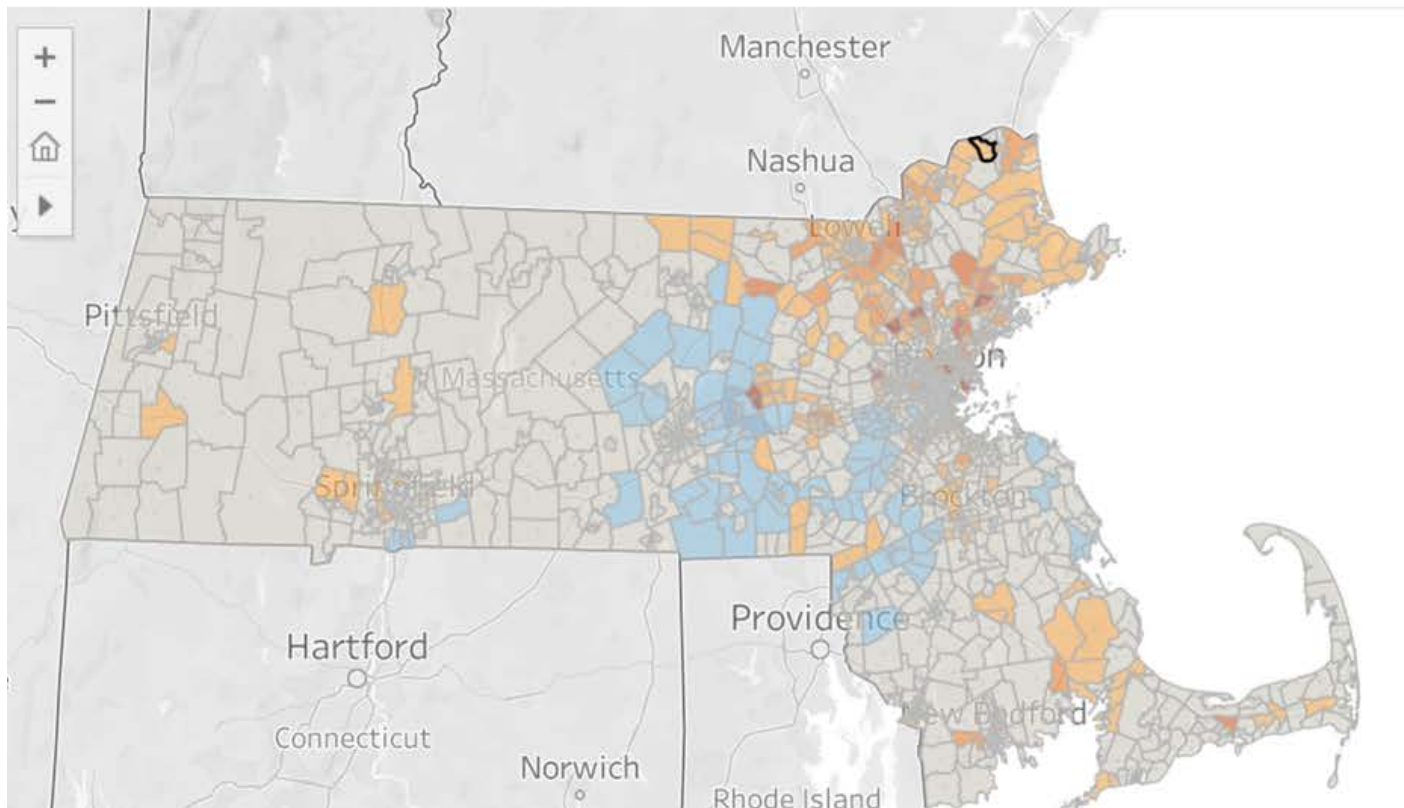


# Streetlight Equity Filters – Electric Vehicle Charging Dashboard

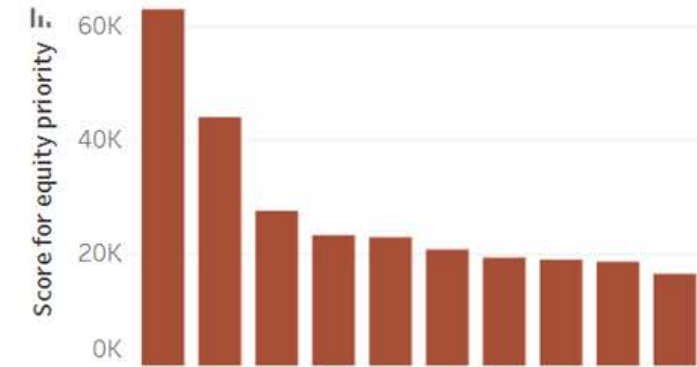
This dashboard shows gaps in the existing electric vehicle charging network. Select a scenario below to learn more.

Optimize for: Level 2 - Equity | Select state(s): Massachusetts | For equity scenarios, prio...: Low income (relative t...

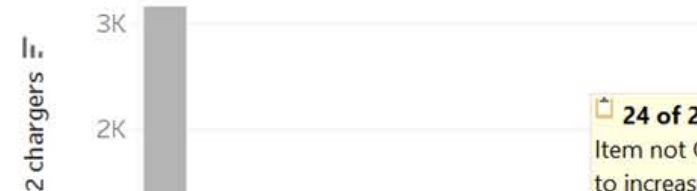
First, select a charging optimization goal. Then, select one or more states to see where charging stations should be prioritized to fulfill that goal. Red means the gap is significant. Blue areas may already have enough chargers. Scores are based on trip volumes, EV



Top 10 Tracts  
(for Selected Optimization Scenario & US States)



Existing Chargers by Network  
(for Selected Charge Level & US States)



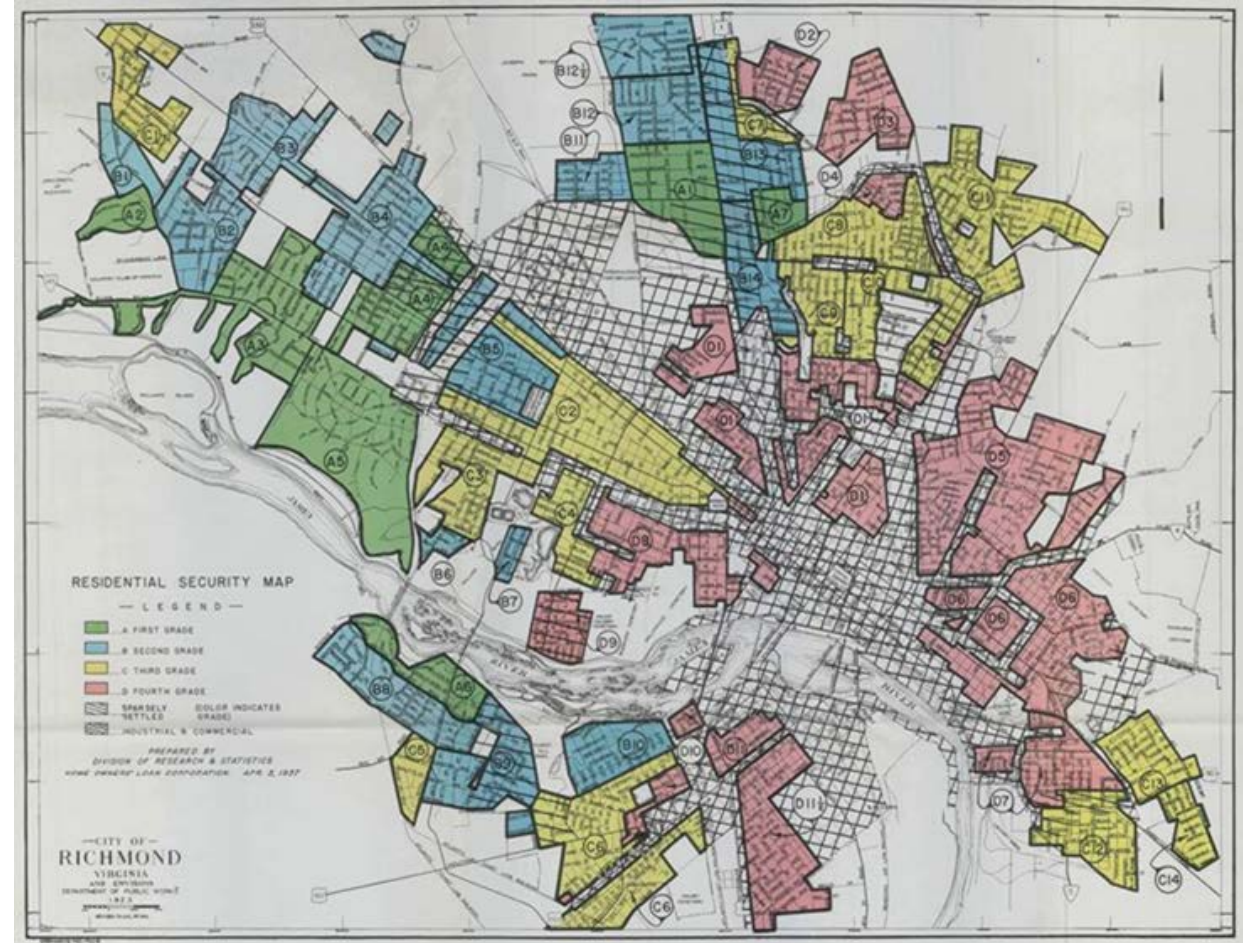
24 of 24 - Clipboard  
Item not Collected: Delete it to increase available space

Gaps in existing EV charging networks



# GIS Heat Mapping – City of Richmond VA

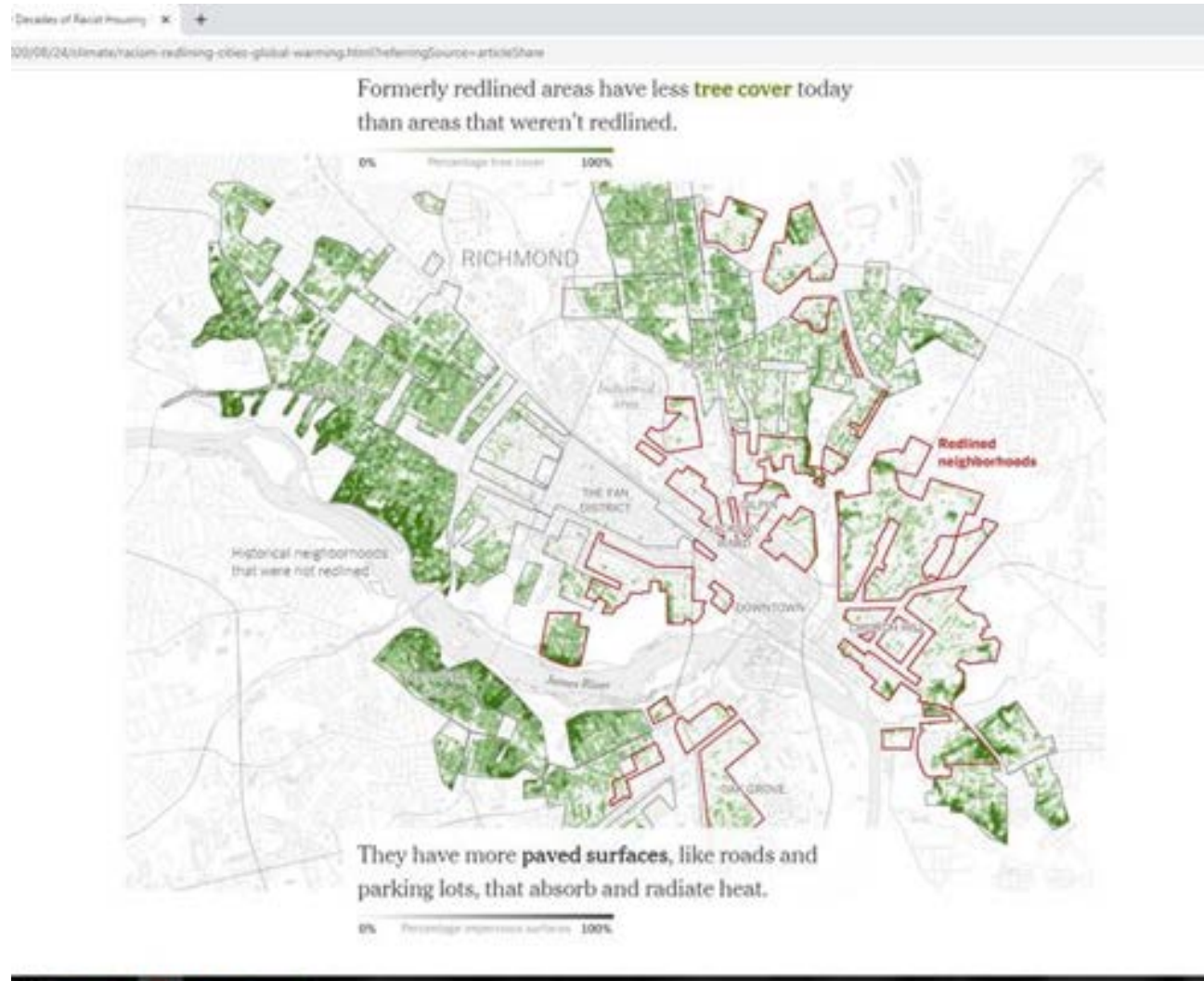
- “Heat is deadliest weather disaster in the U.S. , killing as many as 12,000 people a year”
- During heat wave, every 1° temp increase, increases risk of dying by 2.5%



# Gilpin Neighborhood, in Richmond VA: 15° Hotter than Wealthy, Non-minority neighborhoods



# Tree Cover in Red-Lined Areas



# Autocase: Interactive Project Toolkit – Fresno California DMV

## Testing the Building EJ Tool

655 W Olive Ave, Fresno, CA 93728, USA

Contact

Project Phase

Planning

Project Type

Other

Land Area

50000 sqft

Gross Floor Area

30000 sqft

Housing Price

**\$286,168**

**-9%**

below national avg

Zillow Home Value Index (ZHVI) for all homes in this zip code

Electricity Rate

**0.17** \$/kWh

**41%**

above national avg

\$/kWh - Prices for the U.S. are collected by state from the U.S. Energy Information Administration

Natural Gas Rate

**9.04** \$/MMBtu

**12%**

above national avg

\$/MMBtu - Prices for the U.S. are collected by state from the U.S. Energy Information Administration

Walk Score

**56**

Walk Score is a number between 0 and 100 that measures the walkability of any address.

# Social Value Tools - City of Vancouver

- Target by 2023: 50% spend (\$) and contracts (#) to social/diverse business in identified categories
- Community Benefit Agreements:
  - Saint Paul’s Hospital: \$2 billion capital  
10% local equity hiring  
10% local  
10% social purchasing
  - Providence Health owner/client

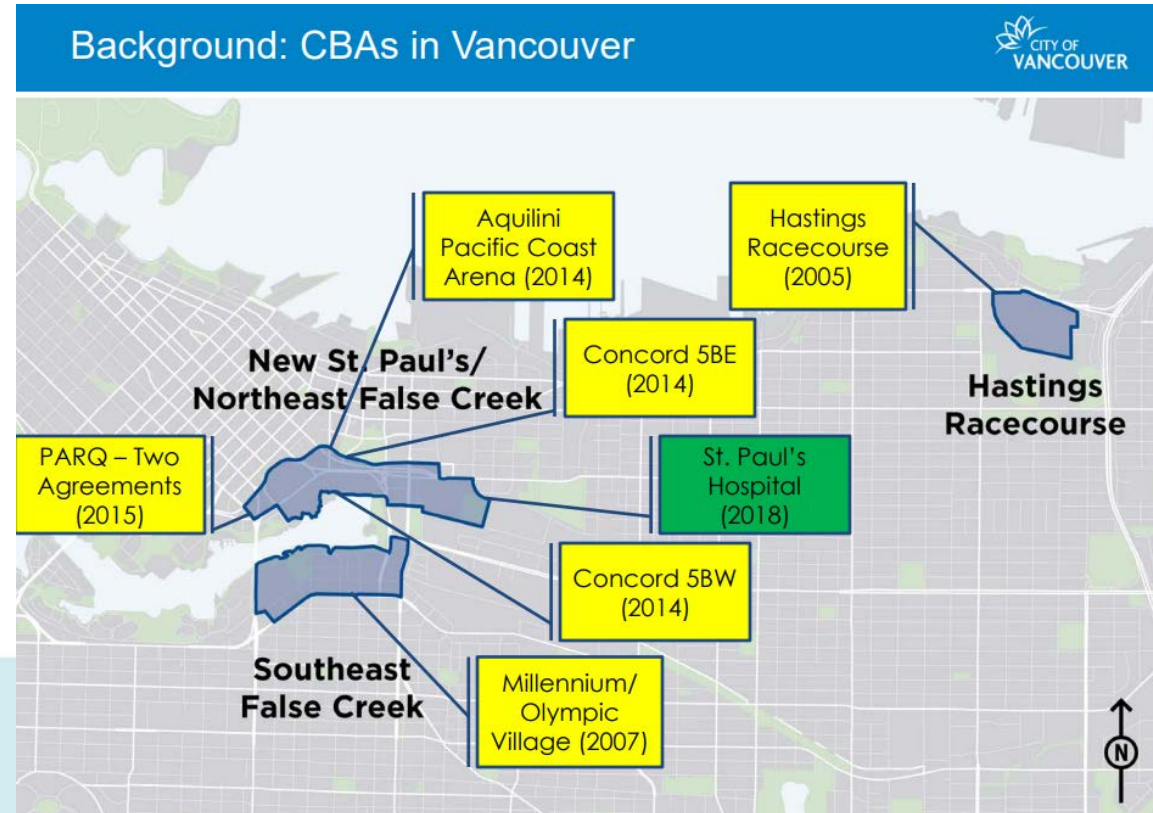
- Living wage certification



LIVING WAGES IN BC AND CANADA



LIVING WAGES IN BC



# DOE Funding Opportunities



# Criteria for Justice40 Covered Programs



Dr. Toby Reames

## Federal Investments

- ✓ Federal financial assistance (e.g., grants, loans, credits)
- ✓ Direct payments or benefits to individuals
- ✓ Federal procurement benefits (acquisition of goods and services for the government's own use)
- ✓ Programmatic Federal staffing costs (e.g., federal pay for staff that provide technical assistance)
- ✓ *Additional federal investments under covered programs as determined by OMB.*

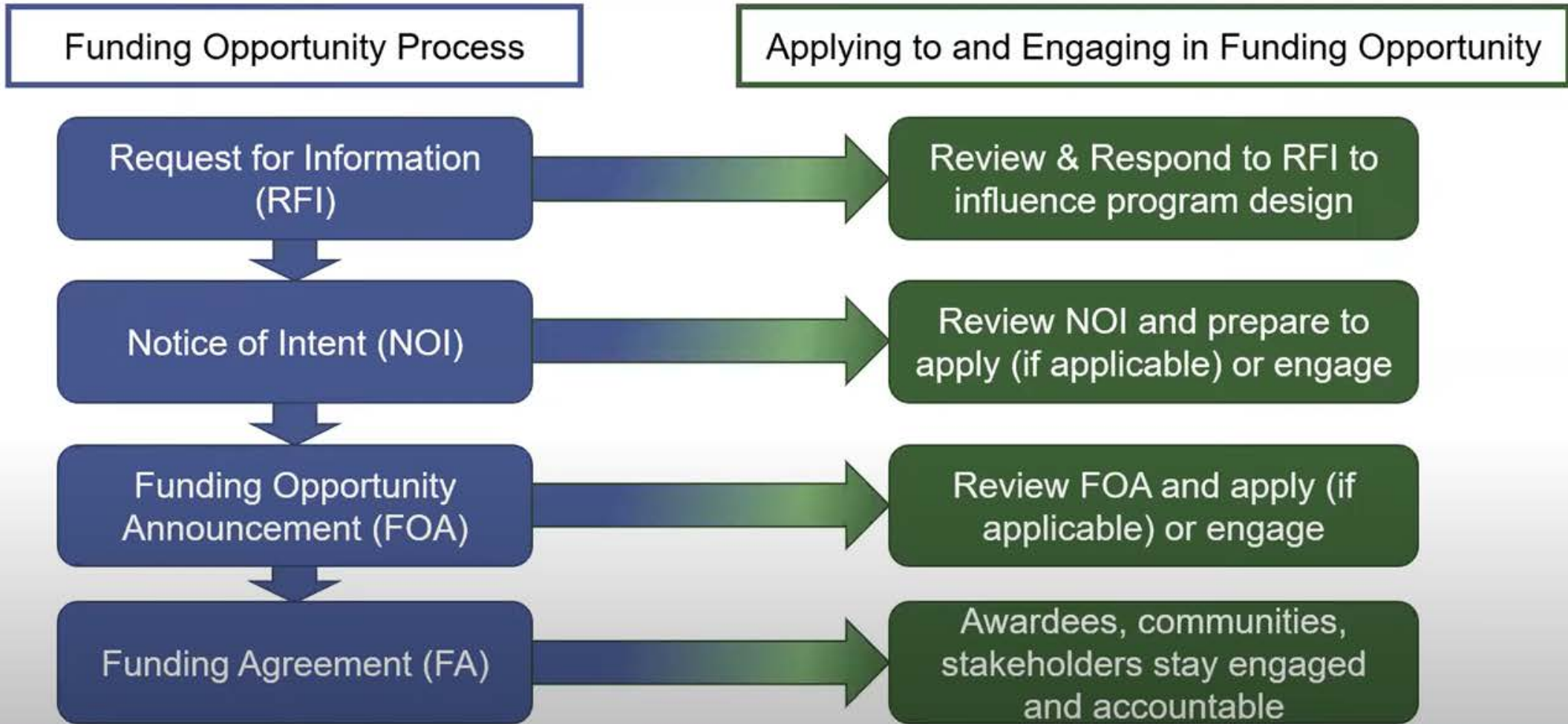
## Covered Program

A Federal Government program that makes **investments** in one or more of the following seven areas:

- ✓ Climate change
- ✓ Clean energy and energy efficiency
- ✓ Clean transportation
- ✓ Affordable and sustainable housing
- ✓ Training and workforce development
- ✓ Remediation and reduction of legacy pollution
- ✓ Critical clean water and waste infrastructure



# Roadmap to Funding and Engagement



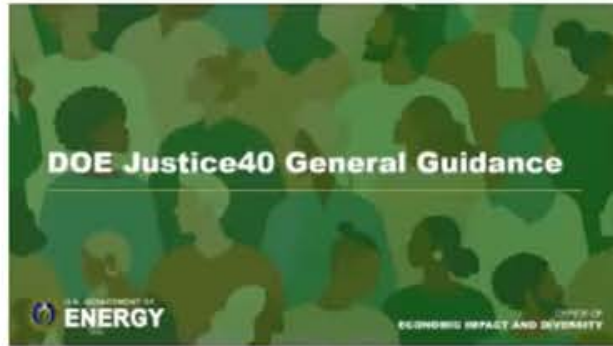
# Justice40 Resources



Dr. Tony Reames

## Guidance and Factsheets

### DOE Justice40 General Guidance



### Justice40 Factsheet



Visit: [www.energy.gov/justice40](http://www.energy.gov/justice40)

### Environmental Justice Explainer



### Justice40 Covered Program Highlights

