

5 Questions Answered with Maps & Data Visualizations

Part 3 of a 3 Part Map Readiness Webinar Series on becoming a more data-driven organization

Presenters:

Esther Needham - Project Manager
MCP Urban Planning
University of Pennsylvania

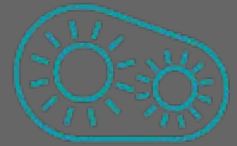


Daniel McGlone - Senior GIS Analyst
M.S. Urban Spatial Analytics
University of Pennsylvania





Civic Software, Data Analytics & Research





B Corporation

- Civic / Social Apps
- Pro Bono Program
- Donate share of profits

Research-Driven

- 10% Academic Research Program
- Academic Collaborators
- Open Source
- Open Data



Webinar Outline

1. Where are my current donors and clients?
2. How can I measure access to my facilities and services?
3. How would a policy change impact the community?
4. Which elected officials have the most constituents affected by a policy change?
5. Sharing your story & design best practices



Where are my current
donors and clients?

Greater Philadelphia Cultural Alliance

Question:

- Where are my current clients and donors? And where can I find more?

Their Data:

- Geocoded database of 1.5 million households, coded with genre and event

Other Data:

- Demographic and tapestry segmentation

Tapestry/Lifestyle Segmentation

- Tapestry helps you understand customer's lifestyle choices, what they buy, and how they spend their free time.
- Classifies US residential neighborhoods into 67 unique segments based on demographic and socioeconomic characteristics
- Insightful - so you can identify best customers and underserved markets
- Higher response rates because you avoid less profitable areas



LifeMode Group: Uptown Individuals

Laptops and Lattes

3A

Households: 1,240,000

Average Household Size: 1.85

Median Age: 36.9

Median Household Income: \$93,000

WHO ARE WE?

Laptops and Lattes residents are predominantly single, well-educated professionals in business, finance, legal, computer, and entertainment occupations. They are affluent and partial to city living—and its amenities. Neighborhoods are densely populated, primarily located in the cities of large metropolitan areas. Many residents walk, bike, or use public transportation to get to work; a number work from home. Although single householders technically outnumber couples, this market includes a higher proportion of partner households, including the highest proportion of same-sex couples. Residents are more interested in the stock market than the housing market. *Laptops and Lattes* residents are cosmopolitan and connected—technologically savvy consumers. They are active and health conscious, and care about the environment.

OUR NEIGHBORHOOD

- 30-something single householders (Index 174), with a number of shared households (Index 246); low average household size of 1.85.
- City dwellers, primarily in apartment buildings: with 2–4 units (Index 190), 5–19 units (Index 223), or 20+ units (Index 548).
- Older housing, 2 out of 3 homes built before 1970; 42% built before 1940 (Index 310).
- Most households renter occupied, with average rent close to \$1,800 monthly (Index 183).
- Many owner-occupied homes valued at \$500,000+ (Index 684).
- Majority of households own no vehicle at 36% (Index 398) or 1 vehicle (41%).

SOCIOECONOMIC TRAITS

- Three out of four have a bachelor's degree or higher (Index 269).
- Unemployment rate is low at 5.3%; labor force participation is high, more than 75%.
- Salaries are the primary source of income for most households, but self-employment income (Index 147) and investment income (Index 167) complement the salaries in this market.
- These are health-conscious consumers, who exercise regularly and pay attention to the nutritional value of the food they purchase.
- Environmentally conscientious but also image-conscious: both impact their purchasing.



Note: The Index represents the ratio of the segment rate to the US rate multiplied by 100. Consumer preferences are estimated from data by GfK MRI.

Greater Philadelphia Cultural Alliance

Project/Process:

- Analyse spatial trends of organization's patrons/donors
- Compare to demographic or tapestry segmentation

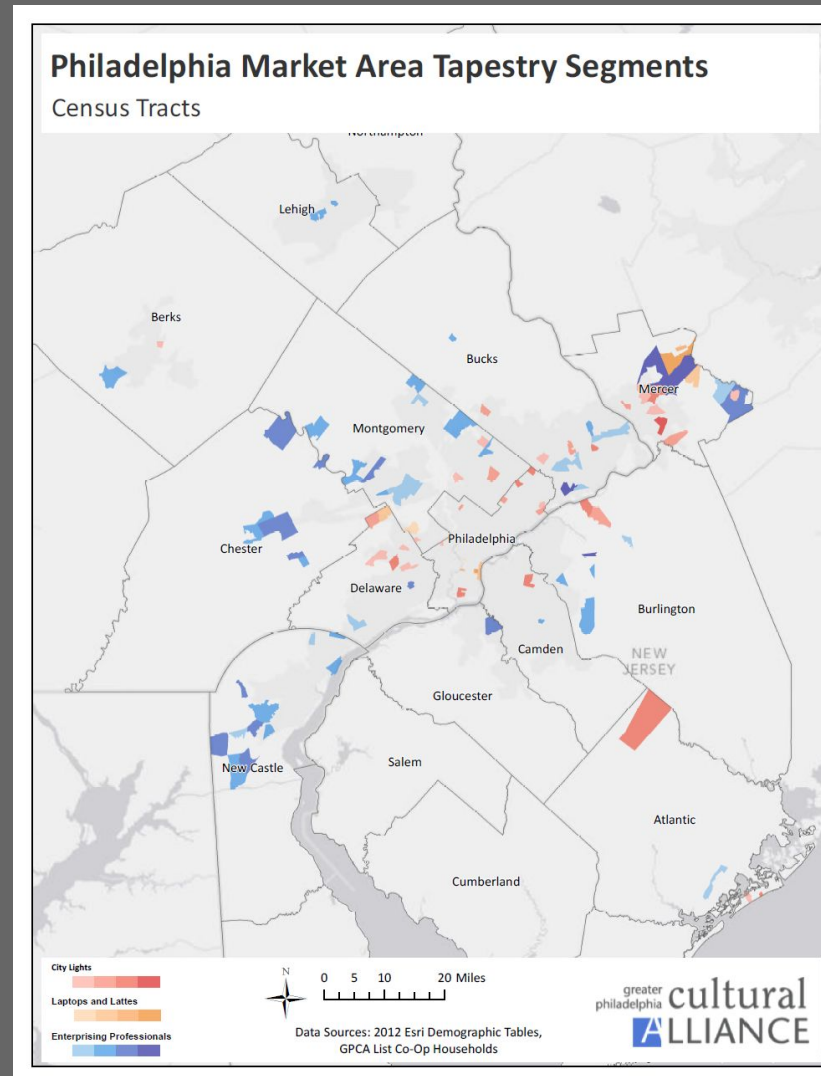
Result:

- Find gaps in reach
- Identify areas of opportunity

Greater Philadelphia Cultural Alliance

Tapestry Segments Mapping

- Which census tracts have the most households from the tapestry segments I want to target?



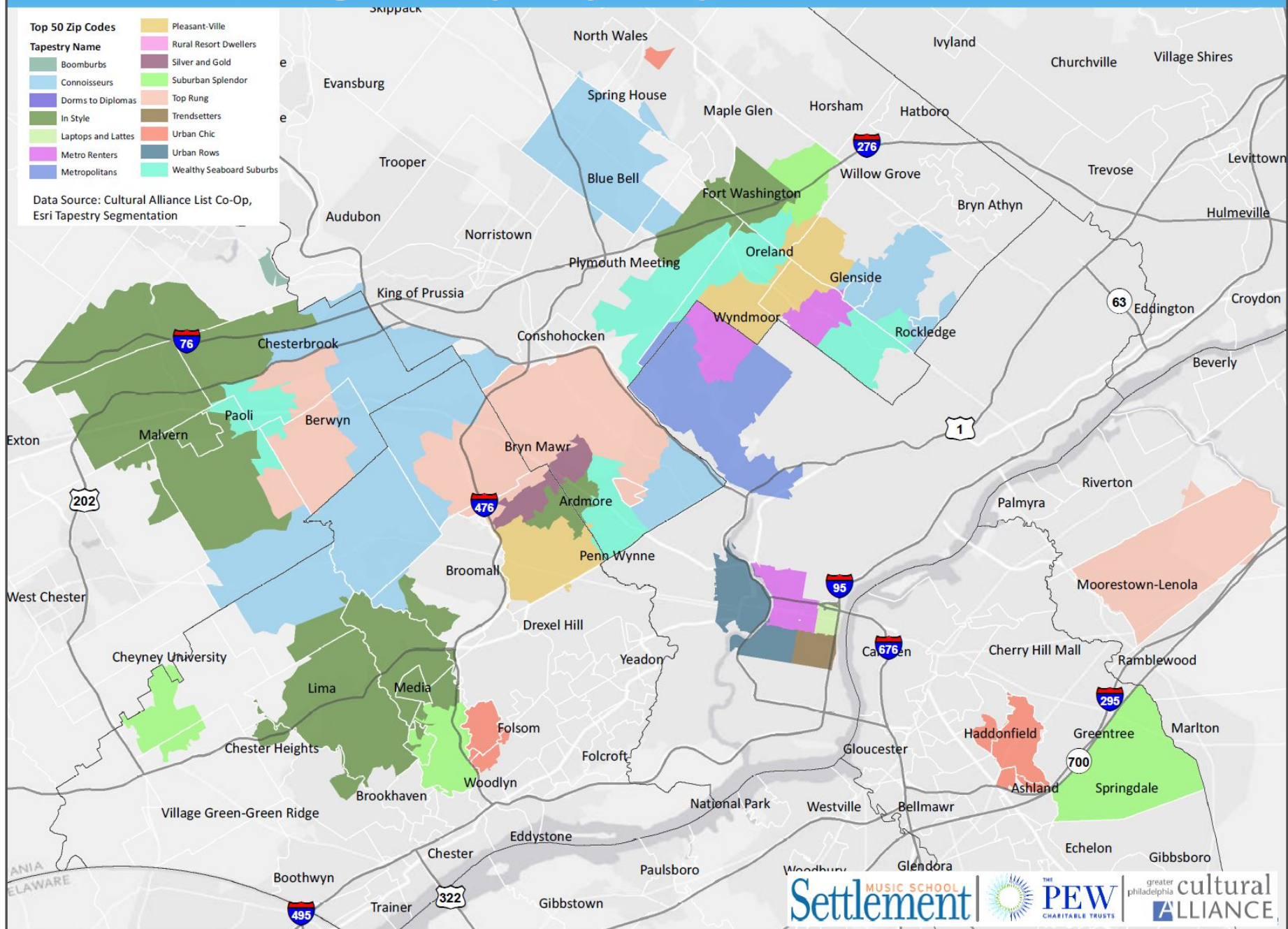
Penn Museum Regional Tapestry Analysis

Top 50 Zip Codes

Tapestry Name

Boomburbs	Pleasant-Ville
Connoisseurs	Rural Resort Dwellers
Dorms to Diplomas	Silver and Gold
In Style	Suburban Splendor
Laptops and Lattes	Top Rung
Metro Renters	Trendsetters
Metropolitans	Urban Chic
	Urban Rows
	Wealthy Seaboard Suburbs

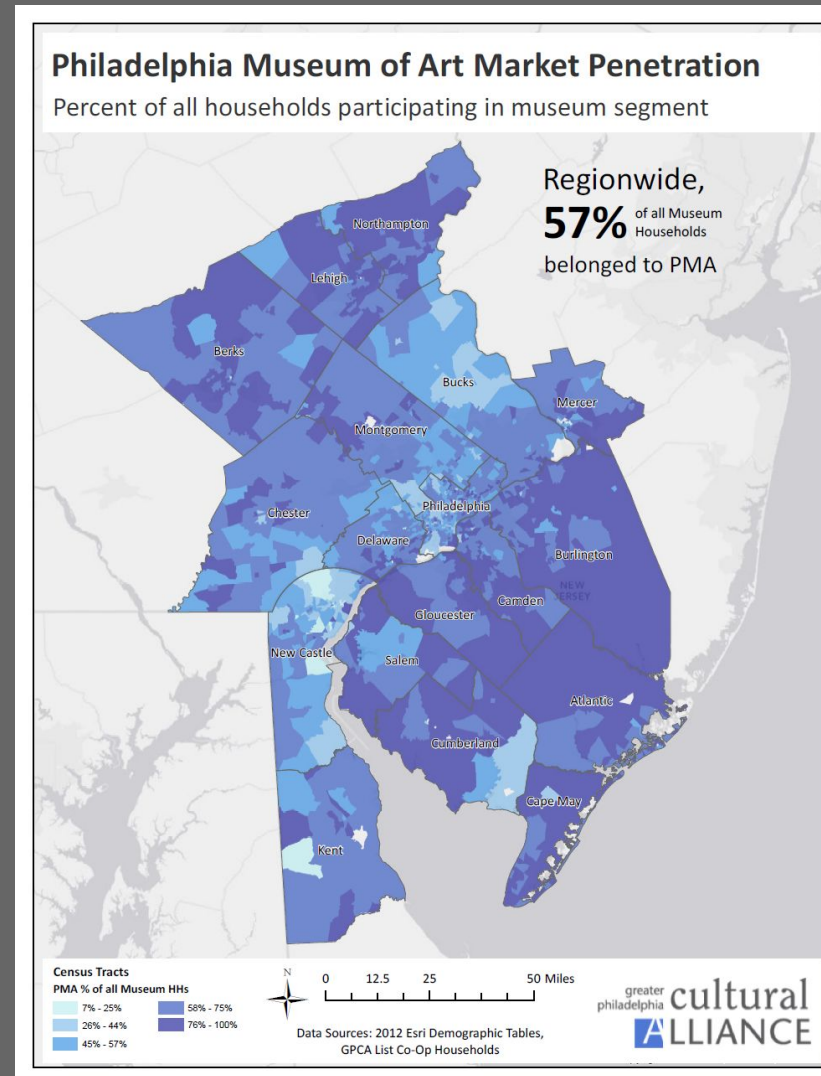
Data Source: Cultural Alliance List Co-Op,
Esri Tapestry Segmentation



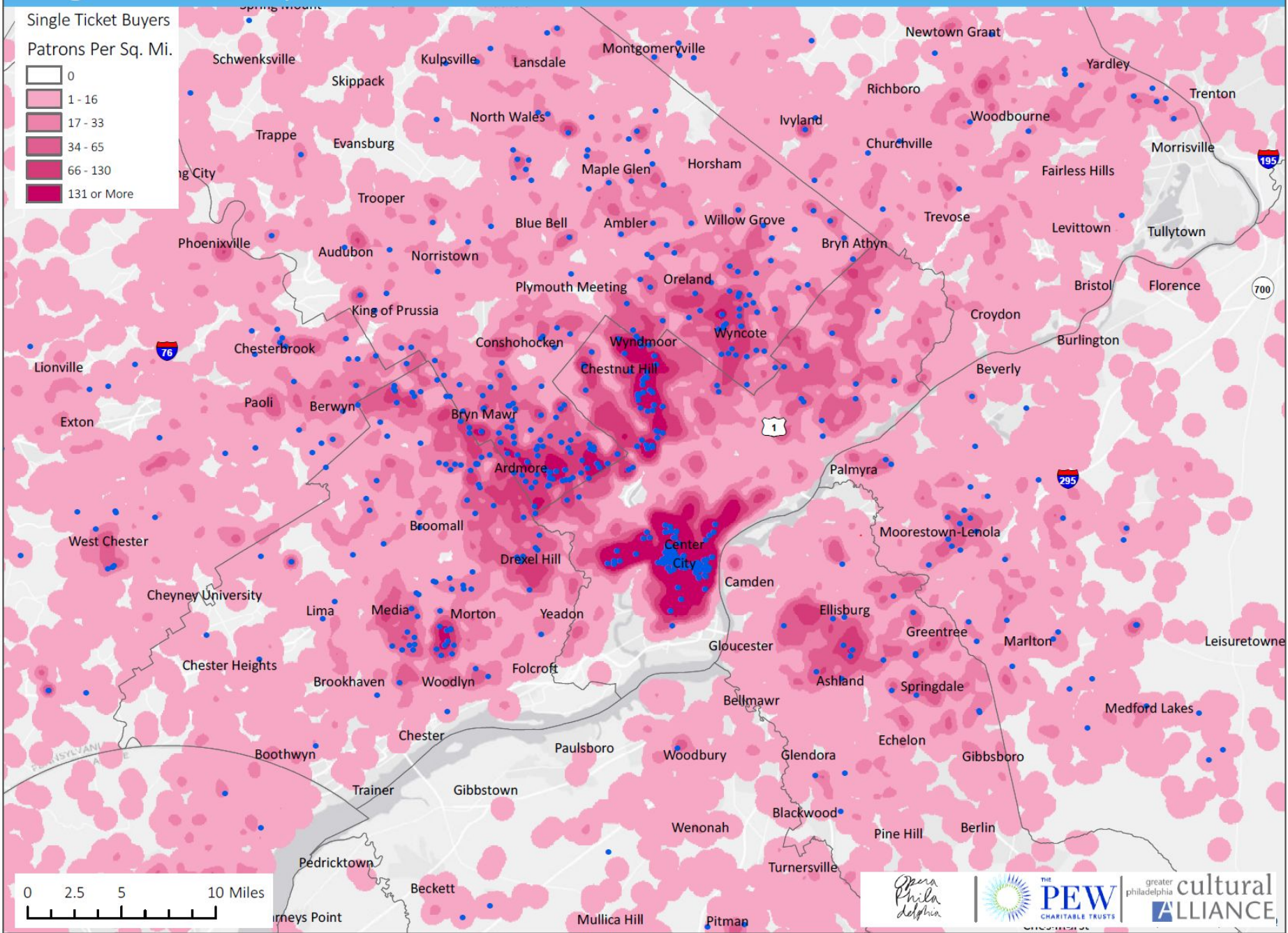
Greater Philadelphia Cultural Alliance

Market Penetration Mapping

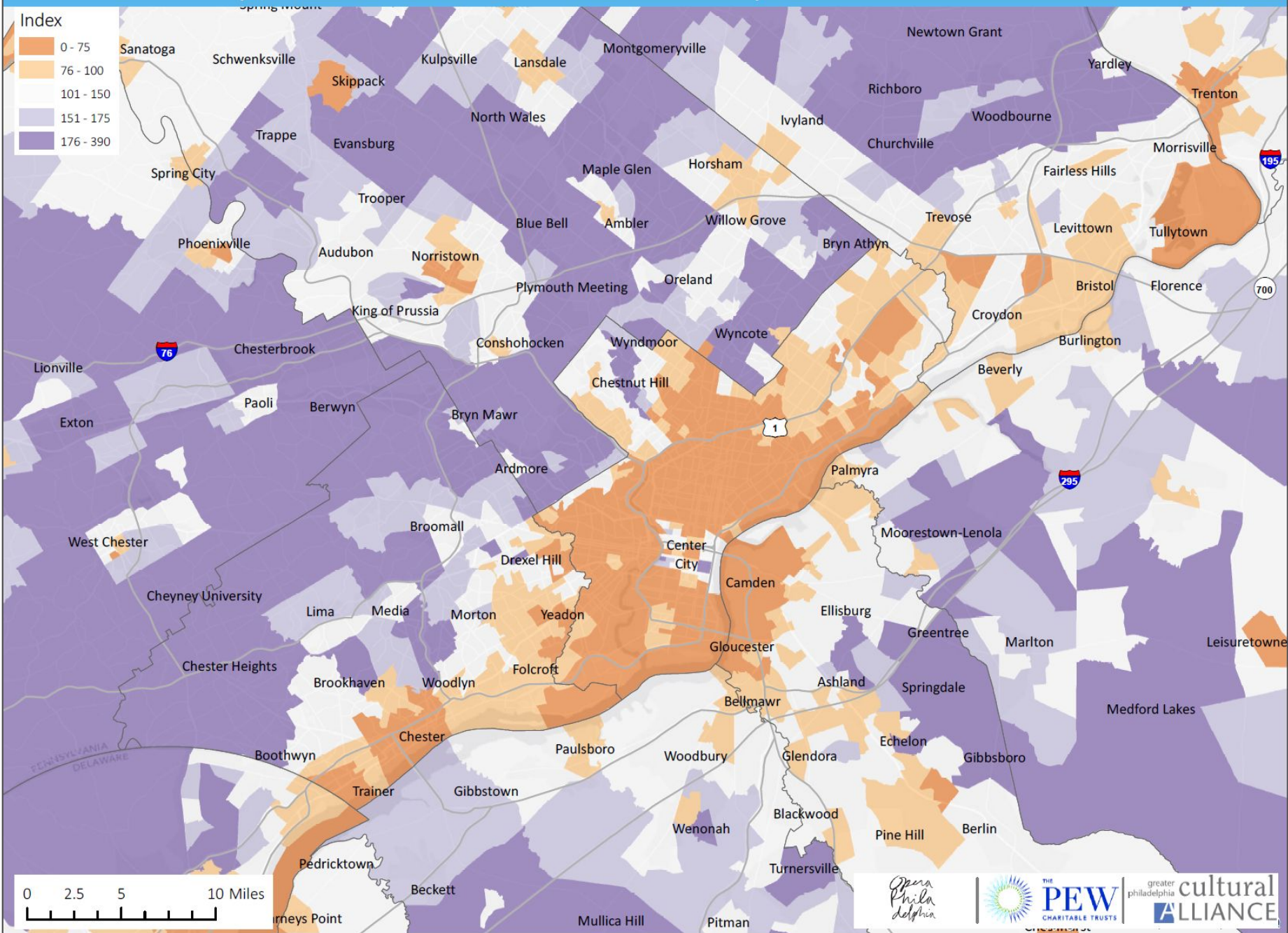
- How many households that visited a museum visited my museum?



Single Ticket Buyers and Advocates



Consumer Expenditure - Movies/Theater/Opera





Takeaways: Mapping Clients

By mapping your clients and donors, you can:

- Tailor your outreach campaigns to a specific client profile (using tapestries)
- Identify where your highest-value clients are
- Identify where to target your outreach to acquire new clients and donors



How can I **measure**
access to my facilities
and services?

Delaware DNREC

Question:

- How accessible are our parks and recreation centers?

Their Data:

- 500+ parks and rec centers, coded with type of amenities

Other Data:

- Census data, land use, transportation dataset

State of Delaware DNREC

Project/Process:

- Create a population surface using census data and land use
- Use network analysis to create **travelsheds** layer for walking, driving, public transit
- Create custom ArcGIS tool to query and filter parks, select type of network analysis, calculate access

Result:

- Custom ArcGIS tool, ran scenarios on dozens of different parks and access measurements

State of Delaware DNREC

What is a **travelshed**?

- The land area within a defined (walking, driving, public transit, biking etc.) range of a specified location

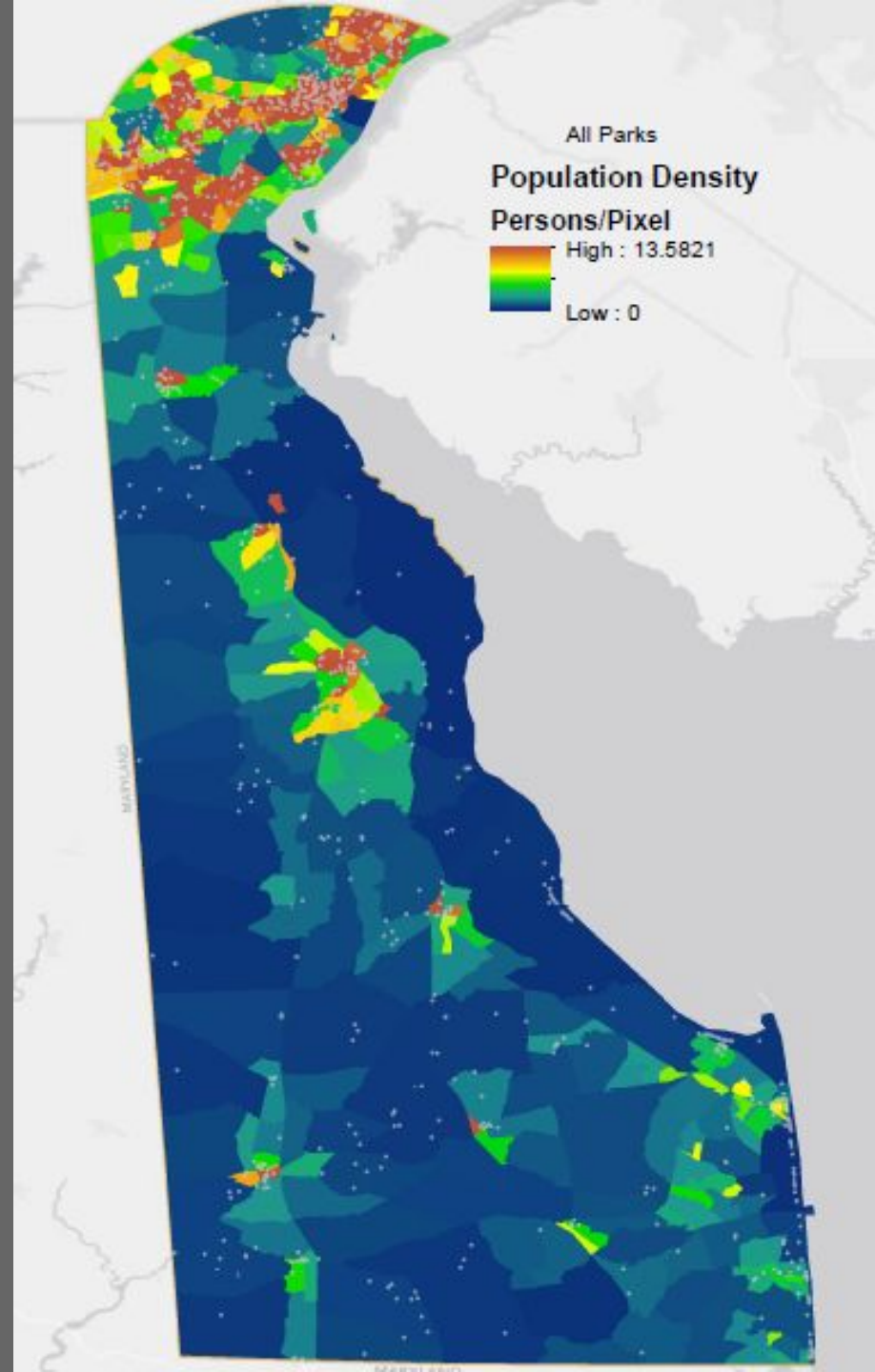
Answers the question:

- Given a starting location and a method of travel (walking, driving, public transit), how far can I travel in a given amount of time?

Population Surface

- More accurate representation of population

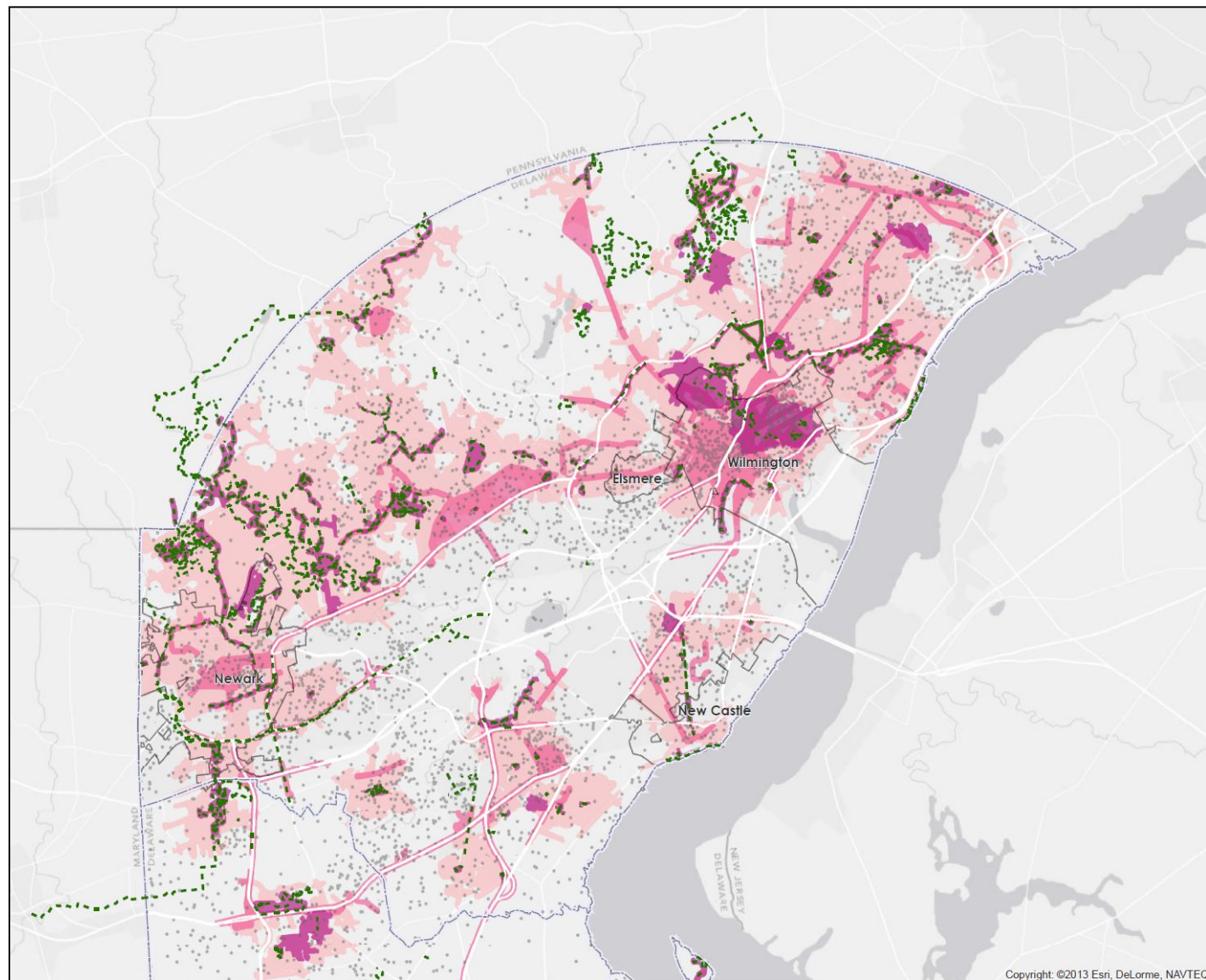
Census Tract Population -
Non-residential land use =
Population Surface



Trail and Pathway Facility Access

SCORP Region 1

Map 1 of 10



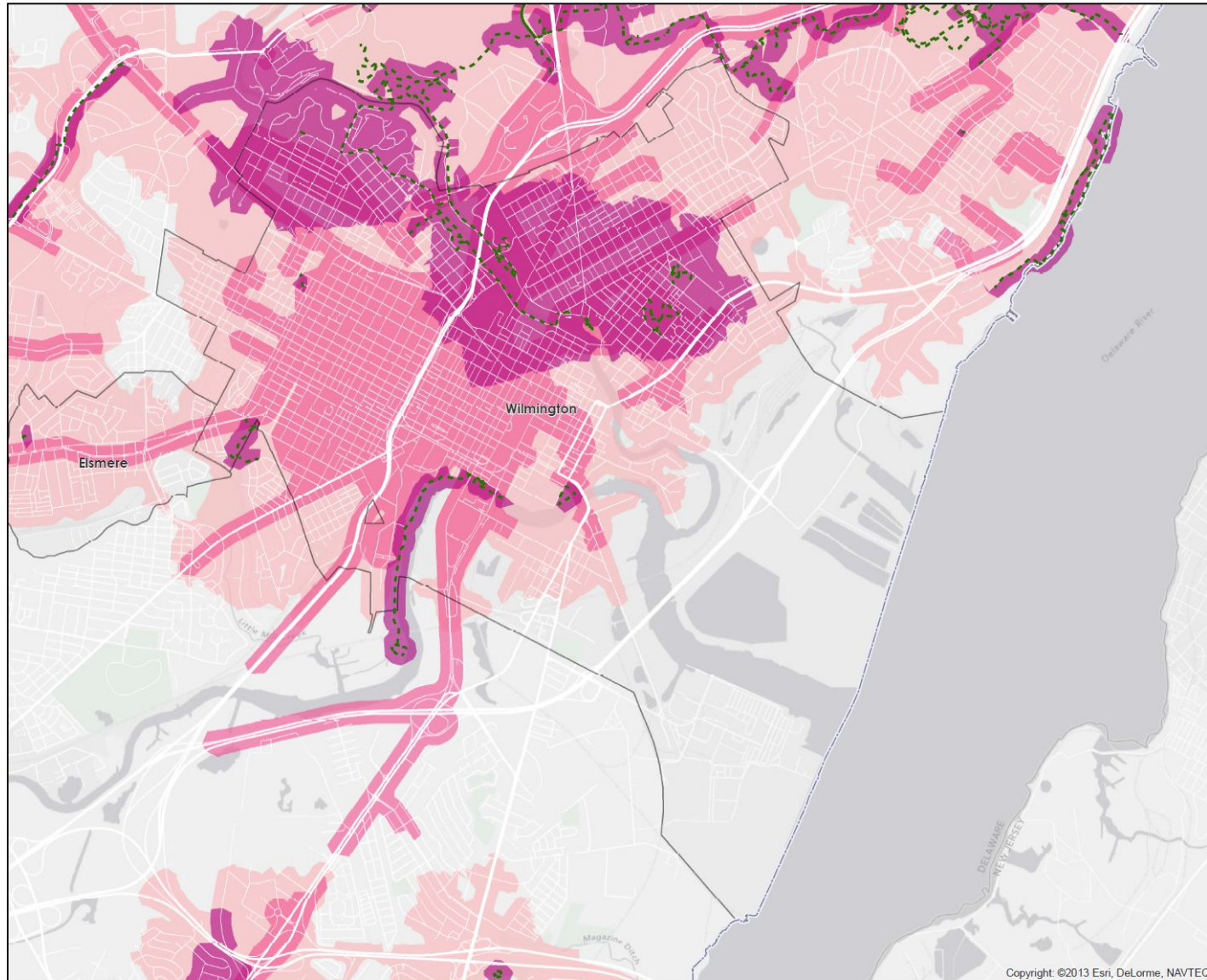
- Trails and Pathways
- Walk Shed (15 min)
- Transit Shed (15 min)
- Drive Shed (1 mile)
- SCORP Regions
- Municipalities (Population > 2000)
- Population
 - 1 Dot = 100

3.5

Miles



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Trail and Pathway Facility Access

Wilmington

Map 6 of 10



- Trails and Pathways
- Walk Shed (15 min)
- Transit Shed (15 min)
- Drive Shed (1 mile)
- SCORP Regions
- Municipalities (Population > 2000)

1 Miles





Takeaways: Accessibility

With a travelshed map, you can understand:

- **Access gaps** - which neighborhoods and residents don't have easy access to your facilities
- **Inclusivity** - whether your services are equitably serving demographics and different parts of the city. Is your organization serving the people you aim to serve?
- **Site Selection** - the optimal location to place your service facilities to serve your target audience



How would a policy
change **impact the**
community?

Keystone Crossroads

Question:

- How would a change in the formula that distributes state funding impact each school district in Pennsylvania?

Their Data:

- A spreadsheet that calculated per pupil funding per district based on % formula inputs

Other Data:

- Demographic & census data
- geographic boundaries of each school district

Keystone Crossroads

Project/Process:

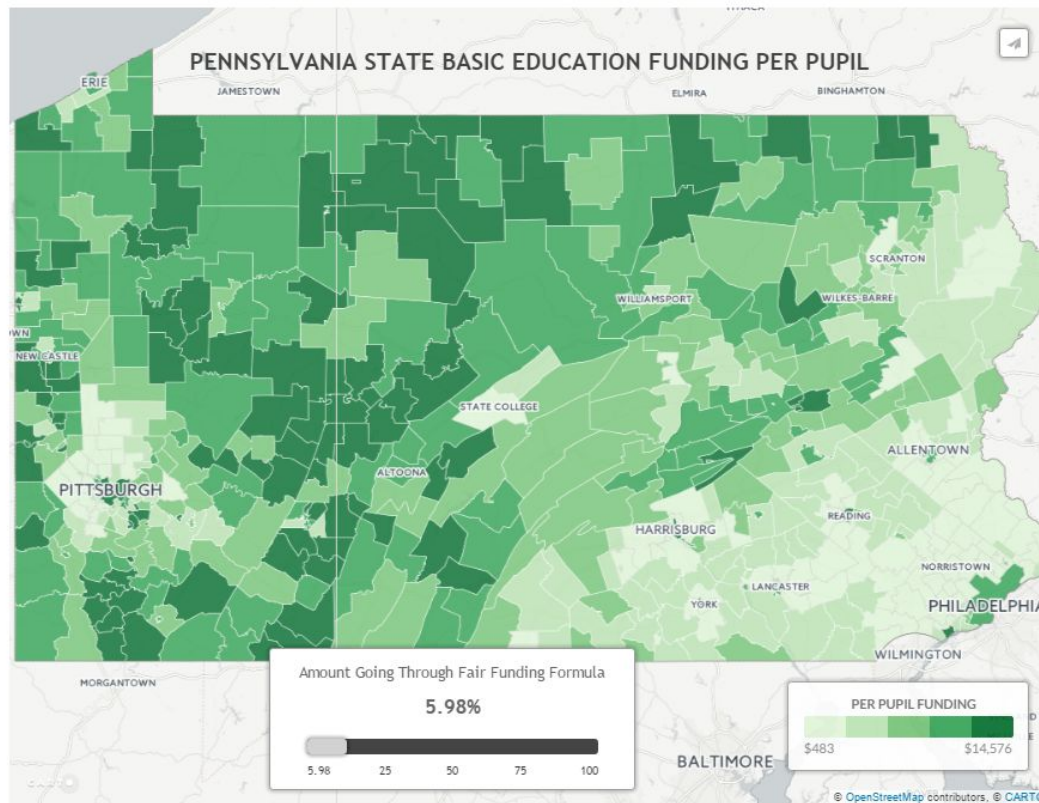
- Pre-calculated the per pupil funding per district for a funding formula % at increments of ten
- Joined funding data and census data to the boundary files

Result:

- Custom tool & graphics
- [Keystone Crossroads article](#)

OCTOBER 13, 2018

How would your school district fare if lawmakers ramped up the new Pa. funding formula?



BY KEVIN MCCORRY

ABOUT ⓘ

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CONTACT

The [interactive map](#) above allows you to see how each of Pennsylvania's 500 school districts would be affected if lawmakers chose to implement the state's new funding formula more rapidly.

The new formula has been lauded for bringing a measure of rationality and fairness to the state's funding scheme.

For more than two decades, lawmakers divided up education dollars without a student-based method that took into account actual enrollment, poverty, and language fluency.

By now taking these and other factors into account, education advocates favor the new formula for systematically recognizing that districts face different burdens that require varying levels of financial support.

SUPPORT PROVIDED BY

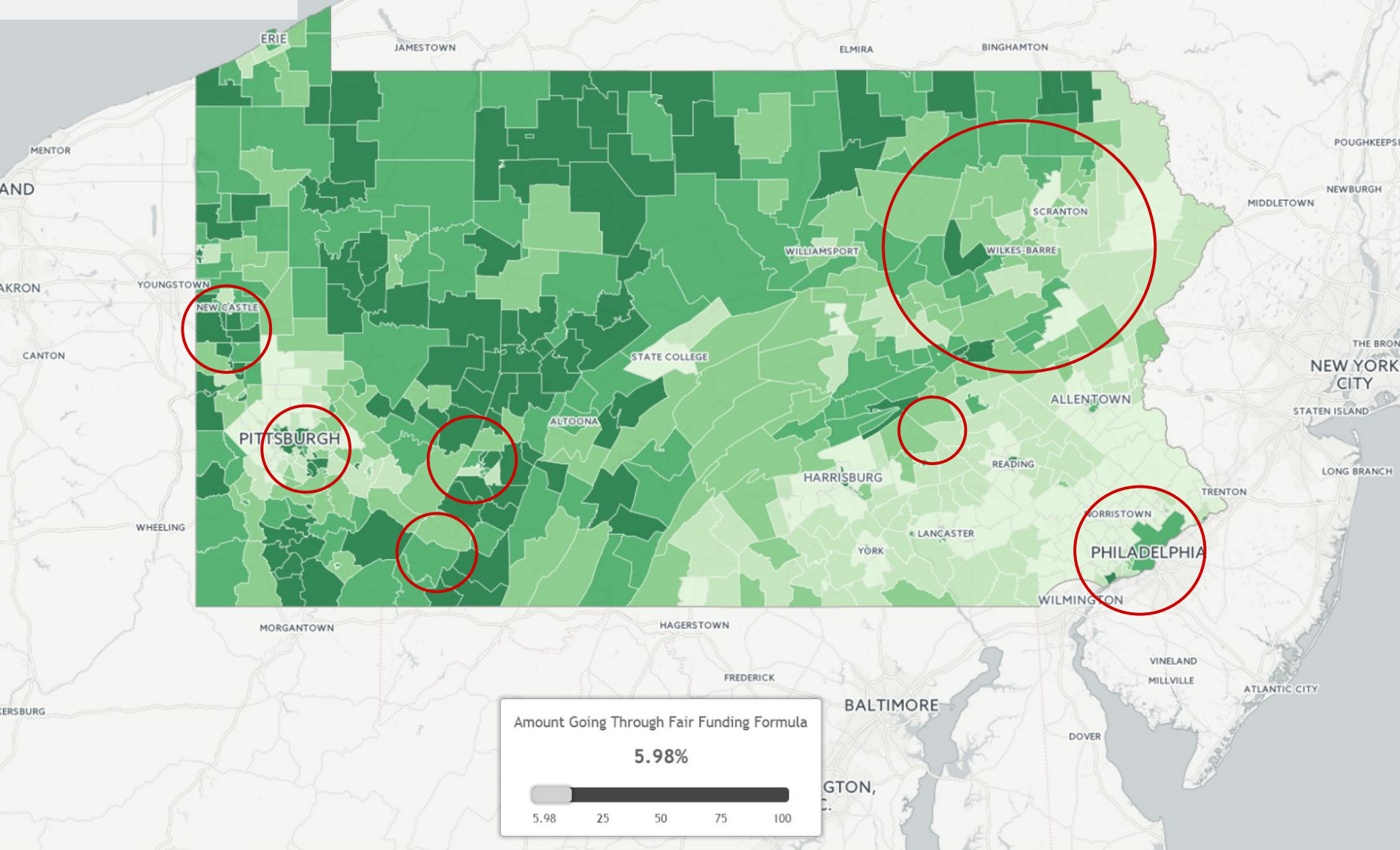


Advocate. Engage. Lead.
MA in Policy Studies

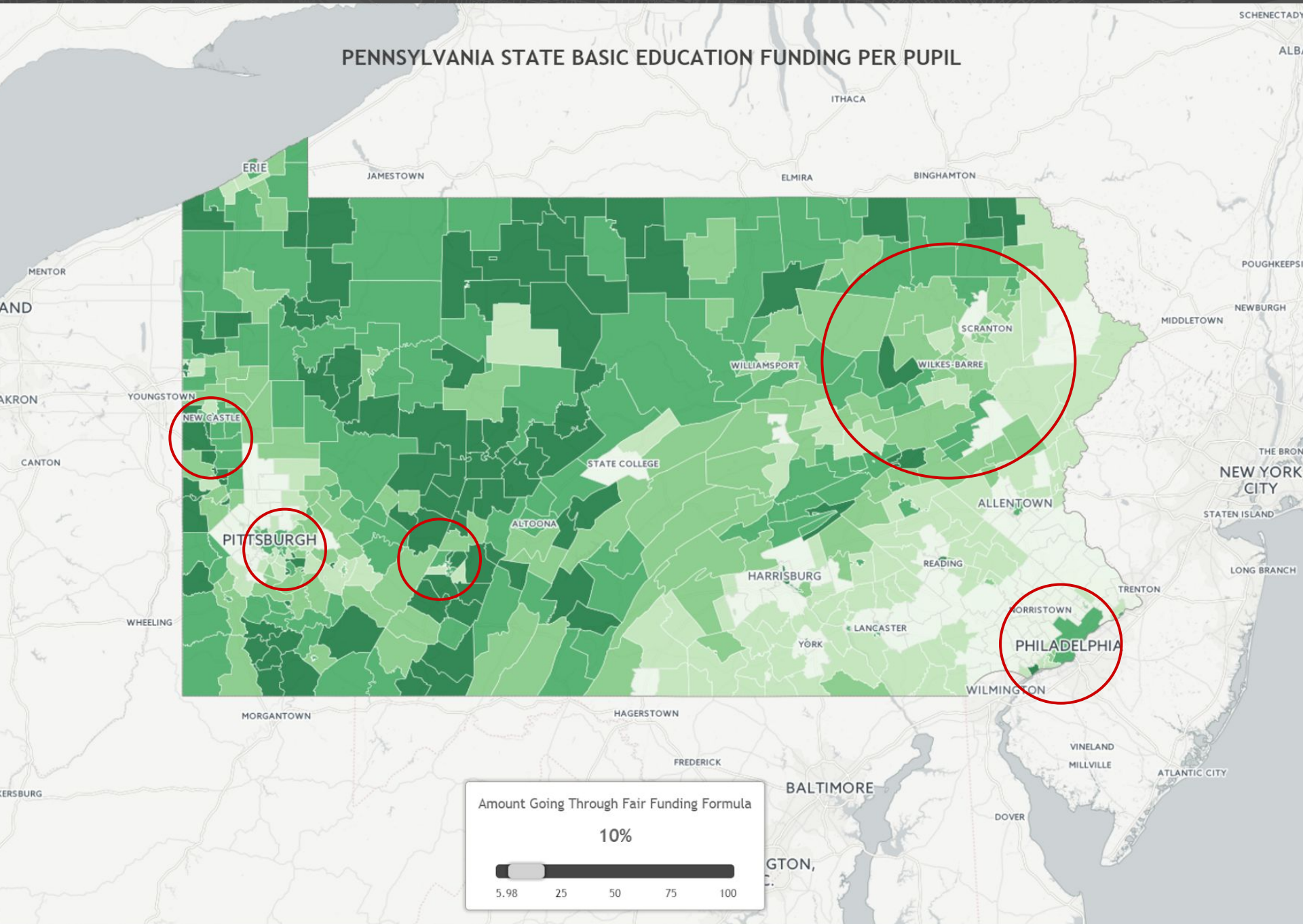
START TODAY

A custom tool
with a slider for
funding %

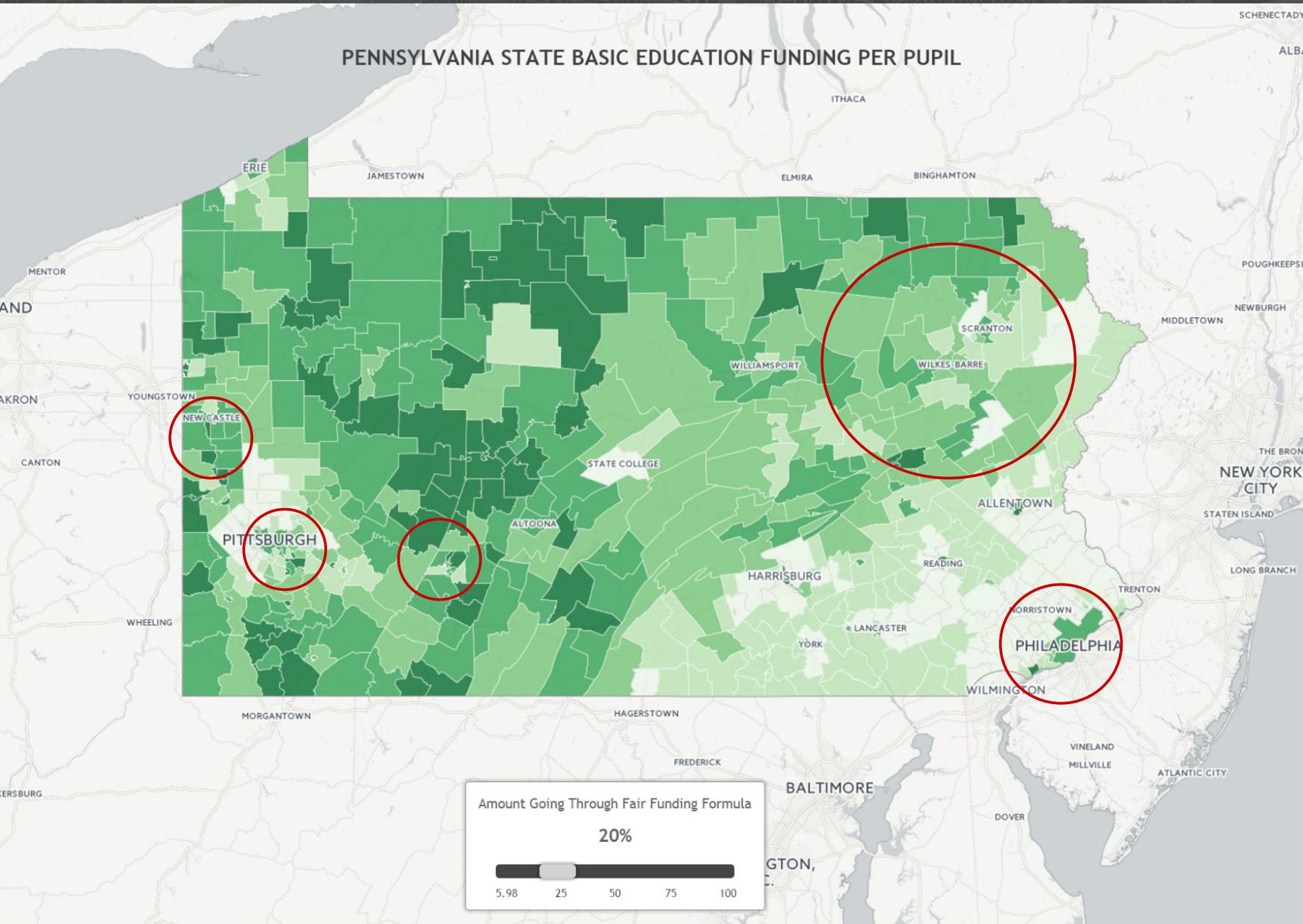
PENNSYLVANIA STATE BASIC EDUCATION FUNDING PER PUPIL



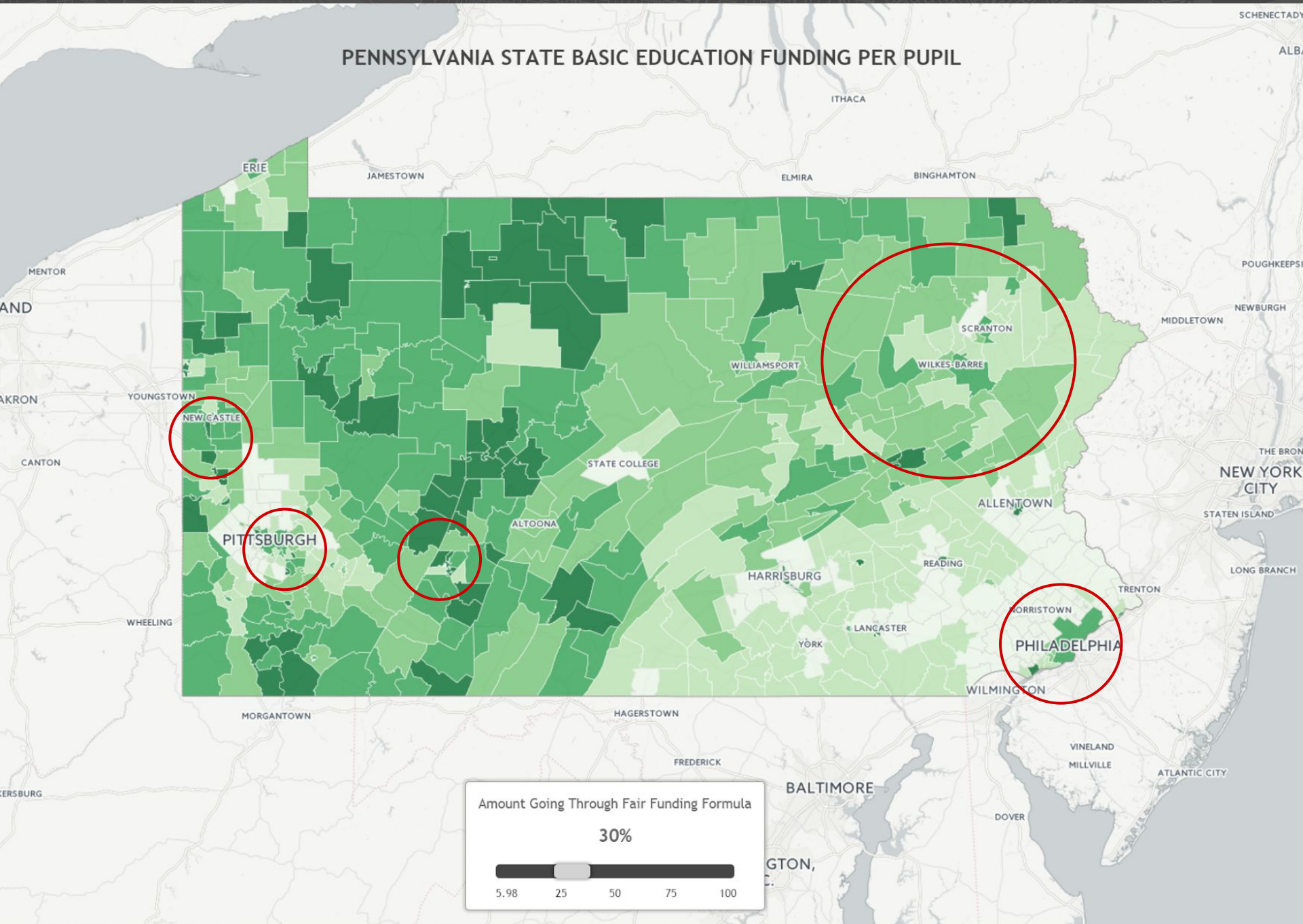
PENNSYLVANIA STATE BASIC EDUCATION FUNDING PER PUPIL



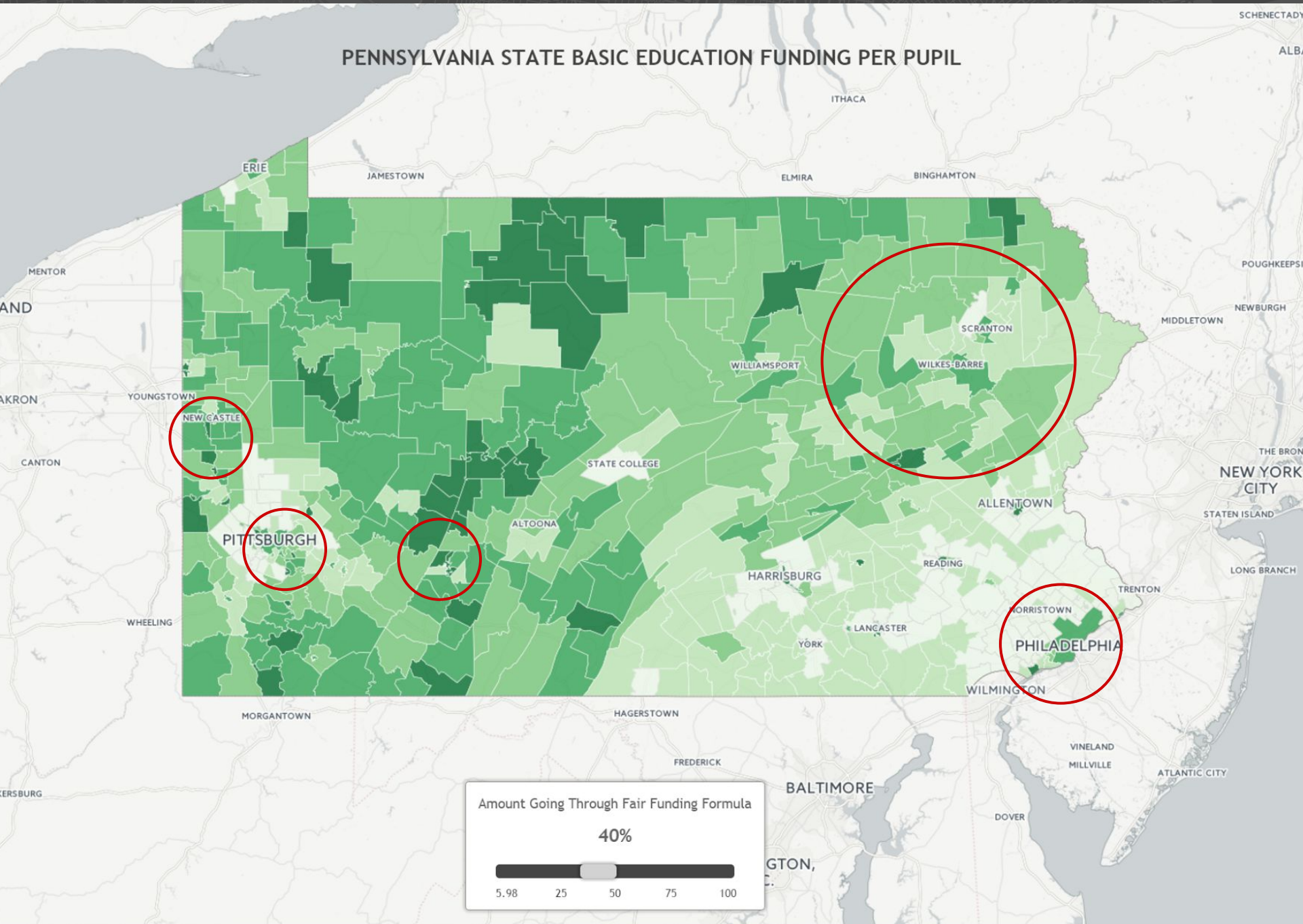
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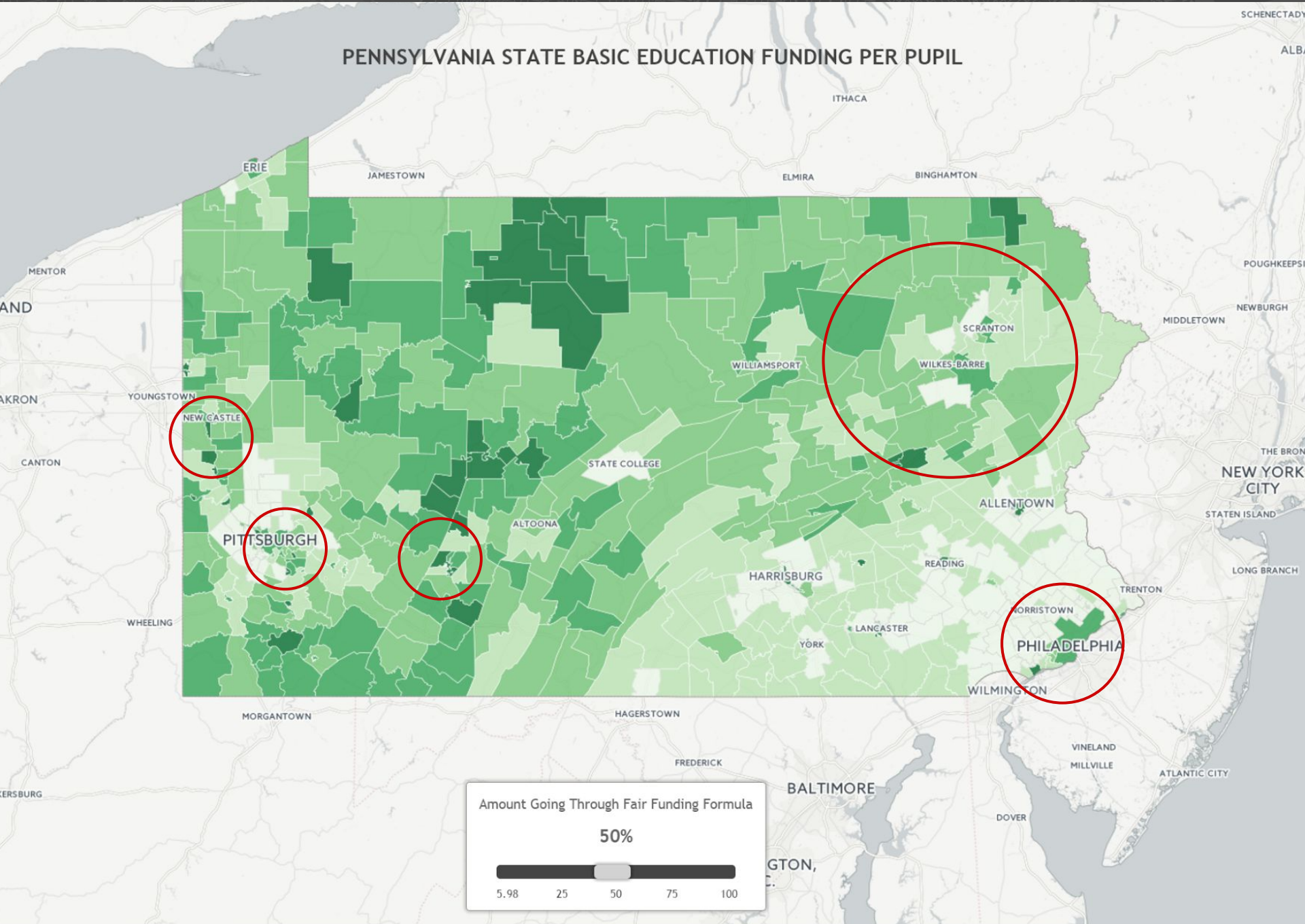
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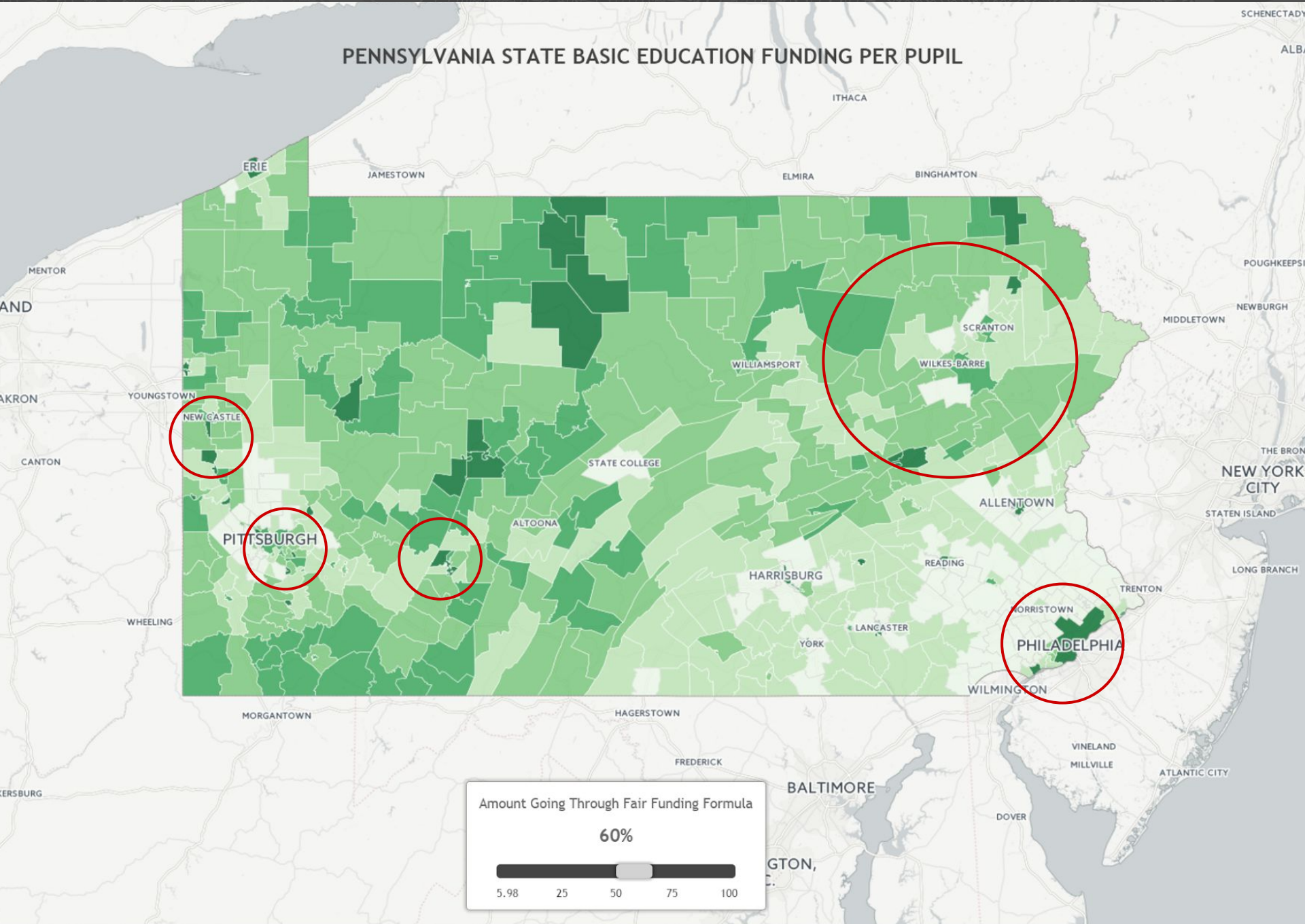
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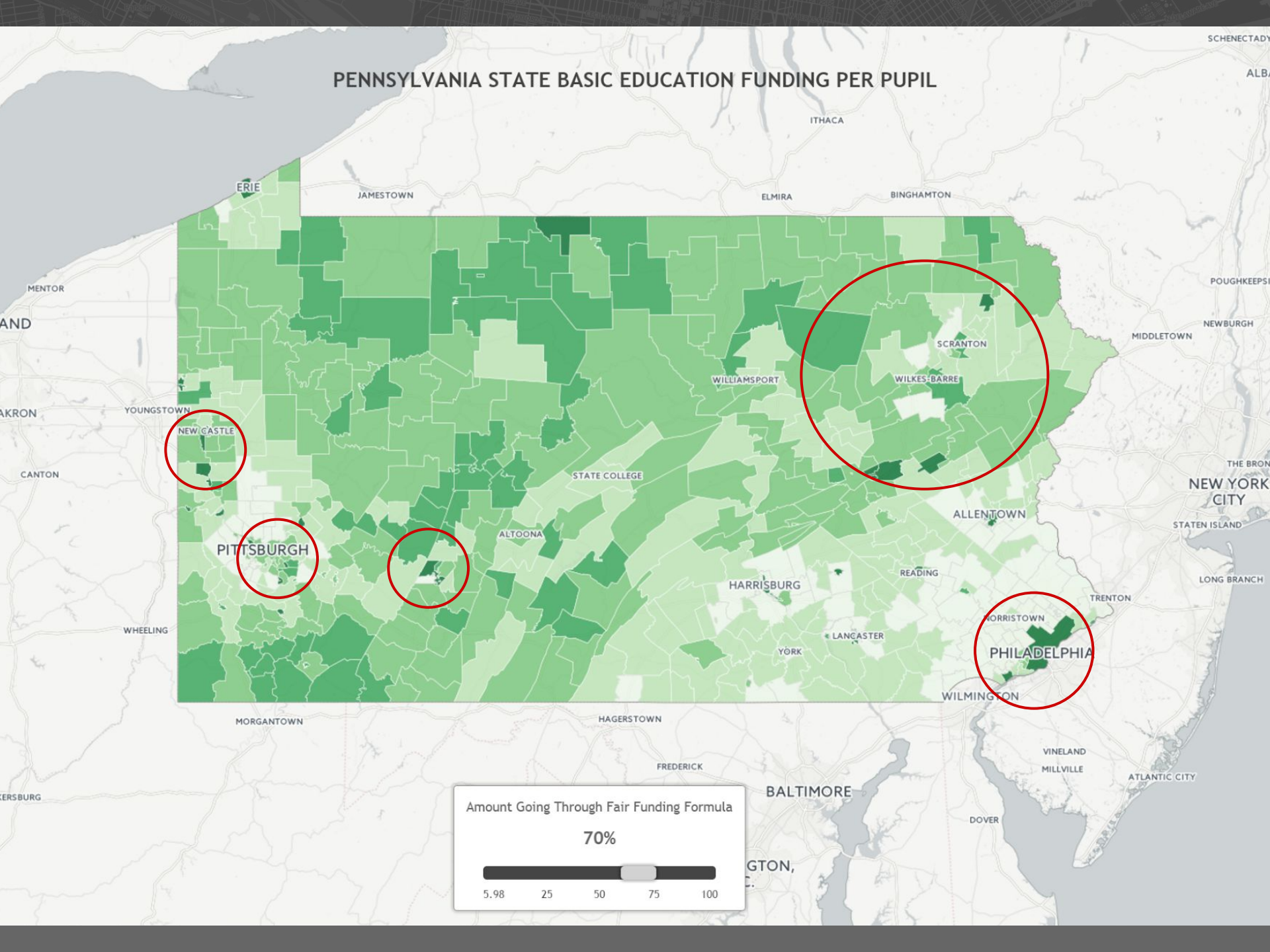
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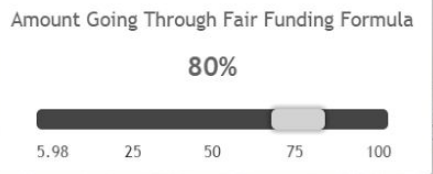
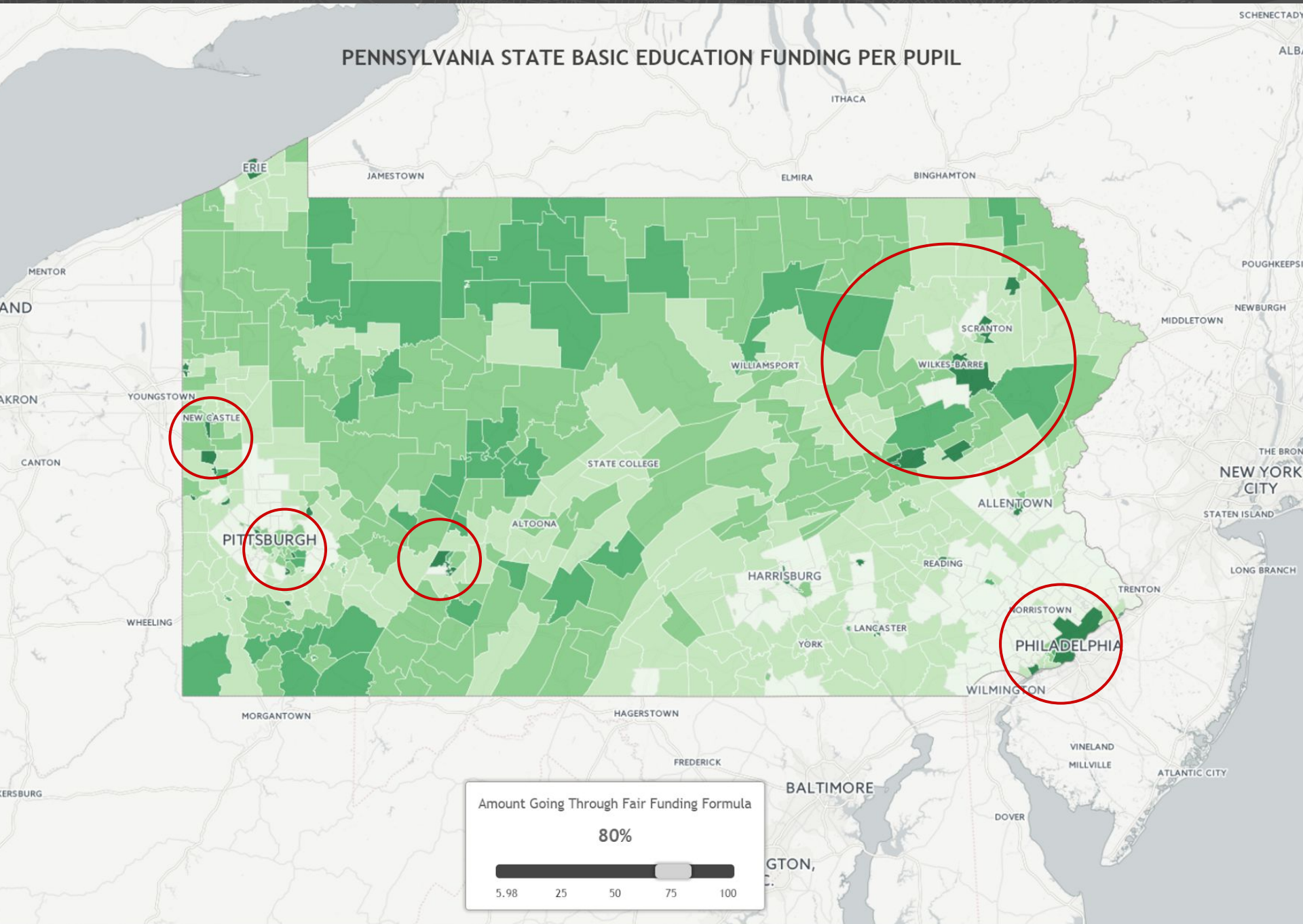
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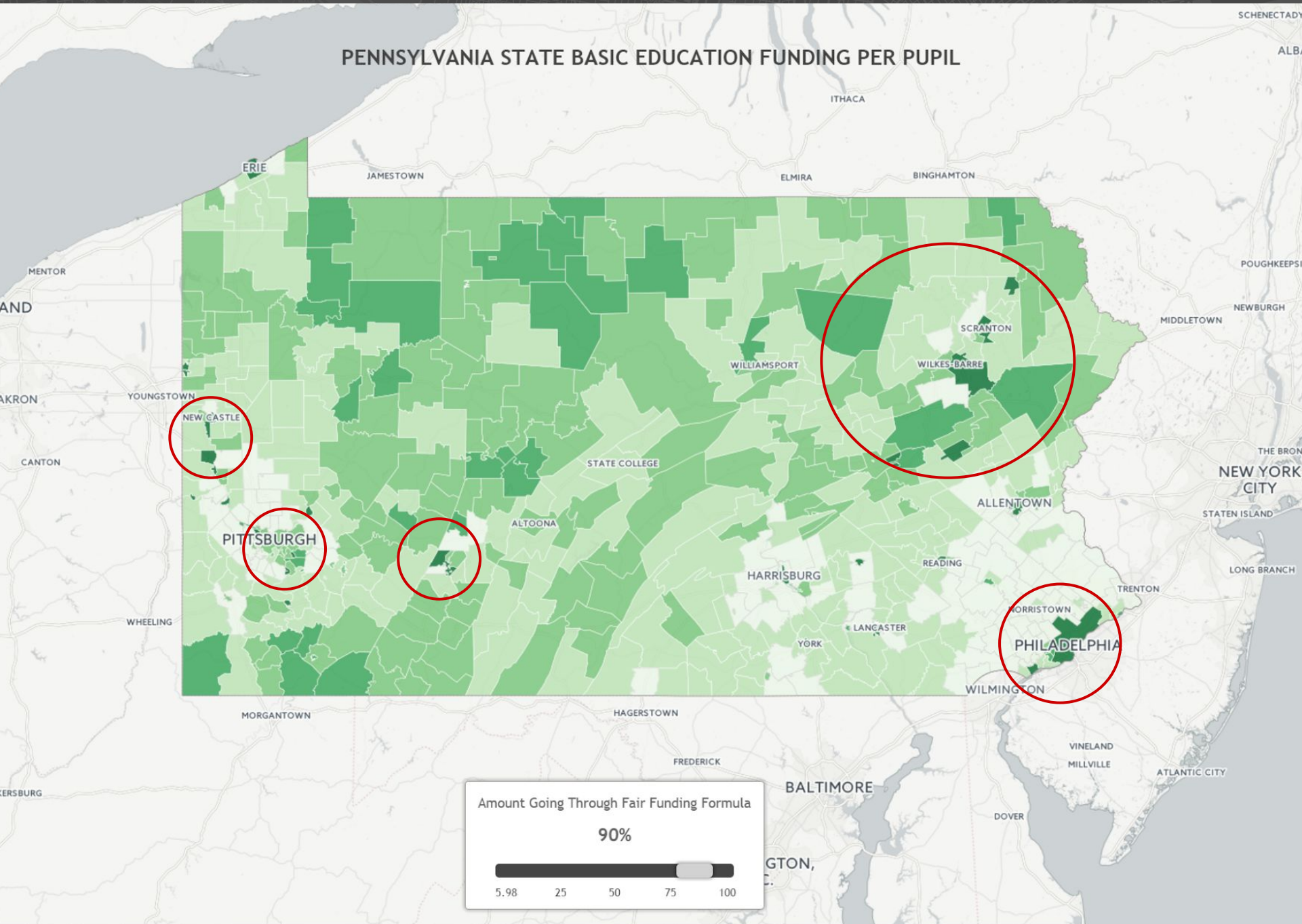
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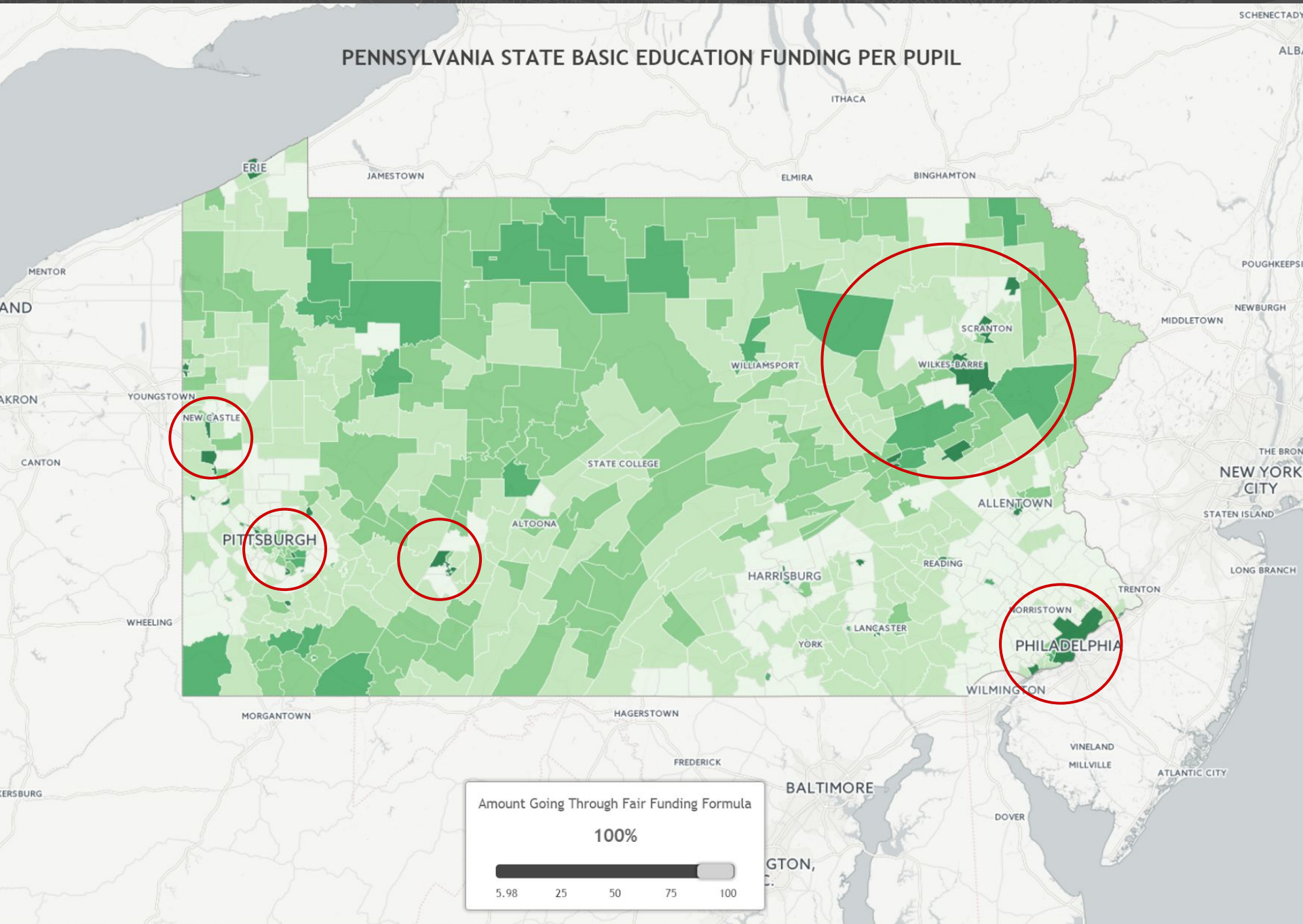
PENNSYLVANIA STATE BASIC EDUCATION FUNDING PER PUPIL



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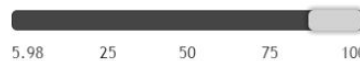


PENNSYLVANIA STATE BASIC EDUCATION FUNDING PER PUPIL



Amount Going Through Fair Funding Formula

100%



PENNSYLVANIA STATE BASIC EDUCATION FUNDING PER PUPIL

Scranton School District

Total State Basic Ed
Funding

\$41,335,873

Per Pupil Allocation

\$4,148

Per Pupil Funding Rank

221 out of 500

Median Household Income

Low \$37,551

Amount Going Through Fair Funding Formula

5.98%



5.98 25 50 75 100

PENNSYLVANIA STATE BASIC EDUCATION FUNDING PER PUPIL

Scranton School District

Total State Basic Ed
Funding

\$67,131,300

Per Pupil Allocation

\$6,737

Per Pupil Funding Rank

25 out of 500

Median Household Income

Low \$37,551

Amount Going Through Fair Funding Formula

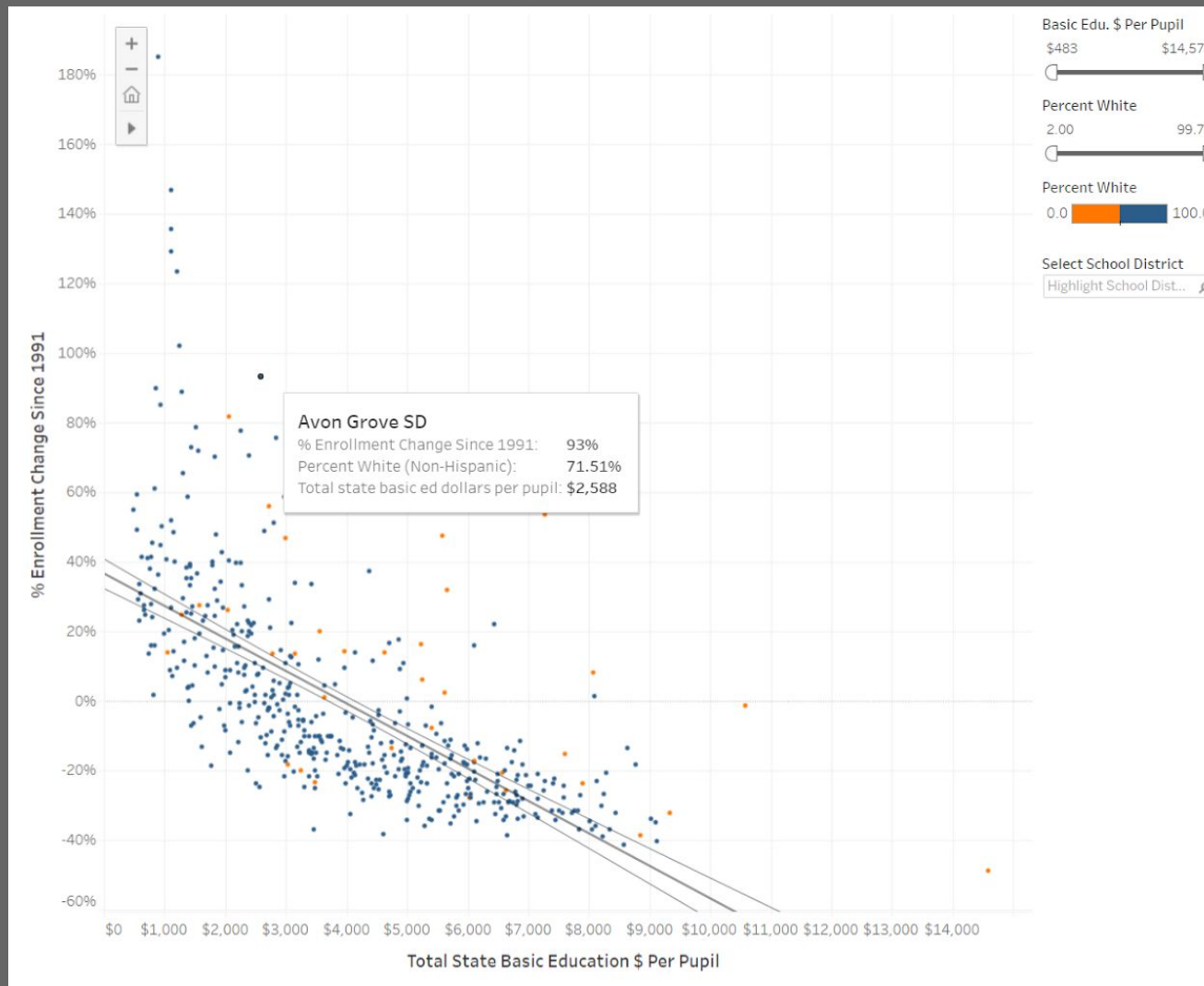
100%



5.98 25 50 75 100

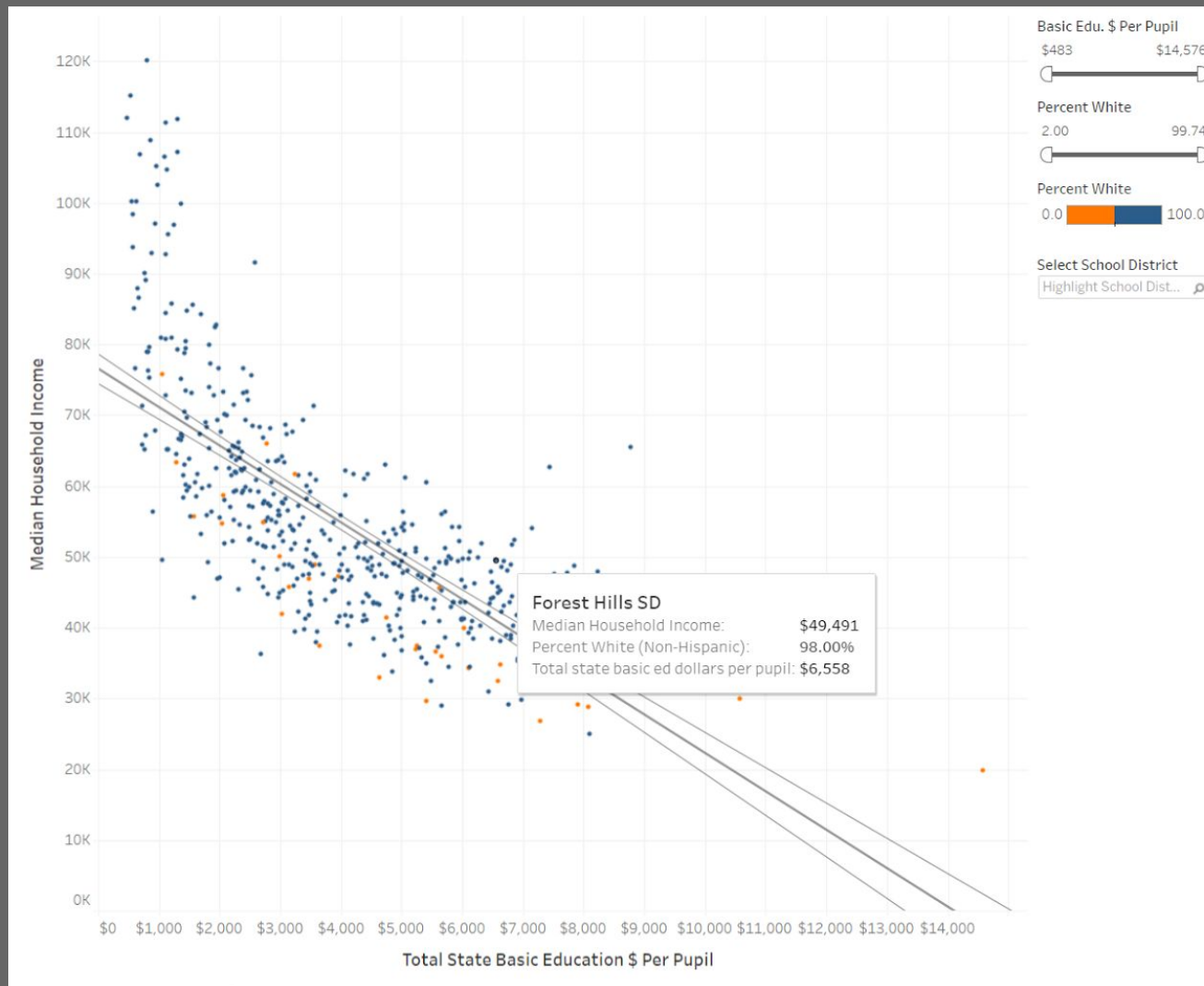
Keystone Crossroads

Correlation between Enrollment Change & Funding



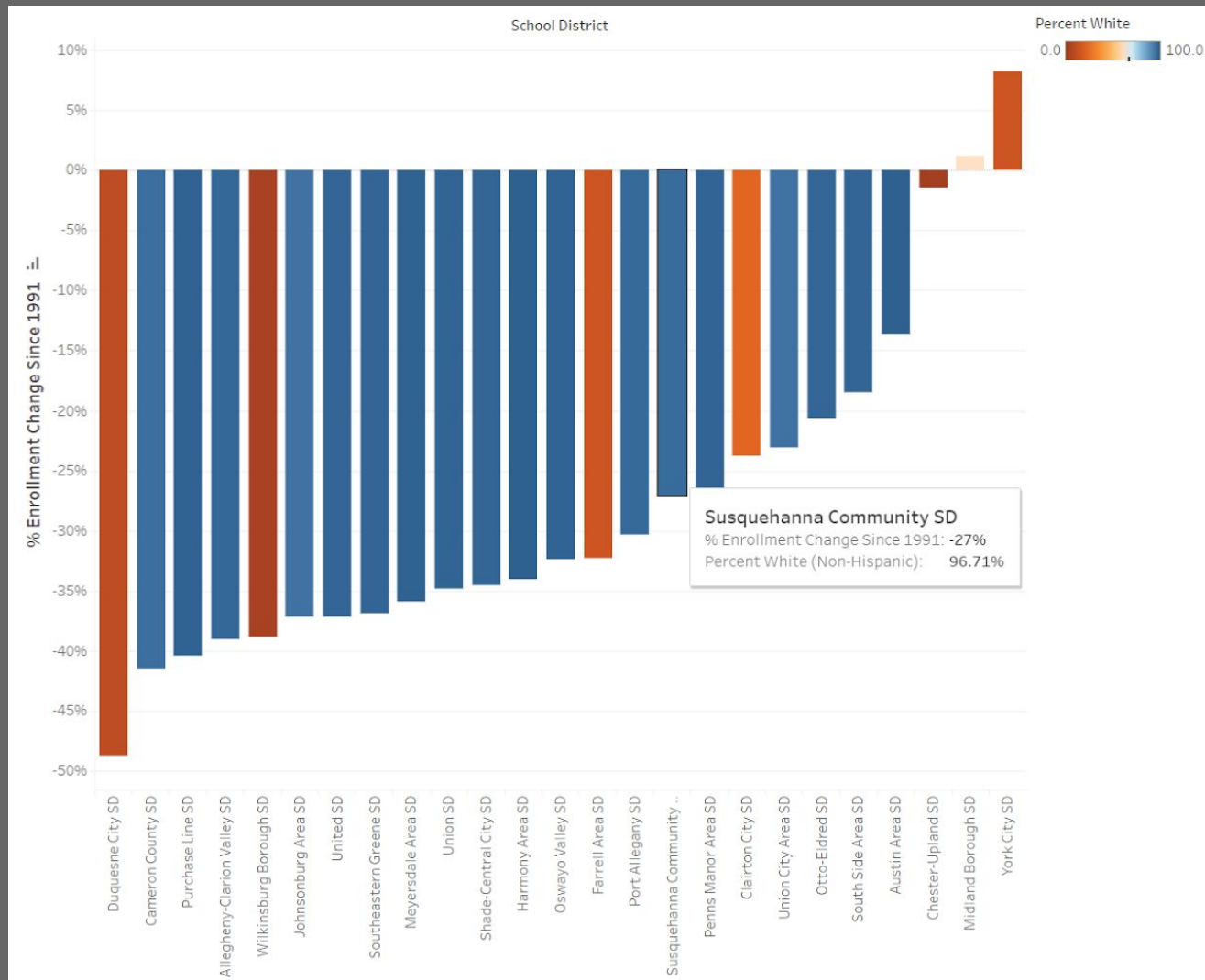
Keystone Crossroads

Correlation between **Student Wealth** & Funding



Keystone Crossroads

25 School Districts Highest Per Pupil Funding





Takeaways: Policy Impact

By mapping and visualizing policy impacts, you can show:

- How a policy benefits (or harms) your audience and their community
- Where to target your outreach based on which communities are most impacted



Which elected officials
have the **most**
constituents impacted
by a policy change?

District-based Advocacy

Question:

- Which elected officials will have the most constituents impacted by the executive order banning travel from 7 countries

Data:

- Census data
- Geographic boundary files for each house district

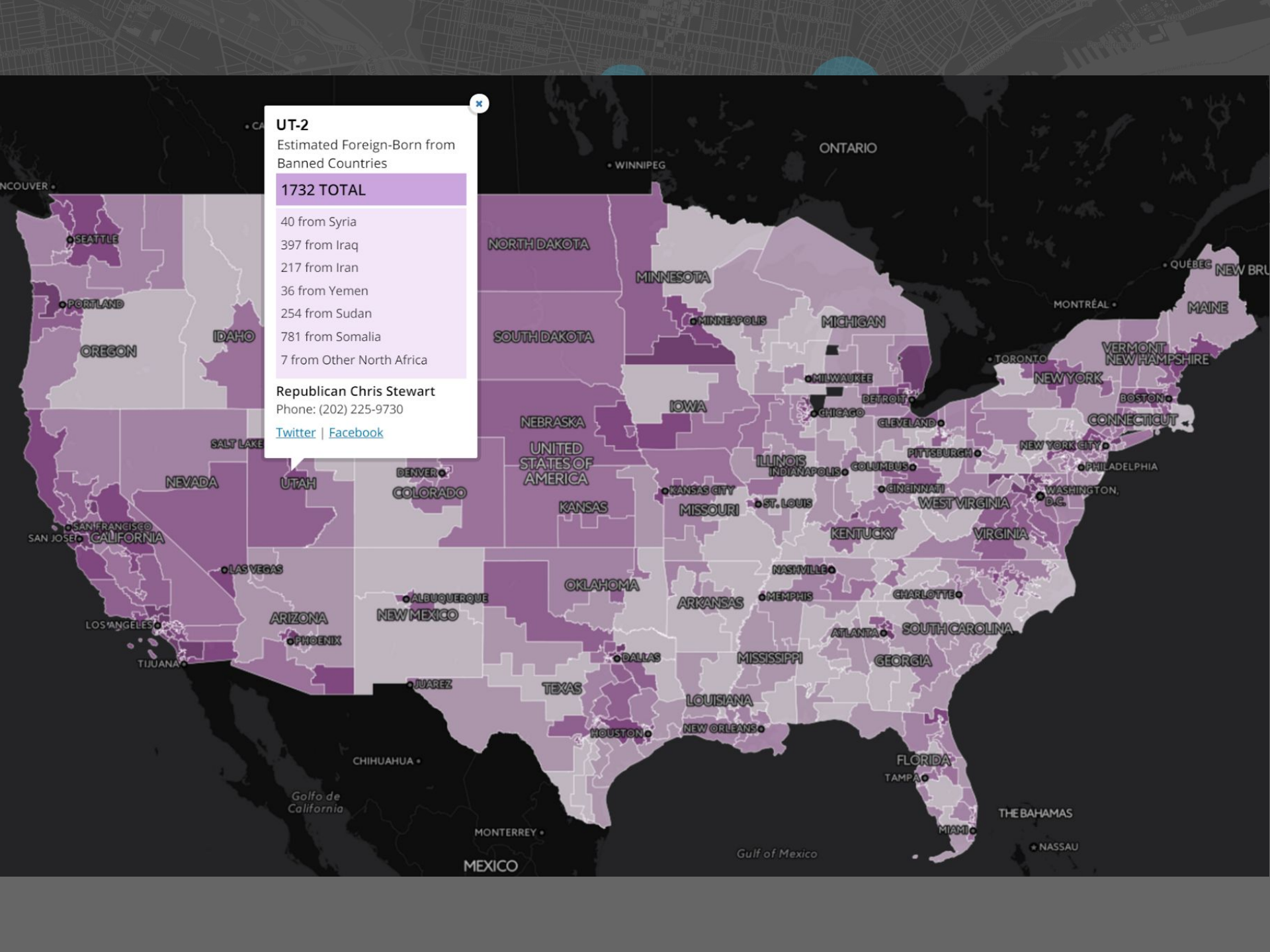
District-based Advocacy

Project/Process:

- Access ACS data and segment based on country of origin
- Create interactive map
- Link to elected official data

Result:

- [Blog Article](#)
- Elected official contact and social media data



UT-2

Estimated Foreign-Born from
Banned Countries

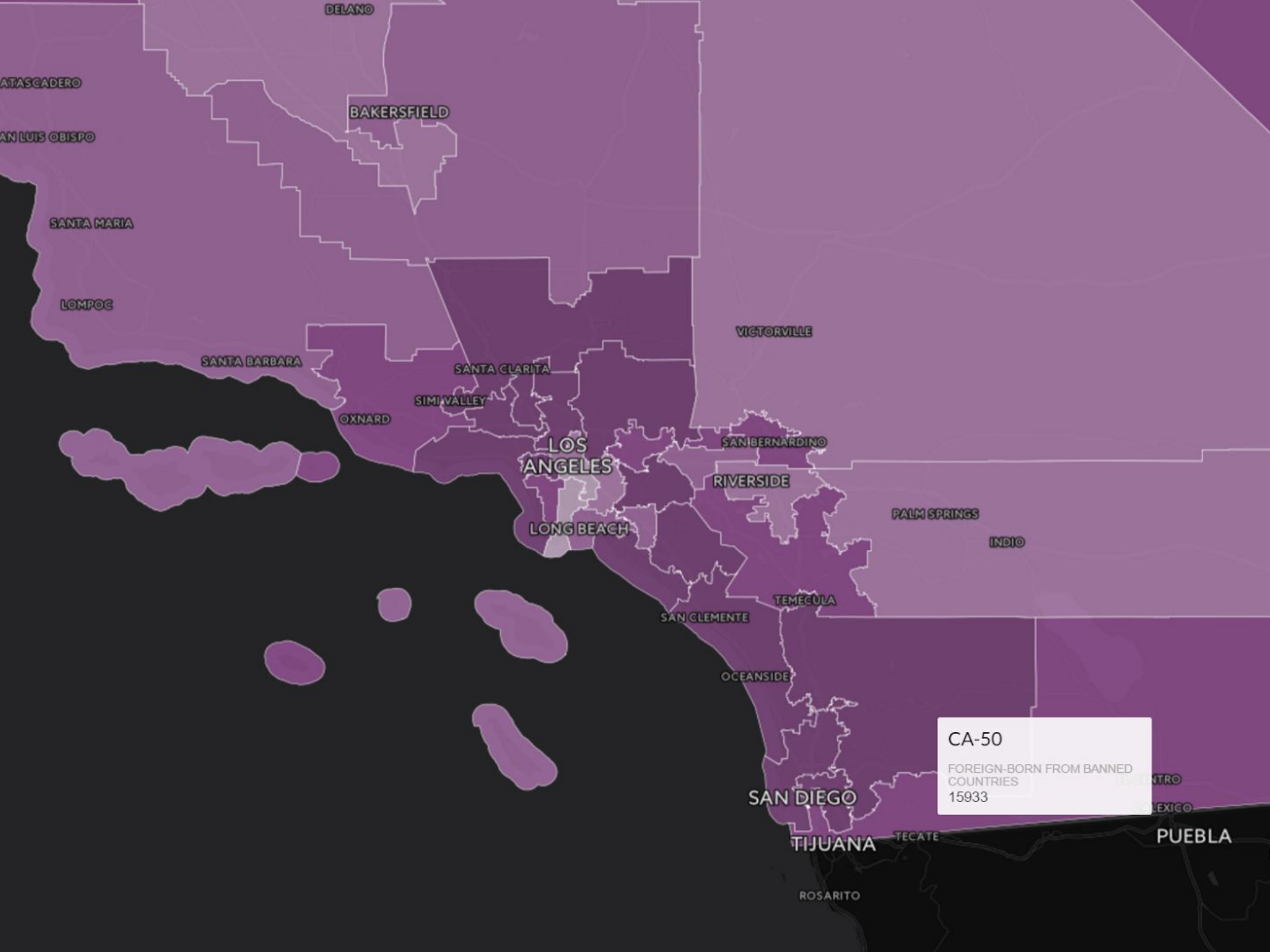
1732 TOTAL

40 from Syria
397 from Iraq
217 from Iran
36 from Yemen
254 from Sudan
781 from Somalia
7 from Other North Africa

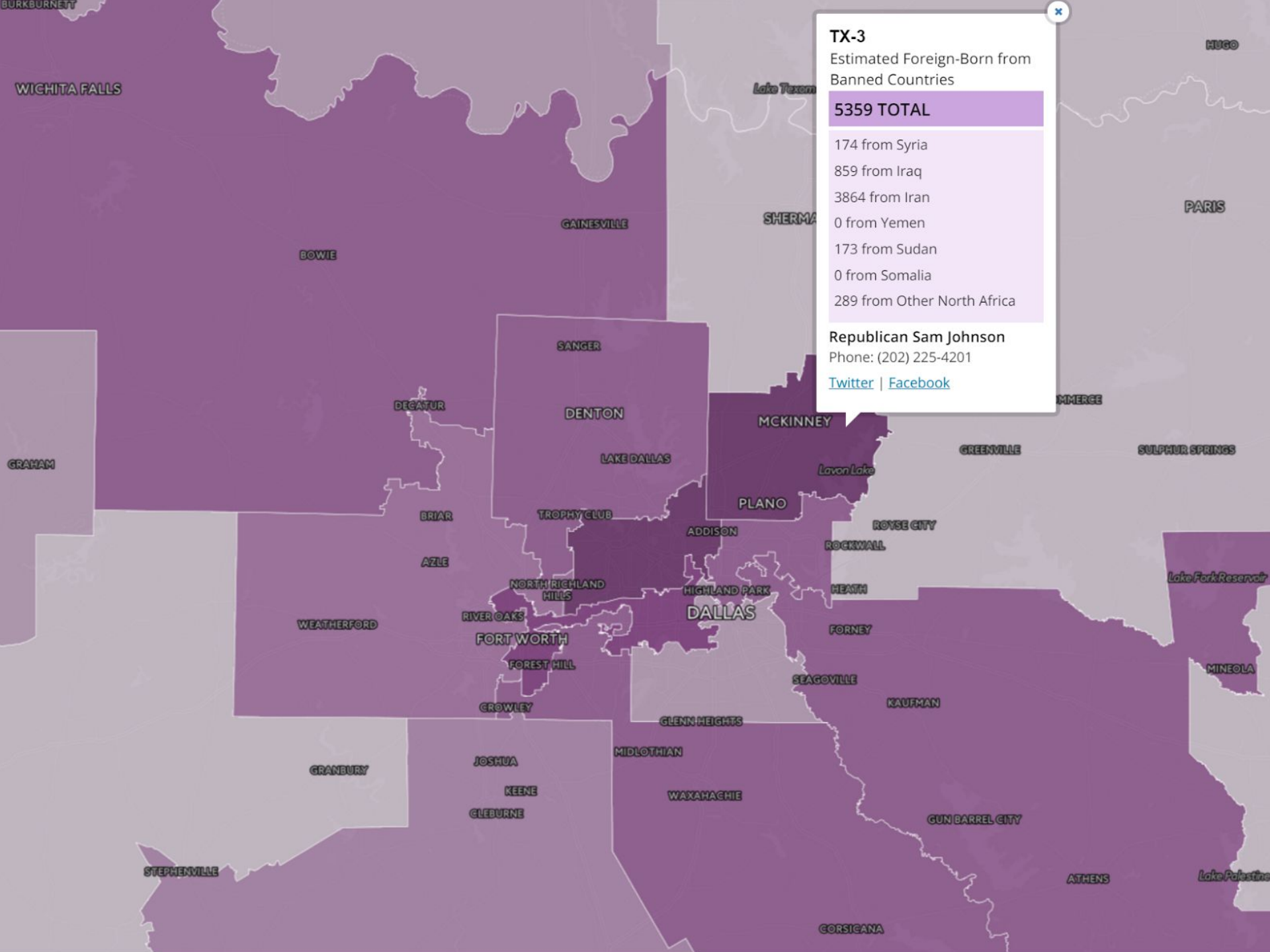
Republican Chris Stewart

Phone: (202) 225-9730

[Twitter](#) | [Facebook](#)



CA-50
FOREIGN-BORN FROM BANNED
COUNTRIES
15933



TX-3

Estimated Foreign-Born from
Banned Countries

5359 TOTAL

174 from Syria

859 from Iraq

3864 from Iran

0 from Yemen

173 from Sudan

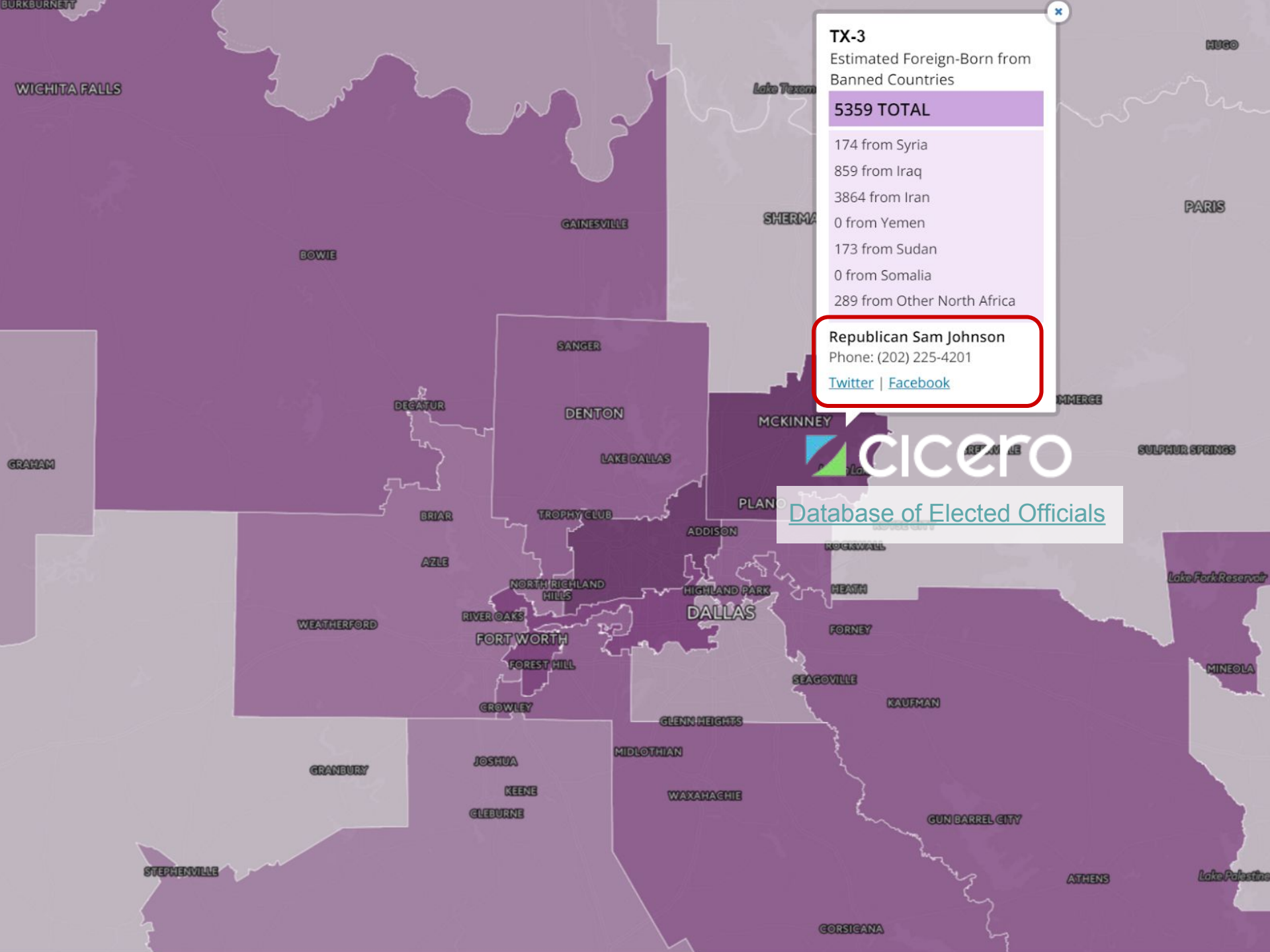
0 from Somalia

289 from Other North Africa

Republican Sam Johnson

Phone: (202) 225-4201

[Twitter](#) | [Facebook](#)



TX-3

Estimated Foreign-Born from
Banned Countries

5359 TOTAL

- 174 from Syria
- 859 from Iraq
- 3864 from Iran
- 0 from Yemen
- 173 from Sudan
- 0 from Somalia
- 289 from Other North Africa

Republican Sam Johnson

Phone: (202) 225-4201

[Twitter](#) | [Facebook](#)



[Database of Elected Officials](#)


District-based Advocacy - Twitter



Nick Decaro @decaro_nick · 4h

.@DarrellIssa, 46,100 of your constituents would lose coverage under Trumpcare. Stand up and oppose it!



 @DarrellIssa

 202-225-3906

Darrell Issa:

46,100

Californians in your district
will lose coverage
under Trumpcare.
Vote against it.

Source: Darrell Issa and Emily Cox, "Coverage Losses by Congressional District Under the House ACA Repeal Bill" (Washington: Center for American Progress, 2017).



 16

 11

American Health Care Act data from Center for American Progress

Takeaways: District-based Advocacy

By identifying which legislative districts a policy impacts, you can:

- Target the highest-impact elected officials and tailor your message to them
- Show the urgency of an issue for a constituent's specific community
- Mobilize constituents in the impacted districts to take action and contact their elected officials via phone, email, and social media



Sharing your story with maps and graphics

Sharing Your Story

- Integrate maps with other graphics
- Choose your graphic
- Design best practices

Maps & Graphics

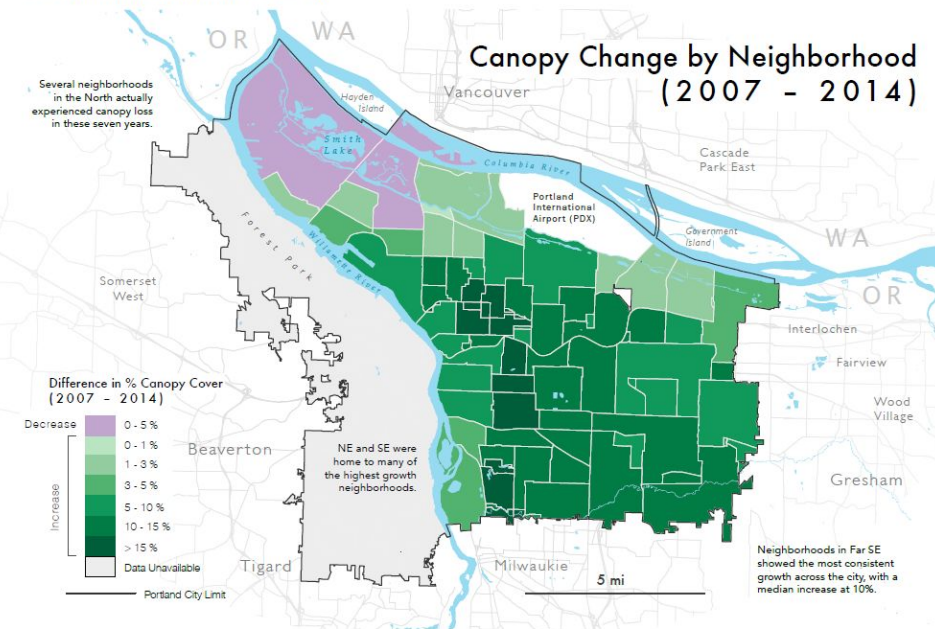
Design of your map and document should be cohesive with each other and across graphics

DETECTING CHANGE in Portland's Urban Canopy

Portland's urban canopy is changing.
While the majority of Portland's neighborhoods saw increase in canopy cover between 2007 and 2014, growth rates varied across the city.

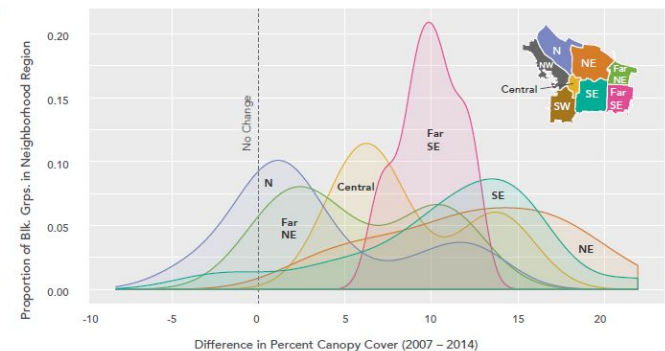
3.9%

The increase in Portland's urban canopy between 2007 and 2014.



Exploring Canopy Change by Neighborhood Region

North and Far Northeast neighborhoods displayed the lowest median canopy growth between 2007 and 2014, 1.7% and 4.7%, respectively. **Southeast and Northeast** neighborhoods had the highest median canopy growth (11.9% and 12.8%, respectively), but displayed large differences between their minimum and maximum growth neighborhoods. **Far Southeast** Portland neighborhoods displayed the most consistent growth in the city.



Sources - Ecotrust, RUS Discovery, Portland State University, The City of Portland, Oregon
Analysis and Cartography by Parker Ziegler

Maps & Graphics

- Color scheme

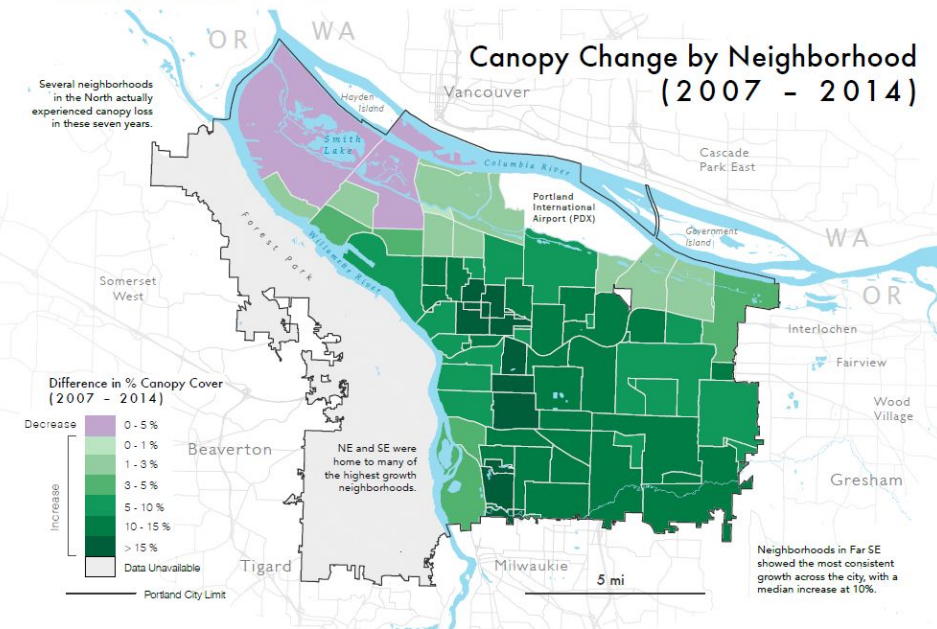
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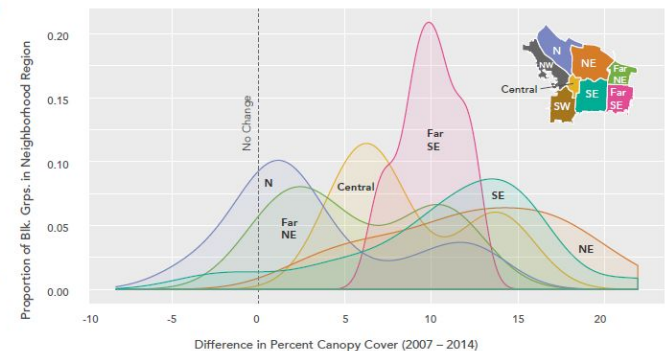
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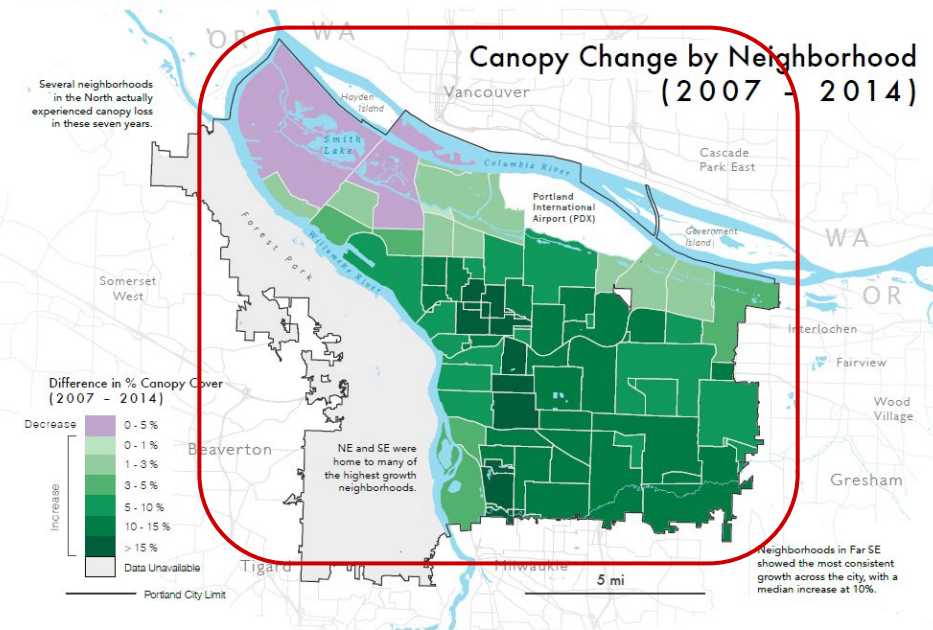
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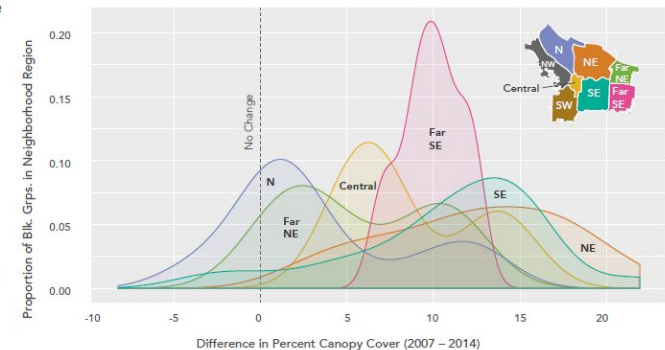
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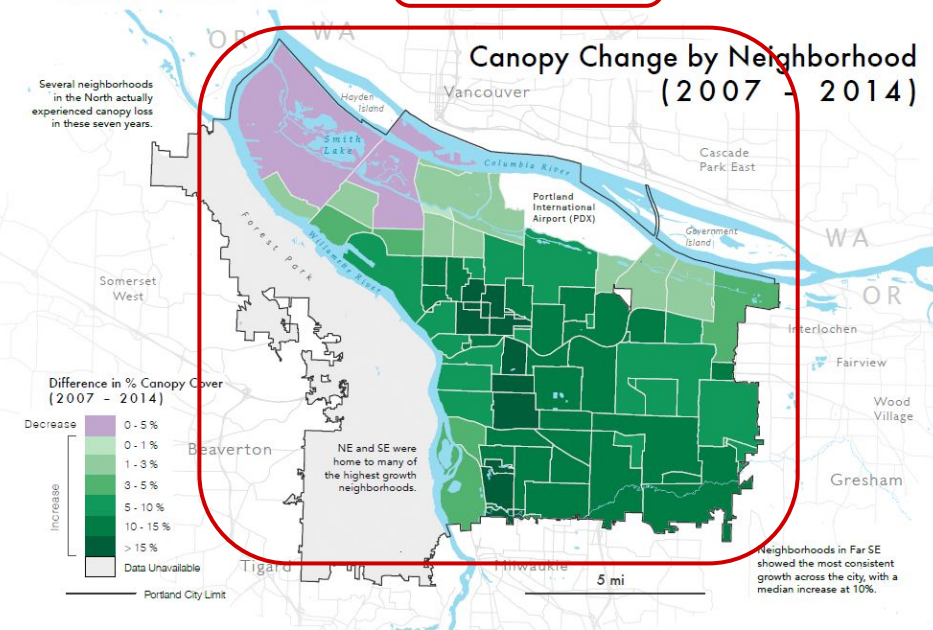
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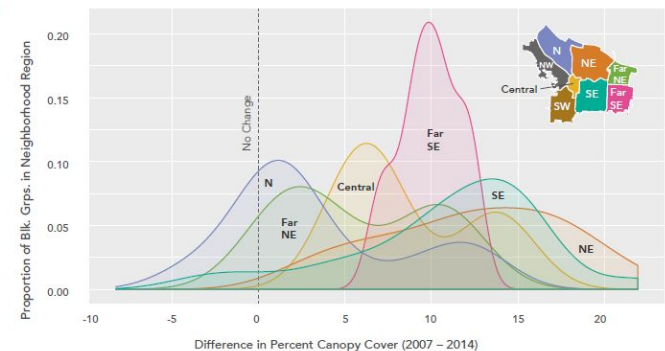
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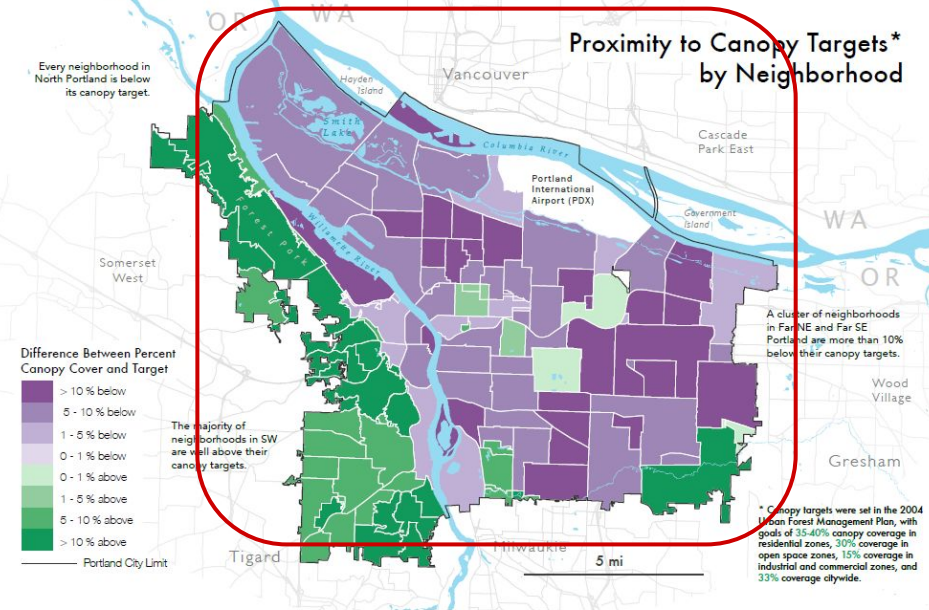
DETECTING CHANGE in Portland's Urban Canopy

There's still work to be done.

Despite consistent growth from 2007 – 2014, the majority of Portland neighborhoods remain below their canopy targets.

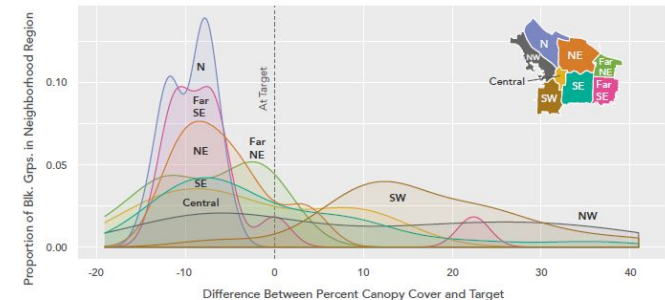
61%

of Portland neighborhoods had not reached their canopy target by 2014.



Progress Towards Canopy Targets by Neighborhood Region

Every neighborhood in **North Portland** is below its canopy target by more than 5%. **Northeast, Far Northeast, and Far Southeast** neighborhoods are also struggling, with fewer than 15% of neighborhoods in these regions above the canopy target. **Northwest** neighborhoods are spread across the spectrum, with several neighborhoods well above and several well below their targets. **Southwest** neighborhoods tend to be well above their targets.



Sources – Ecotrust, RUS Discovery, Portland State University, The City of Portland, Oregon
Analysis and Cartography by Parker Ziegler

* Canopy cover statistics for this project were obtained from a combination of 1m resolution LIDAR data of Portland's urban canopy (2007 and 2014) and a set of 1m resolution canopy classifications derived from NAIP mosaics (2009, 2011, and 2014).

Maps & Graphics

- Color scheme
- Color saturation

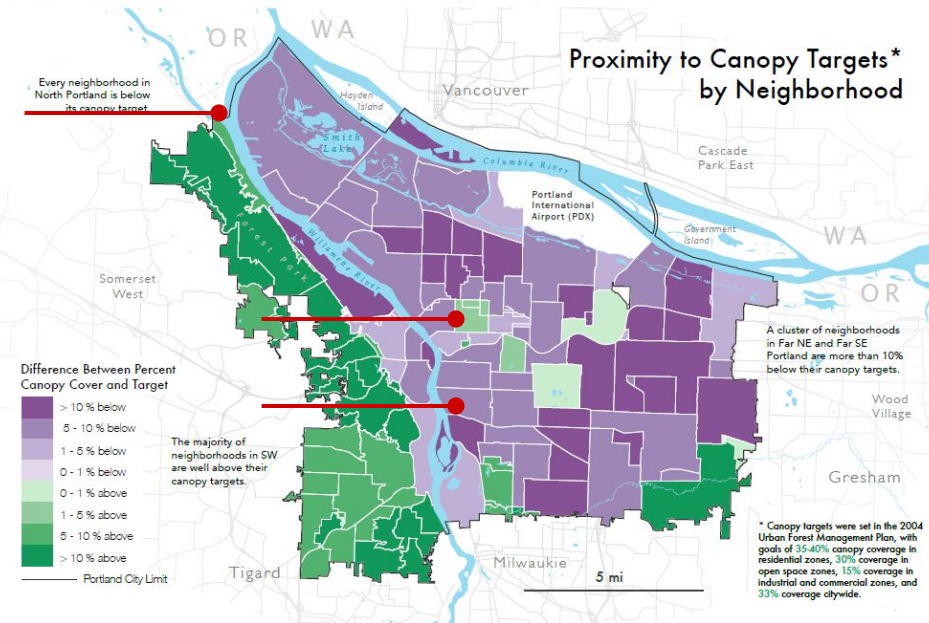
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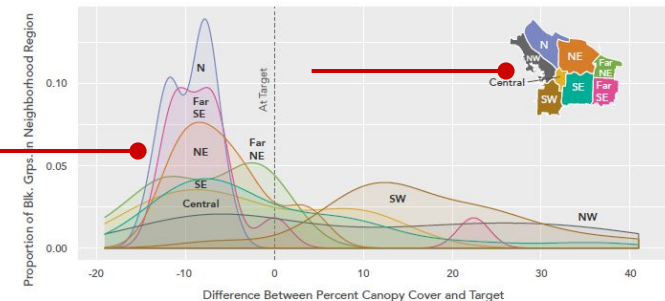
61%

of Portland neighborhoods had not reached their canopy target by 2014.



Progress Towards Canopy Targets by Neighborhood Region

Every neighborhood in **North Portland** is below its canopy target by more than 5%. **Northeast, Far Northeast, and Far Southeast** neighborhoods are also struggling, with fewer than 15% of neighborhoods in these regions above the canopy target. **Northwest** neighborhoods are spread across the spectrum, with several neighborhoods well above and several well below their targets. **Southwest** neighborhoods tend to be well above their targets.

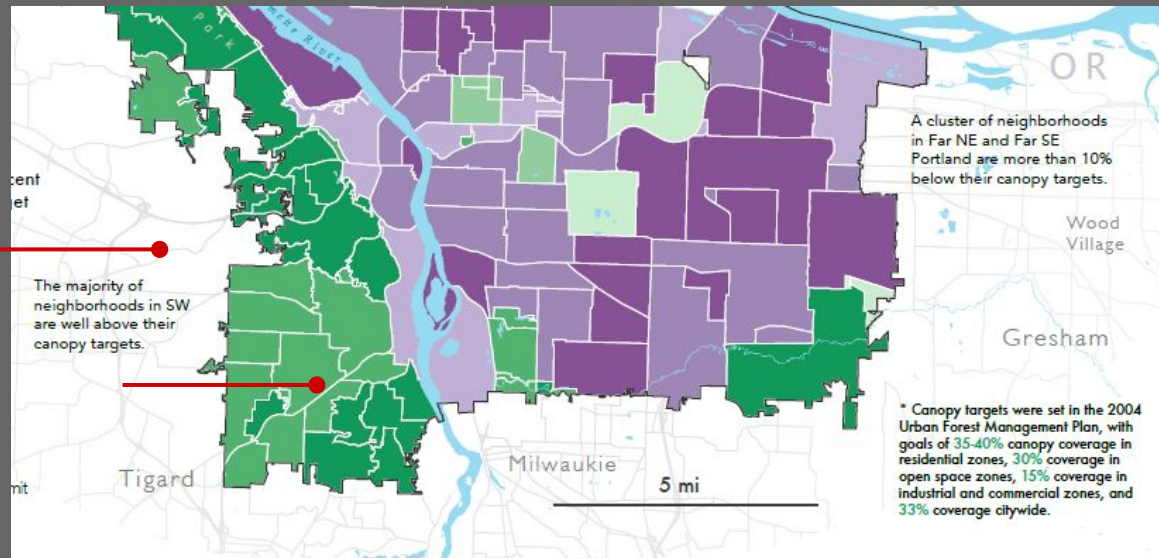


Sources – Ecotrust, RUS Discovery, Portland State University, The City of Portland, Oregon
Analysis and Cartography by Parker Ziegler

* Canopy cover statistics for this project were obtained from a combination of 1m resolution LIDAR data of Portland's urban canopy (2007 and 2014) and a set of 1m resolution canopy classifications derived from NAIP mosaics (2009, 2011, and 2014).

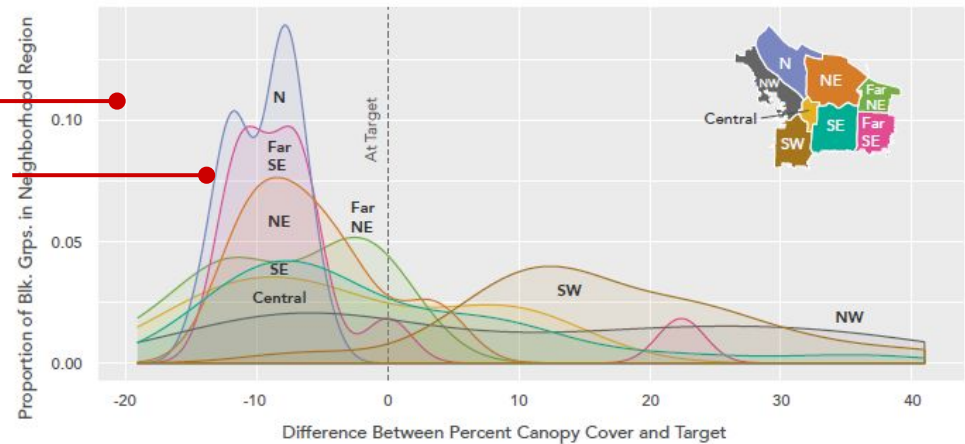
Maps & Graphics

- Color scheme
- Color saturation
- Line width



Neighborhoods by Region

North
canopy
%.
east, and
neighborhoods are
lower than
in these
canopy target.
oods are
spectrum, with
well above
their targets.
oods tend to
get.

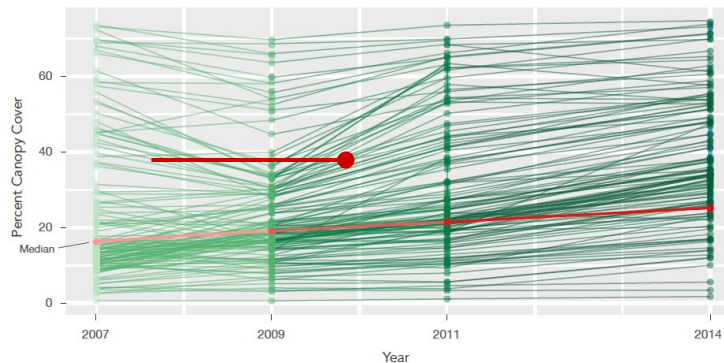


Maps & Graphics

- Color scheme
- Color saturation
- Line width

DETECTING CHANGE in Portland's Urban Canopy

ACROSS THE YEARS Visualizing Canopy Change at Intervals from 2007 – 2014



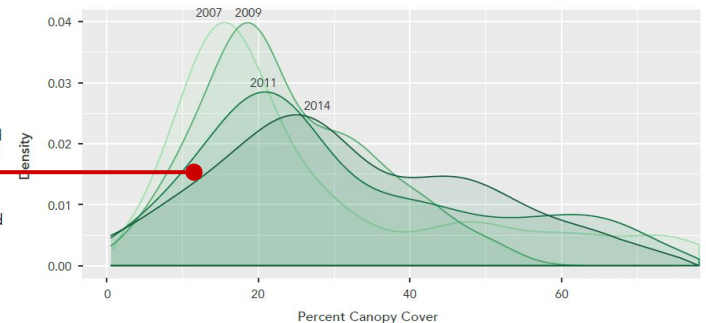
Portland's urban canopy grew consistently from 2007 – 2014. However, 2007 – 2009 saw more variation in change, with a number of neighborhoods displaying losses in canopy cover. 2009 – 2011 and 2011 – 2014 were higher growth time periods, with most neighborhoods experiencing canopy gains. The red line tracks the growth in the median canopy cover of Portland neighborhoods across the years.

Median Percent Canopy Cover of Portland Neighborhoods

Year	2007	2009	2011	2014
Median % Canopy Cover	16.8%	19.4%	21.5%	24.7%

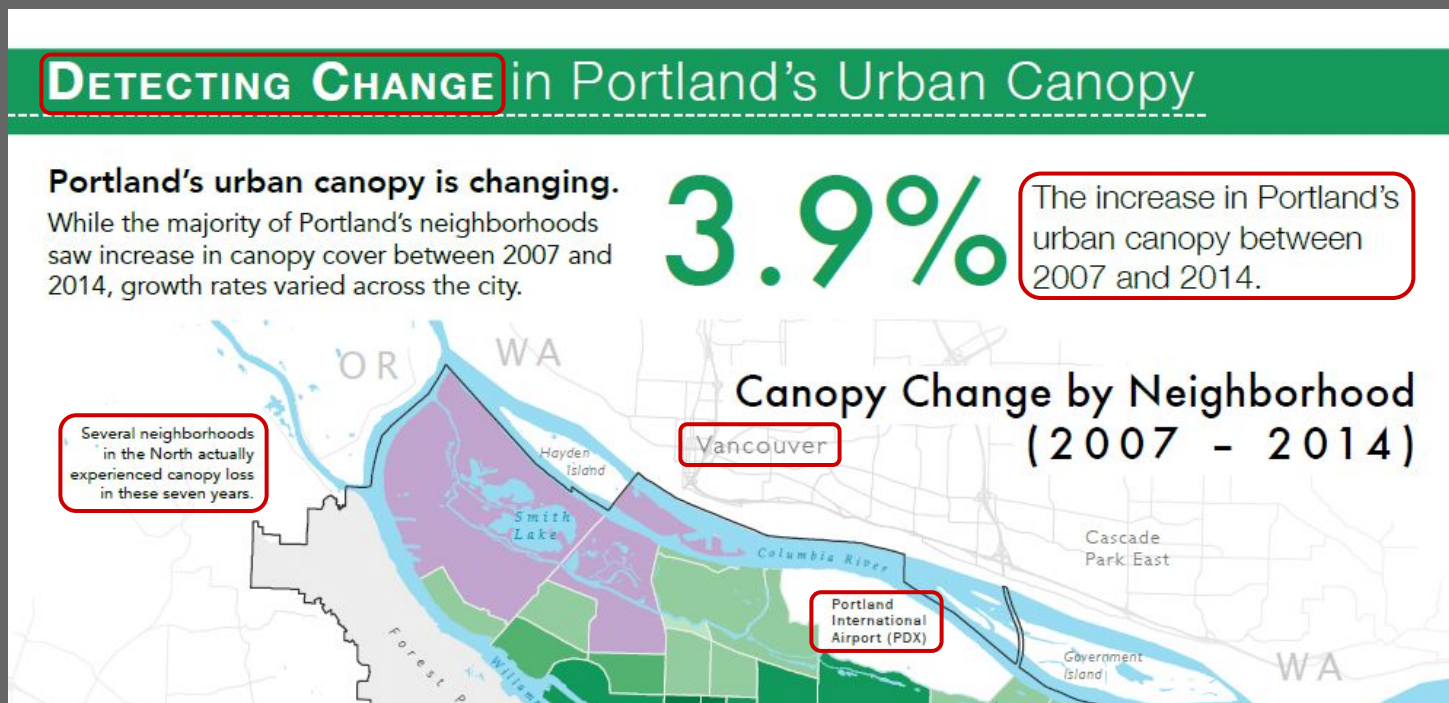
The median canopy cover in Portland neighborhoods increased every year between 2007 and 2014, starting from roughly 17% in 2007 and growing to just under 25% by 2014. However, canopy cover was most consistent among the neighborhoods in 2009. Since then, strong growth in some areas of the city and slower growth in others has increased the canopy cover gap between Portland's neighborhoods.

Sources – EcoTrust, RUS Discovery, Portland State University, The City of Portland, Oregon
Analysis and Cartography by Parker Ziegler



Maps & Graphics

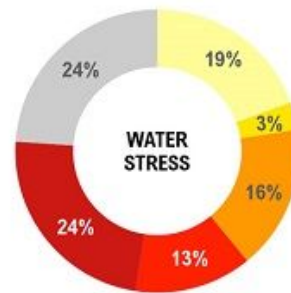
- Color scheme
- Color saturation
- Line width
- Font



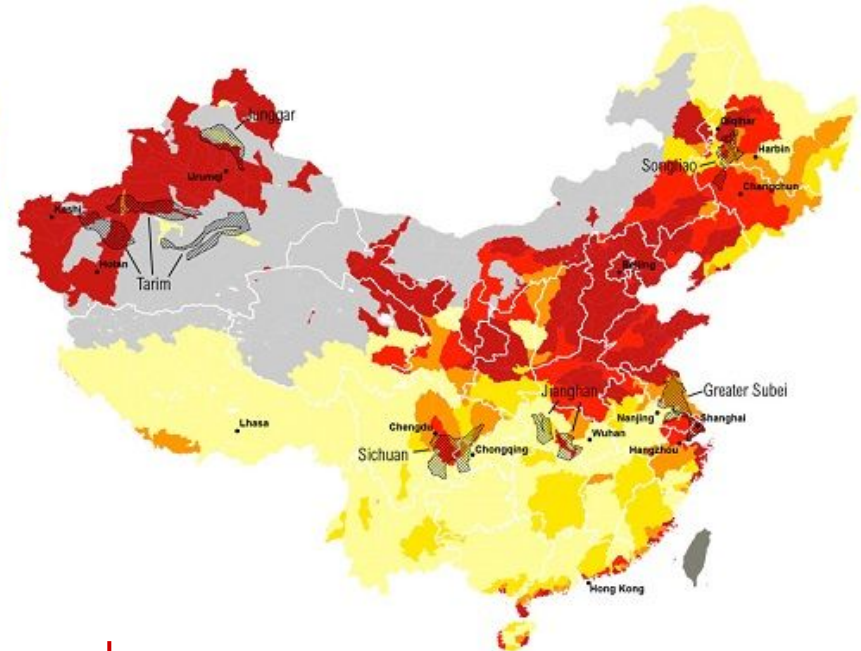
Maps & Graphics

- Color scheme
- Color saturation
- Line width
- Font
- Uncluttered

Shale Plays and Baseline Water Stress in China



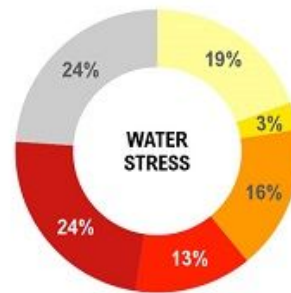
- Low
- Low to medium
- Medium to high
- High
- Extremely high
- Arid & low water use
- Shale play



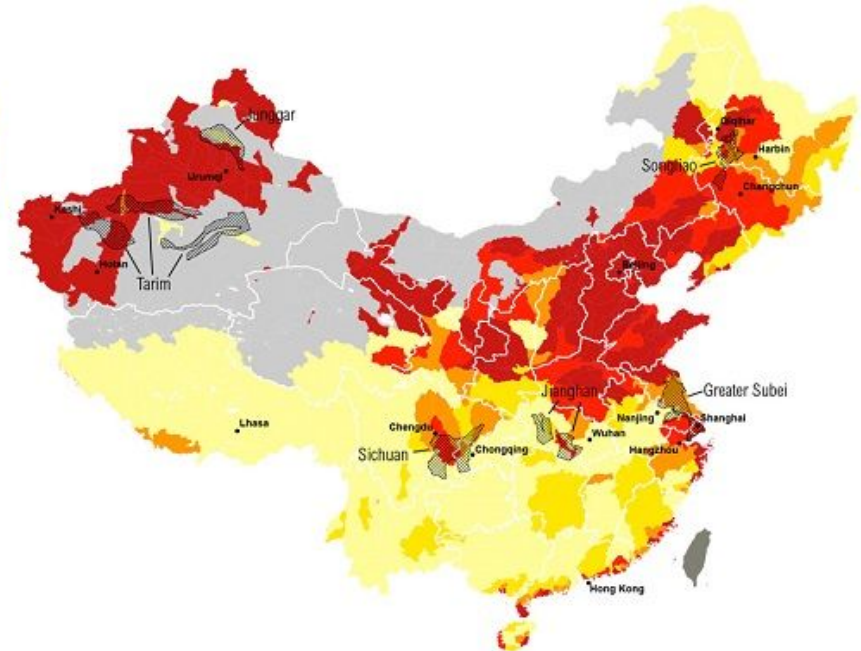
Maps & Graphics

- Color scheme
- Color saturation
- Line width
- Font
- Uncluttered
- Same graphics color scheme

Shale Plays and Baseline Water Stress in China



- Low
- Low to medium
- Medium to high
- High
- Extremely high
- Arid & low water use
- Shale play



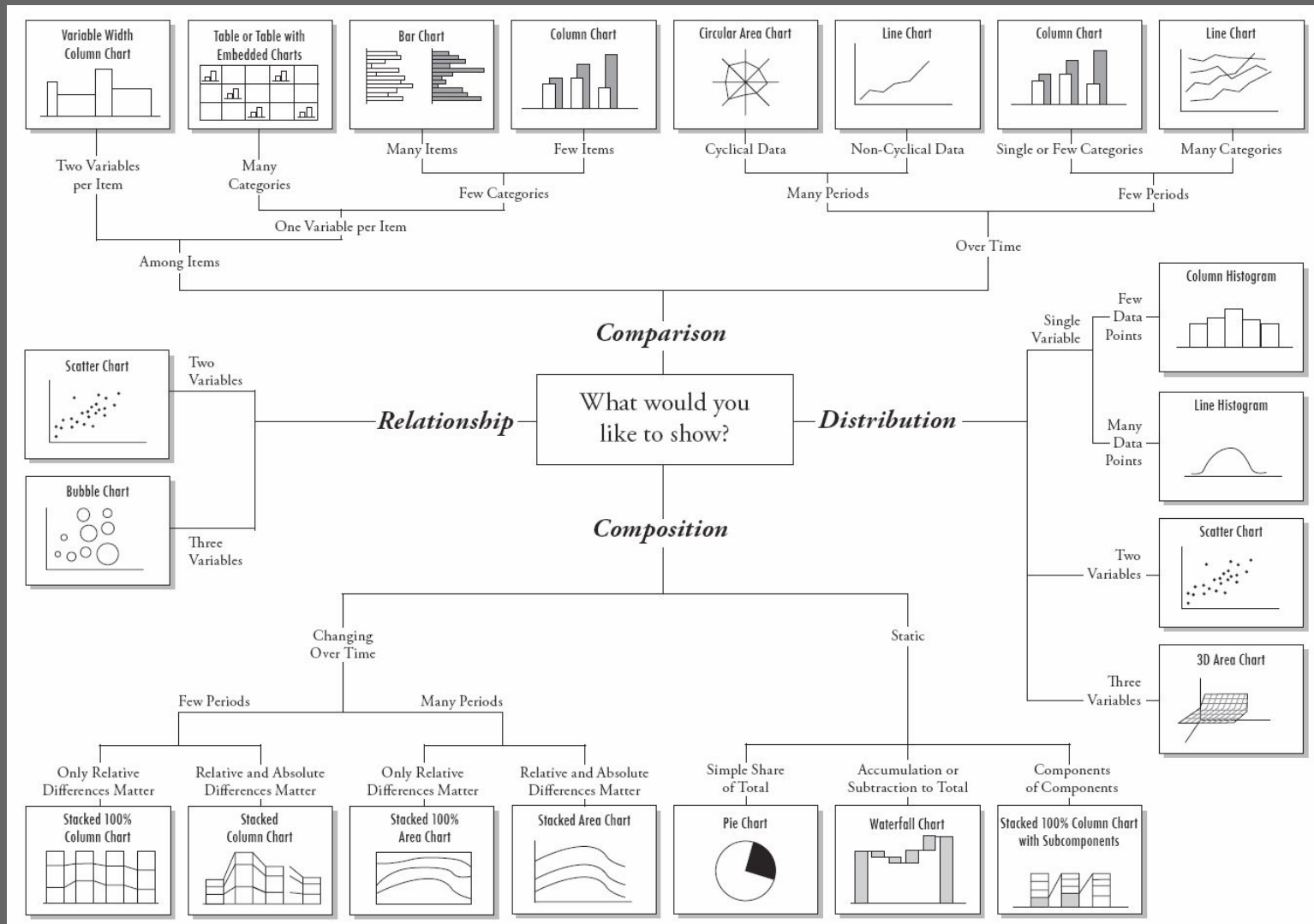
www.wri.org/water-for-shale

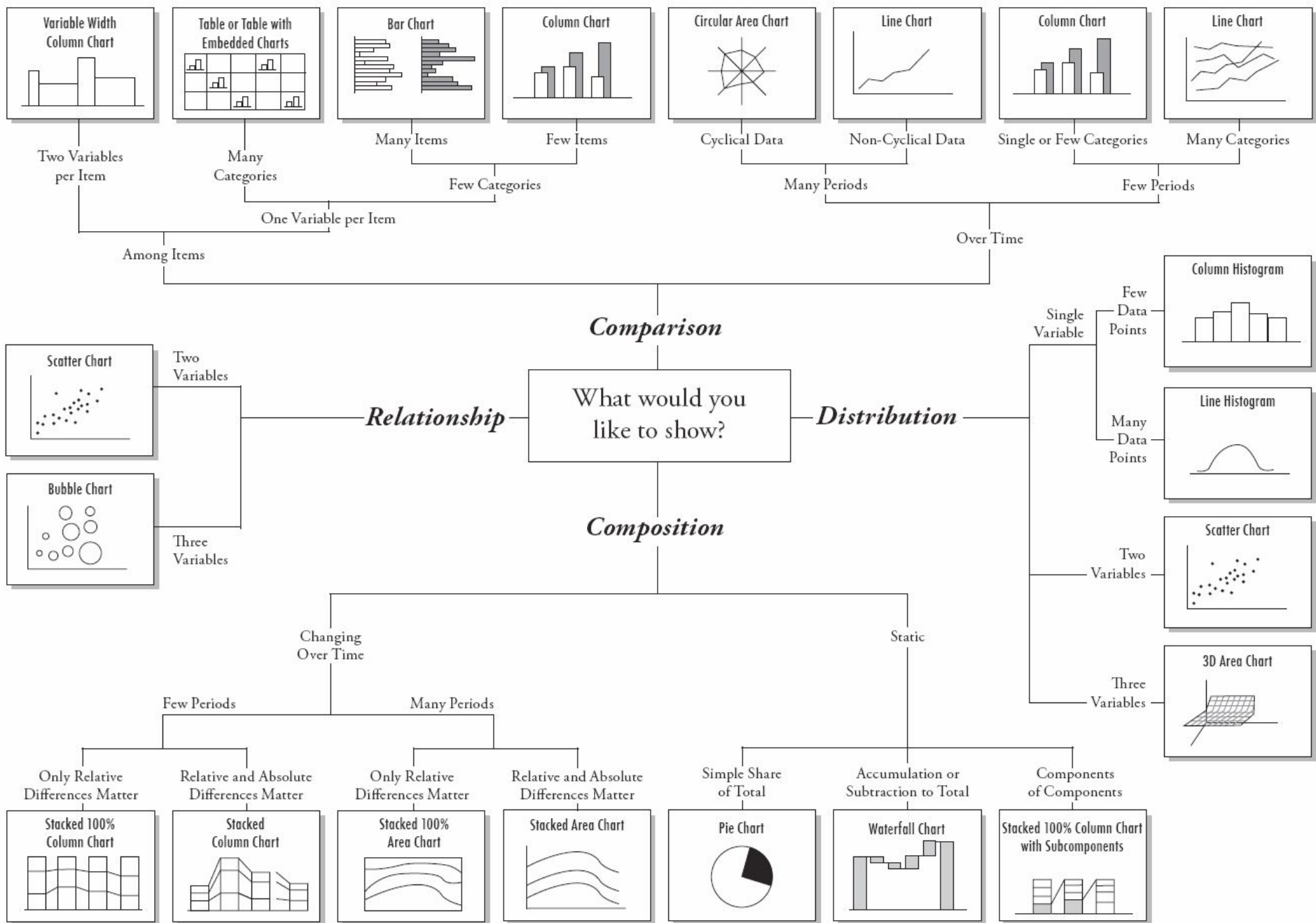


WORLD RESOURCES INSTITUTE

[Source](#)

Choosing Your Graphic





Design Best Practices

- White space is your friend
- Keep it simple
- Don't have any "chartjunk"
- Highlight what you want your viewer to take away
- Create your own color palette - don't use default colors

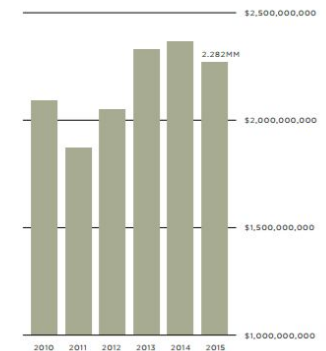
FINANCIAL HIGHLIGHTS

Statement of Activities

FOR THE YEAR ENDED DECEMBER 31, 2015

REVENUES	
Dividends	\$16,138,820
Interest	\$10,279,795
Net realized and unrealized gains on investments	\$55,693,506
TOTAL REVENUE	\$82,112,121
GRANTS MADE AND OPERATING EXPENSES	
Grants made, accrual basis	\$102,563,815
Program and administration and general expenses	\$8,672,687
Investment fee expenses	\$8,553,321
Excise tax and UBIT	\$233,048
TOTAL EXPENSES	\$2,234,633,277
Change in net assets	\$77,105,492
Net assets, beginning of year	\$2,274,931,390
Net assets, end of year	\$2,197,825,898

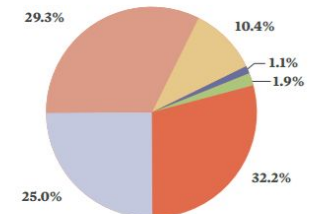
Investment Portfolio



Grant Payments & Future Commitments

FOR THE YEAR ENDED DECEMBER 31, 2015

Creative Communities	\$32,250,948
Great Learning	\$27,543,715
Watershed Protection	\$35,375,844
Pooled Funds	\$11,472,434
Philanthropy Fund	\$1,240,215
Director Discretionary and Matching Gifts	\$2,145,390
TOTAL 2015 GRANT PAYMENTS	\$110,028,546
TOTAL FUTURE COMMITMENTS	\$75,573,176



HOW AMERICA SPENDS
The 2010
bundle Report

SPENDING BY STATE

Average per household in 2009*

The average
New Canaan, Connecticut,
resident spent \$25,486 eating
out last year -- more than
the average resident of
West Virginia spent, total.

West Virginia
residents spent 35%
less than the national
average in 2009

*Spending does
not include
mortgage or rent

Where
people spent
the most

CONNECTICUT
\$57,331

DISTRICT OF
COLUMBIA
\$49,430

HAWAII
\$46,518

CALIFORNIA
\$43,962

TEXAS
\$42,623

ARIZONA
\$41,752

ILLINOIS
\$41,627

NEW YORK
\$40,783

MARYLAND
\$40,538

WASHINGTON
\$40,480

US OVERALL
\$37,782

Where
people spent
the least

WYOMING
\$32,372

NORTH DAKOTA
\$31,179

SOUTH CAROLINA
\$31,080

GEORGIA
\$29,753

ALABAMA
\$29,337

KENTUCKY
\$28,870

IDAHOO
\$28,537

MISSISSIPPI
\$27,740

MONTANA
\$27,033

WEST VIRGINIA
\$24,517

Graph starts at
\$20,000

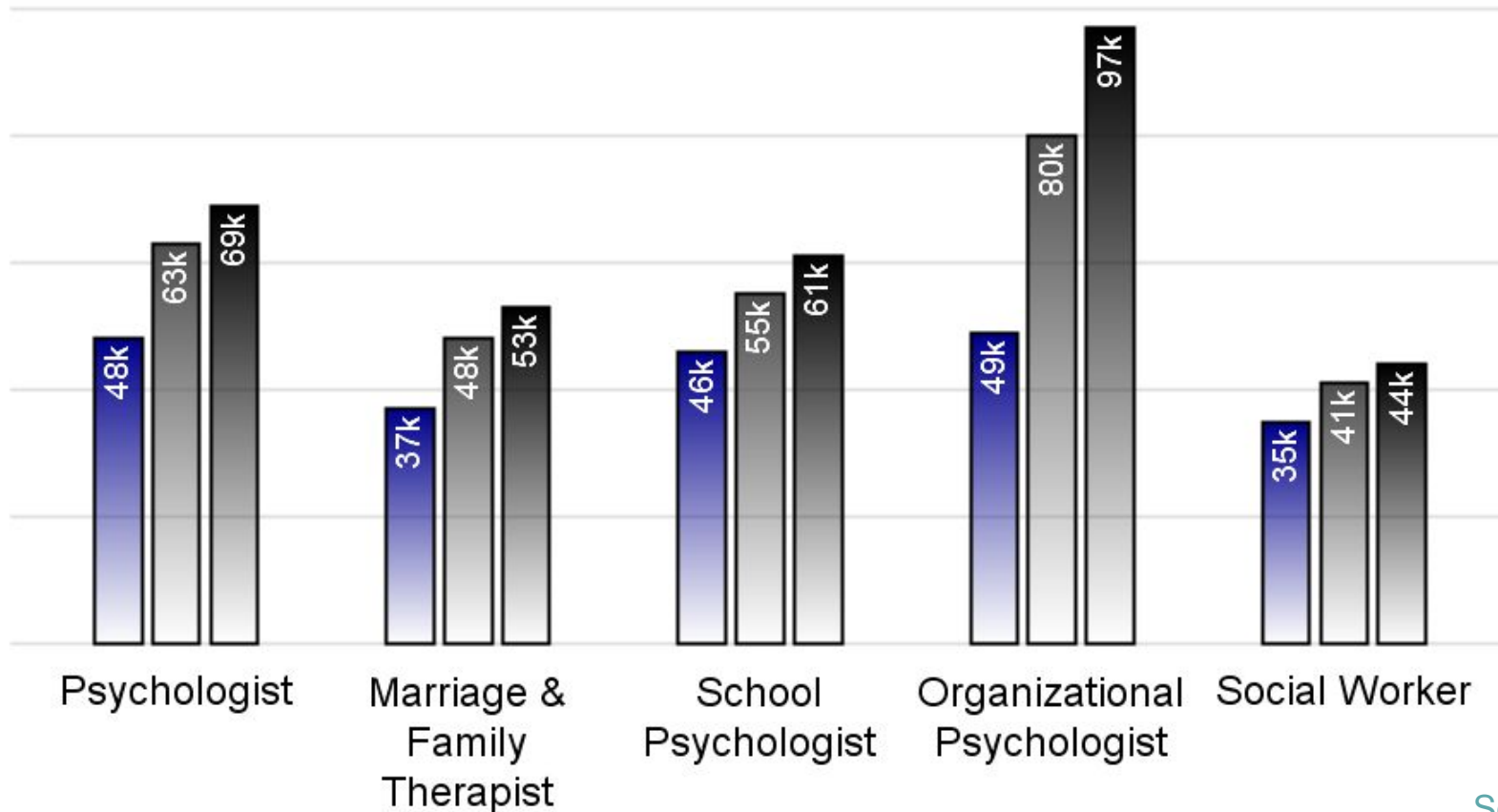
Does not include mortgage/rent.
For complete methodology, go to Bundle.com/bundlereport2010.

Source

Design Best Practices

Average Salaries by Experience

■ <1 Year ■ 5 Years ■ 10 Years

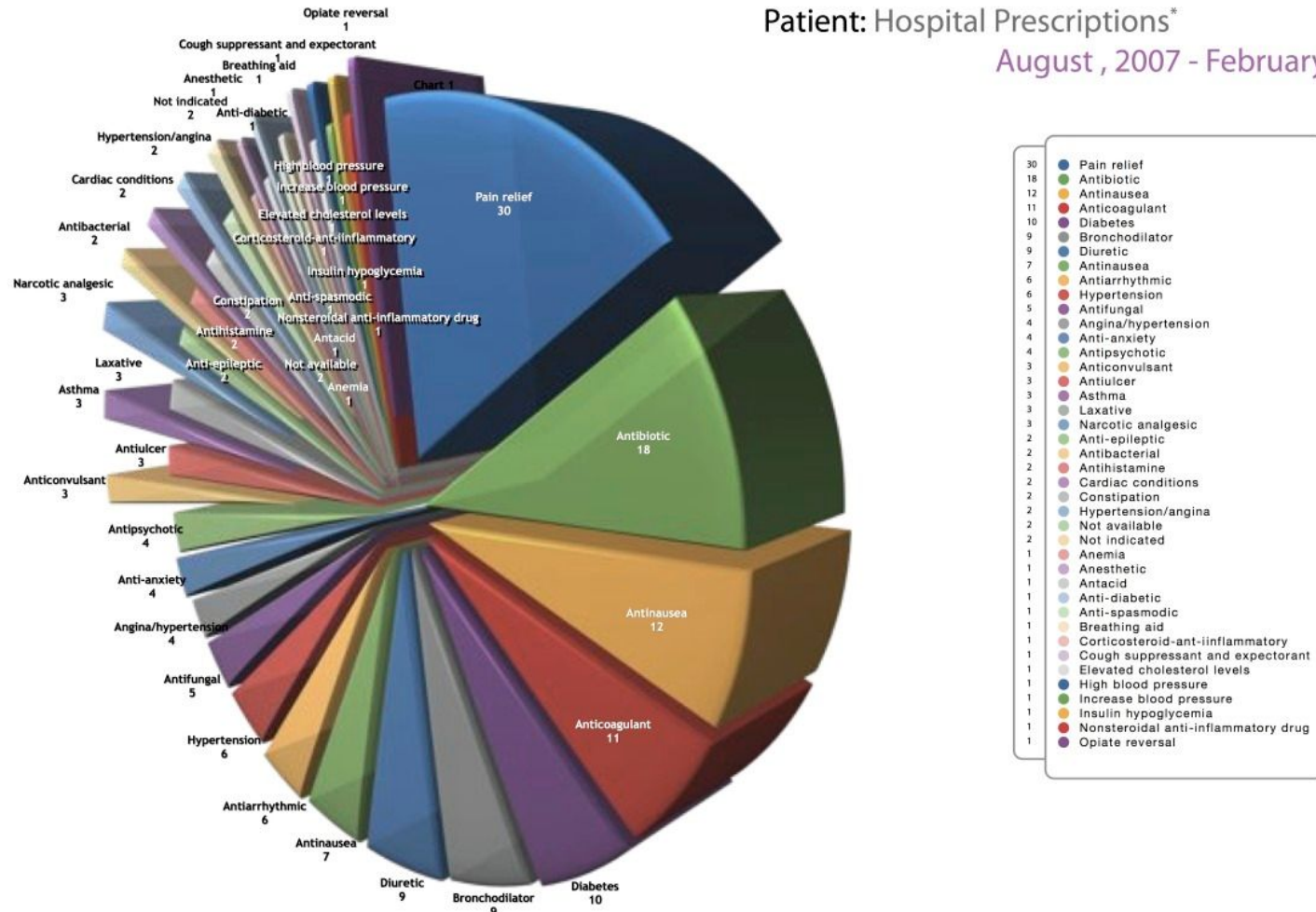


[Source](#)

Design Best Practices

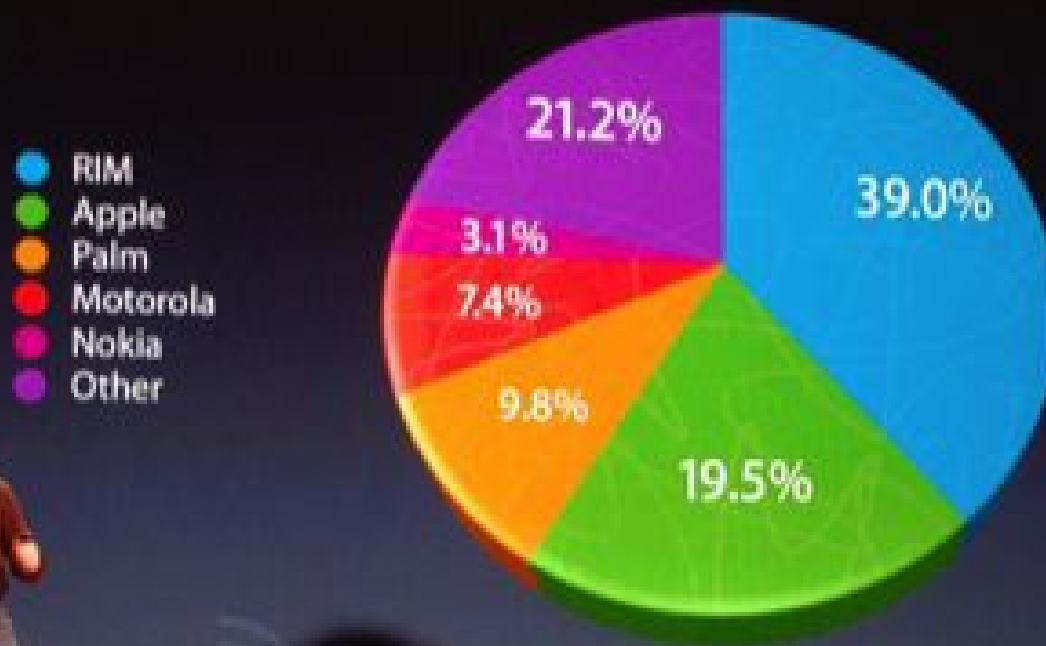
Patient: Hospital Prescriptions*

August, 2007 - February, 2008



Design Best Practices

U.S. SmartPhone Marketshare



Design Best Practices

Outputs Summary:



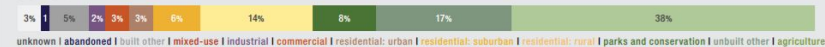
Abandonment doubles

More than 85% of new development is rural or suburban residential

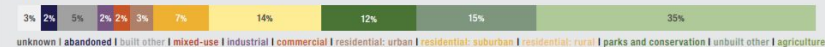
New development replaces agriculture and undeveloped land

Land Use (overall for region)

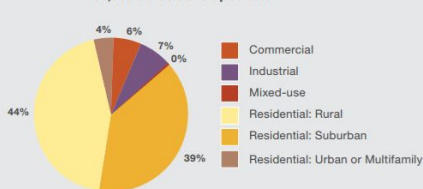
Current



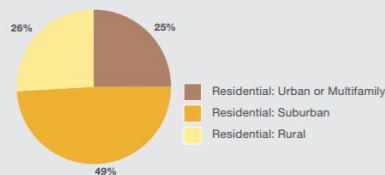
Trend



New Development Mix (acres)



New Housing Units

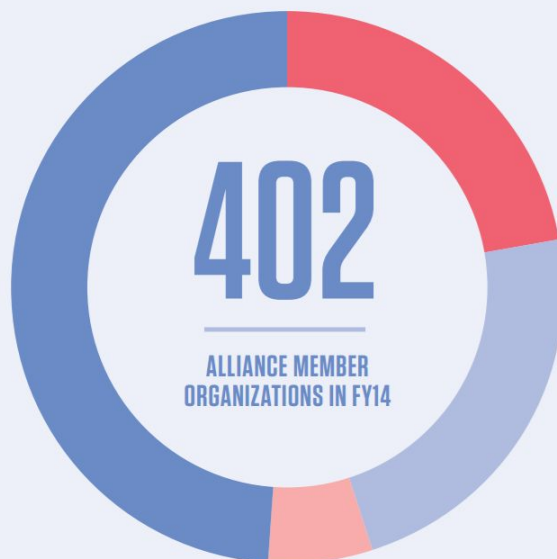


The "Trend" Scenario tests what the region might look like in 2040 if current development rates, patterns, and policies continue. On its current course, the region faces a future with intense outward migration away from its legacy cities, high rates of abandonment, and new development that is expensive for tax payers to build and maintain.

Neighborhoods and rural areas that have grown over the past two decades will continue to grow, while neighborhoods that have lost households over the past two decades will continue to see additional homes abandoned. The style of development in the scenario continues the current development trends in outlying areas. New development is predominately dispersed and auto-oriented: new homes are built on large, suburban lots; offices are located in separate office parks; and shopping is dispersed in strip mall style developments and big box stores. Because the new construction is not accompanied with matching regional population growth, it results in increased abandonment in legacy cities and some 1st ring suburbs and established towns. Public transit remains at current levels. Natural area conservation increases across the region.

Design Best Practices

MEMBERSHIP



49%
PERFORMING ARTS



23%
COMMUNITY ARTS &
ORGANIZATIONS



22%
MUSEUMS, VISUAL
ARTS & HISTORY



6%
SERVICE & OTHER

PROFESSIONAL DEVELOPMENT

The Alliance's professional development programs are among our most popular events, offering insights on best practices and latest trends.

In FY14 we offered two workshops around teen audience engagement in connection with the STAMP program, including the "Engaging Teens in the 21st Century" workshop in June 2014, featuring Danielle Linzer from the Whitney Museum of American Art. Other professional development highlights for FY14 included an April 2014 financial literacy workshop in partnership with the Nonprofit Finance Fund (NFF) and Cultural Data Project, which focused on using financial data to tell an organization's story.

On September 30, 2013, the Alliance held its Annual Member Meeting & Reception

at the Independence Seaport Museum in Philadelphia, attended by over 550 cultural sector workers and civic leaders. The meeting kicked off with an energizing performance by Powelton Steppers & Spiral Q, and Dr. William R. Hite Jr, the superintendent of the School District of Philadelphia, addressed the community about the state of arts education. Michael Norris, Interim Executive Director, presented on the theme "Leadership in Action," calling on the sector to encourage state Representatives and Senators to join the Cultural Caucus and pledge to create a dedicated regional fund for arts and culture.

501

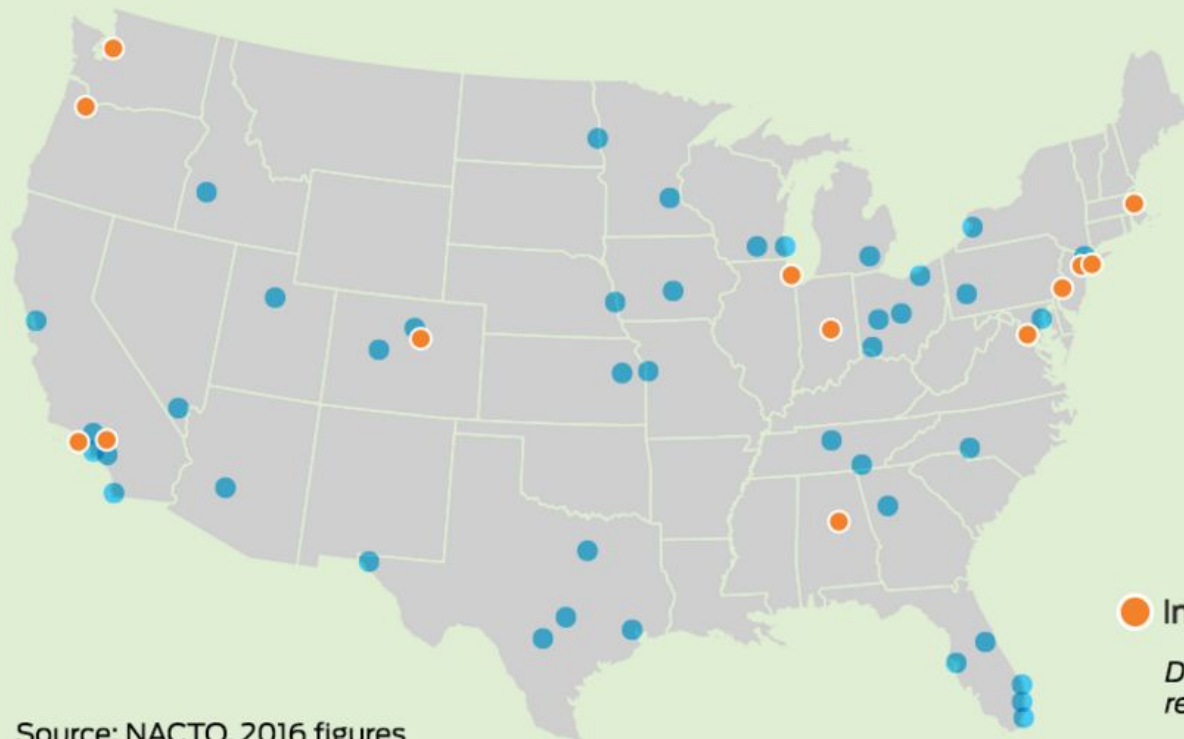
INDIVIDUALS ATTENDED
16 PROFESSIONAL
DEVELOPMENT EVENTS

550+

CULTURAL SECTOR
WORKERS & CIVIC
LEADERS ATTENDED
2013 ANNUAL MEETING

Maps & Graphics

Income-based Subsidy in US Bike Share Systems



24%

HAVE A DISCOUNT PROGRAM

● Income-based Subsidy Available

Defined as using income thresholds or residence in affordable housing as criteria

Source: NACTO, 2016 figures

Takeaways: Sharing Your Story

By applying good design principles in your data visualizations, you can:

- Raise awareness for your cause in a scalable way with limited time and money
- Help your message and brand go viral on social media
- Resonate with donors, funders, and board members by visualizing the need and the impact of your organization's work



Well-designed maps and data visualizations can help you:



Target and tailor your outreach
campaigns



Identify who can and can't access
your services




Show how a policy benefits or
harms your audience



Target the right elected officials
and their constituents



Make your message go viral with
limited resources



Good tools are only as good as
their operators!

If it's a complex project you might need a
professional

Summary of Takeaways

- Maps and data visualizations can help you:
 - Target and tailor your outreach campaigns
 - Identify who can and can't access your services
 - Show how a policy benefits or harms your audience
 - Target the right elected officials and their constituents
 - Make your message go viral with limited resources
- You may need a professional for complex projects

Next Steps

Want to learn more about how to become a data-driven nonprofit?

- [Sign up](#) to receive email notifications about things like future webinars and tutorials.

Don't know where to start? Check out Map Readiness

- Talk to us at analytics@azavea.com and we can help you develop some project ideas to make your organization more data-driven.

Got an idea for a data analysis project?

- Shoot us an email at analytics@azavea.com to discuss how we can help.

Thank you for attending!

Any Questions?

Email: analytics@azavea.com

Web: analytics.azavea.com

Twitter: [@azavea](https://twitter.com/azavea)