



SCAUG2010



# Funding Prioritization for Planned Multi-Use Trails and On-Street Bikeways in the Tulsa Area

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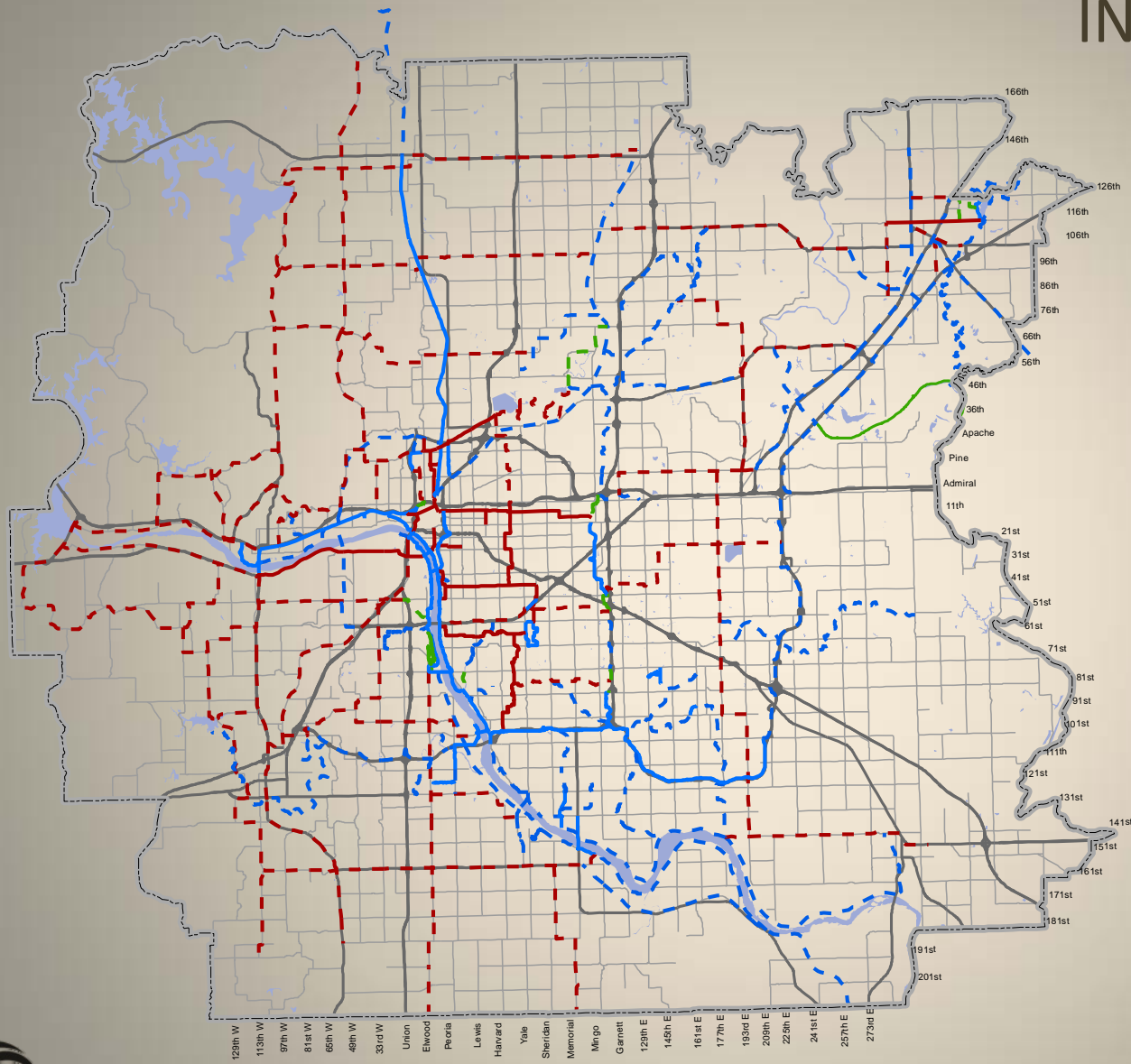


# Introduction







- Where are we?
- Where should we focus on our trails system?
- What areas are underserved?



# INCOG Regional Trail System

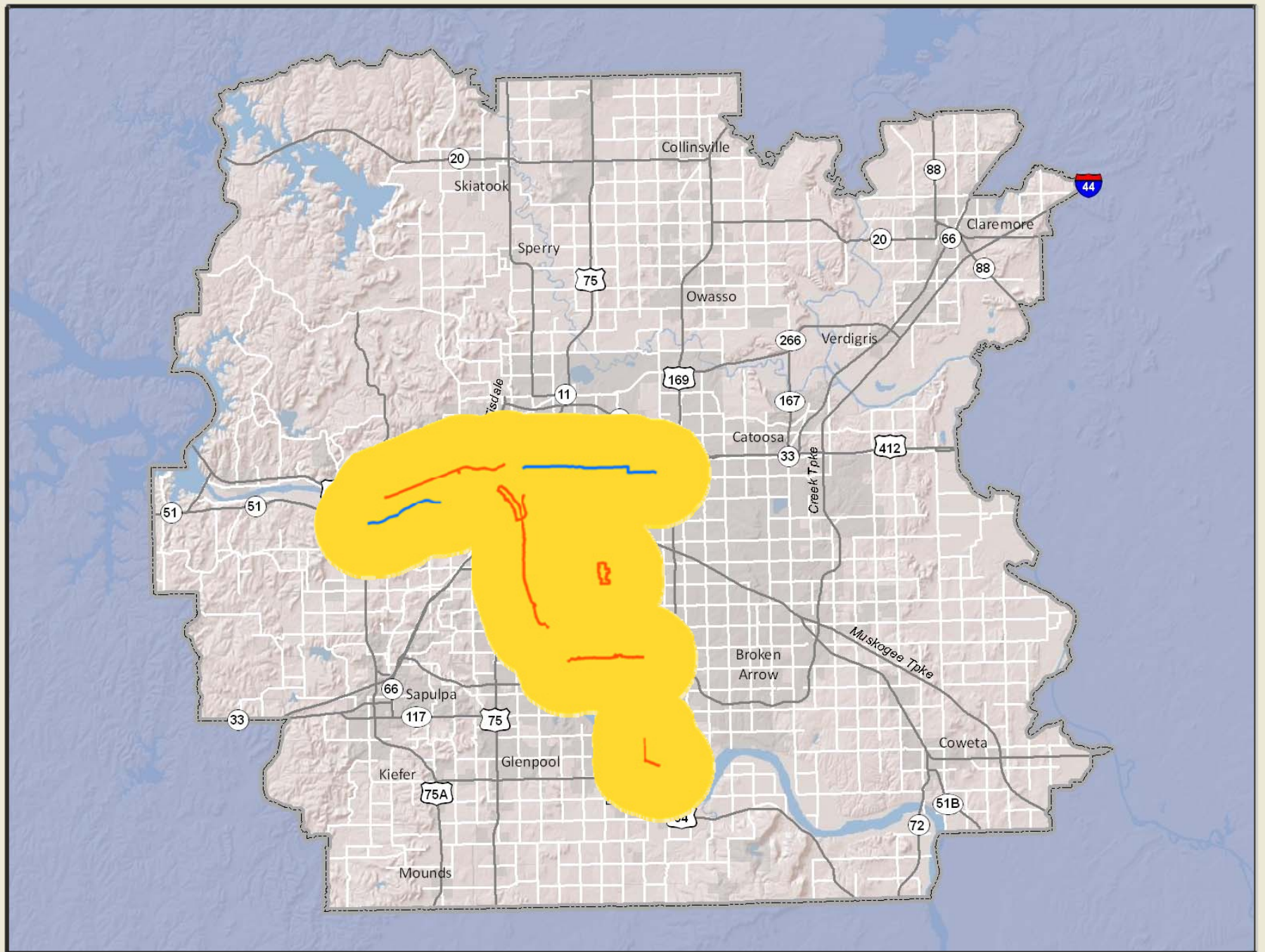


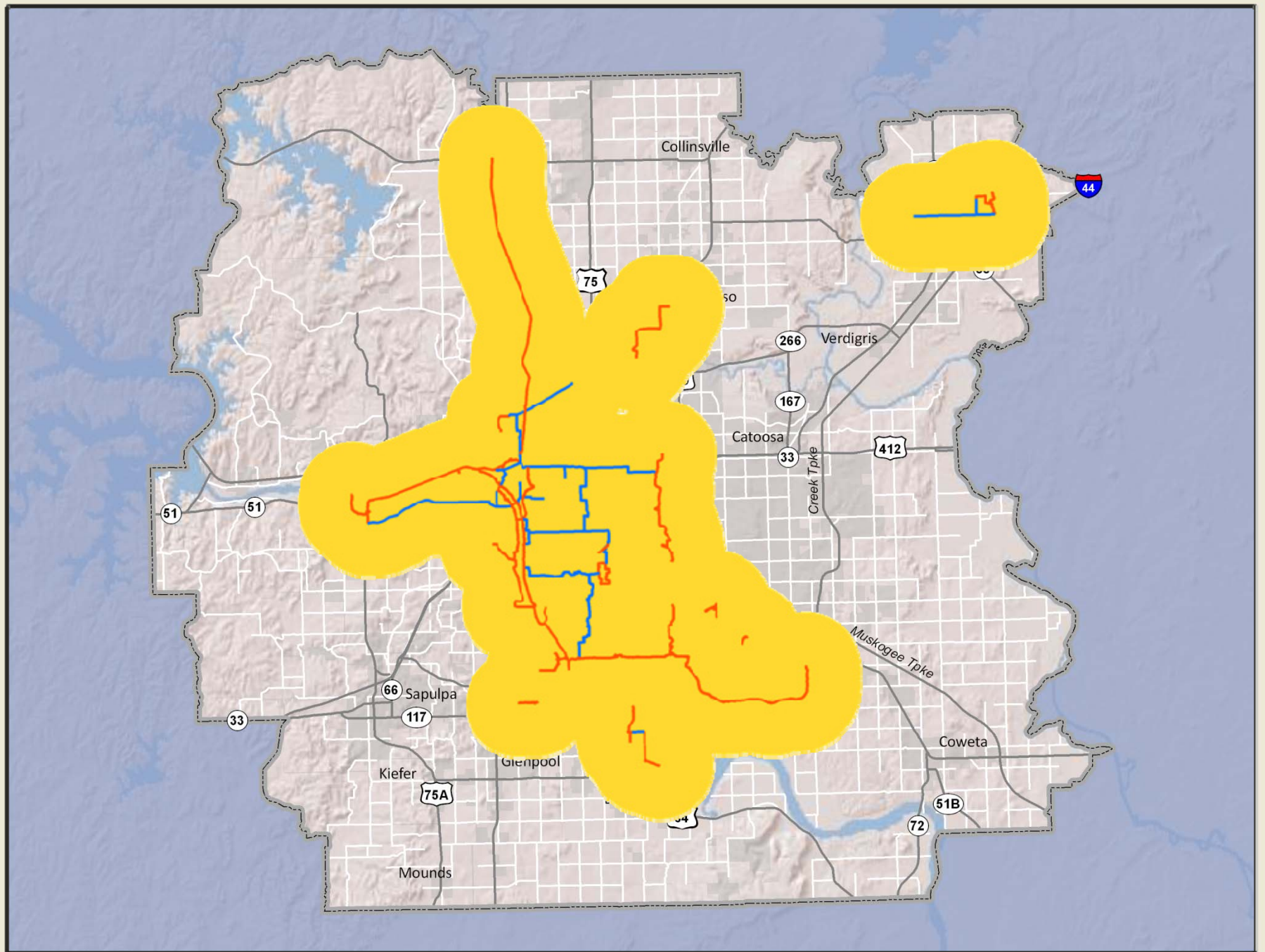
## Trail Type

-  Existing Bikeway/Bike Lane
-  Existing Multi-Use Trail
-  Existing Unpaved Trail
-  Funded Trail Project
-  Planned Bikeway
-  Planned Multi-Use Trail











# Environmental Justice (EJ)– What and Why?

- ***Environmental Justice Area*** – a population within the TMA that encompasses a majority percentage of minorities, racial groups, low income, elderly, youth between ages of 5 to 17 and or persons with disabilities.
- ***Title VI of the 1964 Civil Rights Acts*** – prohibits intentional discrimination as well as any discriminatory policy or practice that has a negative impact on those groups.



# EJ Issues

## Examined:

- Low Income Concentrations
- Minority Concentrations
- Seniors aged 65 + Concentrations
- Persons with Disabilities Concentrations
- Youth ages 5 to 17 Concentrations



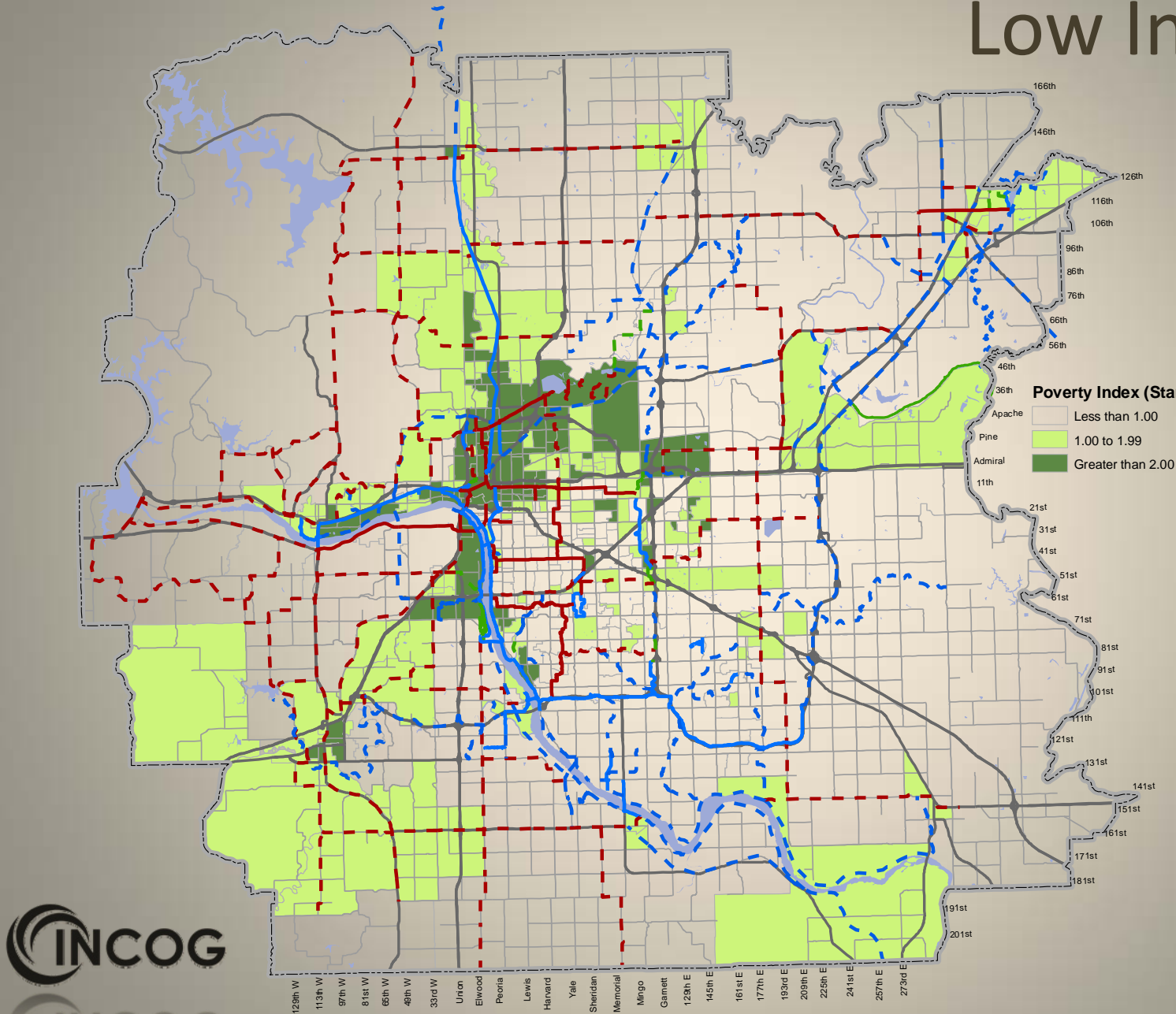
## Analysis:

- Intersections of EJ issues
- Planned trails outside the 1 mile buffer of existing trails but within the EJ intersections
- Feasibility Considerations





# Low Income



## Trail Type

- Existing Bikeway/Bike Lane
- Existing Multi-Use Trail
- Existing Unpaved Trail
- Funded Trail Project
- Planned Bikeway
- Planned Multi-Use Trail

## Poverty Index (Standard Deviation)

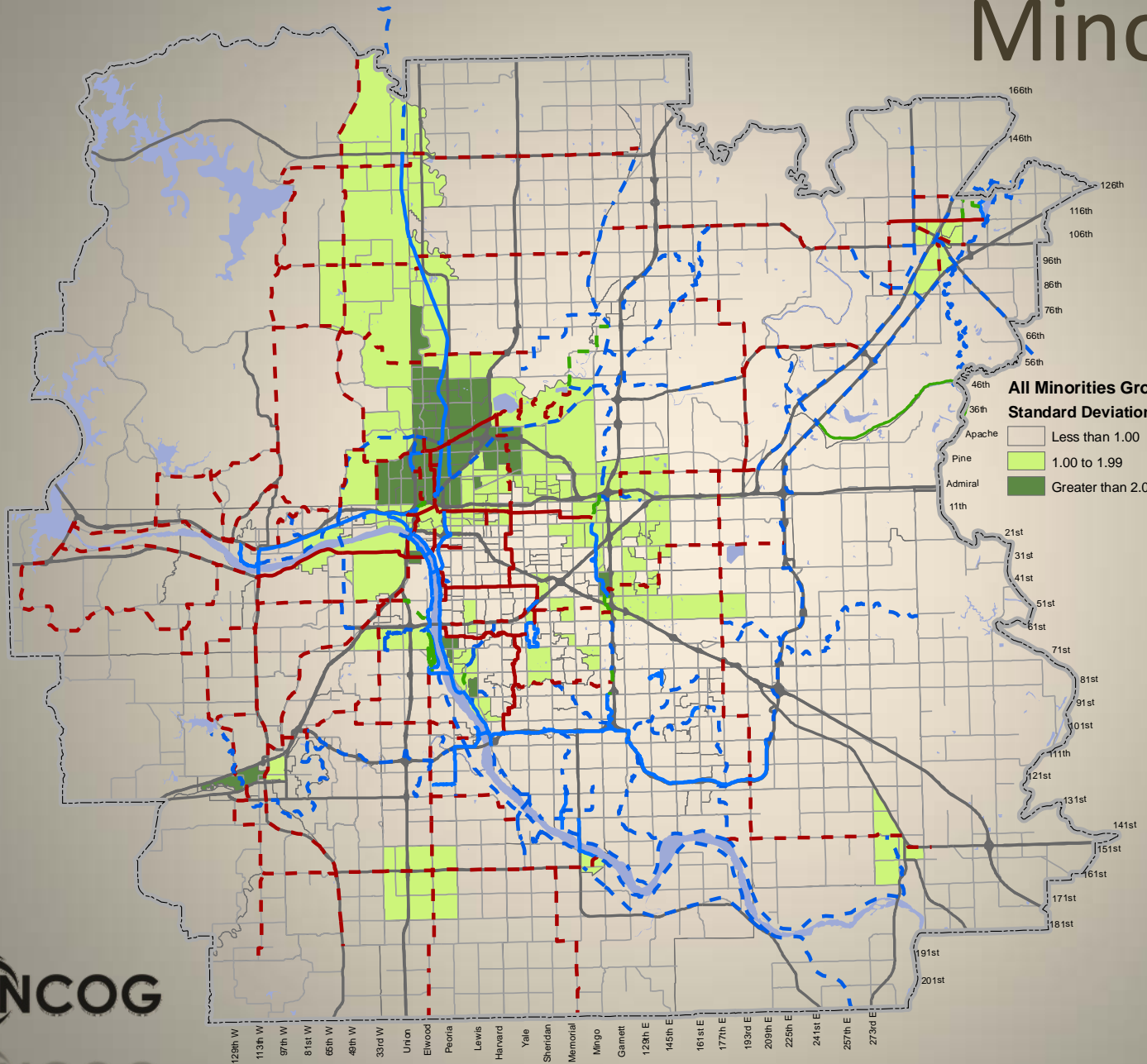
- Less than 1.00
- 1.00 to 1.99
- Greater than 2.00

EJ maps illustrate block groups whose concentrations are greater than the TMA average

Dark green shows the highest concentration of persons below poverty



# Minorities



## Trail Type

- Existing Bikeway/Bike Lane
- Existing Multi-Use Trail
- Existing Unpaved Trail
- - - Funded Trail Project
- - - Planned Bikeway
- - - Planned Multi-Use Trail

## All Minorities Grouped together

### Standard Deviation







- Less than 1.00
- 1.00 to 1.99
- Greater than 2.00

Block groups whose minority concentrations are greater than the TMA average are highlighted. Dark green shows the areas of highest concentrations.






# Elderly 65 +

## Trail Type

-  Existing Bikeway/Bike Lane
-  Existing Multi-Use Trail
-  Existing Unpaved Trail
-  Funded Trail Project
-  Planned Bikeway
-  Planned Multi-Use Trail

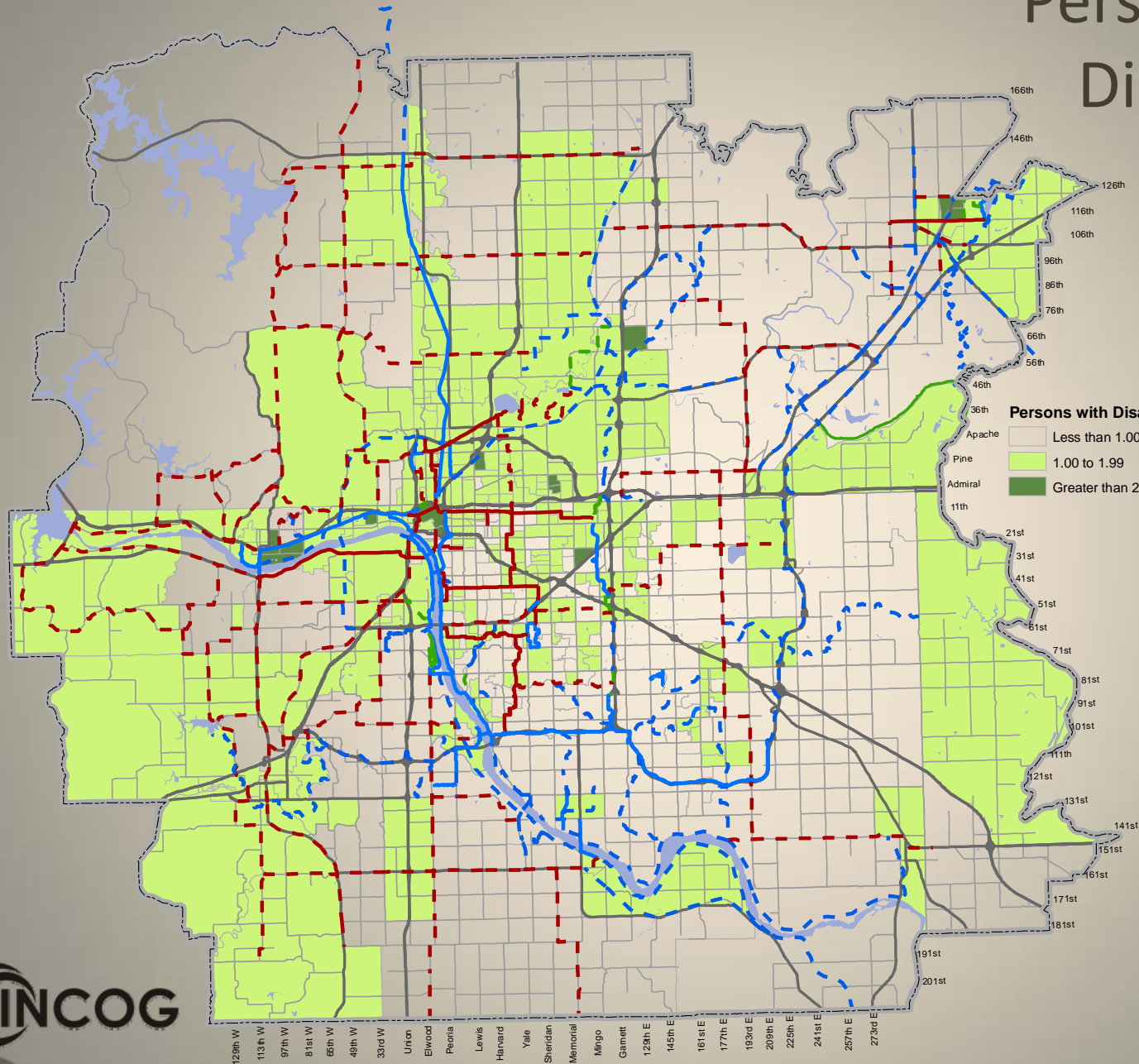
## Elderly 65 & Over Standard Deviation

-  Less than 1.00
-  1.00 to 1.99
-  Greater than 2.00

Block groups whose senior concentrations are greater than the TMA average are illustrated. Dark green shows the areas of highest concentrations of populations aged 65 & over



# Persons with Disabilities



## Trail Type

- Existing Bikeway/Bike Lane
- Existing Multi-Use Trail
- Existing Unpaved Trail
- - - Funded Trail Project
- - - Planned Bikeway
- - - Planned Multi-Use Trail

## Persons with Disabilities

- Less than 1.00
- 1.00 to 1.99
- Greater than 2.00







Block groups whose concentrations of persons with disabilities are greater than the TMA average are illustrated. Dark green shows the highest concentrations of populations with disabilities.








# Youth Ages 5-17

## Trail Type

-  Existing Bikeway/Bike Lane
-  Existing Multi-Use Trail
-  Existing Unpaved Trail
-  Funded Trail Project
-  Planned Bikeway
-  Planned Multi-Use Trail

## Youth Ages 5 - 17

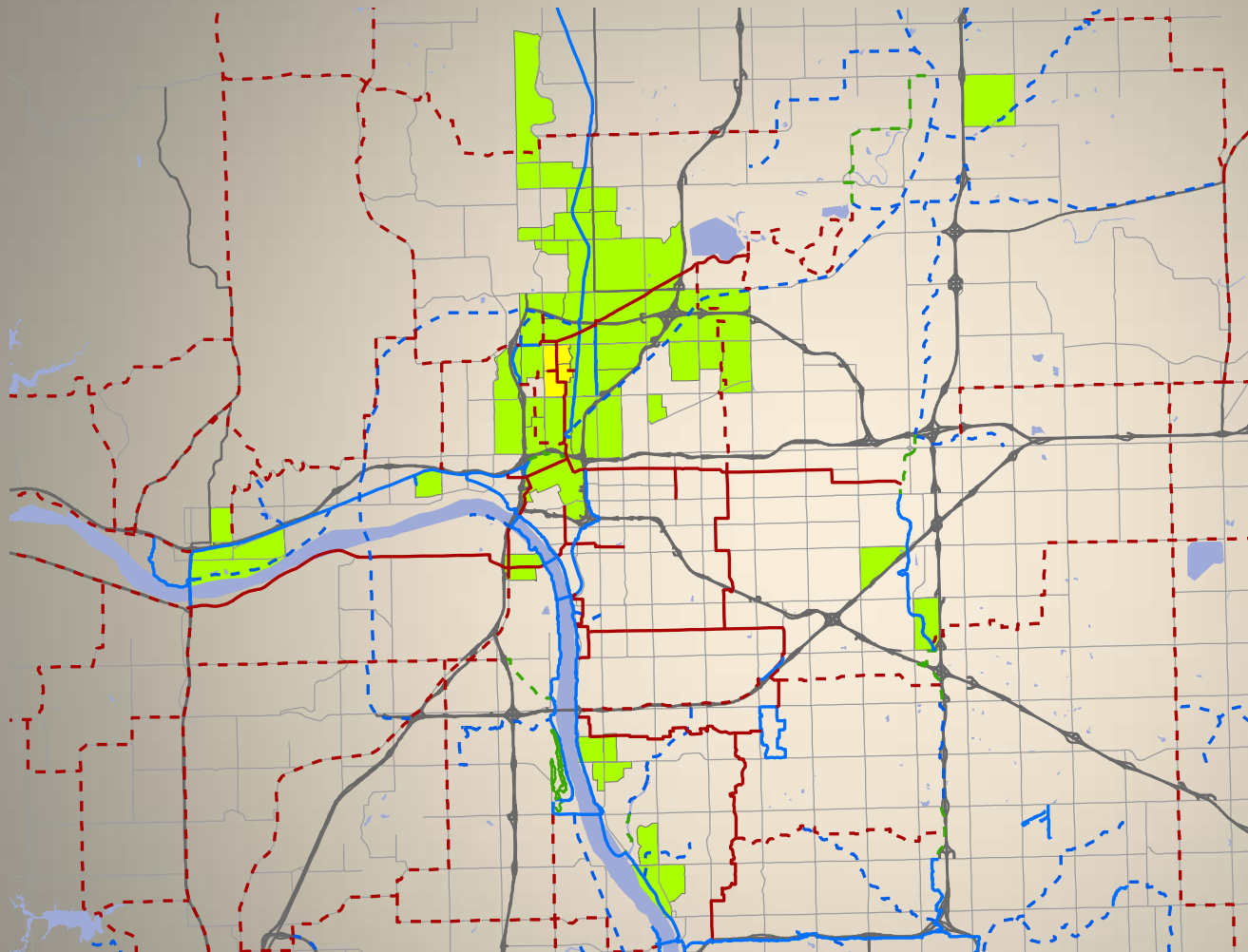
### Standard Deviation

-  Less than 1.00
-  1.00 to 1.49
-  Greater than 1.50

Block groups whose concentrations of youth are greater than the TMA average are illustrated. Dark green shows the areas of highest concentrations of youth ages 5 – 17.



# EJ Intersections

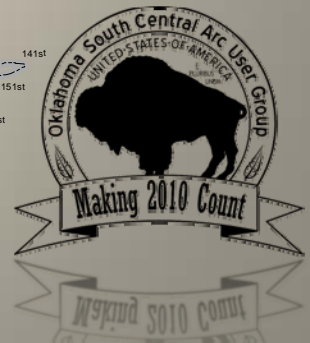
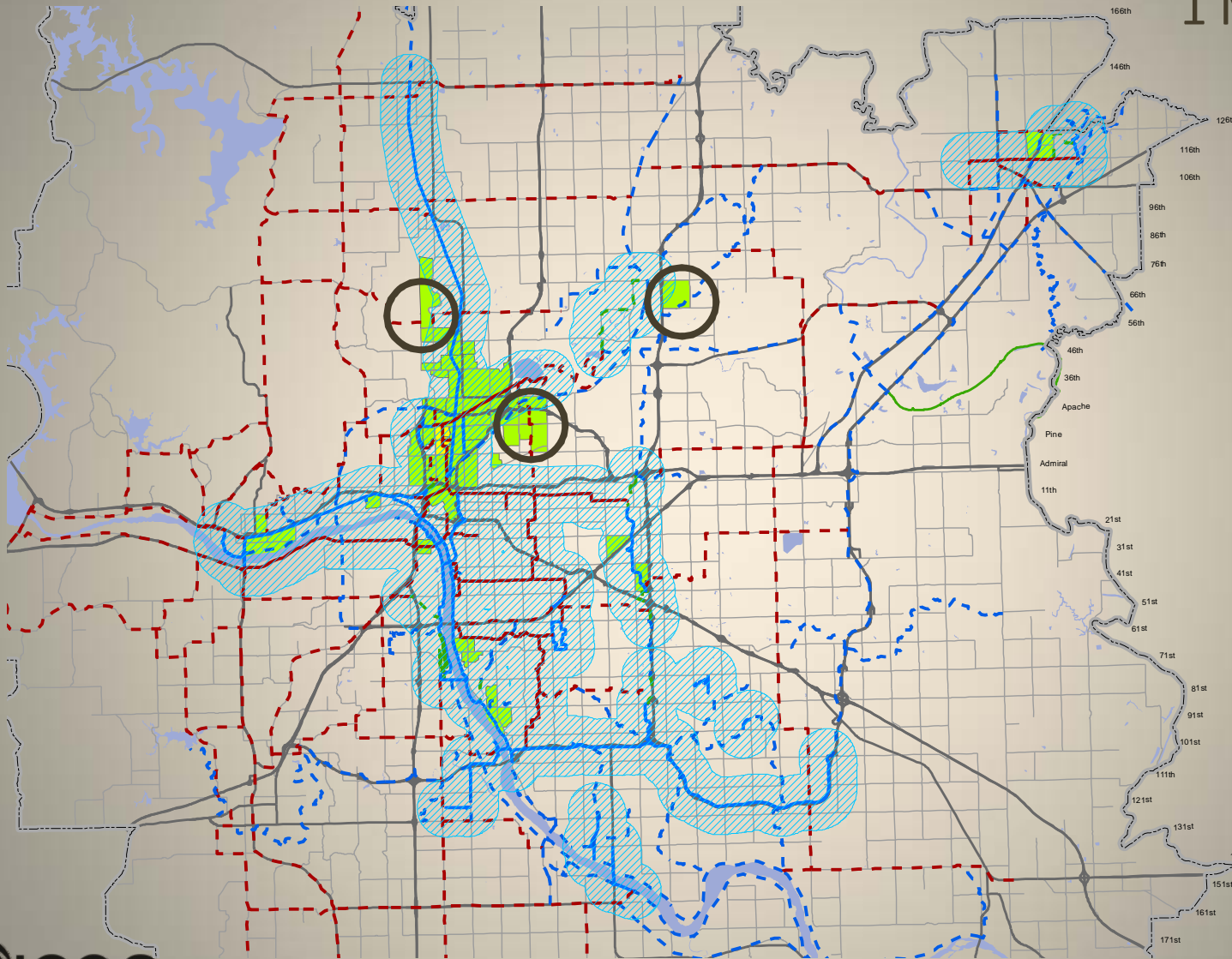


For each EJ issue we looked at those with index scores greater than 2. All of these EJ issues were then laid atop one another and an intersection operation was performed. This process identified 2 block groups that met 3 out of the 4 criteria. None of the block groups had all 4 issues and several others met at least two issues.

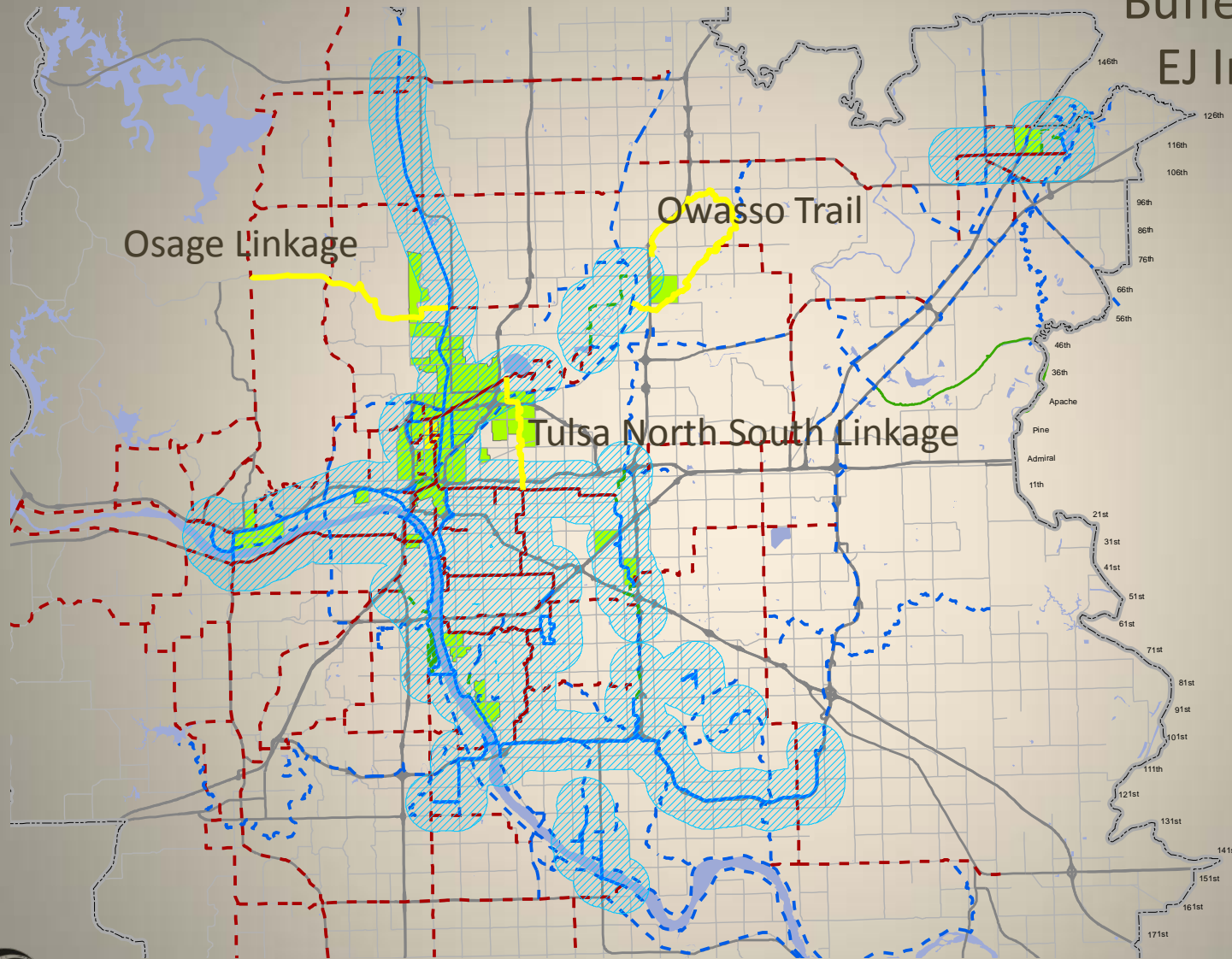
The bright yellow shows the 2 block groups that met 3 out of the 4 which were elderly, poverty, and minorities.

- 3 Intersections (Elderly, Poverty, Minority)
- 2 Intersections

# Existing Trails with 1 Mile Buffer



# Planned Trails Outside Buffer but within EJ Intersections





# Feasibility Considerations

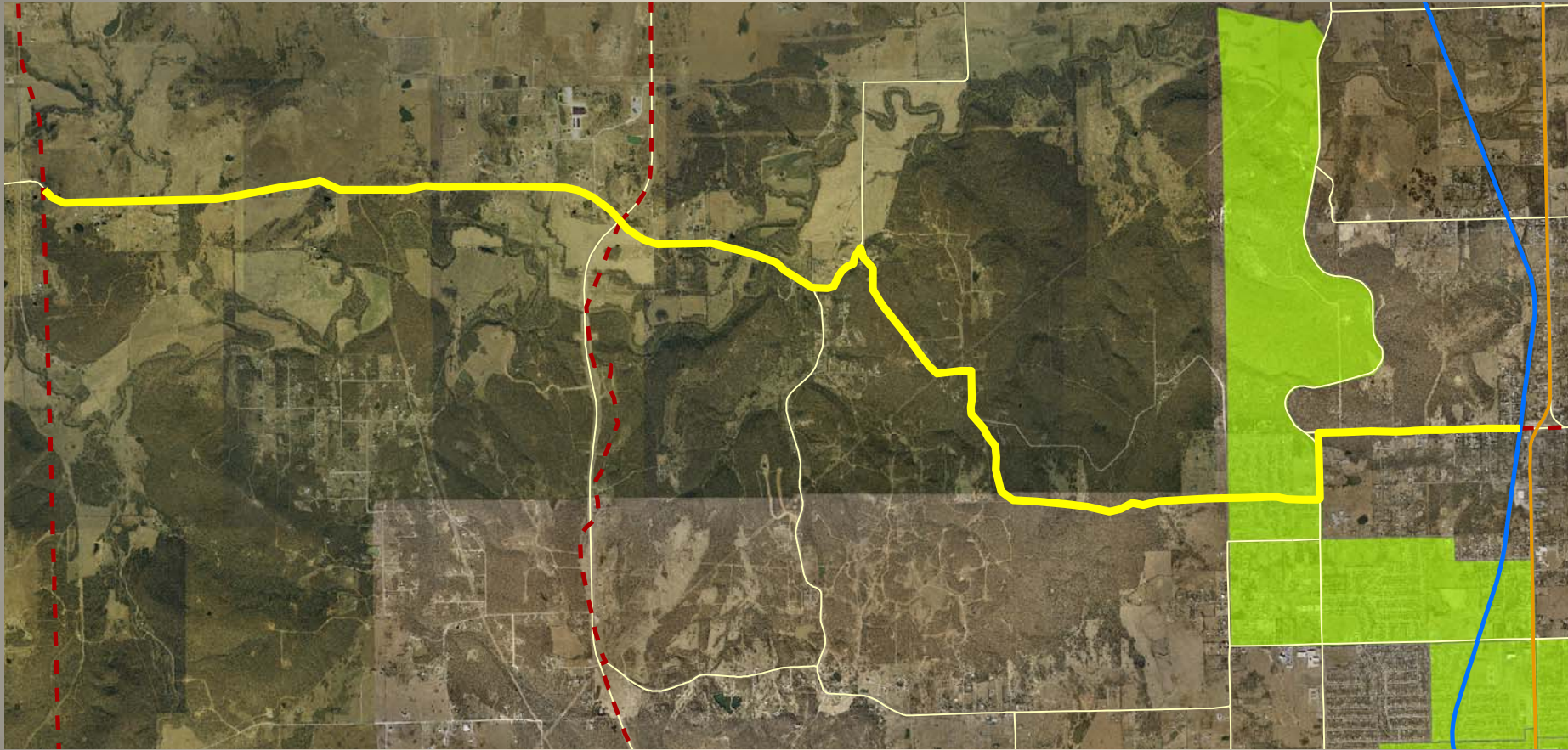
- Cost
- Highway Barriers
- Connectivity
- Existing Sidewalks
- Right of Way
- Community Connector
- Population Served
- Employment
- Schools
- Tulsa Transit Route Proximity

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- Pavement Conditions for bikeway
  - Signalization/crosswalk on major arterials or railroads
  - Traffic Counts
  - Sight Distance at crossings (major arterials)
  - Speeds on major arterials at crossings

Factors	Osage Linkage	Owasso Trail	Tulsa North South Linkage
Highway Barriers	1	2	1
Connectivity	2	3	1
Right of Way	1	3	1
Population Served	3	2	1
Employment	3	1	2
Schools	3	1	2
Transit Routes	2	3	1
<b>Totals</b>	<b>15</b>	<b>15</b>	<b>9</b>



## Osage Linkage



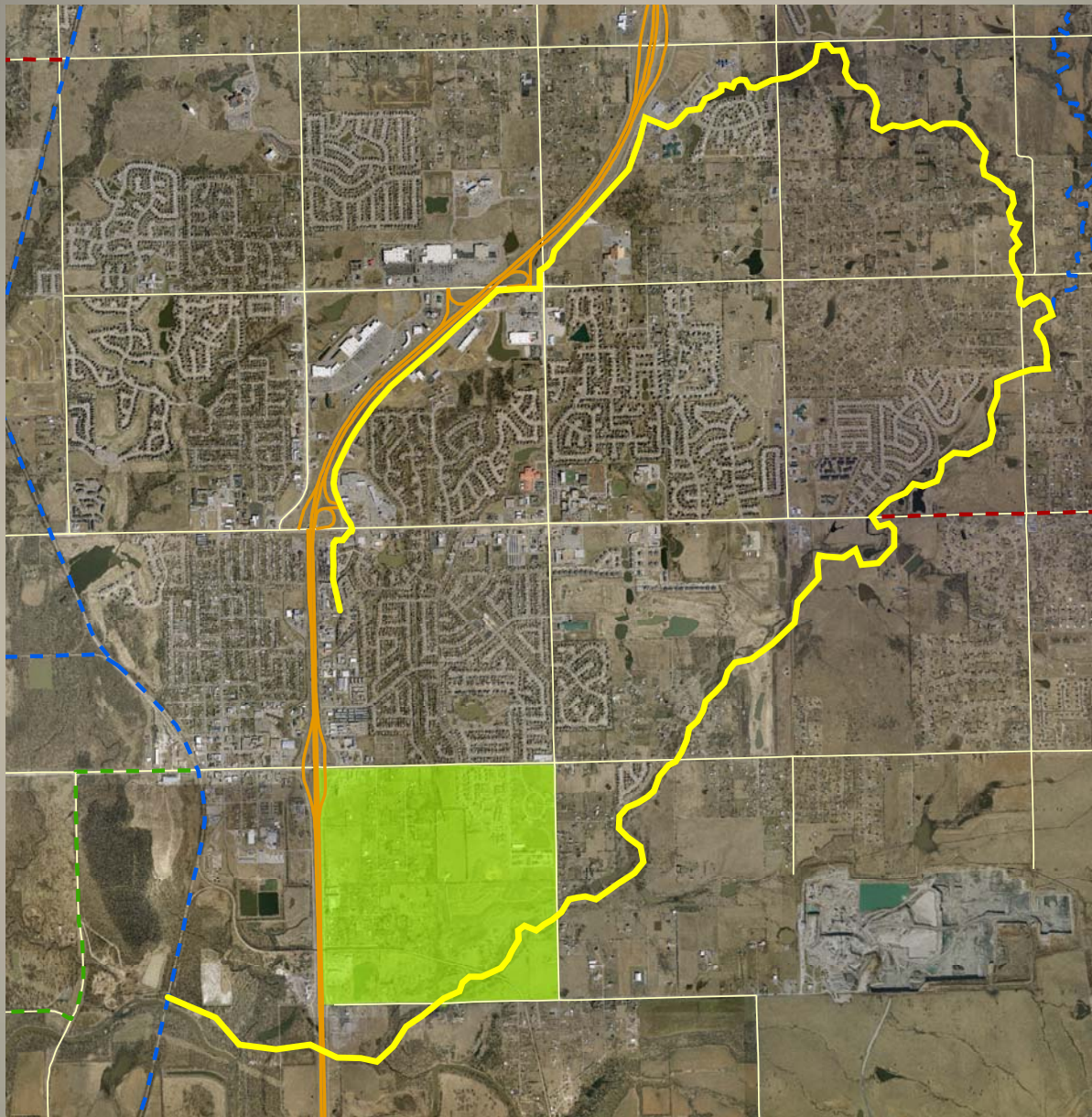
- Low population
- Low employment
- One connection
- Few schools served
- Limited transit access





# Owasso Linkage

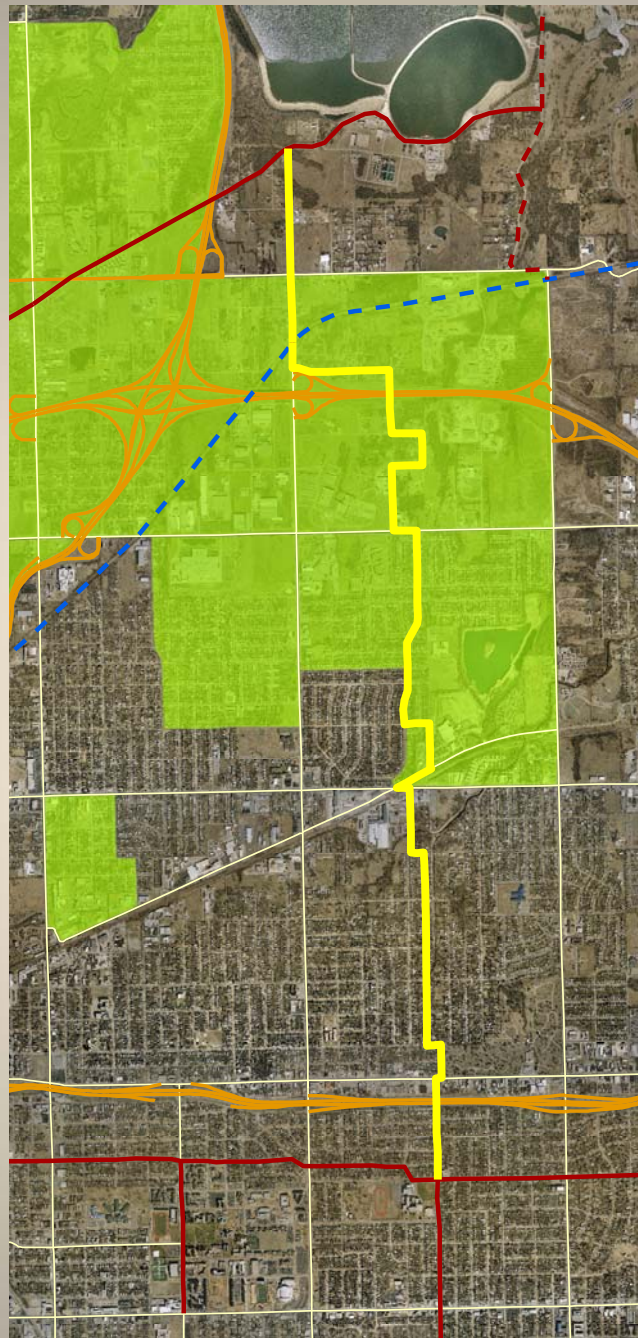
- No connection
- No transit access
- High cost for right of way purchases
- Coordination with ODOT





## Tulsa North South Linkage

- Serves nearly 40,000
- Has connectivity on both ends to existing trails
- No highway barriers
- No right of way acquisitions
- Served well by transit





# Tulsa North South Linkage Video

Watch the Video at:

<http://www.youtube.com/watch?v=OSYaQ9osNsw>

