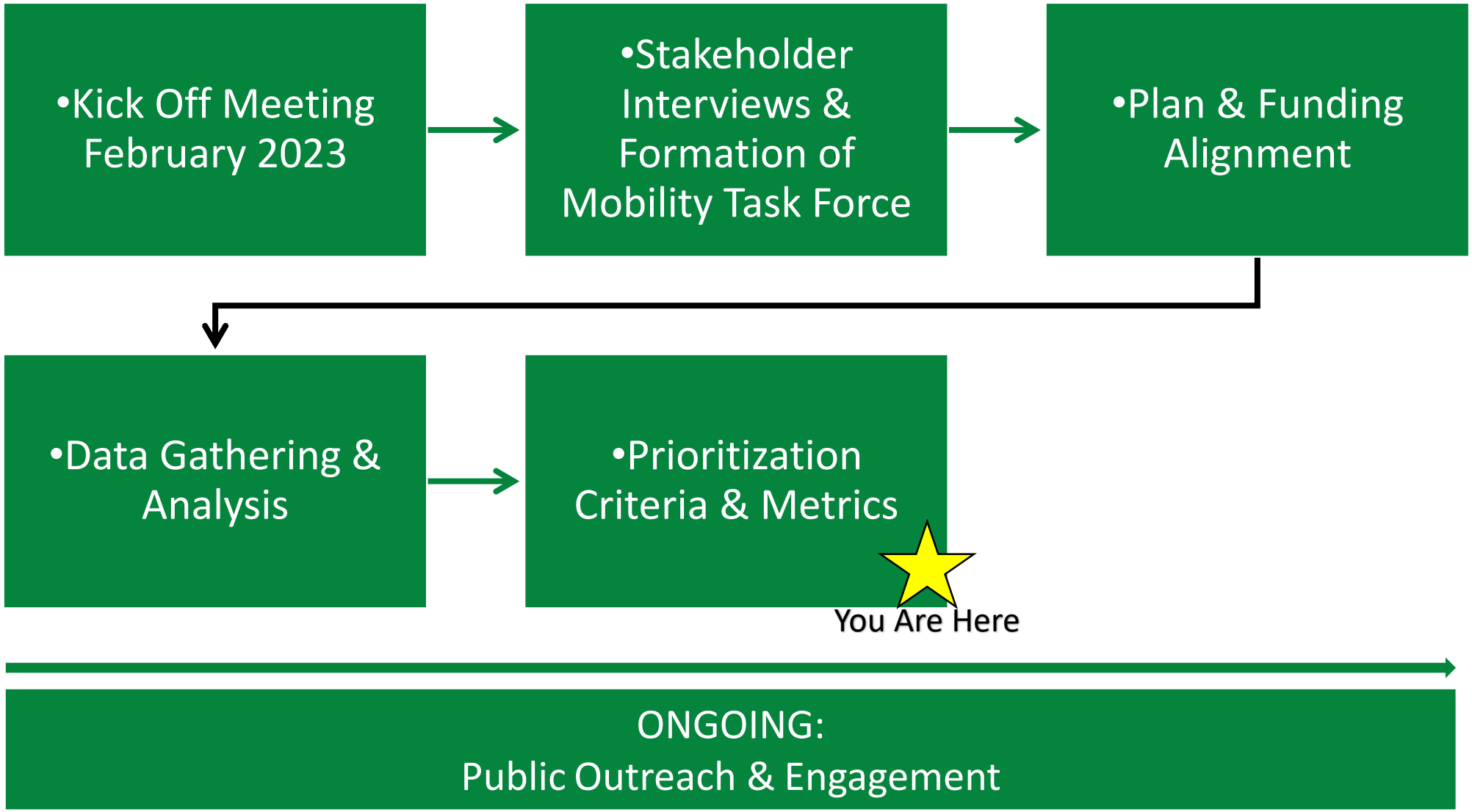
Lake Worth Beach Mobility Plan

Commission Work Session

January 22, 2024

Status Update



Public Outreach Summary

Community Workshop

April 2023

Mobility Task Force “Walkshop”

September 2023

Dia De Los Muertos Outreach Event

October 2023

Data Sources and Best Practices

Data Category/Type	Source/s
Crash Data in GIS format	Signal 4 Analytics (Statewide Repository)
Transportation Infrastructure	Palm Beach County, FDOT
Land Use, Zoning, and Ownership	City of Lake Worth Beach, Florida Geographic Data Library
Demographic and Environmental	US Census Bureau, US DOT
Regional Transportation Projects	Palm Beach County, Palm Beach County Transportation Planning Agency, City of Lake Worth Beach*

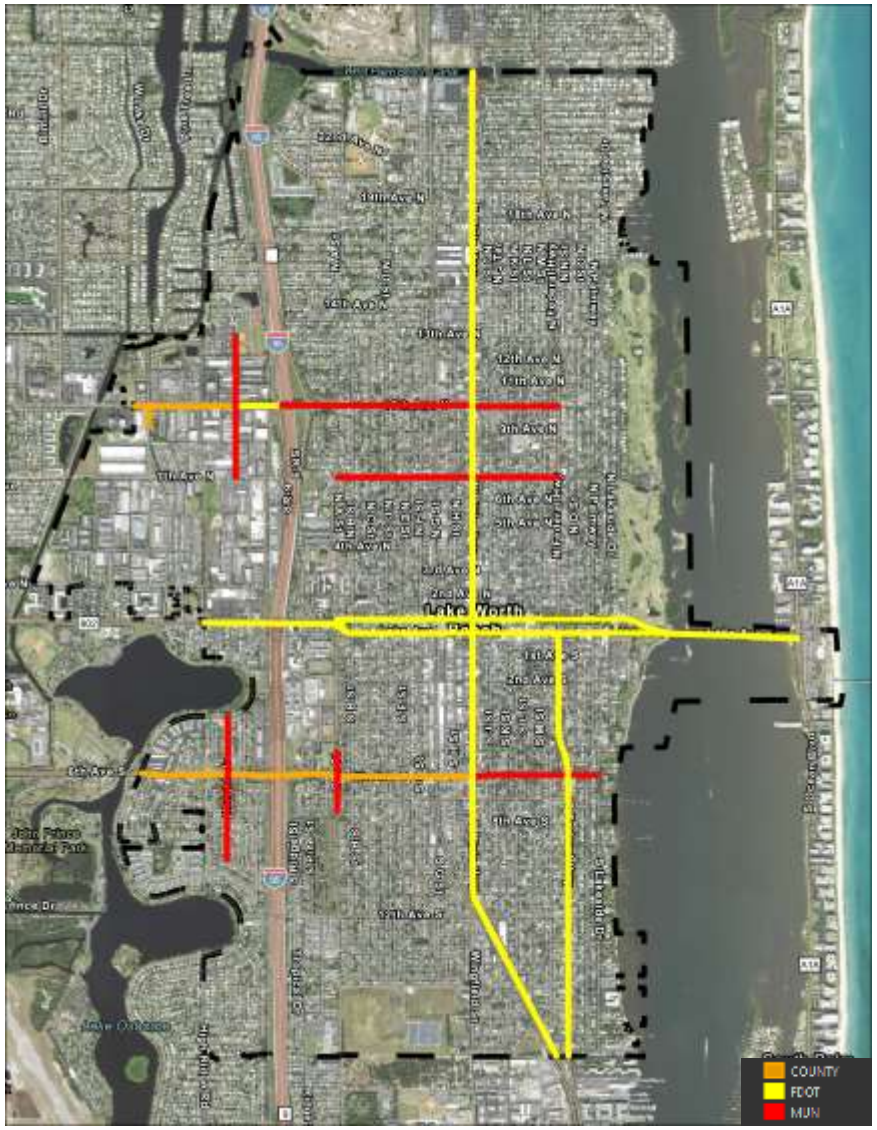
*to be provided to Study Team once finalized by City

Data Sources and Best Practices

Data Review and Collection → Data Clean up and Formatting → Data Analysis and Visualization

ITERATIVE STAGE

High Injury Network (HIN)



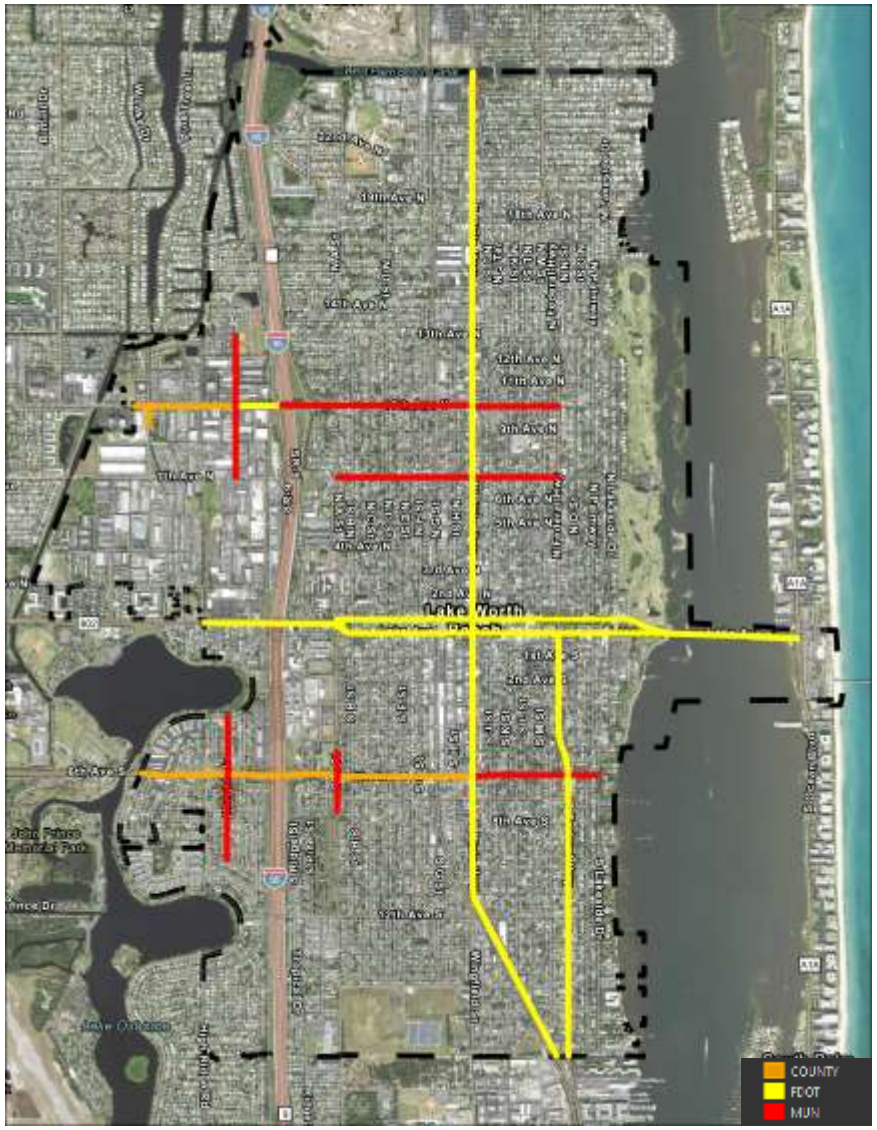
What is the HIN?

*The HIN represents the roads with the highest frequency of crashes **AND** the most severe crashes.*

How can the City use the HIN?

The City can use the HIN to further understand where the most severe crashes are happening the most.

High Injury Network (HIN)



Each individual street within the City was evaluated based on the following variables:

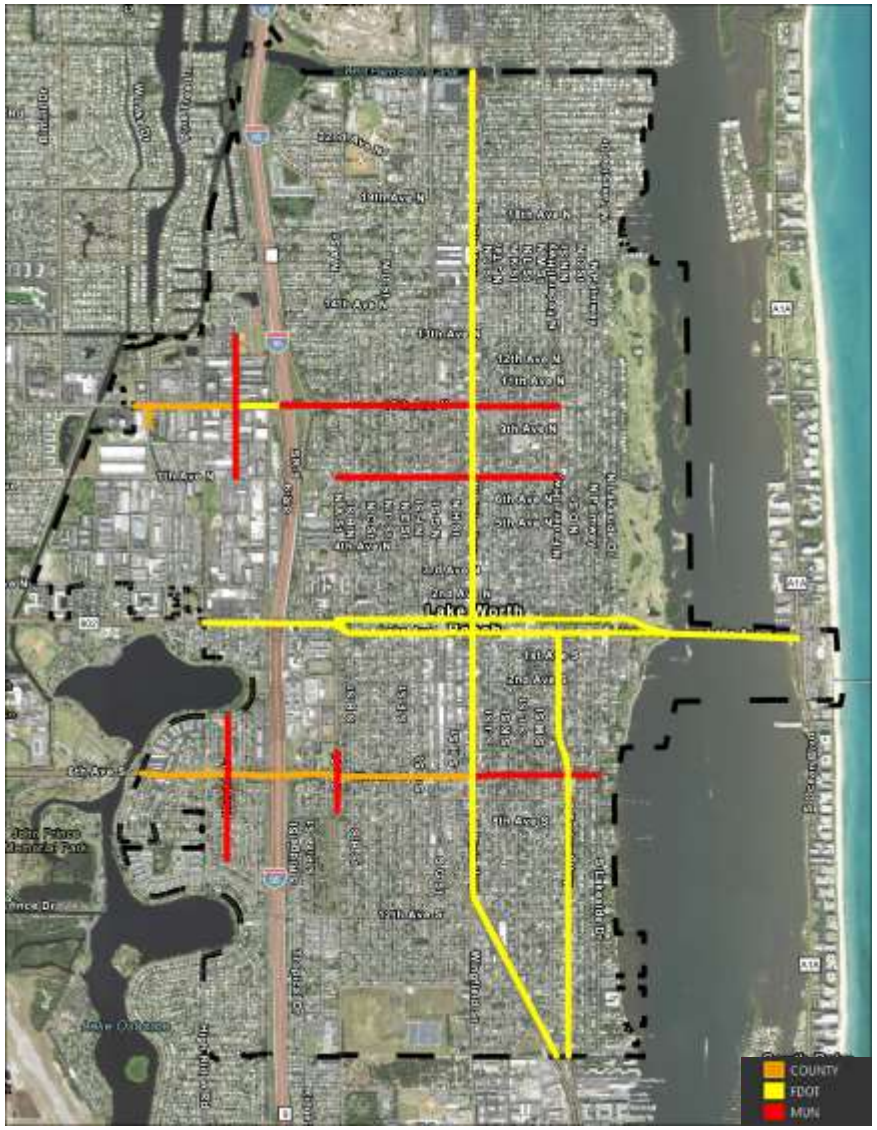
1) Crash Severity of all Crashes on Street.
   - Scaled 1 to 6, with 6 being crashes with Fatalities and 1 being crashes with No Injury.

2) Raw Crash Frequency of all Crashes on Street.
   - Frequency was used to derive crash rate per ¼ mile for each street.

3) Crash rate and Crash severity variables were combined to derive a High Injury Network score.

4) All streets scoring 1 standard deviation from the mean HIN score of the full dataset were selected as the City's HIN.

High Injury Network (HIN)



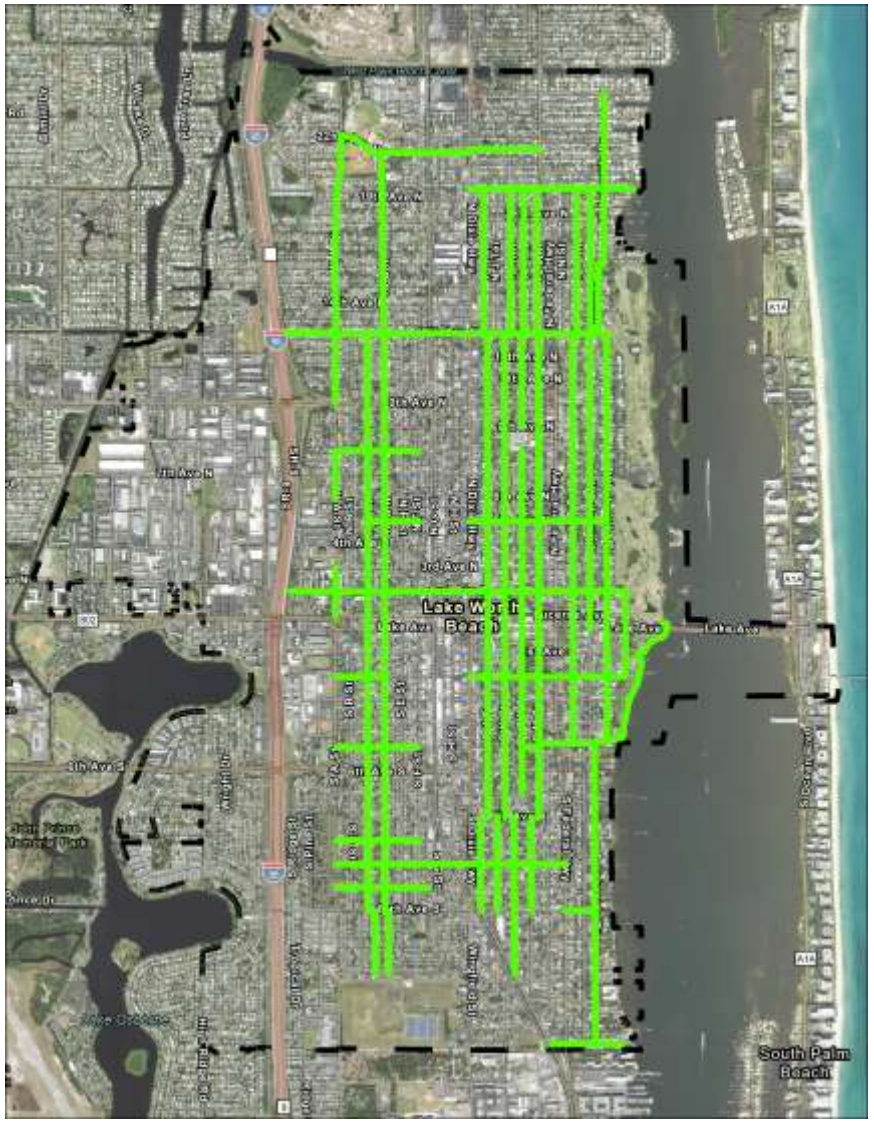
STREET	Responsible Authority	Speed Limit	Lanes	Crash Count	Average Severity	HIN Score
10th Ave N	COUNTY	40	2	136	1.50	269.62
10th Ave N	COUNTY	40	5	114	1.43	238.38
Boutwell Rd	COUNTY	35	2	41	1.46	218.36
10th Ave N	FDOT	40	5	94	1.46	212.84
LWB Circle	FDOT	25	2	54	1.22	208.76
10th Ave N	MUN	35	4	331	1.55	189.80
6th Ave S	COUNTY	35	4	300	1.651	186.61
N Dixie Hwy	FDOT	35	4	814	1.77	181.48
S A St	MUN	35	2	100	1.41	166.39
S Dixie Hwy	FDOT	35	4	466	1.93	143.94
Lucerne Ave	FDOT	25	2	427	1.51	136.47
Lake Ave	FDOT	25	2	377	1.39	111.04
6th Ave S	COUNTY	45	4	118	1.72	98.97
10th Ave N	MUN	25	2	74	1.47	89.29
7th Ave N	MUN	25	2	156	1.61	80.38
Lake Worth Rd	FDOT	35	4	134	2.17	79.74
S Federal Hwy	FDOT	35	2	253	1.64	69.13
6th Ave S	MUN	25	4	53	1.70	66.72
Barnett Dr	MUN	25	2	90	1.45	64.87
Wright Dr	MUN	25	2	58	2.25	63.96
6th Ave S	MUN	25	2	39	0.64	59.46

Low-Stress Bike Network

The Low-Stress Bike Network utilizes the exact same* methodology as the HIN, with a few added variables.

Each individual street under City control was evaluated based on the following variables:

1) Crash Severity (from HIN).
2) Crash Frequency and Rate (from HIN).
3) Posted Speed Limit (new).
4) Number of Lanes (new).
5) Planned Palm Beach County Transportation Planning Agency Bicycle Priority Network Connectivity (new).



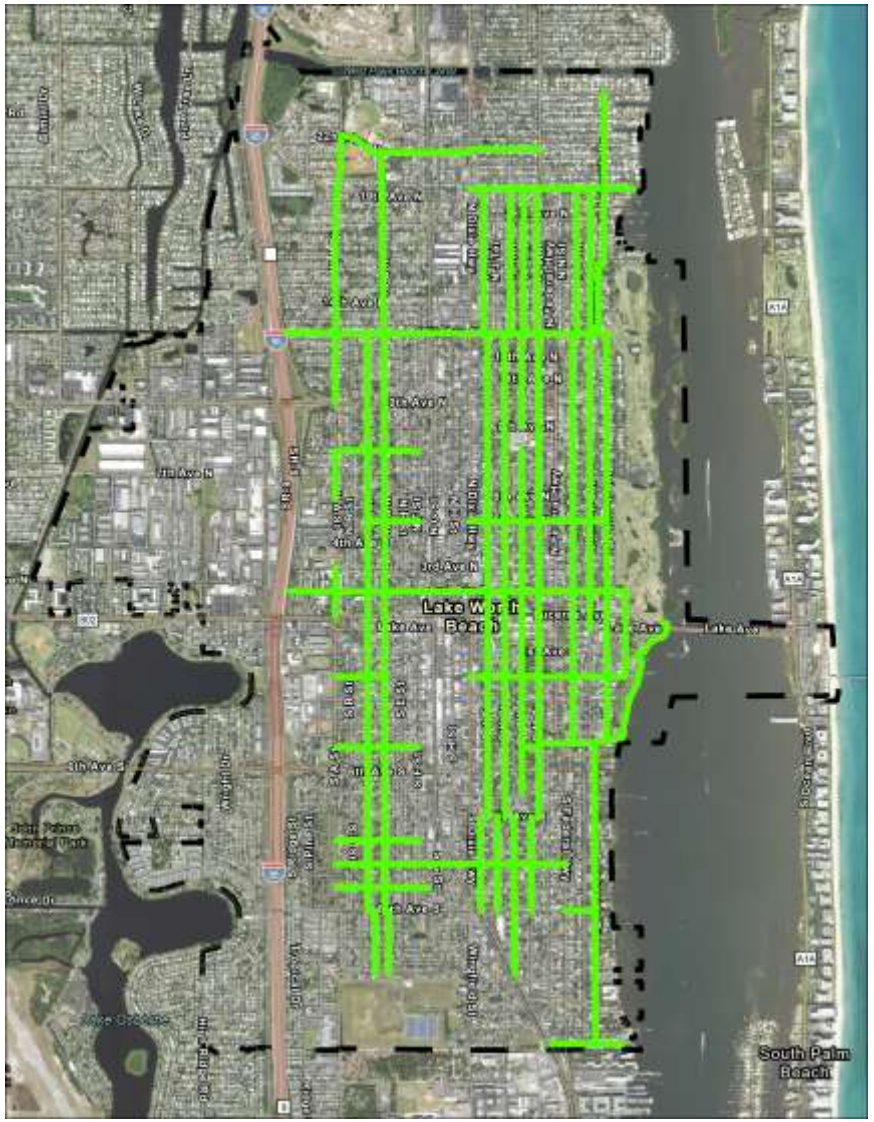
*inverse analysis for this output.

Low-Stress Bike Network

The results of the Low Stress Bike Network Analysis identified 37 possible streets that could be prioritized.

Key notes:

- All 37 potential roads are under control of the City.
- All feature connectivity to the Palm Beach County TPA's Bicycle Priority Network plan.
- Network includes 5th, 8th, 9th, and 11th Ave Footpaths and the Bryant Park Loop.



Plan Pillars

Targets facilities with most crashes, preventing accidents and injuries and increasing user comfort.

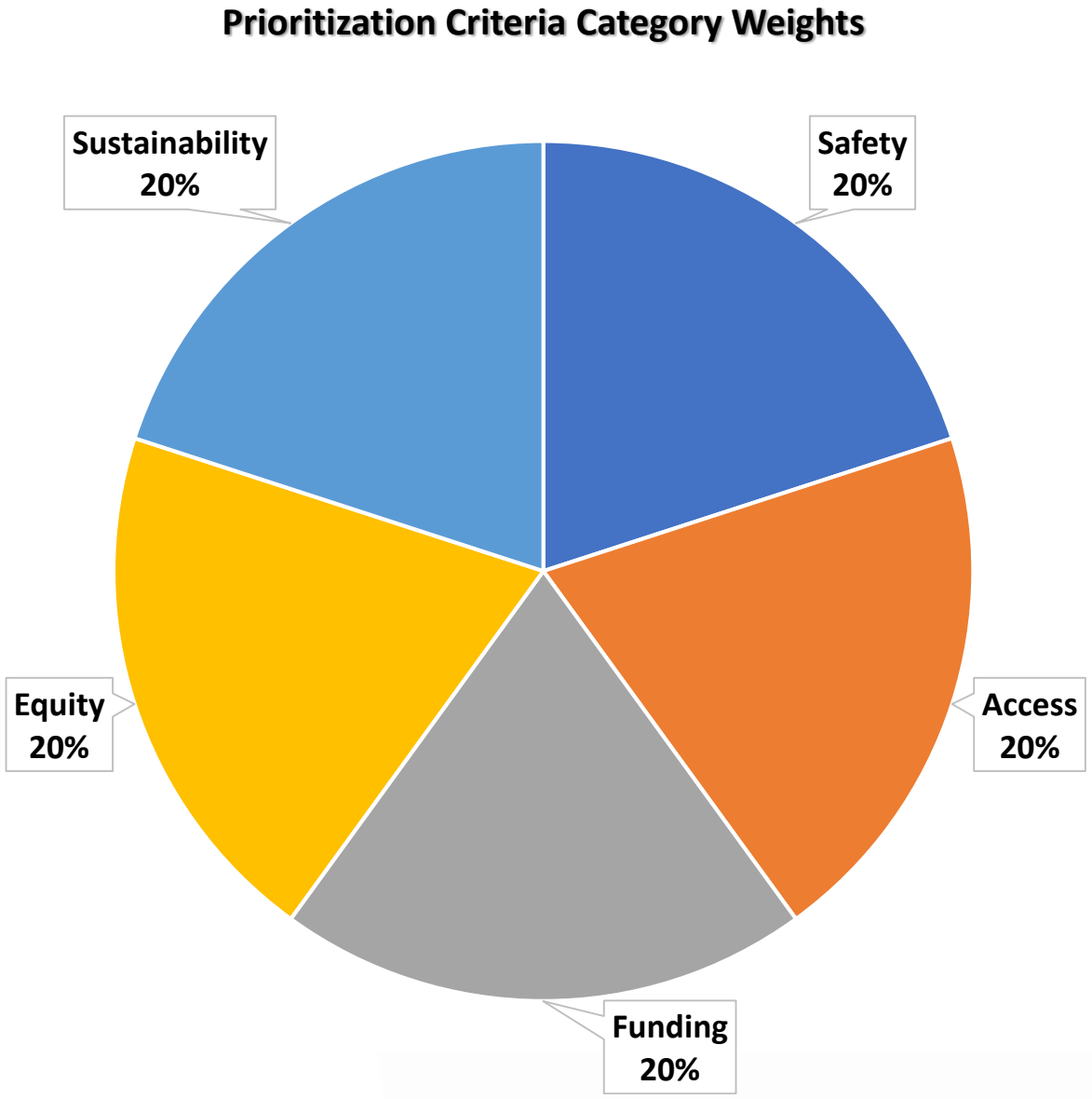
Promotes inclusivity by providing equal opportunities for reaching essential services and common destinations.

Essential for building, maintaining, and improving the transportation network. Ensures that locations align with essential criteria for grants.

Aims to ensure fairness in access to transportation resources for all communities using data from federal agencies that identify vulnerabilities by census tract.

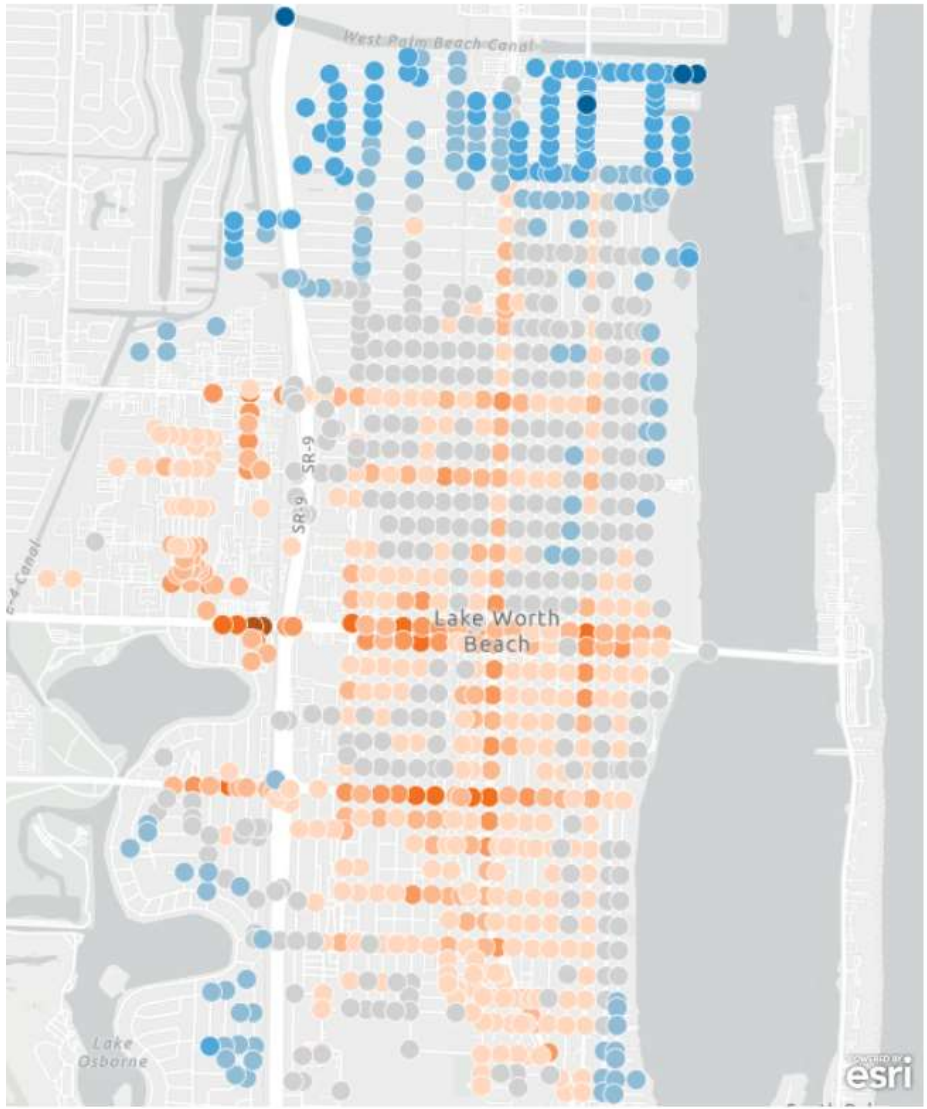
Focuses on eco-friendly transportation and resource conservation for long-term viability.

Prioritization Criteria Categories



Prioritization Criteria Results

- 916 Intersections Analyzed (scoring distribution below)
- 25 Total Measures Considered
  - Highest Weight (>5% of total each)
    - USDOT Justice 40 Classification
    - Distance to Schools
    - Distance to Bus Stops
    - Air Quality



Int Name	Rank
Lake Worth Rd & Holiday Dr	1
Lake Worth Rd & Erie St	2
6th Ave S & S Dixie Hwy	3
Barnett Dr & 10th Ave N	4
S F St & 6th Ave S	5
S H St & 6th Ave S	6
6th Ave S & S E St	7
Lake Worth Rd & Akron St	9
S E St & Lake Ave & N E St	10
N D St & Lucerne Ave	11
6th Ave S & Wright Dr	12
Cleveland St & Lake Worth Rd	13
Lucerne Ave & N Federal Hwy	14
6th Ave S & S D St	15
Lake Worth Rd & N Interstate 95	16
6th Ave S & S C St	17
S Dixie Hwy & 2nd Ave S	18
Barnett Dr & Madrid Ave	19
7th Ave S & S Dixie Hwy	20
10th Ave N & N Dixie Hwy	21
S Dixie Hwy & 8th Ave S	22
1st Ave S & S Dixie Hwy	23
N Dixie Hwy & 2nd Ave N	24
S K St & 6th Ave S	25

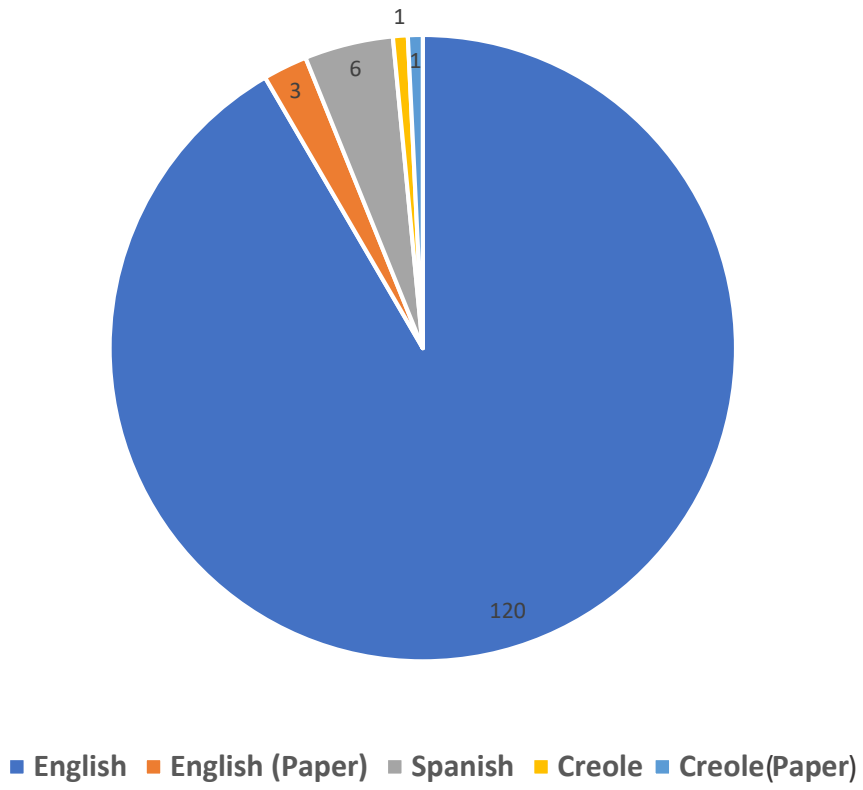
Prioritization Score

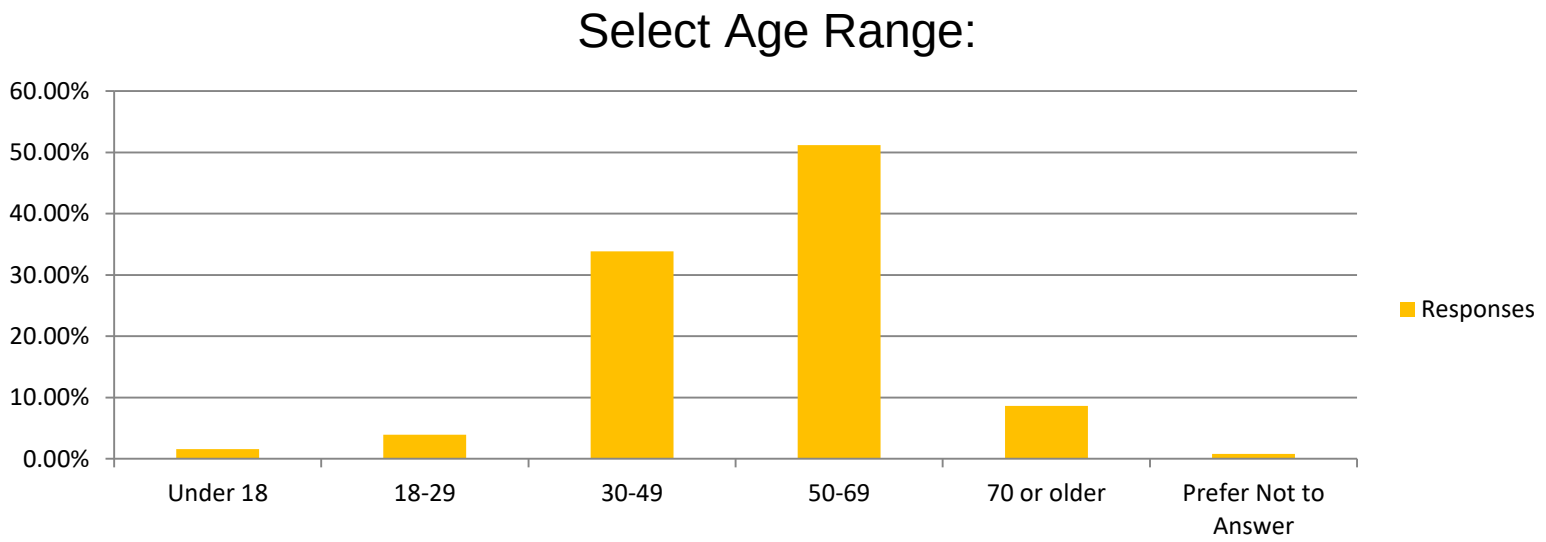
Low Mid High

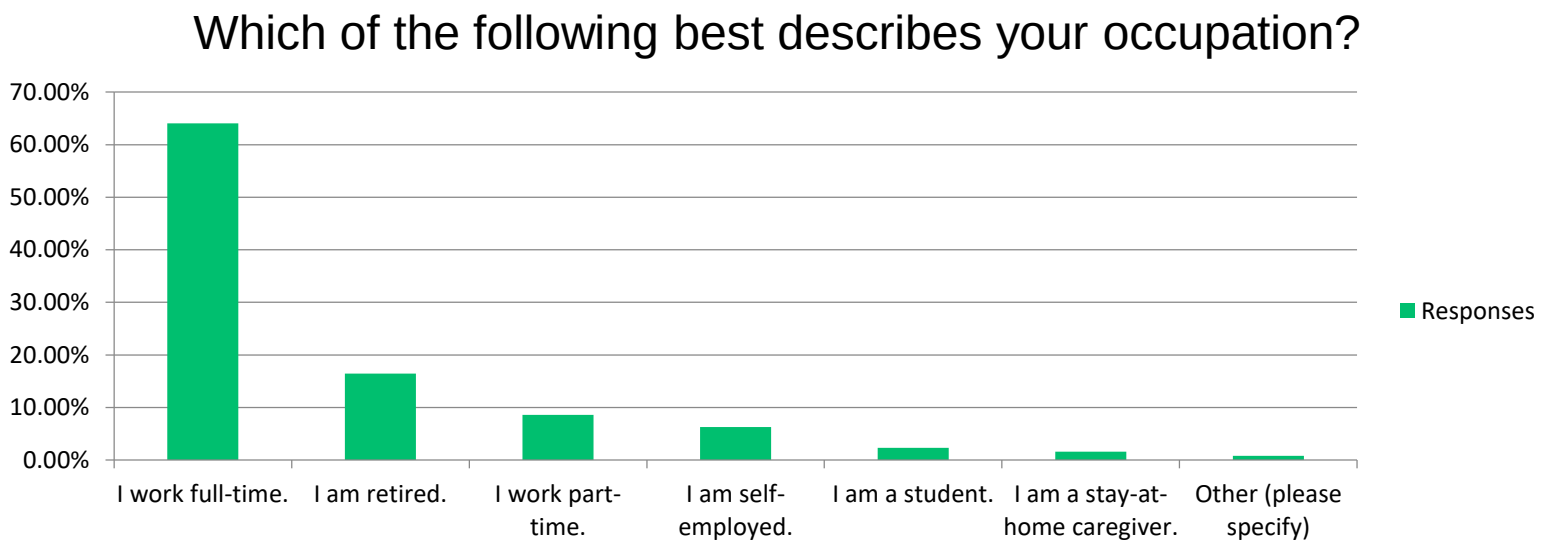
Survey Results

Survey Results

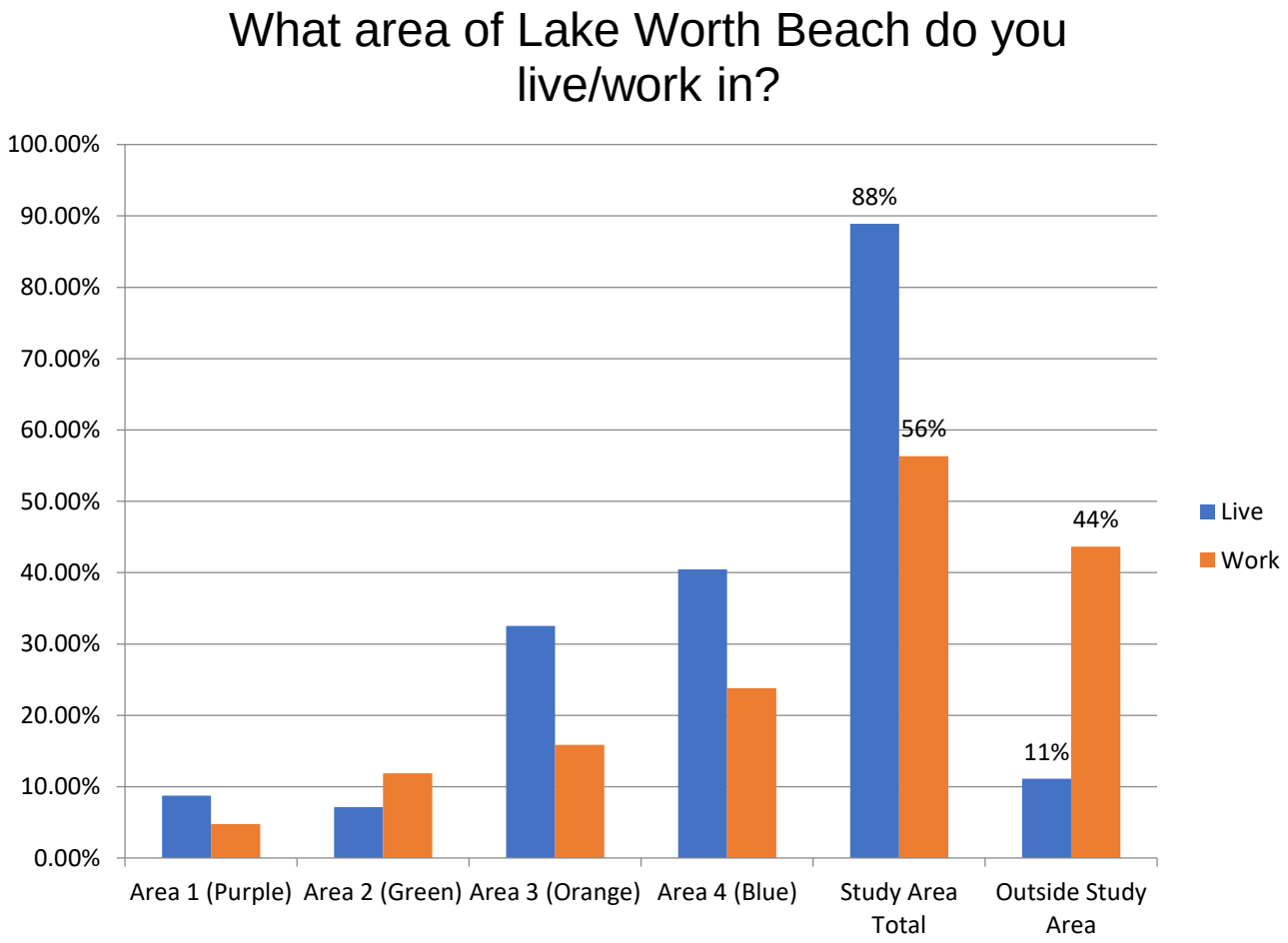
Total Responses: 131

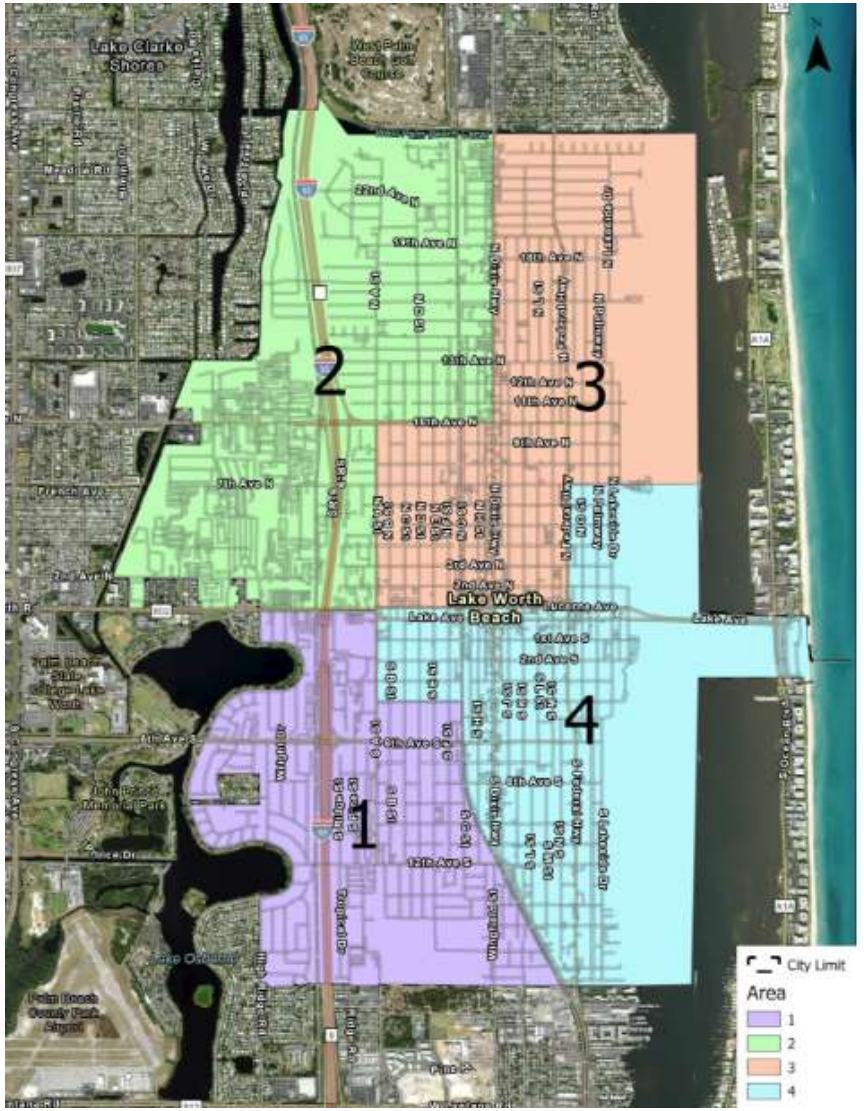






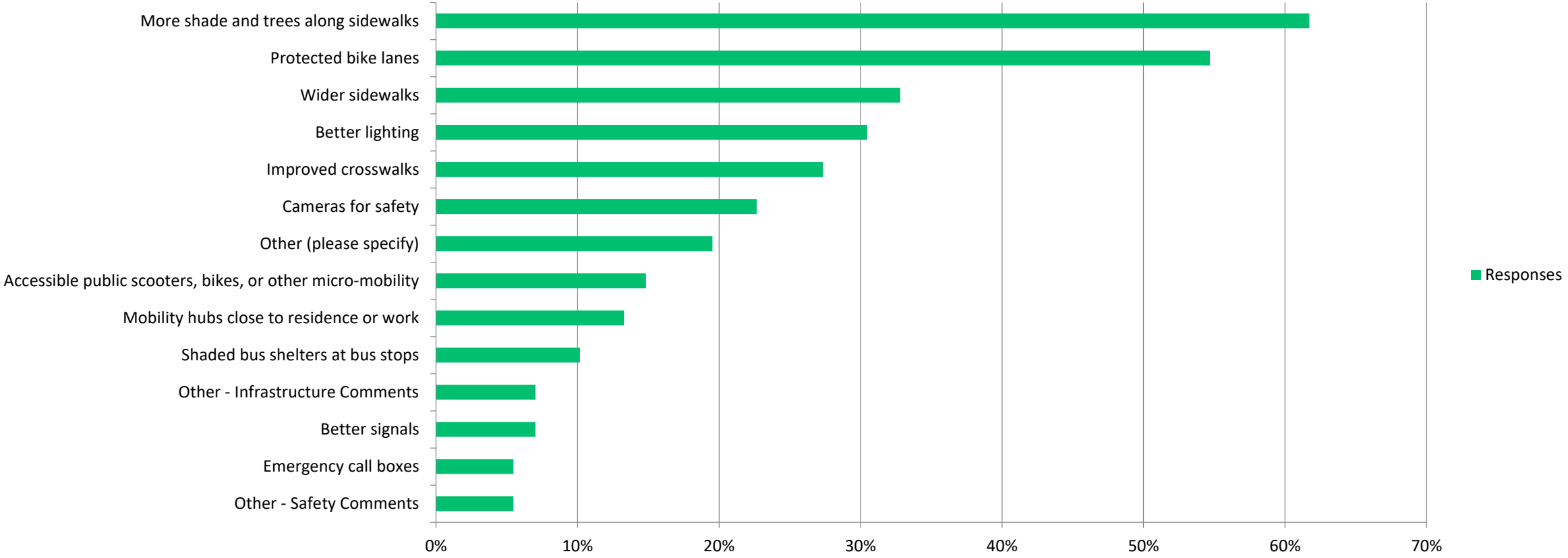
Survey Results



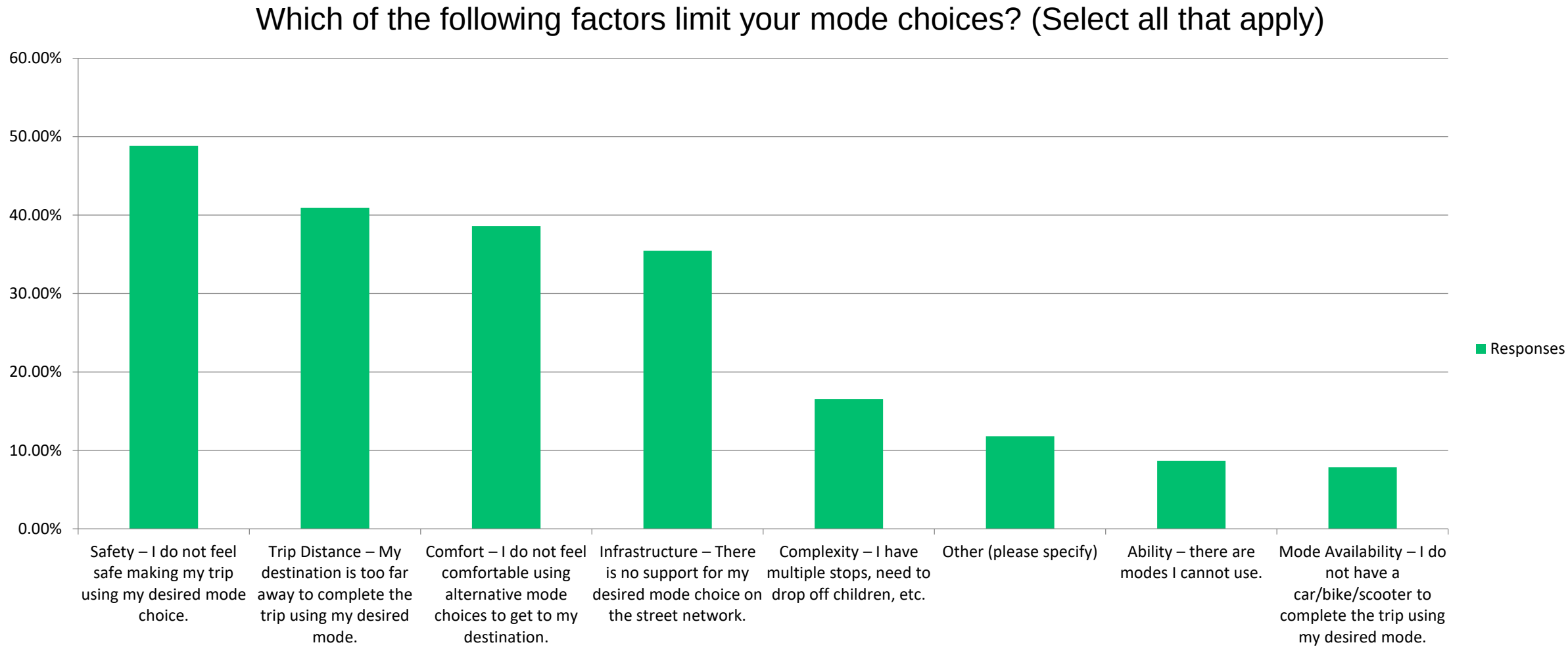


Survey Results

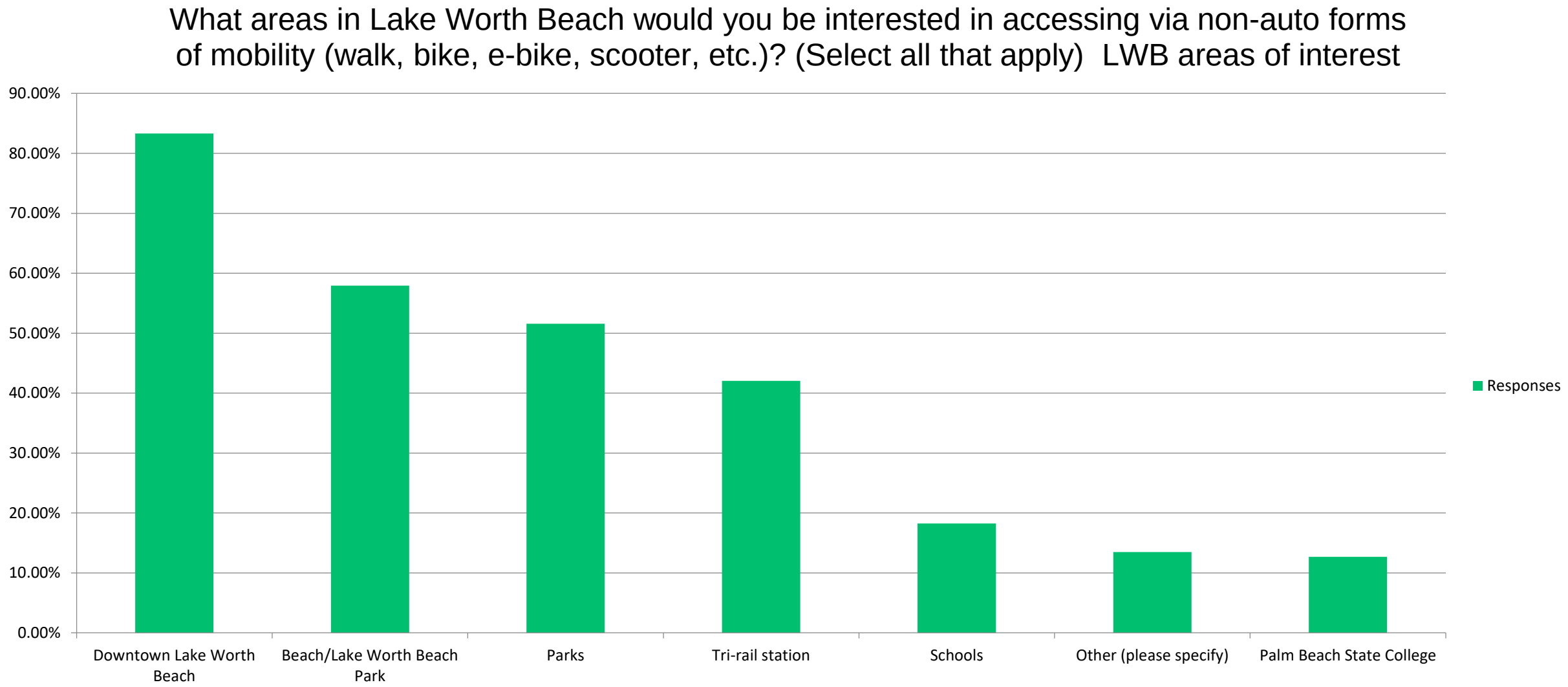
What enhancements to design/infrastructure elements would encourage you to use non-auto forms of mobility (walk, bike, e-bike, scooter, etc.)?



Survey Results



Survey Results



Next Steps and Timeline

Today!

- Commission Workshop

- Finalize Prioritization Criteria & Metrics

  Focus on plan pillars:

  - ***Safety***
  - ***Equity***
  - ***Access***
  - ***Sustainability***
  - ***Funding***

- Develop Project List

  Strategically chosen to maximize grant funding opportunities and meet plan objectives of improving safety, filling in infrastructure gaps, and ensuring equitable access to community hubs and services.

- Public Engagement at LWB Street Painting Festival

  - *February 2024*

- Draft Mobility Plan

- Present to Commission & Public

- Adopt Final Plan as Amendment to Comprehensive Plan!

Funding

TPA

Local Initiatives, Transportation Alternatives, and State Road Modifications (TPA) - Nov-Jan pre-application meetings; Feb – application meetings & deadline; May – final requests due; July – FDOT approves final list.

Five-Year Work Program & Transportation Improvement Program (TIP) (TPA); Annual list of priority projects - usually May - July adoption.

State

FDOT Safety Subgrant Program – Concept papers are submitted to FDOT Jan - Feb of each year. Awards are announced in August.

Safe Routes to School (State & Federal) - Walking/biking construction projects to improve safety within 2 miles of schools. Florida's Safe Routes to School program is being updated and expected to return in 2024. Applications typically due January each year for Florida program and October each year for the Federal program.

Federal

Safe Streets for All (SS4A) - Applications released in February with September deadlines for both planning and construction grants (20% match).

RAISE (Rebuilding American Infrastructure with Sustainability and Equity) Minimum $5M project size. Due February each year (20% match).

Reconnecting Communities and Neighborhoods Grant – Technical assistance grant to help with later planning and construction grants.