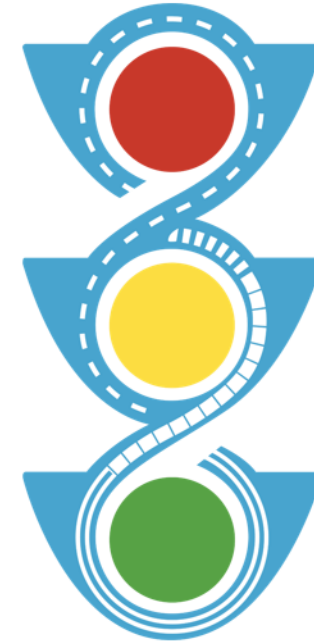


**Independent
Transportation Surtax
Oversight Board
Annual Retreat**

October 20, 2023



MAP Broward
Mobility Advancement Program
Brought to you by the
Penny For Transportation

Setting 2024 Oversight Board Meeting Calendar



MAP Broward
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Setting 2024 Oversight Board Meeting Calendar

- The Independent Transportation Surtax Oversight Board (“Oversight Board”) is created by the County Code of Ordinances, Title V, Section 31½-75. The Oversight Board is required to meet at least quarterly

February

Sun	Mon	Tue	Wed	Thu	Fri	Sat
				1	2	3
4	5	6	7	8	9	10
11	12	13	14	15	16	17
18	19	20	21	22	23	24
25	26	27	28	29		

Holidays and Observances: 14: Valentine's Day, 19: Presidents' Day

Setting 2024 Oversight Board Meeting Calendar

March						
Sun	Mon	Tue	Wed	Thu	Fri	Sat
					1	2
3	4	5	6	7	8	9
10	11	12	13	14	15	16
17	18	19	20	21	22	23
24	25	26	27	28	29	30
31						

Holidays and Observances: 17: St. Patrick's Day, 29: Good Friday (Many regions), 31: Easter Sunday

Setting 2024 Oversight Board Meeting Calendar

April						
Sun	Mon	Tue	Wed	Thu	Fri	Sat
	1	2	3	4	5	6
7	8	9	10	11	12	13
14	15	16	17	18	19	20
21	22	23	24	25	26	27
28	29	30				

Holidays and Observances: 1: [Easter Monday](#), 15: [Tax Day](#), 22: [Passover Eve](#), 23: [Passover \(first day\)](#), 30: [Last Day of Passover](#)

Setting 2024 Oversight Board Meeting Calendar

May						
Sun	Mon	Tue	Wed	Thu	Fri	Sat
			1	2	3	4
5	6	7	8	9	10	11
12	13	14	15	16	17	18
19	20	21	22	23	24	25
26	27	28	29	30	31	

Holidays and Observances: 5: Cinco de Mayo, 12: Mother's Day, 27: Memorial Day

Setting 2024 Oversight Board Meeting Calendar

June						
Sun	Mon	Tue	Wed	Thu	Fri	Sat
						1
2	3	4	5	6	7	8
9	10	11	12	13	14	15
16	17	18	19	20	21	22
23	24	25	26	27	28	29
30						

Holidays and Observances: 14: Flag Day, 16: Father's Day, 19: Juneteenth

Setting 2024 Oversight Board Meeting Calendar

July						
Sun	Mon	Tue	Wed	Thu	Fri	Sat
	1	2	3	4	5	6
7	8	9	10	11	12	13
14	15	16	17	18	19	20
21	22	23	24	25	26	27
28	29	30	31			

Holidays and Observances: 4: Independence Day

Setting 2024 Oversight Board Meeting Calendar

August						
Sun	Mon	Tue	Wed	Thu	Fri	Sat
				1	2	3
4	5	6	7	8	9	10
11	12	13	14	15	16	17
18	19	20	21	22	23	24
25	26	27	28	29	30	31

Setting 2024 Oversight Board Meeting Calendar

September

Sun	Mon	Tue	Wed	Thu	Fri	Sat
1	2	3	4	5	6	7
8	9	10	11	12	13	14
15	16	17	18	19	20	21
22	23	24	25	26	27	28
29	30					

Holidays and Observances: 2: Labor Day

Setting 2024 Oversight Board Meeting Calendar

October

Sun	Mon	Tue	Wed	Thu	Fri	Sat
		1	2	3	4	5
6	7	8	9	10	11	12
13	14	15	16	17	18	19
20	21	22	23	24	25	26
27	28	29	30	31		

Holidays and Observances: 3: Rosh Hashana, 12: Yom Kippur, 14: Columbus Day, 23: Last Day of Sukkot, 31: Halloween

Setting 2024 Oversight Board Meeting Calendar

November

Sun	Mon	Tue	Wed	Thu	Fri	Sat
					1	2
3	4	5	6	7	8	9
10	11	12	13	14	15	16
17	18	19	20	21	22	23
24	25	26	27	28	29	30


Holidays and Observances: 5: Election Day, 11: Veterans Day, 28: Thanksgiving Day, 29: Black Friday

Setting 2024 Oversight Board Meeting Calendar

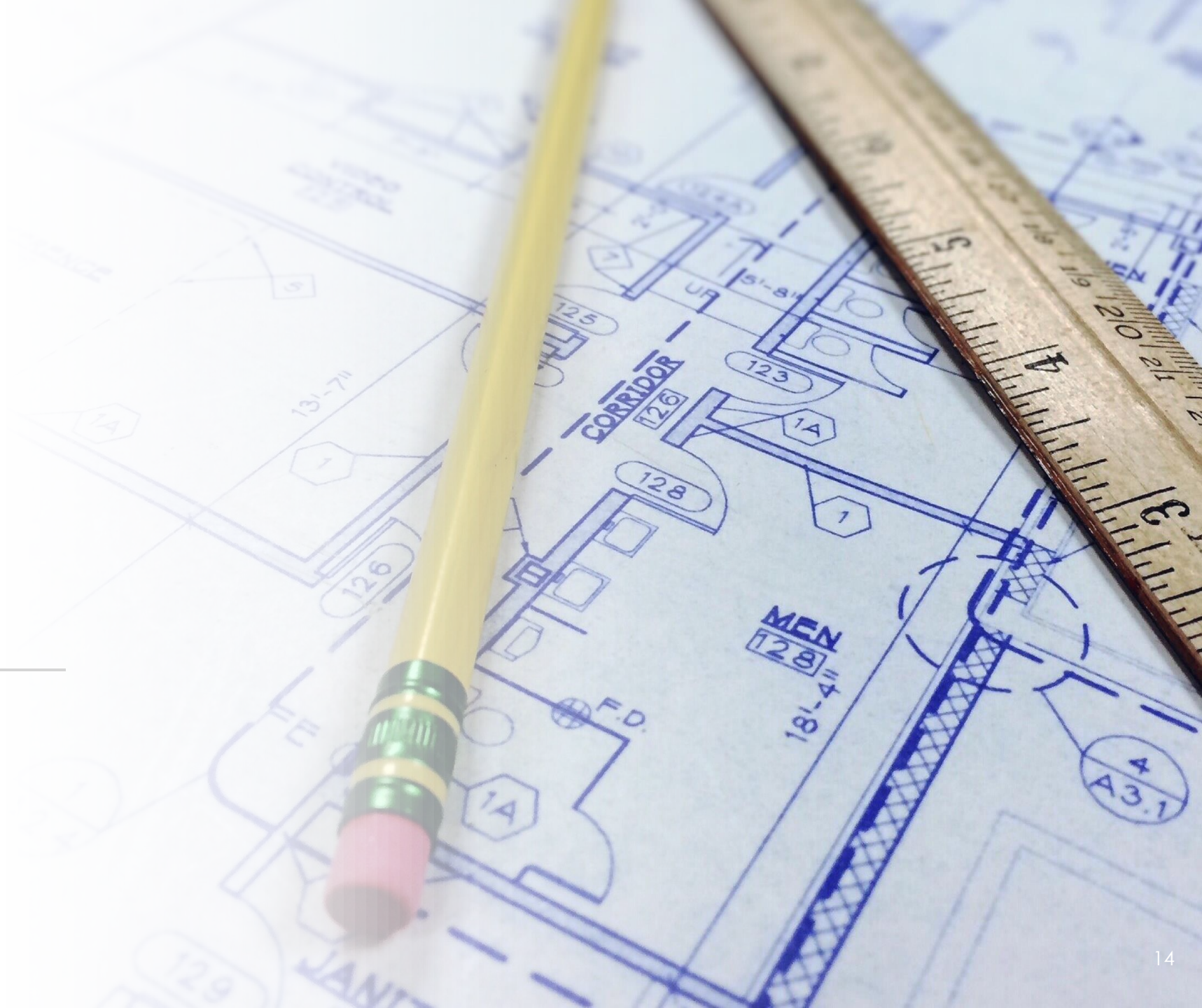
December


Sun	Mon	Tue	Wed	Thu	Fri	Sat
1	2	3	4	5	6	7
8	9	10	11	12	13	14
15	16	17	18	19	20	21
22	23	24	25	26	27	28
29	30	31				

Holidays and Observances: 24: Christmas Eve, 25: Christmas Day (All),
26: Chanukah/Hanukkah (first day), 31: New Year's Eve



GCW Surtax
Plaza
Construction
Update





Broward's Advanced Signal Control System

*Moving forward into
the future*



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So where are we headed with the MAP Program?



Agenda:

- Continuous Refinement and Improvement using Existing Modernized Core Signal System (Non-Adaptive)
- New Adaptive Traffic Signal Control Deployments (ATSC)
- Automated Traffic Signal Performance Measures (ATSPM)
- Connected Vehicle System Deployments (CV)
- Advanced Bike/Pedestrian Sensor Technology
- Near-Miss Safety Technologies



Conventional Signal Timing Still Doing the Heavy Lifting as Adaptive Control Moves Forward

- Requires significant data collection, simulation modeling and field-refinement...very time consuming and resource-intensive.



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Conventional Signal Timing:

- No “machine learning” or “artificial intelligence.”
- Uses pre-programmed set of timing plans that are deployed for certain times of the day, and day of the week (known as “TOD” plans).
- Well-engineered TOD plans are still effective...
- ...but TOD plans don't respond well to unpredictable traffic demand.



Why Adaptive Control?

- Continuously analyzes and redistributes green time in a more “equitable” fashion based on real-time demand.
- More responsive to dramatic fluctuations in traffic conditions.
- Improves travel time reliability.
- More effective in flushing out queues and restarting normal traffic flow resulting from railroad crossings, drawbridge openings, incidents, and special events.



Adaptive Control Performance Measuring

- Measuring before and after conditions is challenging because travel time is highly correlated to traffic volume, vehicle mix, physical roadway capacity, weather, and volume-to-capacity ratio, all of which can change with time.
- Slightly degrading travel times in the future can still represent a net improvement in performance if system volume and other factors are increasing.



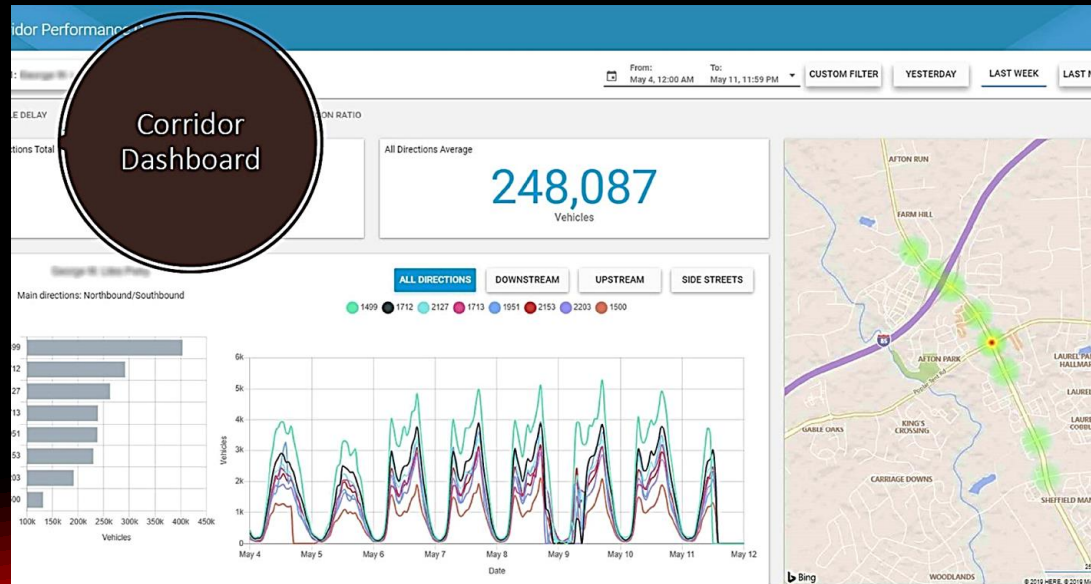
Typical Adaptive Control Performance Metrics Include:

- Travel time (seconds or minutes)
- Vehicle delay (seconds per vehicle)
- Intersection delay by period (total vehicle hours of delay per period)
- Number of stops (along travel route)
- Percent arrivals on red or green
- Quality of signal progression (Purdue performance measures)
- Travel time reliability (degree of travel time variance)

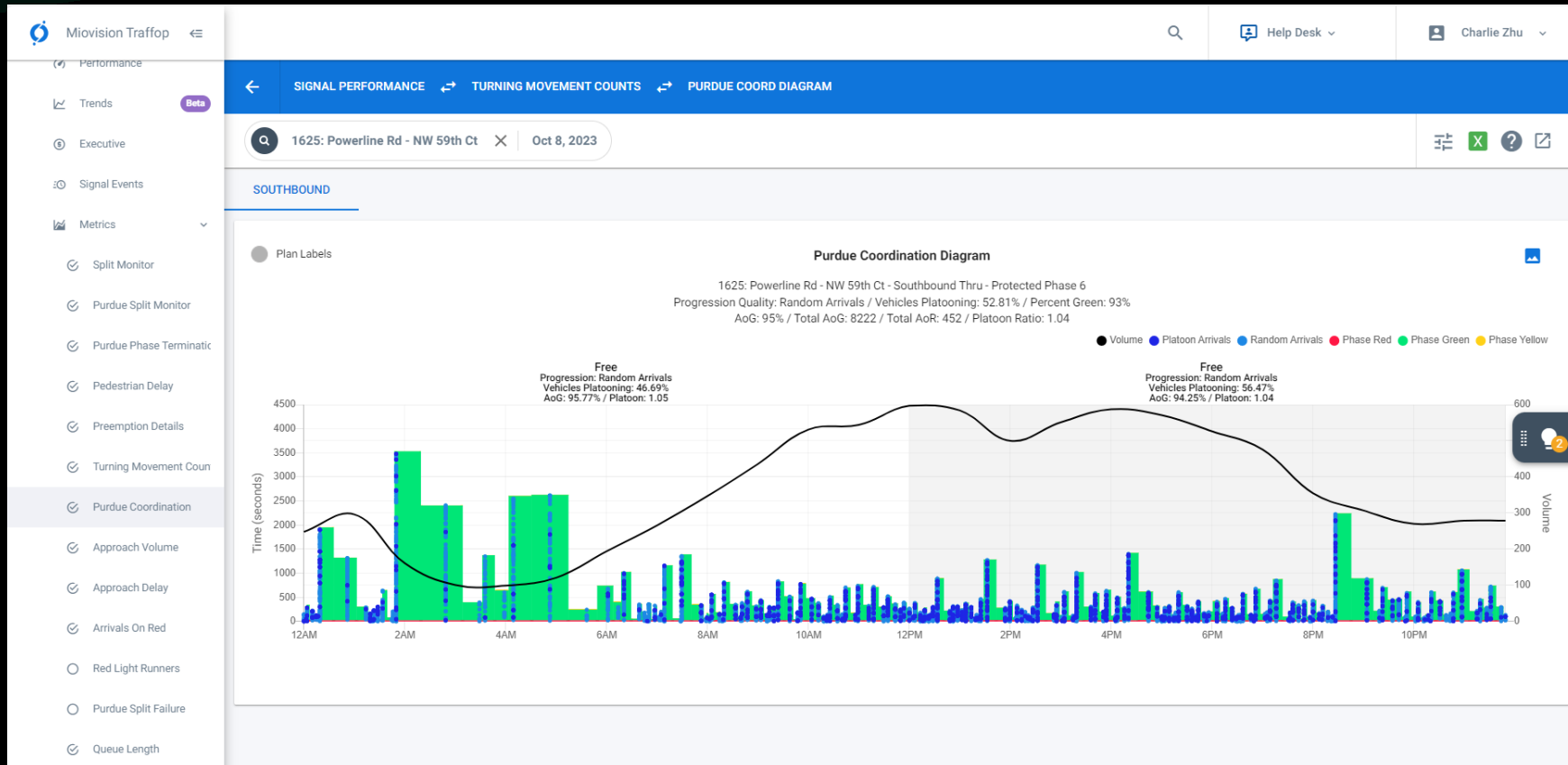


Automated Traffic Signal Performance Measures

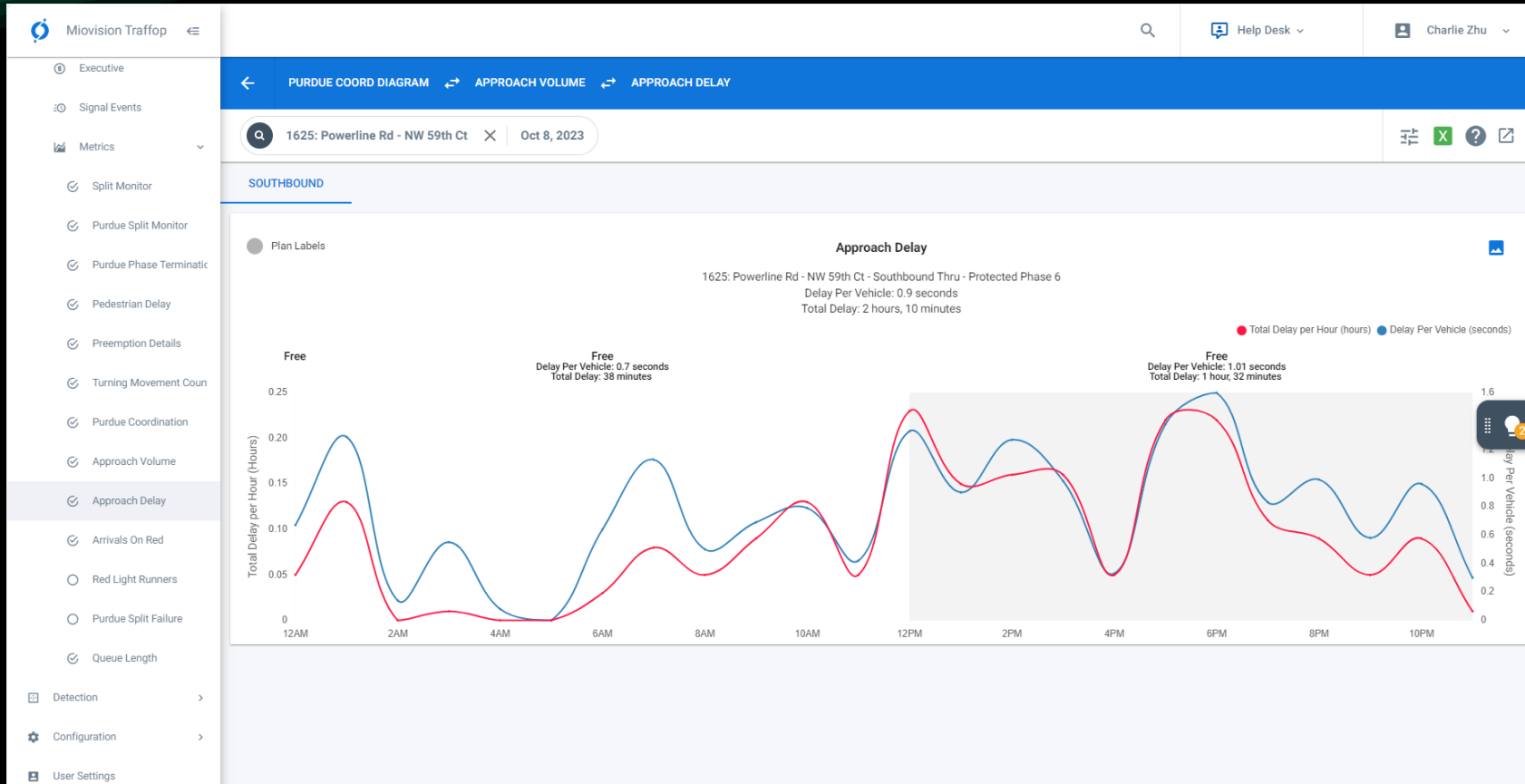
- All new ATSC systems will have Automated Traffic Signal Performance Measure (ATSPM) systems integrated into each intersection and along the corridor so that performance metrics can be automatically generated from real-time data.



Example ATSPM Metrics – Purdue Coordination Diagram



Example ATSPM Metrics – Intersection Approach Delay



Pines Boulevard ATSC Preliminary Performance Comparison:

- Travel time ~ **10%** average reduction
- Vehicle delay ~ **22%** average reduction

These are relatively high degrees of performance improvement and should not be expected of all adaptive deployments. This segment of Pines Boulevard is well-suited for the linear nature of the deployed ATSC, but adaptive systems may face greater challenges in denser, downtown grid networks.



Performance Measuring using “Big Data”

- Countywide signal performance metrics (both adaptive and non-adaptive intersections) are available through a “big data” platform called **INRIX Signal Analytics**.
- INRIX performance metrics are estimated from “probe vehicle” GPS speed and positional data which is analyzed using sophisticated algorithms without the need to directly connect to the signal system.



Adaptive Control Limitations

- Cannot overcome over-capacity conditions, traffic disruptions, or fully eliminate traffic congestion.
- Reduces the duration and severity of over-capacity peak periods but cannot eliminate the underlying over-capacity condition.
- Effective tool for certain traffic situations but is not a “cure-all” for all types of traffic congestion.



Adaptive Control – Hybrid Operation

- In downtown grid networks with equally spaced signals and significant pedestrian activity, TOD systems (even fixed-time operation) may outperform adaptive systems.
- A combination of conventional TOD systems, central adaptive systems, and distributed adaptive systems may be the most effective approach in addressing the specific characteristics of certain corridors or subareas.



So how do we design for Adaptive Control going forward?



Adaptive Control – Planning for the Future

- Continue installation of fiber and Synchro Green adaptive control per current MAP Adaptive Program.
- Continue to evaluate new ATSC systems, software, and algorithms, collaborate with other agencies, and pilot test new systems when appropriate.
- Continue to evaluate and pilot test emerging advanced sensor technologies to detect all transportation users, including pedestrians and cyclists.



Adaptive Control – Just Beyond the Horizon

- Continue to research and evaluate demonstrations of new generations of traffic control which is expected to merge “big data” (Google, HERE, Wejo, INRIX, etc.) probe vehicle travel data with intersection level detection technology to create more advanced adaptive systems.
- Most effective future traffic control will likely be a hybrid of central and distributed adaptive control with the merging of big data and local sensor inputs.

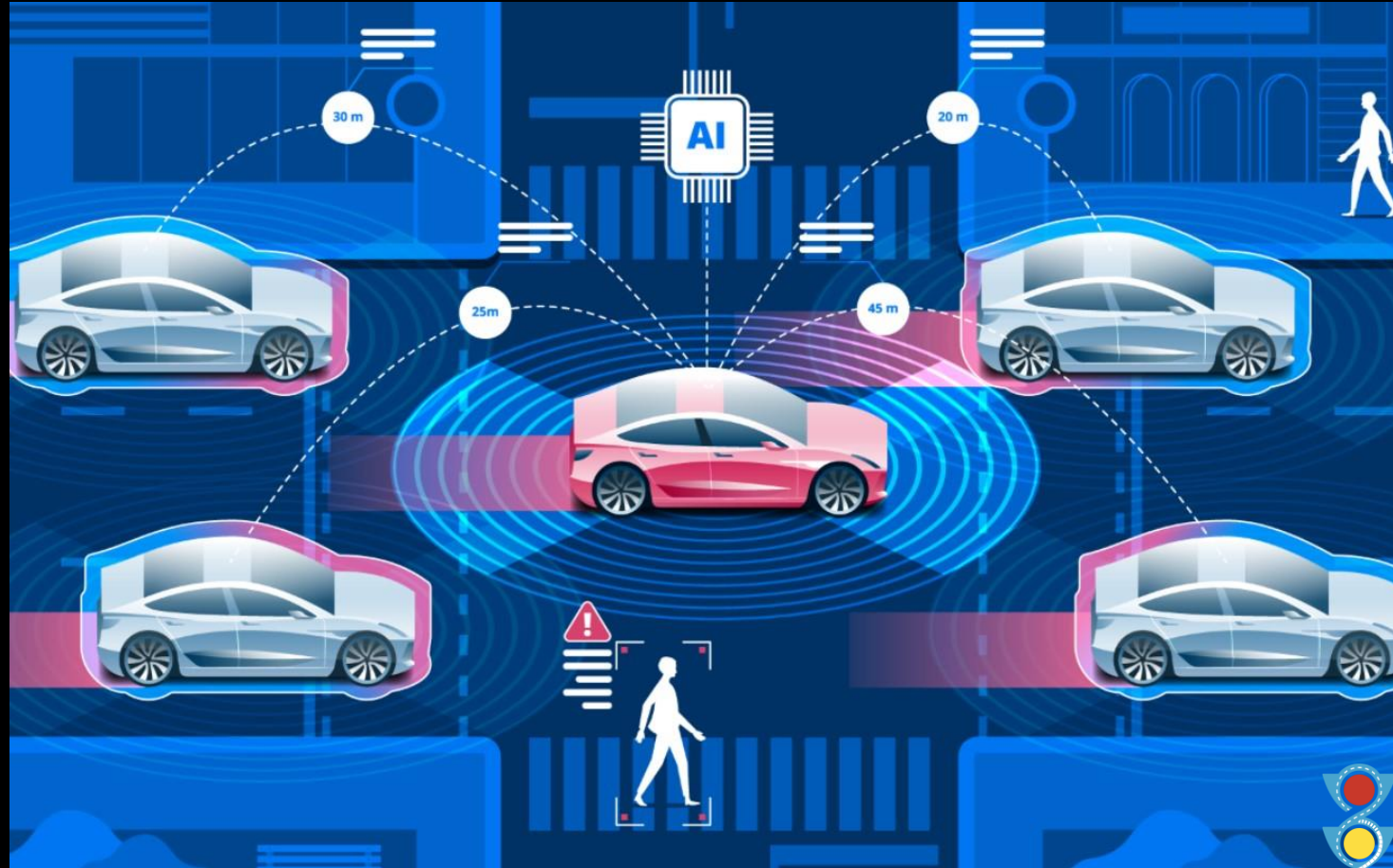


Future Adaptive Control must be Flexible & Scalable

- Adaptive signal control deployment for the MAP program needs to include continuous evaluation of installed system performance and ongoing review and consideration of new and emerging adaptive technologies.
- Countywide adaptive strategy may look very different ten years from now.
- Communications system investments must continue to support higher data speed and bandwidth needs.

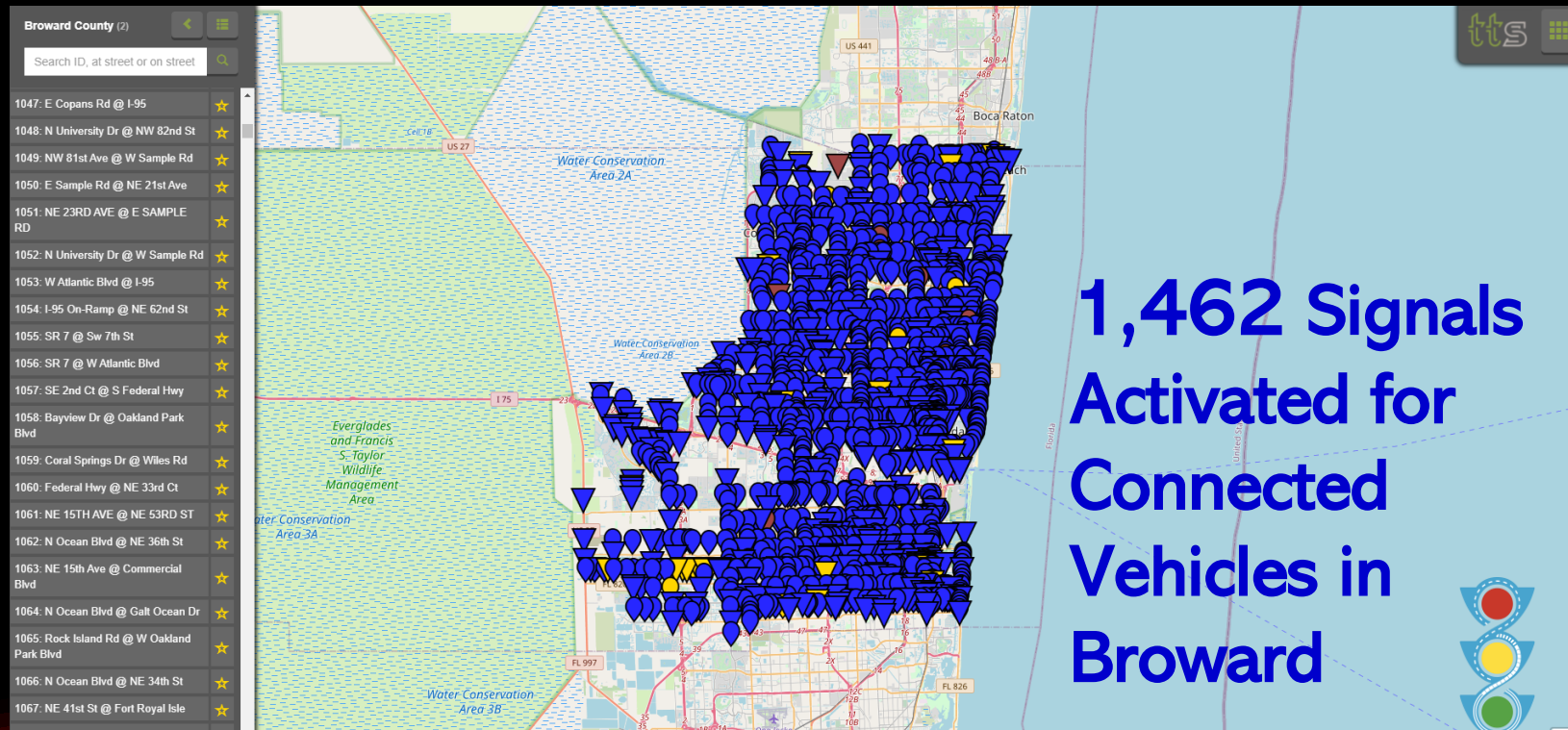


Connected Vehicles (CV's)




Connected Vehicle Industry Partnership

- During the summer of 2020, Broward County upgraded its existing ATMS.now countywide platform to allow real-time signal data to be accessible by third parties.



Traffic Technology Services (TTS) Partnership



Broward County, FL

TTS TRAFFIC TECHNOLOGY SERVICES

Traffic Technology Services, Inc. (TTS) is an information service provider for connected vehicle applications. Through a new data authorization partnership with Broward County, FL, starting in November 2020 TTS will provide a connected vehicle, vehicle-to-infrastructure solution for private industry applications through the service, [Personal Signal Assistant](#)®.

Traffic Management System

Broward County is committed to providing a safe, efficient, and well-maintained county transportation infrastructure to improve the general welfare of travelers in their neighborhoods and the community. The County Traffic Engineering Division utilizes Cubic's Trafficware ATMS now modular central transportation management platform to monitor and manage the operation of a total of 1,454 signalized intersections throughout the County.

Connected Vehicle Technology

During summer 2020, Broward County upgraded the existing ATMS now platform to allow traffic signal data stored on the platform to be accessible by a third party such as TTS.

TTS utilizes the data to develop automotive-grade messages that contain predictions of signalized intersection operations. These messages are delivered as an information service to customers implementing connected vehicle solutions, utilizing existing cellular communications to vehicles or mobile devices.

Driver or End User Impacts

TTS customers use the service to implement their own connected vehicle applications. For example, Audi drivers will receive information on the traffic signals, providing information on the remaining [time-to-green](#) or the [suggested speed](#) to avoid stopping. In another example, [Sydric app](#) users will receive similar time-to-green information through the app, SDK, or via eligible Android Auto or Apple CarPlay systems.

County Benefits

The County will receive performance metric reports from TTS, summarizing signal performance and connected vehicle crossings. These performance metrics will help traffic engineers identify and quantify problem locations to improve traffic signal timing operations for all users. This reporting and service is provided at no-cost to the County.

traffictechservices.com

- In November 2020 Broward County partnered with **Traffic Technology Services, Inc. (TTS)** an information service provider for connected vehicle applications.
- TTS is providing a connected, vehicle-to-infrastructure (V2I) solution for various private industry applications.



TTS-Audi V2I Broward



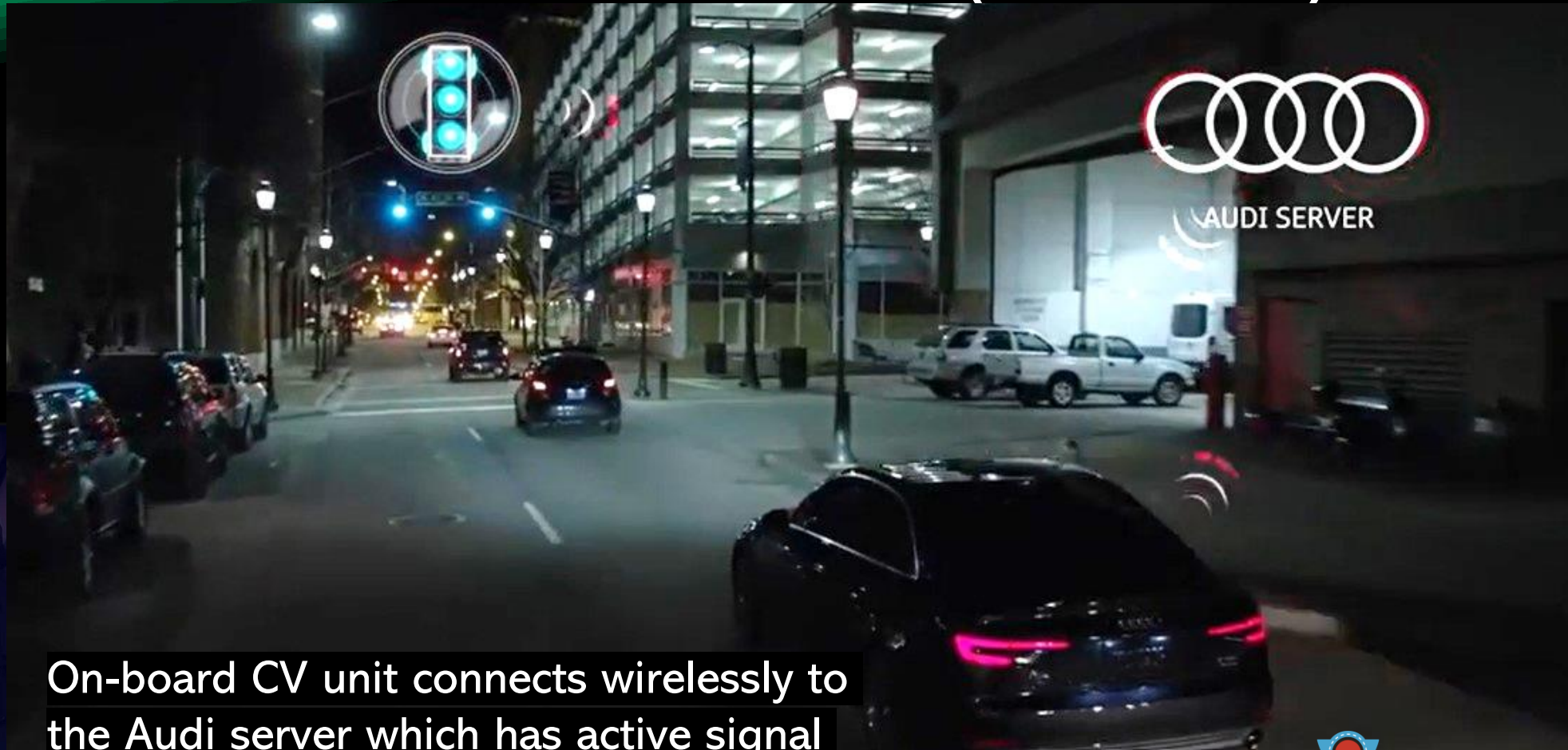
TTS captures real-time signal data from Broward's central signal control server and makes it available to Audi and other auto CV platforms.



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TTS-Audi V2I Broward (continued)



On-board CV unit connects wirelessly to the Audi server which has active signal controller status information for every Broward intersection provided by TTS.



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BROWARD
COUNTY
FLORIDA

TTS-Audi V2I Broward – Countdown to Green Signal



TTS-Audi V2I Broward – Dashboard Navigation



Mapping and Navigation



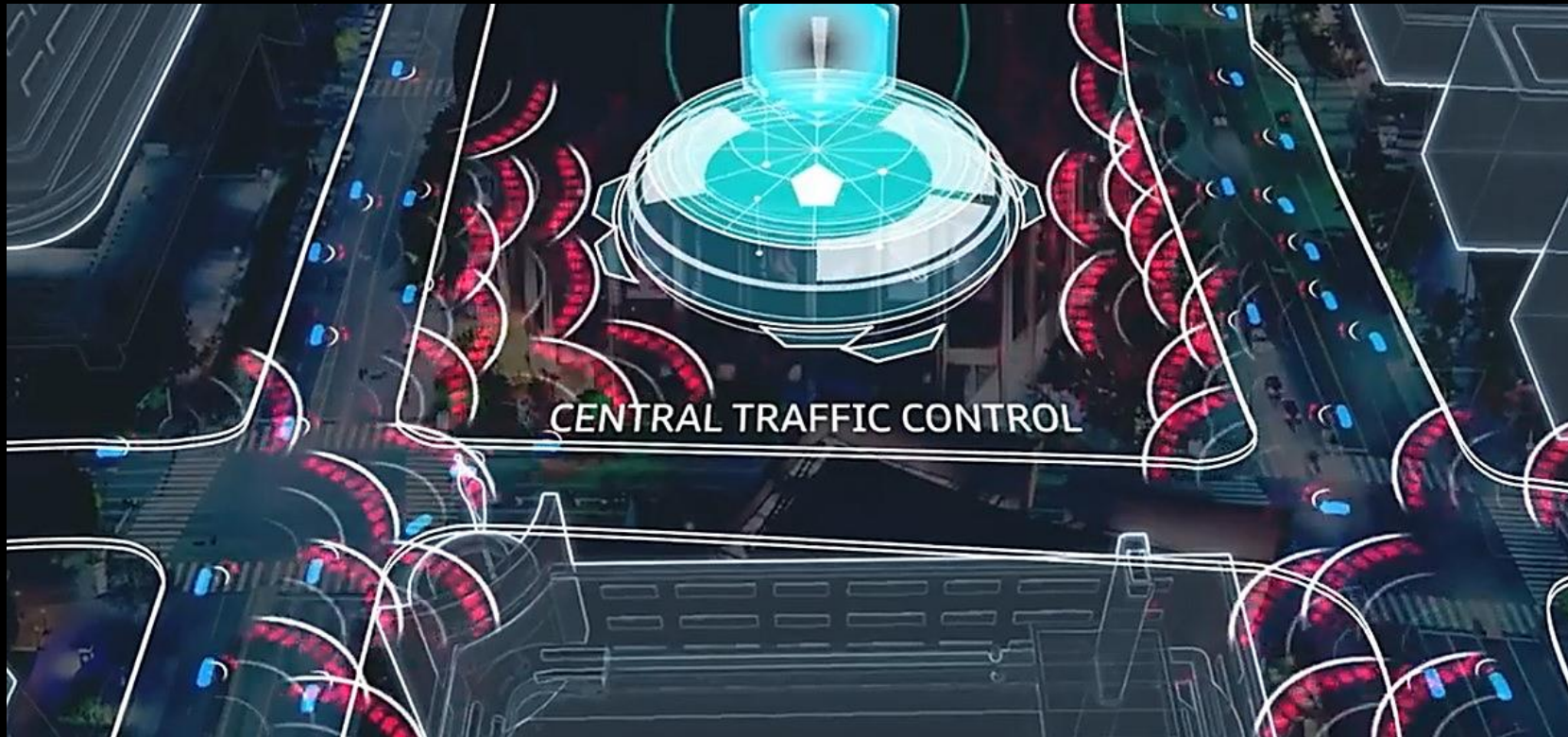
TTS-Audi V2I Broward – Recommended Driving Speed



Recommended speed based on
current signal synchronization



How does CV Benefit Regional Traffic Signal Operations?

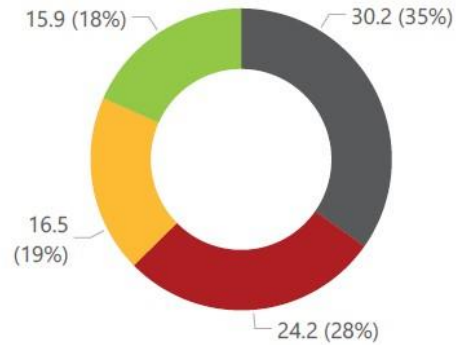


10,000's of actual moving vehicles providing two-way real-time data relative to their interaction with the signal system.



We can now receive signal performance metrics from 10,000's of moving vehicles...

Total Delay (Hours) by Peak



Peak Period ● Other ● Evening ... ● Midday ... ● Mornin...

Average Veh Delay

14.0

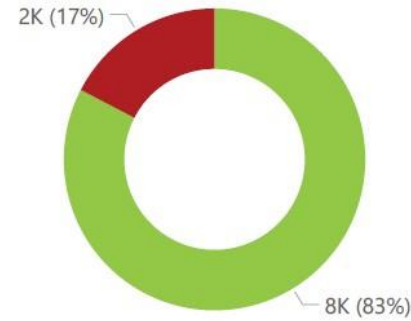
Total Delay (Hours)

86.8

Total Crossings

22.6K

Arrivals



Arrival State ● Green ● Yellow/Red

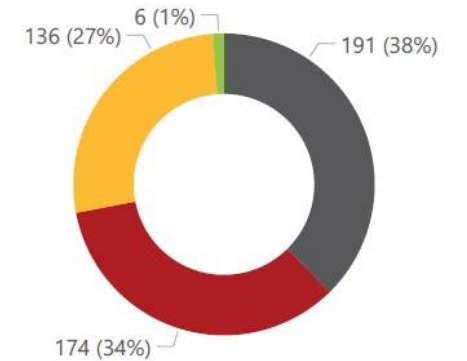
Red Arrival Rate

17.4%

Arrival Crossings

9490

Split Failures by Peak



Peak Period ● Other ● Evening ... ● Midday ... ● Mornin...

Split Failure Rate

2.2%

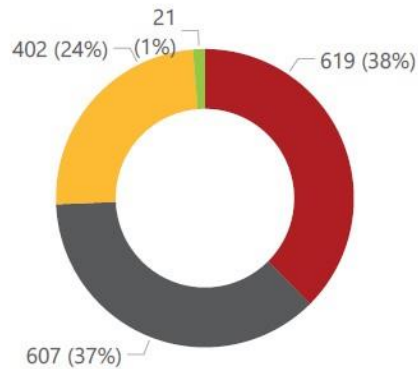
Total Split Failures

507



Percentage of vehicles arriving during green and red signal phases...

Red Arrivals by Peak



Peak Period ● Evening ... ● Other ● Midday ... ● Mornin...

Total Intersections Reported

416

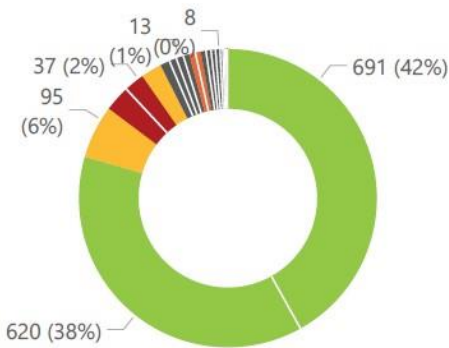
Total Red Arrivals

1649

Total Red Arrival

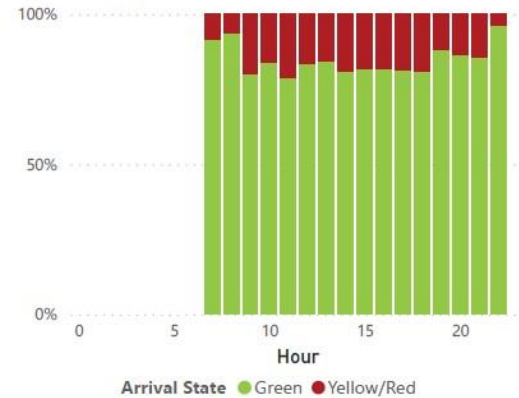
17.4%

Red Arrivals by Phase



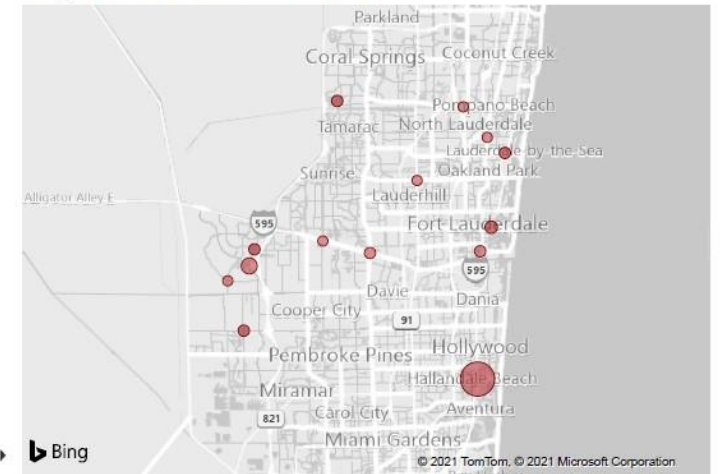
Phase ● 2 ● 6 ● 4 ● 1 ● 5 ● 8 ● 601 ● 204 ● 602 ● 202

Average Arrivals by Hour



Arrival State ● Green ● Yellow/Red

Highest Red Arrival %

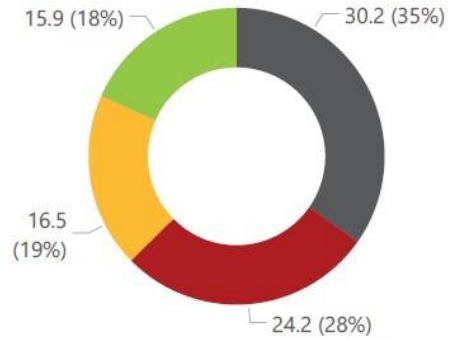


ID	Red Arrival Rate	N/S Street	E/W Street
2091	✓ 100%	SE 15TH AVE	E Broward Blvd
3390	✓ 100%	Weston Rd	Indian Trace
1218	100%	W Atlantic Blvd	Riverside Dr
3455	✓ 100%	SW 172nd Ave	SHERIDAN ST
1101	✓ 100%	E Commercial Blvd	US-1
3084	✗ 93%	E Hallandale Beach Blvd	N Federal Hwy
2366	✓ 83%	SE 3rd Ave	SE 17th St
2034	✓ 83%	S UNIVERSITY DR	W STATE RD 84 WB RAMP
3385	✗ 82%	Weston Rd	Royal Palm Blvd
1028	✓ 80%	N Dixie Hwy	E Cypress Creek Rd
3507	✓ 80%	BONAVENTURE BLVD	S Post Rd
1007	✓ 80%	POWERLINE RD	W Atlantic Blvd
1068	80%	SR 7	W Oakland Park Blvd



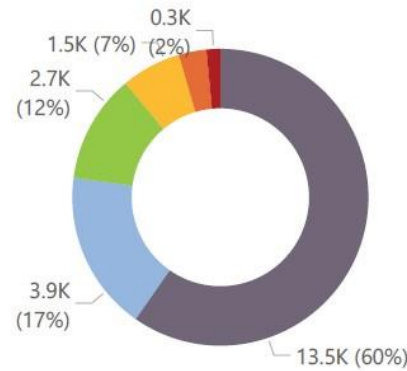
Signal related delays and where are the worst delays, and when...

Total Delay (Hours) by Peak



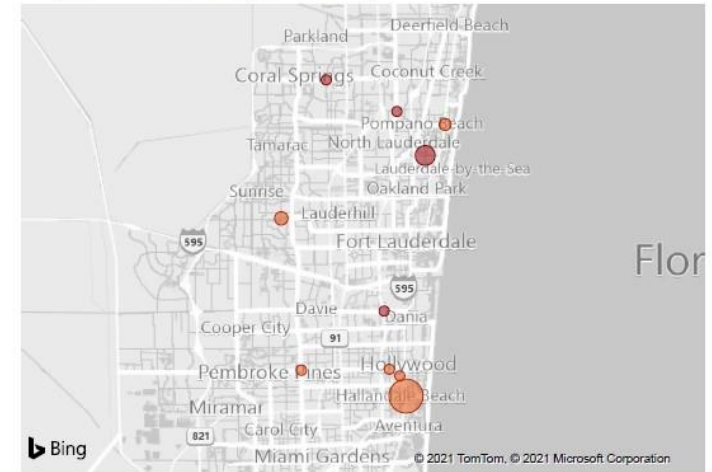
Peak Period ● Other ● Evening ... ● Midday ... ● Mornin...

Crossing by LOS



Calc LOS ● A ● B ● C ● D ● E ● F

Highest Average Delay



ID	Average Delay	N/S Street	E/W Street
3274	✓ 134.1	Griffin Rd	Interstate 95 SB Ramp
1200	✓ 111.5	ROCK ISLAND RD	W Sample Rd
1009	✓ 103.2	N Powerline Rd	Dr Martin Luther King Blvd
1273	⚠ 84.1	NE 18th Ave	NE 62nd St
3084	✗ 79.2	E Hallandale Beach Blvd	N Federal Hwy
3014	✓ 78.9	S UNIVERSITY DR	Pines Blvd
3211	✓ 78.6	Washington St	S 21st Ave
1336	✓ 76.1	N Federal Hwy	E ATLANTIC BLVD
3209	✓ 75.0	S 26th Ave	HOLLYWOOD BLVD
2260	✓ 73.5	N Pine Island Rd	W Sunrise Blvd

Average Veh Delay

14.0

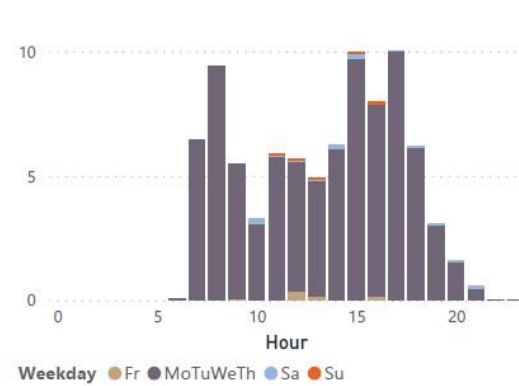
Total Delay (Hours)

86.8

Total Crossings

22.6K

Total Delay (Hours) by Hour



Weekday ● Fr ● MoTuWeTh ● Sa ● Su



Advanced Intersection Sensor Deployment

The County is installing intersection detection systems that can detect pedestrians and bicycles, in addition to vehicles.



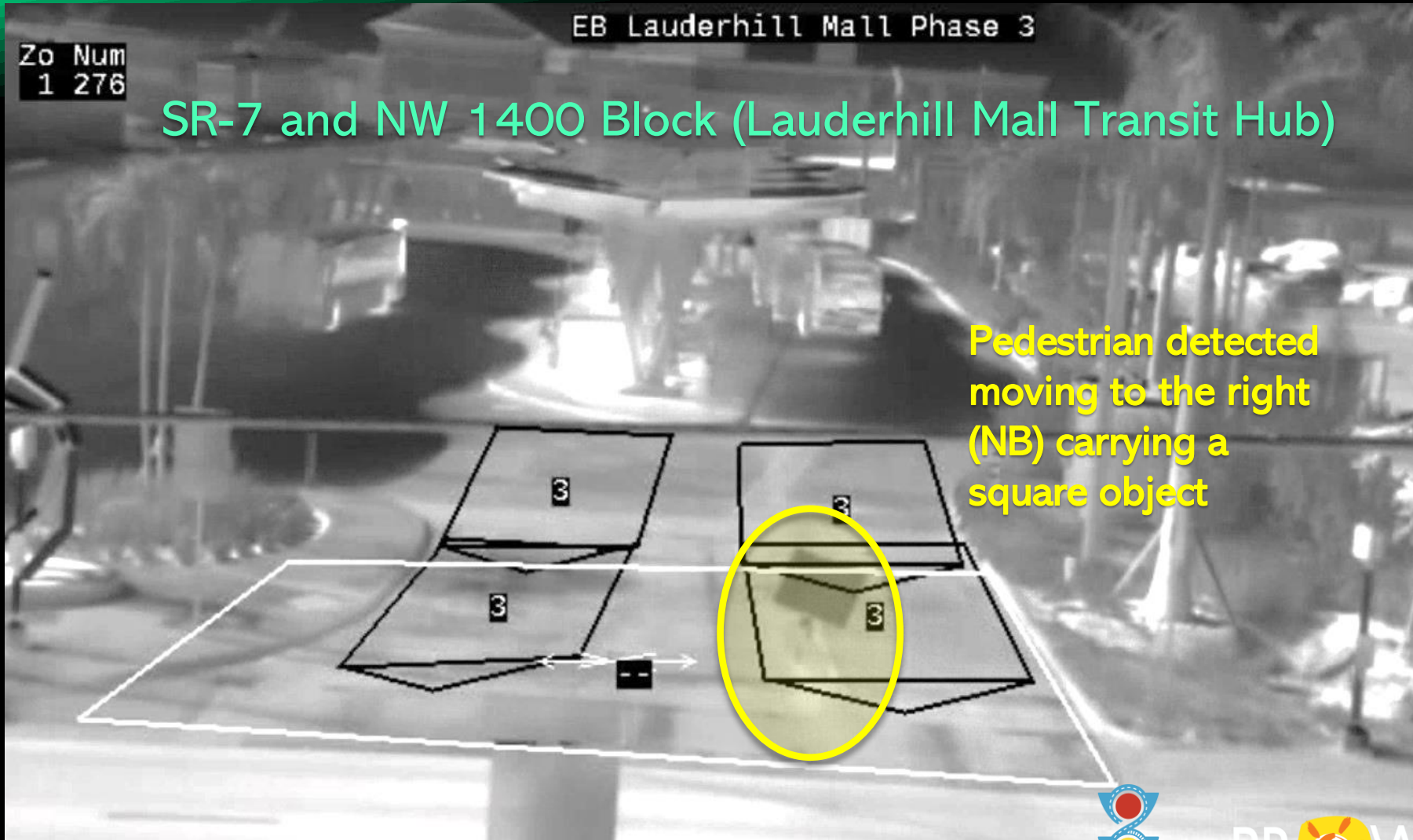
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Eight (8) locations are already equipped with the Trafisense2 thermal technology (Teledyne FLIR):

1. SR-7 and NW 1400 Block (Lauderhill Mall Transit Hub)
2. Sunrise Blvd and NW 16 Avenue
3. Griffin Road and Dykes Road/Weston Road
4. Nob Hill Road and Springtree Lakes Drive/NW 47 Street
5. Atlantic Blvd and Oasis Drive
6. Pines Blvd and Flamingo Road
7. SW 30 Avenue and SW 42 Street
8. Wiles Road and Coral Springs Blvd





Trafisense2 technology (Teledyne FLIR):



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Bicycle Signalization on the Near Horizon

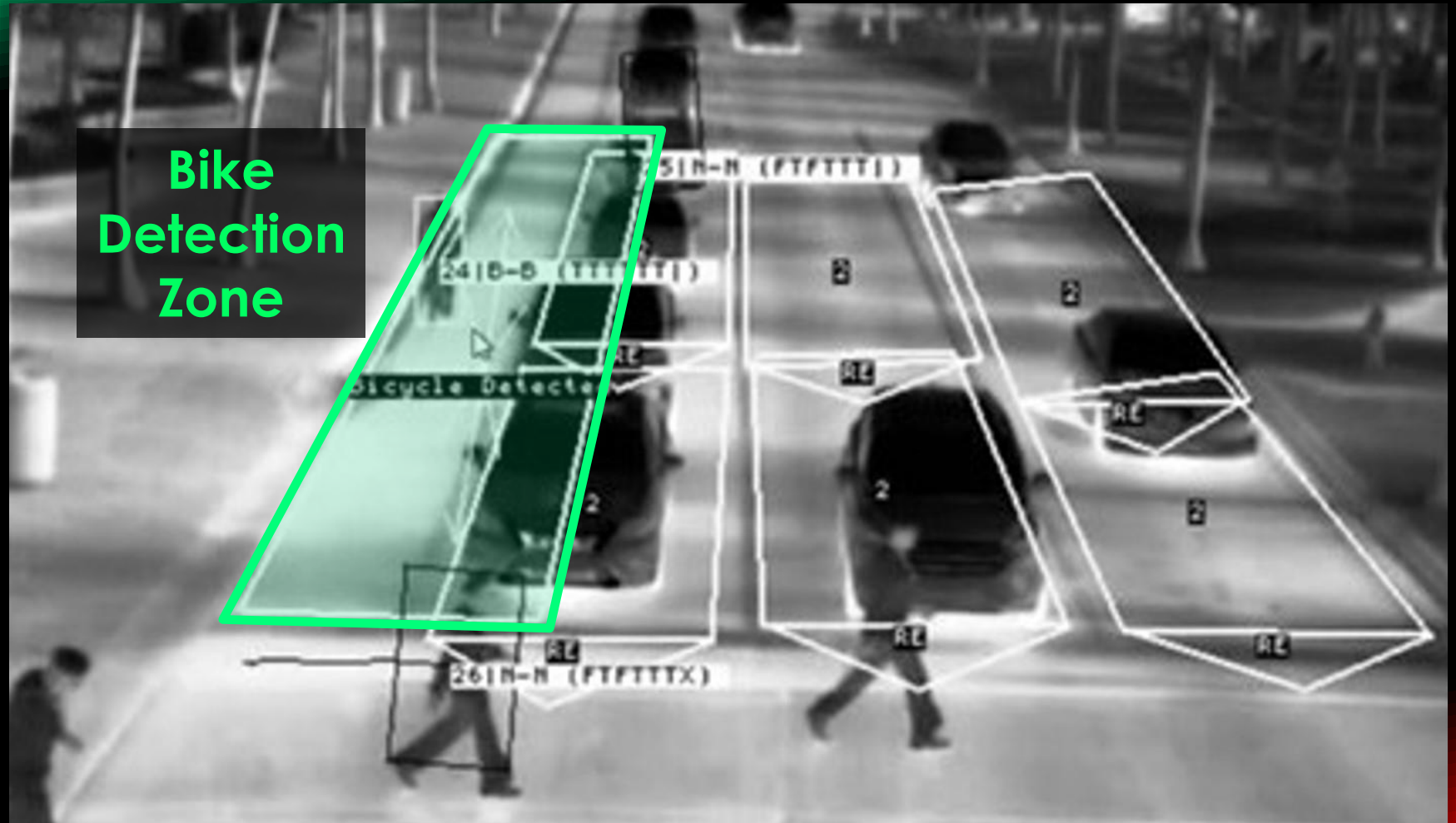
County staff is partnering with FDOT and MPO in selecting locations to deploy the sensor technology to provide special bike phasing and/or monitor pedestrian activity. The four (4) initial pilot locations are:

1. Sunrise Boulevard and Bayview Drive
2. Las Olas Boulevard and SR-A1A
3. Commercial Boulevard and SR-A1A
4. Wilton Drive and Northeast 21 Court



Las Olas
Boulevard at
SR-A1A
(Northbound
Approach)

Showing Bike
Detection
Zone



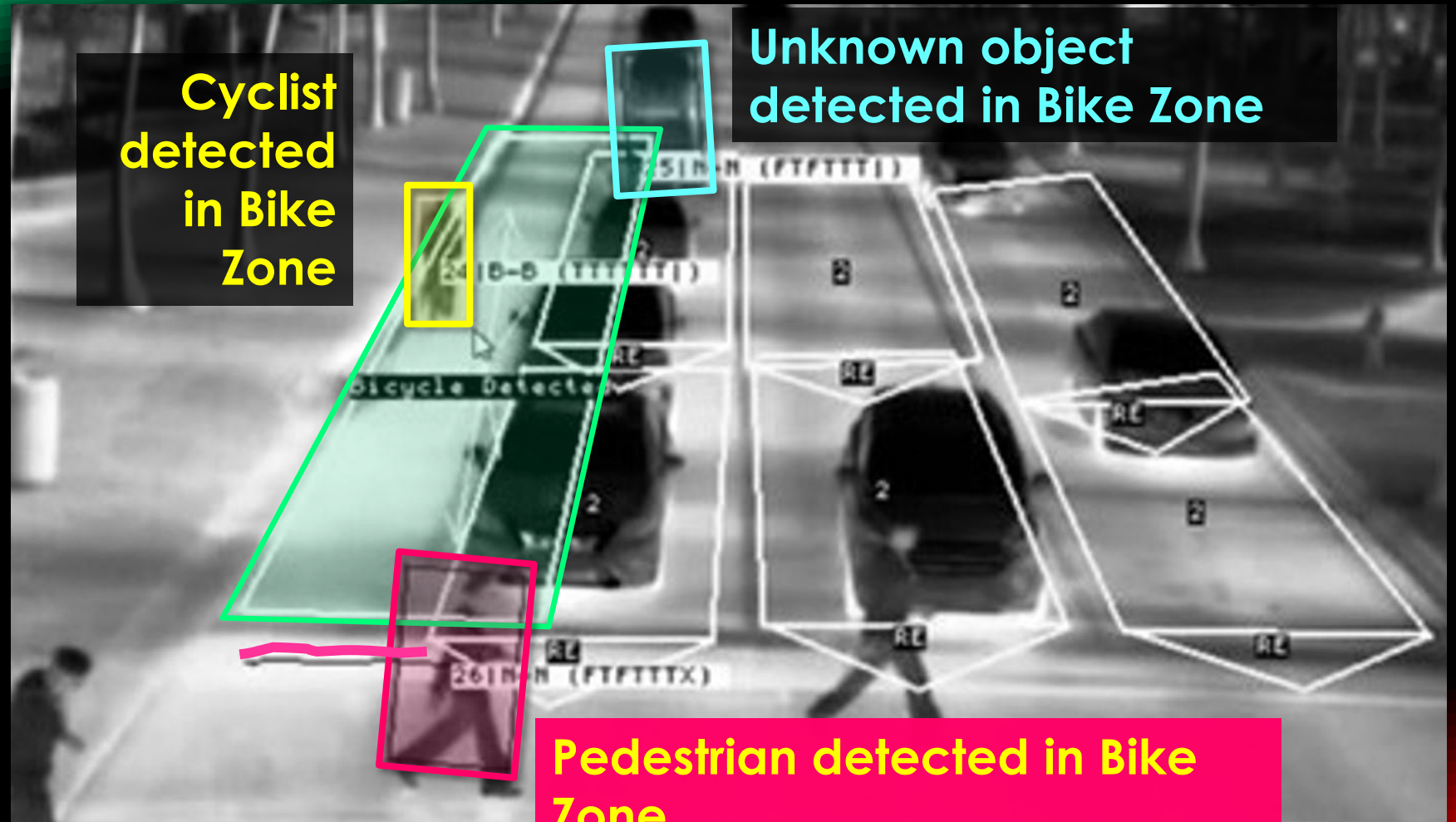
Trafisense2 technology (Teledyne FLIR):



Advanced Thermal Sensor Technology

Las Olas
Boulevard at
SR-A1A
(Northbound
Approach)

Showing
Multiple
Objects being
Detected



Trafisense2 technology (Teledyne FLIR):



Other potential advanced intersection sensor deployments include:

- Sheridan Street and SR-A1A
- Hallandale Beach Blvd and SR-A1A
- Flagler Drive and Andrews Avenue, Oakland Pk Blvd, and Commercial Blvd (continuous bike lanes)
- Andrews Avenue at various locations in the City of Oakland Park



Near-Miss Identification Study University of Florida (UF) Partnership with Broward County

53



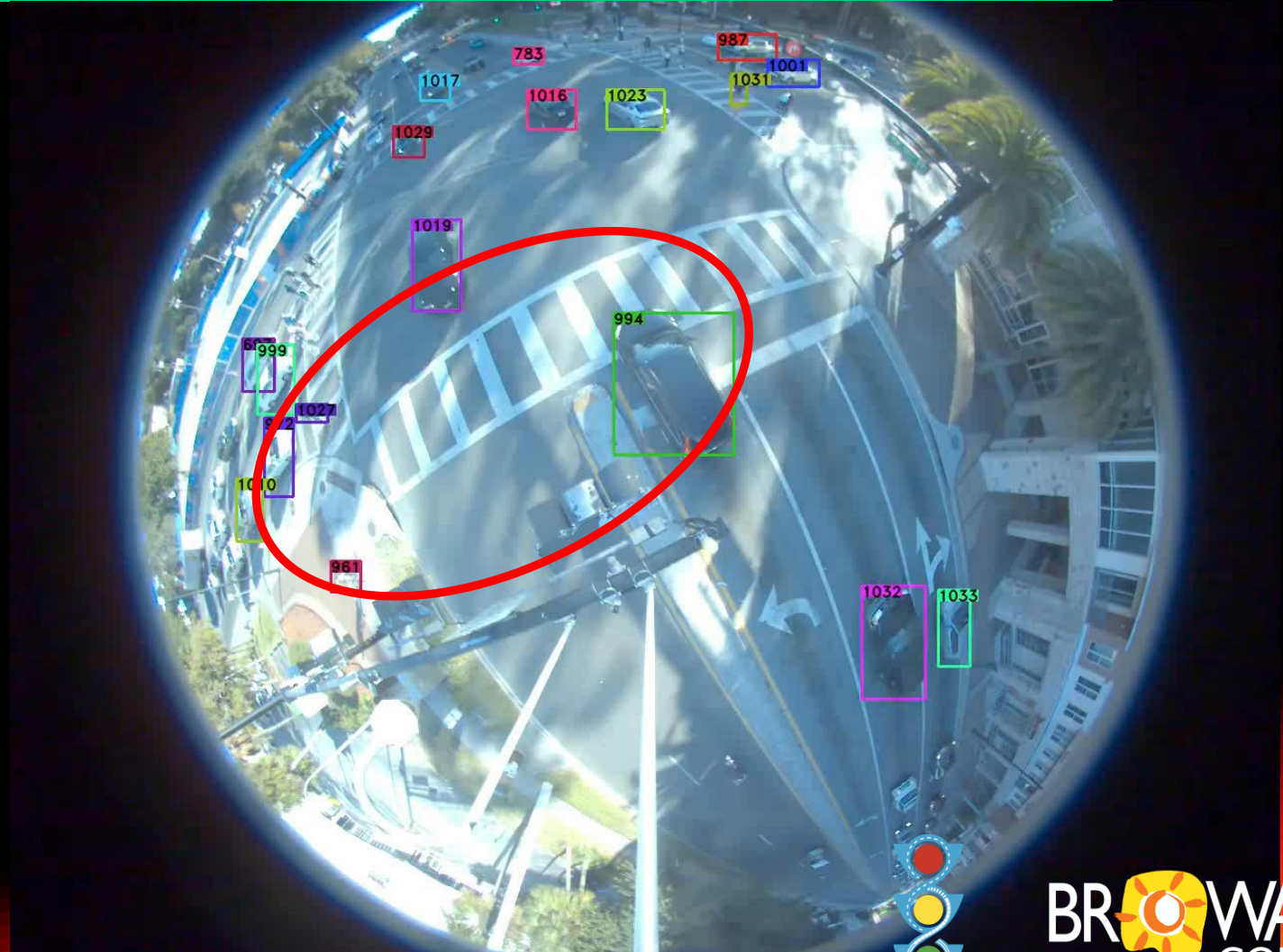
Artificial Intelligence (AI) algorithms will process video images captured from fisheye cameras along Stirling Rd to identify near-miss incidents.

Visual aid credits of this topic:
City of Gainesville, FL



Pedestrian-to-Vehicle (P₂V) Near Miss

Recorded near-miss of pedestrian (illegal crossing) with thru vehicle.



V₂V Near-Miss

Recorded near-miss of permissive (non-yielding) left-turning vehicle with thru vehicle.

Basler-2335772 2021-11-01 17:51:53 UTC 10.0



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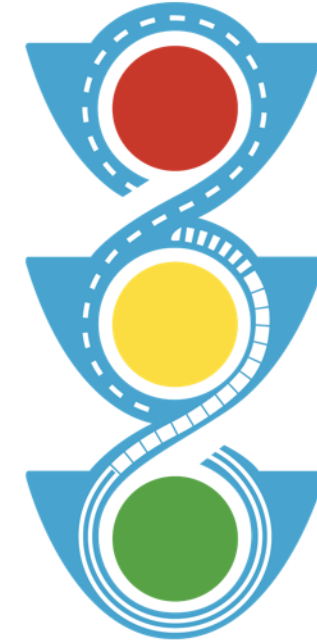


Thank you!
QUESTIONS?



Surtax Audit Plan Performance Reviews

Office of the County Auditor



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Office of the County Auditor

FY 2024 Audit Plan-Surtax

ROBERT MELTON, COUNTY AUDITOR, CPA, CIA, CFE, CIG

LAURA ROGERS, AUDIT MANAGER, CIA, CFE, CGAP, CCA

JED SHANK, AUDIT MANAGER, CPA, CIA, CISA, CCA

Audit Activity Update

Overview of audit activities and annual planning process

FY 2024 Audit Plan:

Planned Surtax Related Activities

FY 2023 Updates:

Summary of Completed Surtax Related Activities

Annual Audit Planning

Why Prepare an Annual Audit Plan?



Risk Based Assessment Process



Directs Limited Staff Resources to Needed Areas



Prioritize Critical Areas and Ensure Appropriate Audit Coverage



Inform Stakeholders

Types of Audit Services

Advisory or Consulting Services:

Tasks related to general review of information

Attendance at meetings

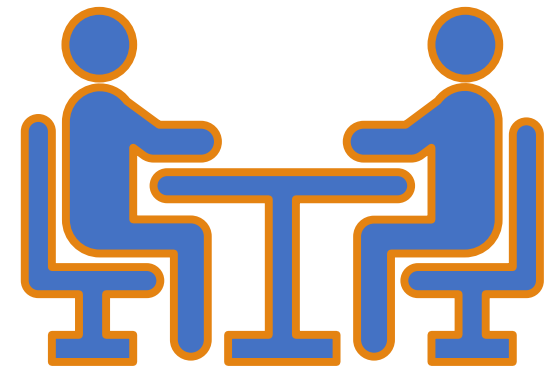
Providing advisory recommendations

Direct Audit Services:

Performance, Financial or Compliance Audits

Re-occurring, One-Time or 'Surprise' Audits

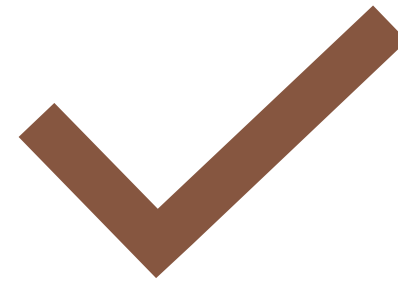
Conducted in Accordance with Generally Accepted Government Auditing Standards



Office of the County Auditor Annual Audit Plan



Presented in a Report to the Board
of County Commissioners



Surtax Audit Activity will be
included in the Overall Annual Plan

Office of the County Auditor

Annual Audit Plan

May include:

Audit Requests from Commissioners, County Administrator or Management

County Auditor's Discretionary Items

Investigations of Complaints

Flexibility:

Items not Completed are Generally Carried Forward to Following Year

Subject to Adjustments, Available Resources, and Changing Needs

FY 2024 Audit Plan- Surtax

Surtax Funded Audit Resources

One Full Time Position

Primary Assigned Surtax Liaison:

Laura Rogers, Audit Manager

Additional Resources:

County Auditor, Deputy County Auditor, Administrative Support
Audit Manager, Audit Senior and Audit Staff Positions

Advisory and Consulting Services

20%



Attendance at Oversight Board Meetings



Review of Surtax Items on BOCC Agenda



Negotiation Assistance for Surtax Funded Projects and Agreements



Review of Surtax Solicitations



Issuance of Advisory Memoranda

Direct Audit Services

80%



Audit of MAP Contract Administration



Audit of Municipality Agreement



Analysis of Municipality Fund Distributions

Audit of MAP Contract Administration Practices

Objectives:

Determine adequacy of contract administration practices and controls to safeguard County interests.

Identify opportunities for improvement



Audit of Municipality Agreement

Review of at least one selected
Municipal Agreement

Objectives include

- Financial- Expenditures, Invoices, Costs
- Performance- Services, Deliverables
- Compliance- Other Contract Elements
- Other Opportunities for Improvements

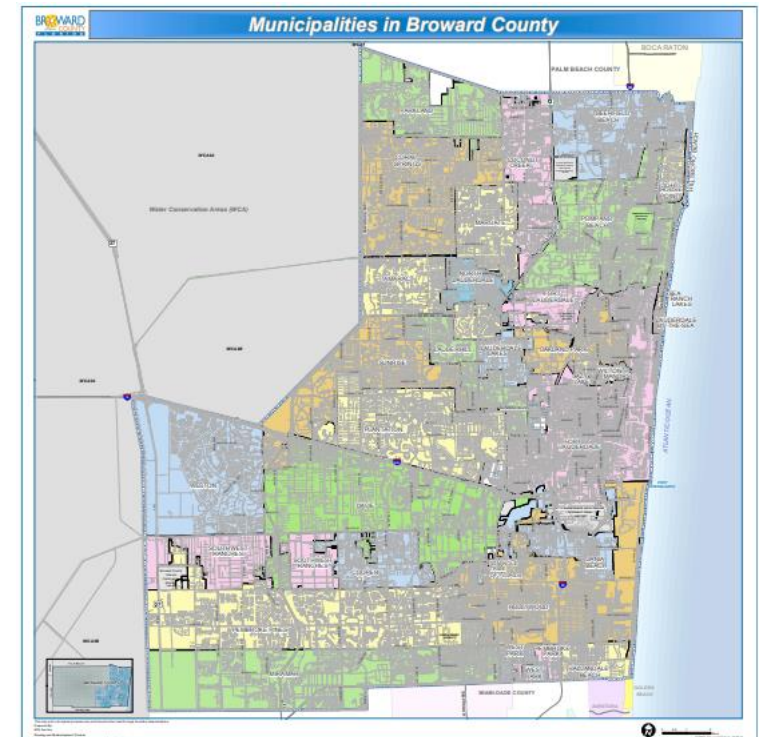


Analysis of Municipality Fund Distributions

Analysis of funding distributions across Municipalities
Review of projects, prioritization/ranking

Objectives:

- Determine equity
- Identify any opportunities for improvements



Other Related Audits

Audit of Paratransit Service Provider Contract Management and Compliance

Audit of Paratransit Rider's Choice Program

Objectives are to determine:

- Compliance with terms of agreement
- Assess performance
- Identify any opportunities for improvements



FY 2023

Audit Activity Updates

Audit of HCED Oakland Park Bridge Rehabilitation Project

Report No. 23-04 Issued November 30, 2022

https://www.broward.org/Auditor/Reports/Documents/Exh1_0AuditofHighwayandBridgeMaintBridgeRehabOPBR_ReportNo_23-04.pdf

Overall Conclusions:

- The applied contracting model is in accordance with best practices and competitive solicitation, except as noted
- The project scope, in-house, and contractor's estimates were adequately prepared and reviewed
- Pay applications were adequately reviewed, reflected actual work performed, and were compliant with contractual requirements



Audit of HCED Oakland Park Bridge Rehabilitation Project

Opportunities for Improvement:

- Procurement Methods Other Than Open-end / Master Price Agreements Should be Used for Significant Projects
- Additional Costs Associated With an Alternative Work Methodology to Maintain Traffic Flow was not Clearly Reflected Within the Estimates or Properly Procured
- Project Estimates Should Use Independently Determined Competitive Market Prices

Follow Up Audit of Transportation Department's Community Shuttle Program

Original Report No. 22-14 Issued August 24, 2022

www.broward.org/Auditor/Reports/Reports/090822_Ehx1_AudCommShut_RptNo22_14.pdf

Original Report Overall Conclusions:

- Municipalities are in compliance with Agreements
- Fiscal controls and oversight are adequate
- Resources are used appropriately
- Funding sources are appropriately applied and reported



Follow Up Audit of Transportation Department's Community Shuttle Program

Report No. 24-02, issued October 10, 2023:

- Of the 17 recommendations in the original report, 10 were implemented and 7 were partially implemented.

Key Partially Implemented Recommendations:

- Reporting metrics to the appropriate level of governance.
- Formalize an internal policy identifying maximum timeframes to notify municipalities of non-compliance.

Other Transportation Related Audits Completed

Report No. 23-08, issued February 22, 2023:

Follow Up Review of Audit of Transit Division's Information Technology Operations

[Microsoft Word - Follow-up Review of Audit of Transit Division's Information Technology Operations - Report No. 23-08 \(broward.org\)](#)

Original Report No. 20-01 contained 30 recommendations regarding various information technology and security related controls.

Of these, 20 were implemented, and 10 were partially implemented.

FY 2023 Advisory Memoranda Issued

RFP Reviews:

No. 275, RFP Sheridan Street Expansion, Step 2

No. 278, RFP Transportation Vertically Integrated Project Management

No. 282, RFP Design Services Andrews Avenue Improvements

No. 289, RFQ Sheridan Street Bridge, Step 1

No. 294, RFP Consultant Services Pembroke Rd and Palm Av Intersection Improvements

No. 303, RFP Construction Engineering Inspection Services for W Hillsboro Rd

Questions?



MAP Broward

Mobility Advancement Program

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MAP Broward FY 2024 Public Outreach Plan

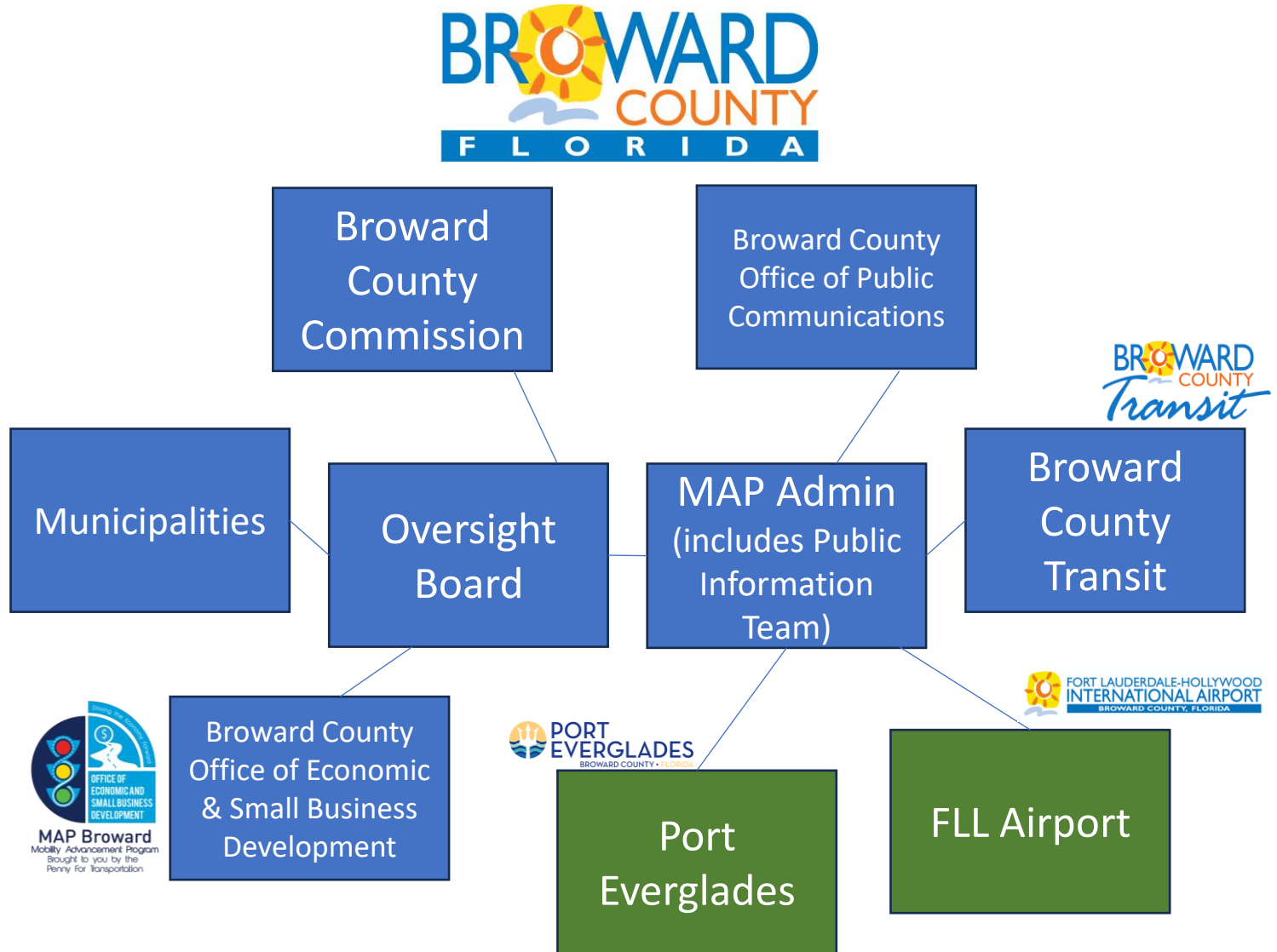
Oversight Board Regular Meeting and Retreat

Tashauna Wilson, Marketing Manager

October 20, 2023

Who we are and how we operate

- Support and inform the Oversight Board
- Collaborate with County and Municipal staff across agencies for cross-functional activities (i.e. reporting, messaging, event partnerships, etc.)



What We Do (examples)

- Implement brand and messaging strategies backed by audience and industry research
- Develop and distribute surtax-related messaging for the public, the Oversight Board, county and municipal staff, elected officials, and executive leadership upon request
- Coordinate events with local, regional, and national partners/stakeholders to capture curated information for various audiences
- Provide education to residents, visitors, community groups, etc. about surtax programming, specific projects for which non-surtax funds are being sought, the public project dashboard and more
- Secure, track, and monitor media coverage in local and national publications
- Oversee digital outreach efforts, including but not limited to social media, county/municipal e-newsletters, Oversight Board and Appointing Authority meeting livestreaming, promotional videos, etc.
- Coordinate project signage installation for construction projects from project start to finish, including memorialized signage
- Develop MAP Broward Annual Report and all other print and digital outreach materials
- Provide translated materials in Spanish, Creole, and Portuguese

Public Outreach Overview

Recent accomplishments include:

- Agreed upon branding for transit vehicles and infrastructure (began applications in November 2022)
- Completed Public Perception Survey (October 2022) & Regional Focus Groups (December 2022)
- Released & distributed FY 2022 Annual Report, the program's first digitally animated report, to all Broward stakeholders and the public
- Received national recognition for Public Perception Survey and Focus Group initiative
- Media coverage: WLRN, NBC 6 South Florida, Miami Community News, and several municipal publications
- Launched "Project Highlights" video campaign, garnering over 1,000 views on YouTube and across social media platforms
- Over 1,700 followers across social platforms as of 9/22/23
- Hosted three (3) largely-attended ribbon cutting ceremonies in Davie, Hollywood, and Wilton Manors
- Sponsored the 6th Annual OESBD Broward and Beyond Business Conference with keynote speaker, Anthea Pennant-Wallace, Oversight Board Vice Chair
- Over 50 presentations made to city and county commissioners, community groups, advisory boards
- Nearly 100 signs installed to date (project signage for construction and memorialized signage); not inclusive of transit branding

MAP Broward FY 2024 Public Outreach Plan

Purpose: *The purpose of this plan is to establish, build and maintain relationships while increasing brand awareness with MAP Broward’s stakeholders so together we may better inform residents and visitors of progress on surtax-funded projects. This plan focuses on activities for FY 2024; some activities may continue into the following fiscal year(s) as part of a 5-Year Public Outreach Plan.*

This plan was created to guide and assure progress is consistently made for the Mobility Advancement Program Administration’s Public Outreach and Engagement Plan



Telling the Surtax Program Story

Segue branding was attempted during the pandemic and efforts require continuation to connect the education campaign to the established program. One of our objectives this year is to tell more of the Penny for Transportation story and how it became MAP Broward.



GOAL: Ensure 90% of all Broward County Transit (BCT) projects funded with the transportation surtax are properly branded by Q4

Baseline: To date, we have completed over 47 bus stops and 258 transit shelters funded entirely by the surtax. That infrastructure is not branded.

Signage is key in raising public awareness of surtax-funded projects countywide. They serve as “program progress billboards”. The addition of signage will also aid public outreach efforts.

Strategy: Collaborate with BCT to increase volume of branded signage for surtax-funded projects



GOAL: Ensure 90% of all Broward County Transit (BCT) projects funded with the transportation surtax are properly branded by Q4

Tactics:

- ✓ Collaborate with BCT to implement signage for surtax-funded bus infrastructure (~300 shelters and stops)
 - Identify costs regarding BCT advertisement packages (benches, bus wraps, etc.)
- ✓ Cross-promote on social media channels and TransitFlash e-newsletter



Costs Associated: ~\$30,000 for BCT project signage and advertisement packages

GOAL: Increase Multicultural Outreach & Education Efforts

Baseline: According to the Census, the top three most-commonly spoken languages in Broward County, are Spanish, Haitian Creole, and Portuguese. MAP Broward has translated and distributed both print and digital materials in these languages year-over-year

Strategy: Engage “linguistically isolated” households (non-English speaking) and the local community groups/leaders that engage with the demographic (chambers, NPOs, advocacy groups, faith-based organizations, schools, etc.)

Tactics:

- ✓ Translate surtax project videos into Spanish, Portuguese, and Creole
- ✓ Purchase ads to share program information on non-English-speaking podcasts/radio stations
- ✓ Attend and table at community & cultural events to showcase the surtax program and projects; multilingual staff present to engage with public
- ✓ Collaborate with regional partners and local influencers to reach diverse audiences

Costs Associated: \$80,000 – includes translation services (up to \$7k per language per order); \$20k for ad spots on South FL podcasts/radio; promotional materials; events

GOAL: Obtain 10 media placements by Q3 FY 2024

Baseline: Earned placements in every major publication in South Florida since program inception

Strategy: Collaborate with local media contacts to secure coverage on upcoming surtax projects—media landscape including local social media influencers, podcasts, etc.

Tactics:

- ✓ Pitch five (5) project feature stories centered on program goals
 - Highlight adaptive signal control; Late Shift Connect; Multimodal Mobility Master Plan; small business goal wins
- ✓ Participate or large-scale events in Broward County that historically receive local media coverage
- ✓ Coordinate with county agencies for cross-promotion as surtax projects roll-out (OESBD, BCT, Airport, Intermodal Center, etc.)

Costs Associated: Digital materials; paid booths and banners estimated \$20-\$25K (already in budget)



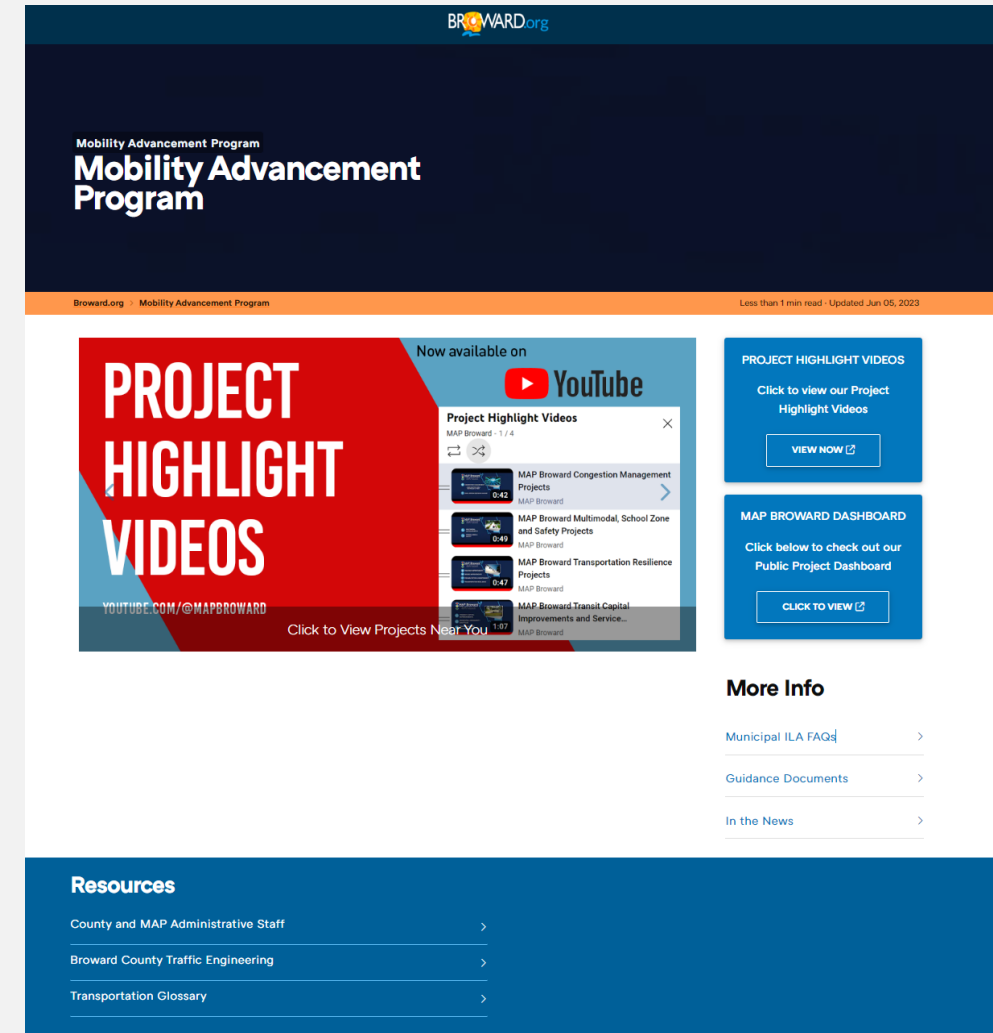
GOAL: Establish new website to increase number of unique visitors by 40% over baseline in FY 2024

Baseline: MAP Broward currently has an average of 2,000 site visits per month with no reports on the unique visitors per month

Per recommendation from Broward County's Office of Public Communications (OPC), MAP Broward is establishing a separate site from Broward.org to offer enough bandwidth to embed the public Project Dashboard and other large files and videos.

Tactics:

- ✓ Once website is developed, use SEO software to conduct regular site audits to update keywords quarterly; boost site ranking
- ✓ Create and monitor Google Analytics profile to accurately track web traffic and unique site visits
- ✓ Partner with municipalities to host links to new website URL ("backlink") on their municipal sites to boost new website over current Broward.org links
- ✓ Embed public dashboard on a webpage to more accurately track unique visitors



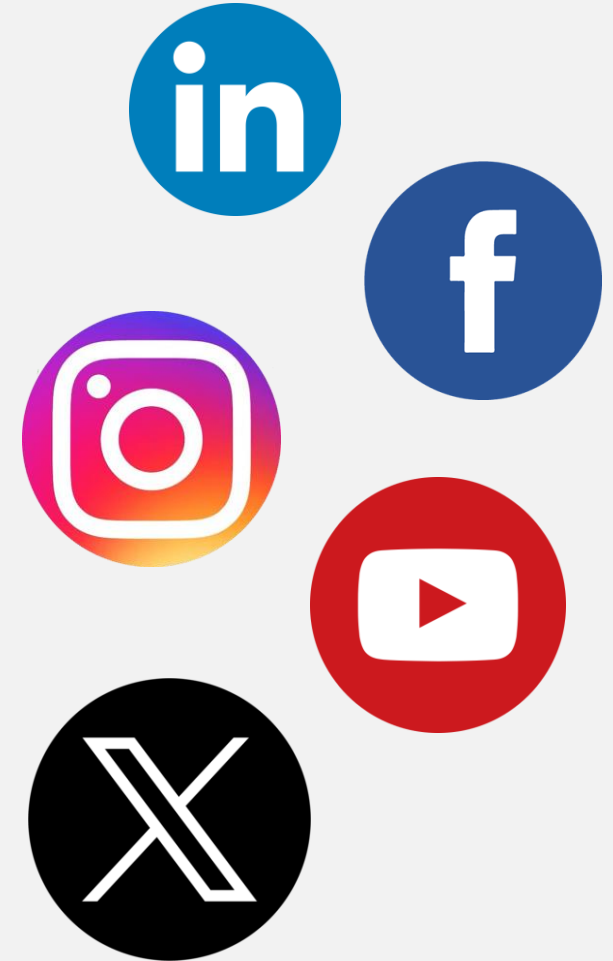
GOAL: Increase engagement on social media by 30% over FY 2023 baseline

Baseline: To date, MAP Broward social media engagement is as follows:

- Over 1,700 followers across 5 platforms
- An average of 2,300 “impressions” per month (i.e, the number of times posts on Facebook, Instagram, LinkedIn, and X pages or accounts appeared on someone’s screen)

By recommendation of the Transportation Surtax Oversight Board, MAP Admin aims to expand its digital marketing efforts on social media to boost public understanding of the program and its impacts.

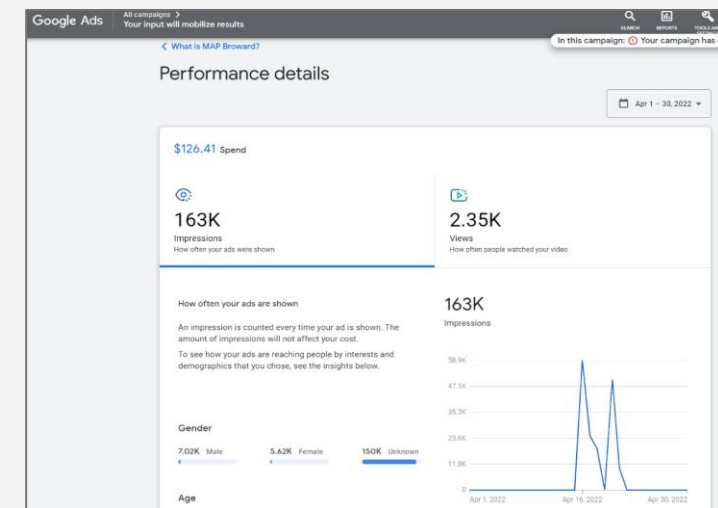
Strategy: Enhance social media content and management; explore targeted social media messaging; and implement a scheduling system



GOAL: Increase engagement on social media by 30% over FY 2023 baseline – (cont.)

Tactics:

- ✓ Create and schedule month-long content series for various brand-aligned topics
- ✓ Coordinate work with Public Works and BCT to create project visualization videos for large-scale, highly funded, surtax projects – i.e., PREMO Rail, Sheridan St, Port Adjacent Route (Eller Drive), etc.
- ✓ Identify and engage with local influencers for sponsored content
- ✓ Schedule regular video shoots to create more content for social media and other digital marketing
- ✓ Livestream ribbon cutting and groundbreaking ceremonies
- ✓ Implement AR/VR features and 3D-optimized videos
- ✓ Project site visits with drone video recording; take photos of Construction-phase projects both ongoing and completed – lead by incoming *Public Information Specialist*
- ✓ Digital Ads – Run quarterly PSA ad campaigns to drive traffic to new website and project-related events (Facebook, Instagram, YouTube)

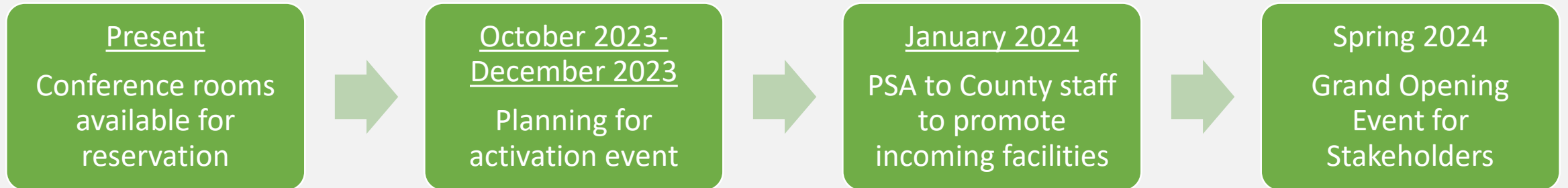


On the Horizon

For FY 2024 and beyond

- More program videos and collaboration with local and regional partners on visualizations
- Drone videos of projects (before, during, and after) under construction
- Storyboards and 3D project visualizations; AR/VR educational content
- Using surtax funded school zone projects as K-12 engagement opportunities
- Re-activation of Core Surtax Team for interagency cross-functions
- Ensuring all completed projects have videos and/or photos via site visits and then adding completed project videos/photos to dashboards (*Dashboard Review*)
- Multi-lingual, multi-cultural engagement and outreach
- Project groundbreaking, ribbon cuttings, and project public outreach
- **Local, state, and federal elected officials invited to Surtax Plaza and future meetings to learn about the program from municipal and County stakeholders**

Surtax Public Plaza



What **else** would you like to see?

Q & A



Thank You

LUNCH BREAK

- **Oversight Board ID Badge appointments**



Transportation Department Updates

Coree Cuff Lonergan, General Manager



MAP Broward
Mobility Advancement Program
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Agenda

- Marketing Campaigns
- Community Outreach
- Public Service Announcements
- Copans Road Facility Project Update
- Comprehensive Operational Analysis (COA)
- Late Shift Connect Program
- Community Shuttle Program
- Bus Operator Hiring Efforts/Status
- Commuter Rail South

Marketing Campaigns

Our goal is to have consistent, targeted, multi-lingual messaging throughout the year highlighting and reinforcing the benefits of our current services and promoting our new programs and enhanced services.

- Ridership Campaign
- Mobile App Campaign
- Community Engagement Campaign
- Broward County Micro Transit Campaign
- PREMO Campaigns
 - Broward Commuter Rail South
 - Oakland Park BRT
 - LRT (Airport, Seaport, Convention Center)



Community Outreach

Engage, Participate and Partner

- Engage the community through surveys and outreach
- Participate in community parades and ceremonies
- Partner in a diverse selection of community events



Public Service Announcements

Develop messaging plans that communicates, supports and aides the community of resources available as well as events and other beneficial topics.

- Mental Health Awareness
- Rent Assistance
- Hurricane Preparedness
- Healthcare
- Heat or Cold Advisories
- Events

MAY IS MENTAL HEALTH AWARENESS MONTH



MENTAL HEALTH
MATTERS
BE KIND TO YOUR MIND

NEED TO TALK?

First Call for Help: 2-1-1
Mental Health Hotline: 754-321-HELP (4357)
National Crisis Text Line: 741741
National Suicide Prevention Lifeline: 9-8-8

**HURRICANE
PREPAREDNESS
WEEK**



April 30-May 6, 2023

Broward.org/Hurricane

Copans Road Facility Project Update



Copans Road
Facility
Rehab/Upgrade
Construction
(\$225.68M)

Construction:
Summer 2024

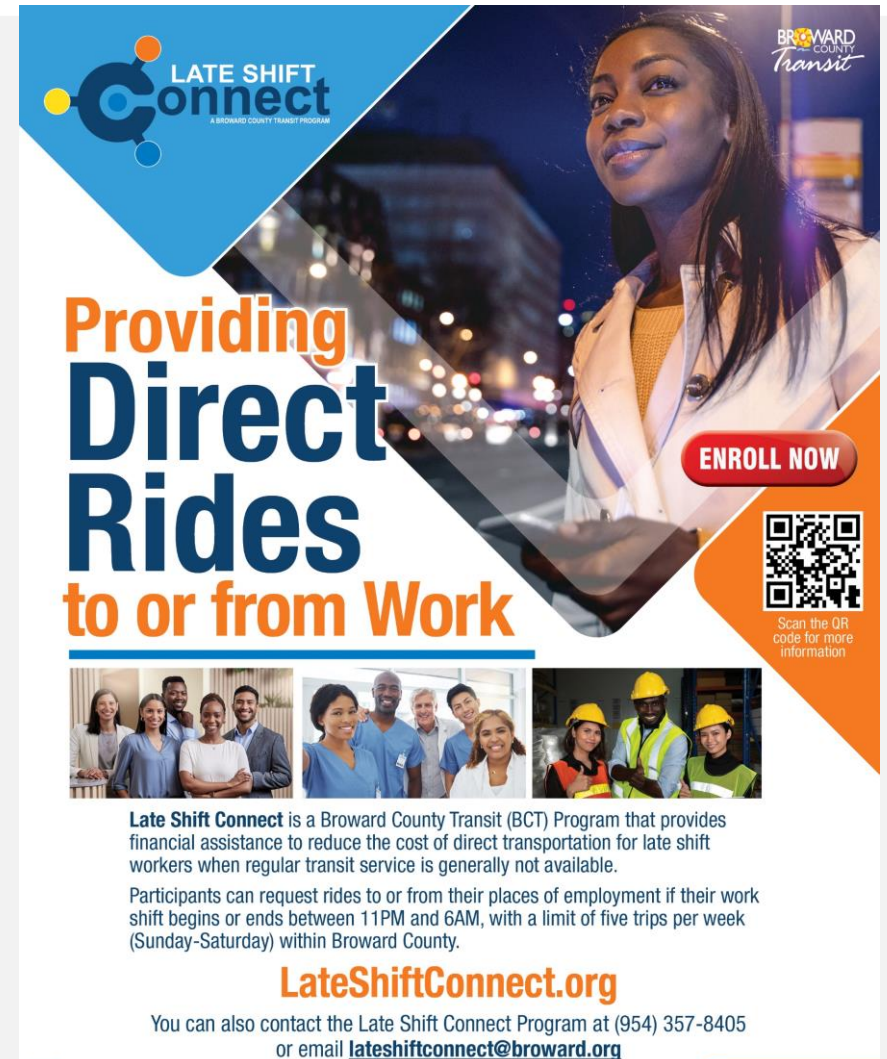
- Site construction
- Stormwater Drainage
- Structural steel and precast Concrete Masonry Units/ Concrete
- Waterproofing and Roofing
- Site Lighting & CCTV Monitoring
- Drywall & Insulation
- Electrical/ Solar components
- Metal Framing (Interior)
- Utilities Coordination and Installation
- Finished Asphalt/Pavement Improvements
- Perimeter Fencing Installation

Comprehensive Operational Analysis (COA)

- COA will assess current and future needs and recommend transit improvements to increase ridership
 - Modernize the existing Fixed-Route and Express Bus service based on travel demand
 - Integrate with PREMO Plan
 - Analyze possible Micro-transit and other Mobility on Demand solutions
 - Review Community Shuttle System
- Includes Extensive Public Outreach
- Schedule
 - Notice to Proceed Issued on July 25, 2023
 - Completion Scheduled for December 2024

Late Shift Connect Program

- Program launched 8/22/2022
- Multilingual information on the program was advertised on TV, radio, print, digital channels, social media platforms, e-blasts and e-newsletters, and posted on Broward County Transit's website, on buses and at Transit facilities
- 650 people have applied
- 457 people were approved
- 897 trips have been taken by 86 people



The advertisement features a large image of a woman in a white lab coat looking at a tablet. The text 'LATE SHIFT Connect' is in the top left, with 'A BROWARD COUNTY TRANSIT PROGRAM' below it. The main headline reads 'Providing Direct Rides to or from Work'. A red button says 'ENROLL NOW' and a QR code is in the bottom right with the text 'Scan the QR code for more information'. At the bottom, there are three small photos: a group of people, a group of healthcare workers, and a group of construction workers. Below these photos is a paragraph of text describing the program and its benefits. The website 'LateShiftConnect.org' is listed, along with contact information: '(954) 357-8405' and 'lateshiftconnect@broward.org'.

Late Shift Connect is a Broward County Transit (BCT) Program that provides financial assistance to reduce the cost of direct transportation for late shift workers when regular transit service is generally not available.

Participants can request rides to or from their places of employment if their work shift begins or ends between 11PM and 6AM, with a limit of five trips per week (Sunday-Saturday) within Broward County.

LateShiftConnect.org

You can also contact the Late Shift Connect Program at (954) 357-8405 or email lateshiftconnect@broward.org

Community Shuttle Program

- Ridership 61% of pre-pandemic levels
 - FY23 Ridership increased 9.8% over FY22
 - 62% of routes above 7.1 Passenger Per Hour (PPH) requirement
 - PPH increase 12.5% over FY22
- Increasing from 17 to 19 municipalities
 - Increasing 50 to 56 routes
- New vehicle branding project
- Propane conversion project
- ADA bus stop accessibility project
 - 1,000 stops over 5 years
- Micro-transit Pilot



Bus Operator Hiring Efforts

- On-site BCT Hiring Event at the Urban League of Broward County in Fort Lauderdale 8/4/2023
- Applicants provided the opportunity see an electric bus, and speak with current Bus Operators, Trainers and Supervisors
- Able to apply, interview, and if selected receive an immediate job offer
 - 121 applicants attended
 - 45 offers issued for Bus Operators
 - 7 offers issued for Coach Service Attendants

Bus Operator Hiring Status

Bus Operator Training Class Graduation Dates	Total Bus Operator Positions	Bus Operator Vacancies	Estimated Bus Operator Attrition	Estimated Class Graduation Size	Total Estimated Bus Operator Vacancies	Estimated % Vacancies
October 13, 2023	845	91	NA	9	82	9.7%
December 31, 2023	845	82	20	50	52	6.2%

Commuter Rail South

- 8/24/2023 - Small Starts Project Rating Application submitted for the Commuter Rail South project for the FTA Capital Investment Grants Program
- Addressed FTA's Initial Comments and Documents Included:
 - Ridership Forecast Model and Report
 - Capital and O&M Cost Estimates
 - Financial Plan (Partial)
 - Land Use and Economic Development Report
 - Small Starts Application Template
 - Letter of Support
- Estimated overall project rating: Medium-High

Discussion?

Q&A?

Discussion Items



MAP Broward
Mobility Advancement Program
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Discussion Item 1

1. **Broward County City Manager's Association Proposals for a 3rd Amendment to the Transportation System Surtax Interlocal Agreement (*Chair, C. Douglas Coolman*)**

Revisiting Certain Roles and Responsibilities of the Independent Transportation Surtax Oversight Board



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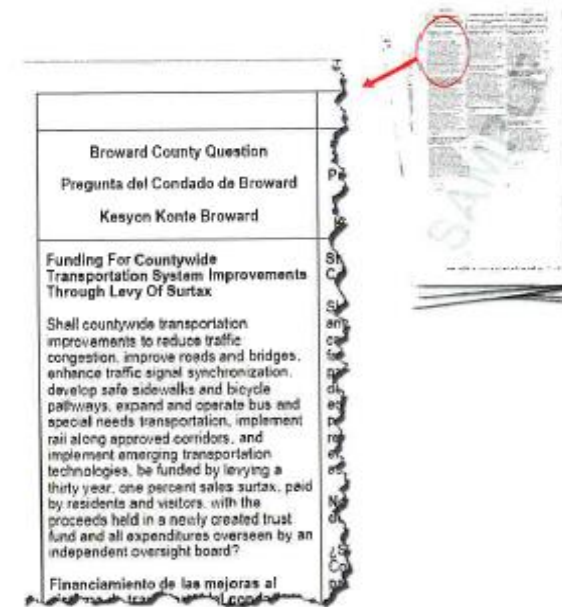
General Overview & History - 2018 Ballot Language

“FUNDING FOR COUNTYWIDE TRANSPORTATION SYSTEM IMPROVEMENTS THROUGH LEVY OF SURTAX

Shall countywide transportation improvements to reduce traffic congestion, improve roads and bridges, enhance traffic signal synchronization, develop safe sidewalks and bicycle pathways, expand and operate bus and special needs transportation, implement rail along approved corridors, and implement emerging transportation technologies, be funded by levying a thirty year, one percent sales surtax, paid by residents and visitors, with the proceeds held in a newly created trust fund **and all expenditures overseen by an independent oversight board?**”

BALLOT LANGUAGE

The question is located on the back of page three, top left, first County question. It reads:



INDEPENDENT OVERSIGHT COMMITTEE

A 9-member Board (“Oversight Committee”), nominated by 7 independent community entities (“Appointing Authority”), is intended to:

- Monitor revenue, expenses, assumptions and forecasts
- Evaluate projects for eligibility
- Remove politics from the project review process
- Track progress milestones
- Report on activities and offer transparency to the public

Example of popular mailer/flyer during the educational campaign in 2018 describing the Oversight Board’s Role



Excerpts from Article V, Section 31 ½ - 75

Broward County Code of Ordinances

“To ensure accountability and transparency in the expenditure of Transportation Surtax proceeds, there is hereby established an independent Transportation Surtax Oversight Board ("Oversight Board"). The Oversight Board shall review and approve all proposed expenditures of Transportation Surtax proceeds to ensure consistency with the requirements of Section 212.055(1)(d), Florida Statutes. No expenditure of Transportation Surtax proceeds may be made unless such expenditure has been approved by the Oversight Board. . .

(j) **Project Oversight**. All projects and expenditures funded with Transportation Surtax proceeds shall be subject to the Oversight Board's review, critique, and assessment for the duration of the projects or expenditures. The Oversight Board shall issue reports on the performance of ongoing projects and shall provide recommendations to the Broward County Administrator and the County Commission for any proposed performance improvements.” *(Relevant to Discussion Item 2a)*

Excerpts from Code of Ordinances (cont.)

(5) **MPO Review Process.** With regard to proposed municipal capital projects (projects that do not involve rehabilitation or maintenance of roads) that a municipality requests be funded with Transportation Surtax proceeds, Broward MPO staff will review the project and shall:

- a. Indicate their acceptance of the project application without modification, and proceed to rank and prioritize the project application; or
- b. With the concurrence of the Office of the County Attorney (which may not be granted prior to consultation with the municipality's legal counsel), notify the municipality that staff will not consider the project application because it is not eligible for funding under an applicable contractual or statutory provision; or
- c. Return the project application to the municipality with proposed revisions, and, after receipt of the municipality's resubmitted application, proceed either to rank and prioritize the project application per subsection a. above, or notify the municipality that staff will not consider the project application per subsection b. above.

(Relevant to Discussion Item 2b)

Excerpts from Code of Ordinances (cont.)

(i) Approval of Proposed Projects and Proposed Expenditures.

(1) County staff assigned to support the Oversight Board shall at least annually compile all County and municipal proposed projects and proposed expenditures that will be considered for funding with Transportation Surtax proceeds, consistent with budgetary recommendations, and present them to the Oversight Board for approval as to statutory eligibility. The Oversight Board shall consider proposed projects and proposed expenditures submitted by the County only for eligibility under Section 212.055(1)(d), Florida Statutes, with due consideration given to the opinion of the Transportation Surtax General Counsel to the extent the applicable eligibility determination involves a question of statutory construction.

- a.** If the Oversight Board determines that a proposed project or proposed expenditures are statutorily eligible, the Oversight Board shall send written notice thereof to the Broward County Administrator, which written notice may contain recommendations made by the Oversight Board regarding best practices or other methods that may be employed to improve a proposed project or proposed expenditures.
- b.** If the Oversight Board determines that a proposed project or proposed expenditures are only partially fundable with Transportation Surtax proceeds, the Oversight Board's written notice to the Broward County Administrator shall identify those portions of the proposed project or proposed expenditures the Oversight Board determines are fundable with Transportation Surtax proceeds.
- c.** If the Oversight Board determines that a proposed project or proposed expenditures are not eligible for funding with Transportation Surtax proceeds, the Oversight Board shall, in writing, specify the reasons for such determination. Such proposed project and proposed expenditures may be modified and resubmitted to the County for its consideration and, if applicable, for reconsideration by the Oversight Board.
- d.** The Oversight Board shall issue its written notice regarding statutory eligibility of proposed projects and expenditures no later than thirty (30) days after the meeting during which the proposed project and proposed expenditures were considered (or, for resubmitted projects, reconsidered). (*Relevant to Discussion Item 2b*)

Discussion Item 2

2. Role of the Oversight Board (in ordinance and potential 3rd Amendment)

a. Revisiting 31 ½-75 (j) **Project Oversight as it relates to “mega projects”.** (Phil Allen)

“All projects and expenditures funded with Transportation Surtax proceeds shall be subject to the Oversight Board's review, critique, and assessment for the duration of the projects or expenditures. The Oversight Board shall issue reports on the performance of ongoing projects and shall provide recommendations to the Broward County Administrator and the County Commission for any proposed performance improvements.”

b. Revisiting 31 ½ -75 (i)1 – **Approval of Proposed Projects and Proposed Expenditures.** (Chair, C. Douglas Coolman)

“The Oversight Board shall consider proposed projects and proposed expenditures submitted by the County only for eligibility under Section 212.055(1)(d), Florida Statutes, with due consideration given to the opinion of the Transportation Surtax General Counsel to the extent the applicable eligibility determination involves a question of statutory construction.”

Chair Report

Member Reports

General Counsel Report

Board Coordinator Report

- Financial Reports in binder materials
- Programmatic Reports in binder materials

Adjourn October 20, 2023 Oversight Board Retreat