

TRANSPORTATION SITE IMPACT HANDBOOK 2014 Edition



Andrew Young

ESTIMATING THE TRANSPORTATION IMPACTS
OF GROWTH

Session 2 (Chapter 2 - Part 1)

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CHAPTER 2 – Transportation Impact Process



Your Panelists



Gary
Sokolow
(FDOT)



Gina
Bonyani
(FDOT)



Andrew
Young
(FDOT)



Nathan
Hicks (CDM
Smith)



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CHAPTER 2 – Transportation Impact Process



Common Questions

You will get a copy of the presentation in a day or two

1.5 CM Credits # **30498**

1.5 PDH Credits

There will be a recording (no credit however)

3



Webinar Intro

MUTED



All Participants are muted



Ask question via Question Tab at any time

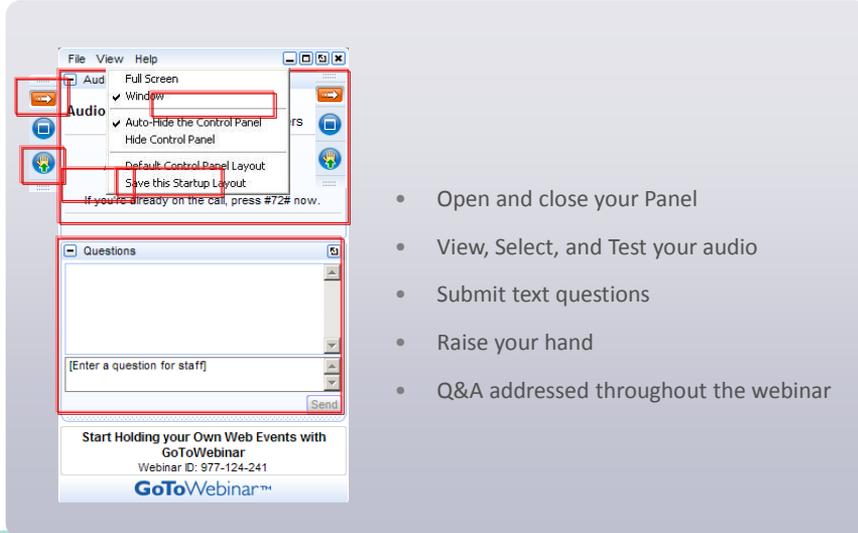


Question & Answer Session during the presentation

4



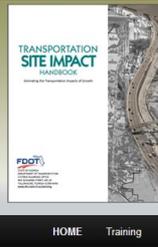
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- Open and close your Panel
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- Q&A addressed throughout the webinar

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TRANSPORTATION SITE IMPACT HANDBOOK
FLORIDA DEPARTMENT OF TRANSPORTATION

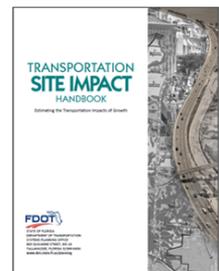
HOME Training Contacts

Search

[TSIH_April_201404.pdf](#)

The Florida Department of Transportation (FDOT) has developed these guidelines to assist FDOT staff in their review of developments. While this handbook is primarily for FDOT staff, it is available to local governments and other transportation partners in an effort to communicate the FDOT's guidance for reviewing various documents.

The purpose of this document is to guide the professional through the current generally accepted professional practice. This should assist in making better decisions for the study of the transportation impacts of new developments.

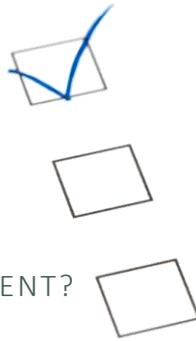


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<http://fdottransportationimpacthandbook.com/>

OPEN HANDBOOK CURRENT VERSION April 4, 2014





WHO DO YOU REPRESENT?

Poll



Download the Handbook!



TRANSPORTATION SITE IMPACT HANDBOOK

FLORIDA DEPARTMENT OF TRANSPORTATION

HOME Training Contacts

HOME

Welcome to the FDOT...

We are proud to announce the new Transportation Site Impact Handbook!

We've renamed the document to help you differentiate between our documents.

[TSIH_April_201404.pdf](#)

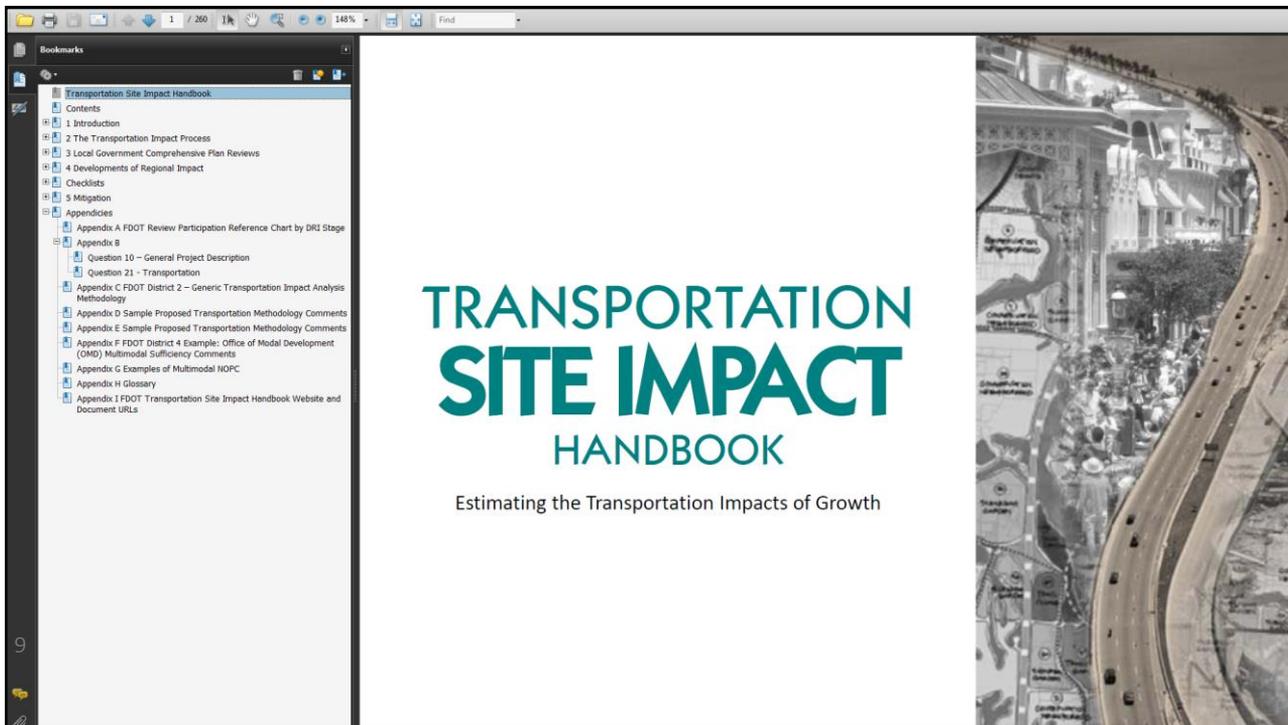
Right Mouse Click

- Open Link
- Open Link in New Tab
- Open Link in New Window
- Save Target As...
- Print Target
- Show Picture
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Search

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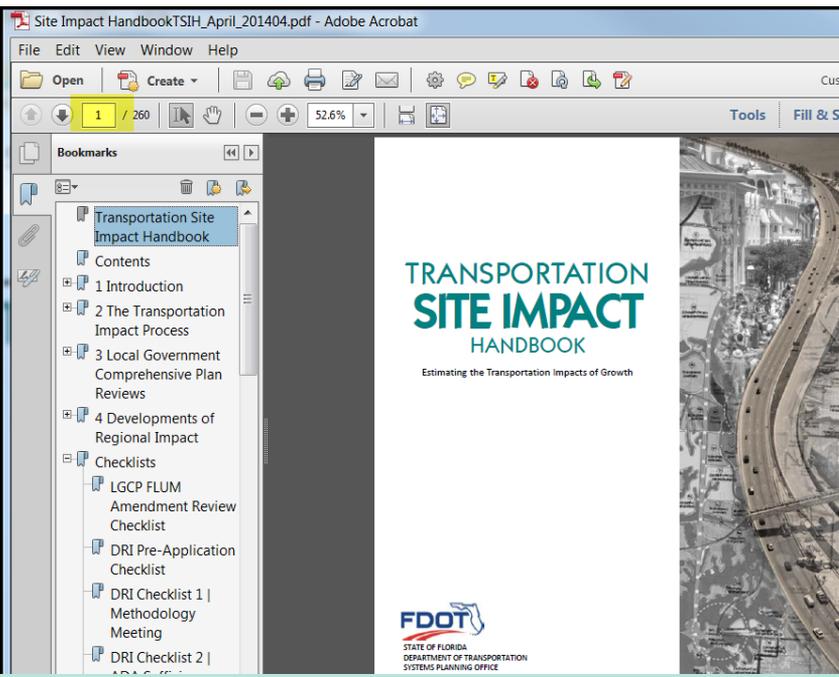




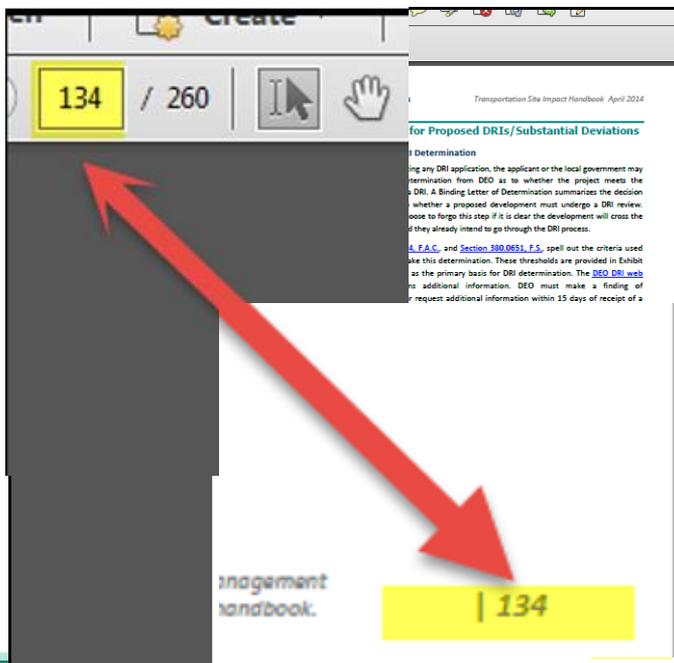
Matching Page Numbers in Adobe Acrobat

- The cover is page 1

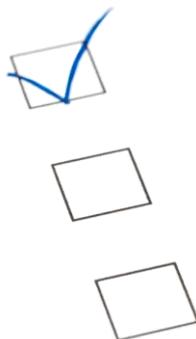
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Matching Page Numbers in Adobe Acrobat



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Poll

DID YOU ATTEND OUR LAST WEBINAR IN APRIL?



Caveat Emptor Caveat Venditor



caveat emptor

[kav-ee-aht emp-tawr, -at, kah-vee-, key-; Latin kah-we-aht emp-tohr]

1. let the buyer beware: the principle that the seller of a product cannot be held responsible for its quality unless it is guaranteed in a warranty.

We have tried to have the most up to date information. However, due to changes in legislation and acceptable practices, we recommend you check with the links in this handbook.

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Questions?



What are we covering today?



Gina Bonyani



CHAPTER 1 – Introduction



CHAPTER 2 – Transportation Impact Process



CHAPTER 3 – Local Government Comprehensive Plans Review



CHAPTER 4 – Development of Regional Impact



CHAPTER 5 – Mitigation

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Chapter 2



Largest Chapter
Much is the same



Incorporated materials
added in training since 2010

The Transportation Impact Process

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What Are the Objectives of the Transportation Impact Study?

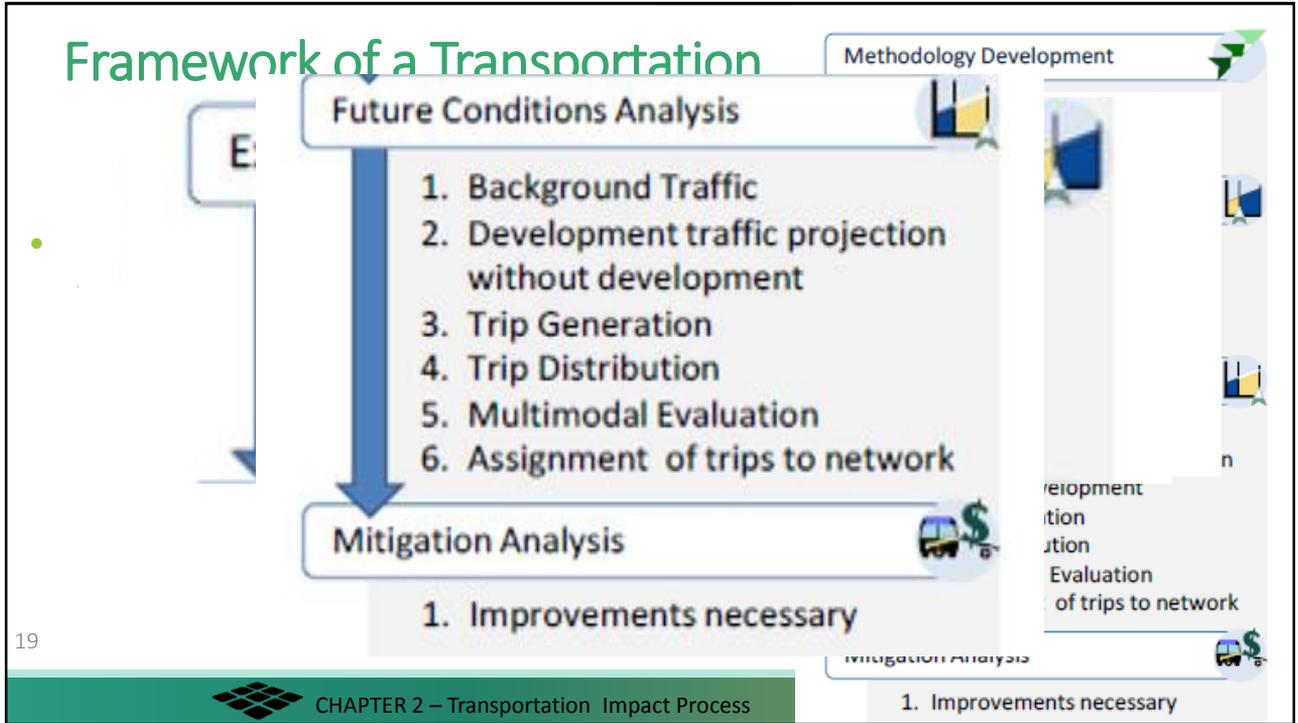
- Dialogue Forum
- Fair Assessment
- Safe and efficient transportation near development

Adapted from: Transportation Impact Analysis for Site Development, ITE 2005
Page 17 – TSI Handbook

The Types of Site Impact Studies We Review

- Developments of Regional Impact (DRIs)
- Comprehensive Plan Amendments
- Concurrency Review (sub DRIs) on occasion
- Access permit studies





Establish responsibilities and analyses that will be performed

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Methodology Development

Page 21 – TSI Handbook

CHAPTER 2 – Transportation Impact Process

Centennial FDOT

Methodology checklist

- Comprehensive
- Specifically for DRIs, but can be modified for any study

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Page 165 – TSI Handbook

DRI Checklist 1 | Methodology Meeting

1 of 3

Project	Reviewer	Date of Review: Comments Due:	
Project Information			Y N N/A
A. Site relative to the surrounding roadway network shown?	1. In map format?		<input type="radio"/> <input type="radio"/> <input type="radio"/>
B. Project phasing shown?	1. Single phase project?		<input type="radio"/> <input type="radio"/> <input type="radio"/>
	2. Multiple phases?		<input type="radio"/> <input type="radio"/> <input type="radio"/>
C. Proposed buildout year(s) of project phase(s) identified?			<input type="radio"/> <input type="radio"/> <input type="radio"/>
D. Development defined in acceptable manner for each phase of implementation?	1. Number dwelling units (DUs) for residential land uses?		<input type="radio"/> <input type="radio"/> <input type="radio"/>
	2. Square feet (SF or GLSF) for commercial, office, retail, industrial land uses?		<input type="radio"/> <input type="radio"/> <input type="radio"/>
E. Acceptable study area limits identified?	1. Critical roadway segments identified?		<input type="radio"/> <input type="radio"/> <input type="radio"/>
	2. Critical intersections identified?		<input type="radio"/> <input type="radio"/> <input type="radio"/>
Data Collection and Existing Conditions			
A. Stated how data on existing conditions will be collected?	2. Acceptable locations and durations for traffic data collection identified?		<input type="radio"/> <input type="radio"/> <input type="radio"/>
	a. 3 consecutive days for 24-hr counts in urban areas?		<input type="radio"/> <input type="radio"/> <input type="radio"/>
	b. Five consecutive days in rural areas?		<input type="radio"/> <input type="radio"/> <input type="radio"/>
	3. Measures identified for collecting transit, bicycle and pedestrian volumes and facilities info?		<input type="radio"/> <input type="radio"/> <input type="radio"/>
	4. TMOs, TDMs and other special considerations appropriate are identified?		<input type="radio"/> <input type="radio"/> <input type="radio"/>
B. Measures included to account for previously adopted development agreements included?			
C. WP or TIP projects used in existing conditions analysis?	1. Project(s) listed in first three years of the WP/TIP?		<input type="radio"/> <input type="radio"/> <input type="radio"/>
	2. Funding source(s) identified?		<input type="radio"/> <input type="radio"/> <input type="radio"/>
D. Traffic characteristics to be used in the analysis identified?	1. Each characteristic within range accepted by Department?		<input type="radio"/> <input type="radio"/> <input type="radio"/>
Project Approach			
A. Site Impact analysis to use primarily manual calculation mechanisms?	1. Manual approach appropriate for project scale and location?		<input type="radio"/> <input type="radio"/> <input type="radio"/>
	2. Acceptable methodology described for determining future network volumes?		<input type="radio"/> <input type="radio"/> <input type="radio"/>
	a. Growth rates reasonable based on historical/current development?		<input type="radio"/> <input type="radio"/> <input type="radio"/>



Methodology Checklist

Bookmarks

- Transportation Site Impact Handbook
- Contents
- 1 Introduction
- 2 The Transportation Impact Process
- 3 Local Government Comprehensive Plan Reviews
- 4 Developments of Regional Impact
- Checklists
 - LGCP FLUM Amendment Review Checklist
 - DRI Pre-Application Checklist
 - DRI Checklist 1 | Methodology Meeting**
 - DRI Checklist 2 | ADA Sufficiency Review
 - DRI Checklist 3 | ADA Review
 - DRI Checklist 4 | DO Review
 - DRI Checklist 5 | Project Monitoring & Report Review
 - DRI Checklist 6 | Conceptual Site Access Review
 - DRI Checklist 7 | Notice of Proposed Changes/Substantial Deviation Determination

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DRI Checklist 1 | Methodology Meeting

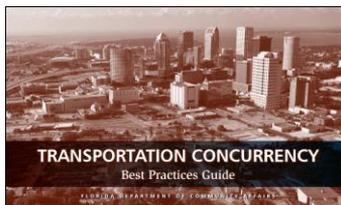
1 of 3

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	a. Growth rates reasonable based on historical/current development?		<input type="radio"/> <input type="radio"/> <input type="radio"/>

Use your bookmarks!



How Big Should the Study Area Be?



<http://teachamerica.com/TIH/PDF/TCBP.pdf>

trips that cross jurisdictional boundaries. Adjustments to the study area boundaries may be needed to account for site specific circumstances. The *Transportation Concurrency Best Practices Guidebook (DCA 2007)* has detailed descriptions of these methods of determining impact areas.

Wrong description: This is based on a percent of service volume

Exhibit 4 shows an example of the traffic impact area using a radius from the development based on trip generation.

**Exhibit 4
Example of Traffic Impact Area or Study Area**

Source: *Transportation Concurrency Best Practices Guide, DCA 2007*

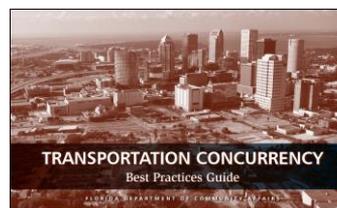
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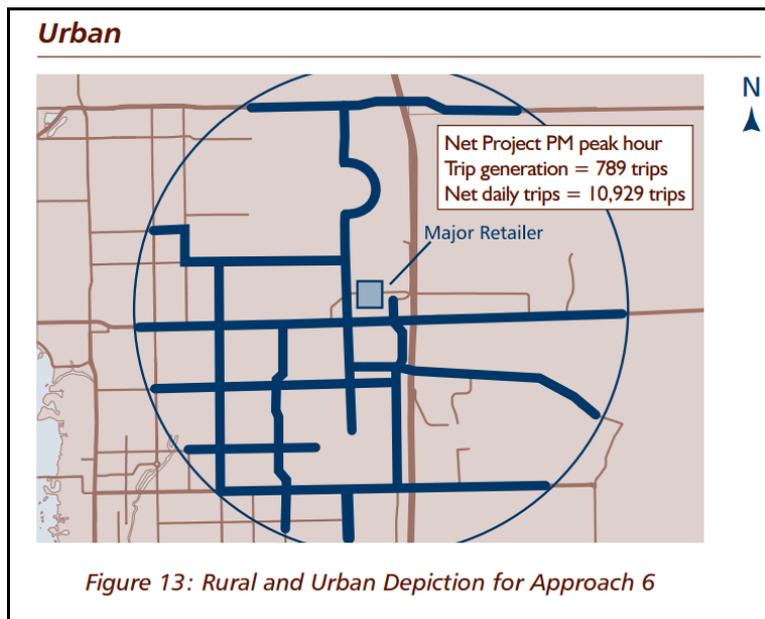


Radius Based Study Area

- Radius based on number of generated trips
- Local governments and RPCs may have formal guidance



<http://teachamerica.com/TIH/PDF/TCBP.pdf>



Using Hourly Directional LOS Table to Determine Impact Area



Let's use 5% as significant

Development adds **300**
Peak Hour directional trips
to segment

1,630 Maximum Service
Volume at LOS D

$$\frac{300}{1,630} = 18\%$$

- 4 Lane divided Arterial
- From Directional Peak Hour Tables.
Urbanized Class II, LOS D = 1,630.

Yes, this is significant

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TABLE 7

Generalized **Peak Hour Directional** Volumes for Florida's
Urbanized Areas¹

12/18/12

INTERRUPTED FLOW FACILITIES						UNINTERRUPTED FLOW FACILITIES				
STATE SIGNALIZED ARTERIALS						FREEWAYS				
Class I (40 mph or higher posted speed limit)						Lanes	B	C	D	E
Lanes	Median	B	C	D	E	2	2,260	3,020	3,660	3,940
1	Undivided	*	830	880	**	3	3,360	4,580	5,500	6,080
2	Divided	*	1,910	2,000	**	4	4,500	6,080	7,320	8,220
3	Divided	*	2,940	3,020	**	5	5,660	7,680	9,220	10,360
4	Divided	*	3,970	4,040	**	6	7,900	10,320	12,060	12,500
Class II (35 mph or slower posted speed limit)						Freeway Adjustments				
Lanes	Median	B	C	D	E	Auxiliary Lane			Ramp Metering	
1	Undivided	*	370	750	800	+ 1,000			+ 5%	
2	Divided	*	730	1,630	1,700					
3	Divided	*	1,170	2,520	2,560					
4	Divided	*	1,610	3,390	3,420					

Want to learn more about the use of the lookup tables?

Go to: <http://www.dot.state.fl.us/planning/systems/training.shtm#Recorded>

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Using Hourly Directional LOS Table to Determine Impact Area



Let's use 5% as significant



Development adds **300**
Peak Hour directional trips
to segment

1,630 Maximum Service
Volume at LOS D

$$\frac{300}{1,630} = 18\%$$

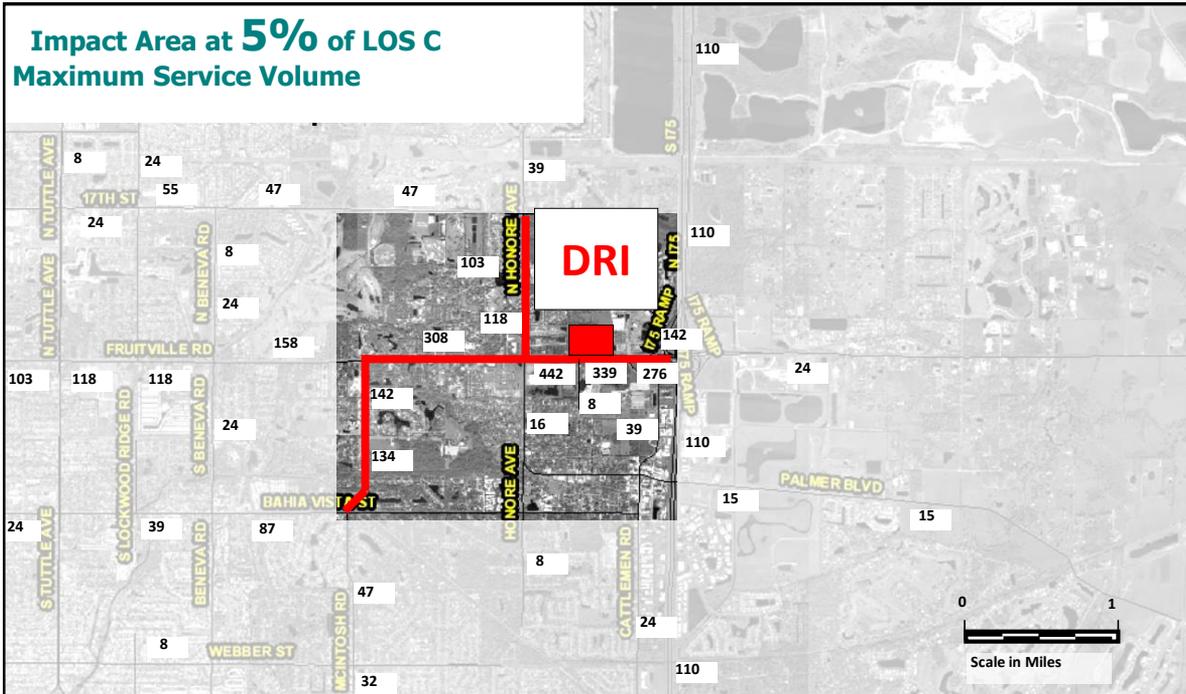
- 4 Lane divided Arterial
- From Directional Peak Hour Tables. Urbanized Class II, LOS D = 1,630.

Yes, this is significant

27

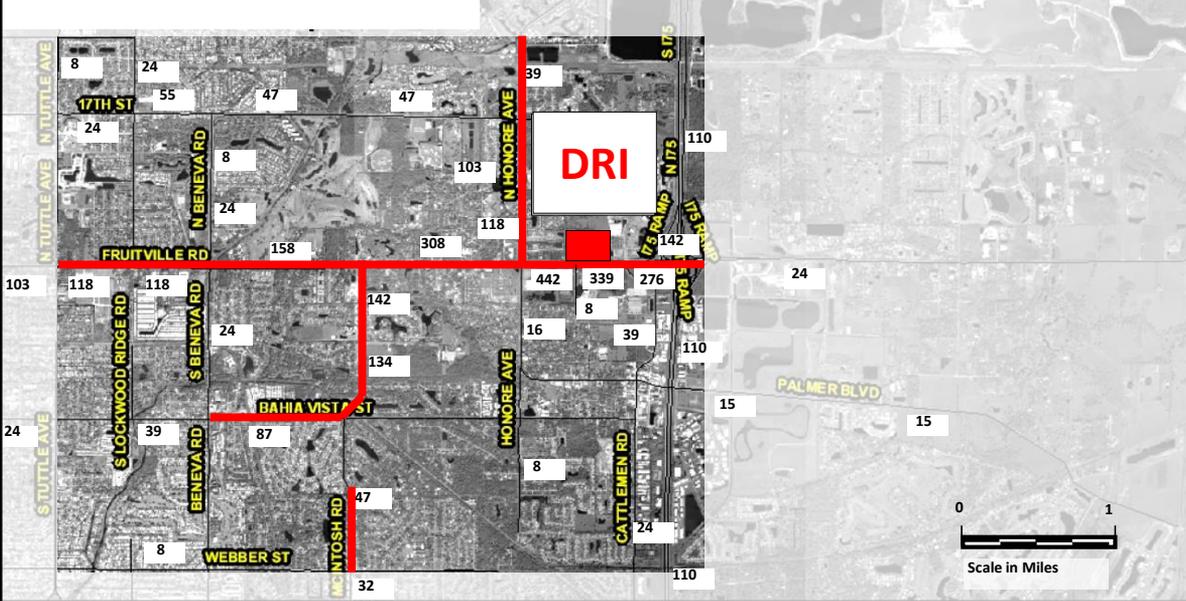


Impact Area at 5% of LOS C Maximum Service Volume

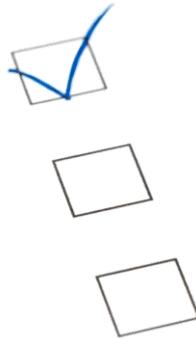


From: Developer Contributions for transportation facilities CUTR - Kristine Williams 2006

Impact Area at 3% of LOS C Maximum Service Volume



From: Developer Contributions for transportation facilities CUTR - Kristine Williams 2006



Poll

HAVE YOU EVER PARTICIPATED IN A METHODOLOGY MEETING OR PREPARATION?



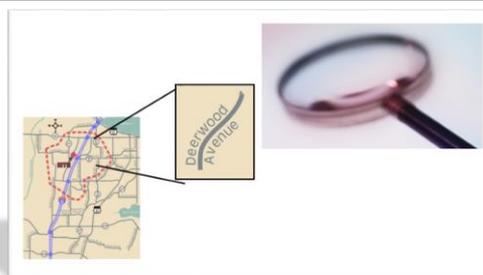
Questions?



Gary Sokolow

DIFFERENCE BETWEEN LARGE AND SMALL SCALE SITE TRAFFIC IMPACT STUDIES

SHORT RANGE AND
LONG RANGE

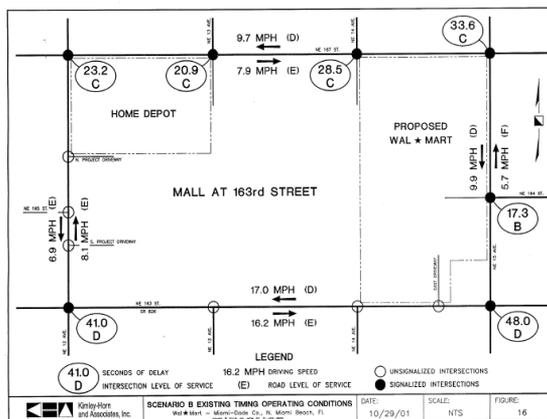


Two Basic Traffic Studies in Site Impact Analysis

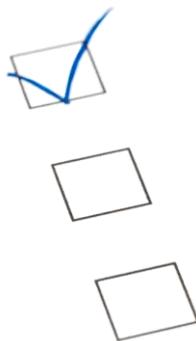
Comprehensive Plan Change



A Permitting Analysis



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WHAT WOULD YOU BEST CATEGORIZE YOUR INVOLVEMENT IN SITE IMPACT ANALYSIS?



Two Basic Traffic Studies in Site Impact Analysis



Long Range

- Remote off site improvements
- Impacts to the entire regional transportation system

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CHAPTER 2 – Transportation Impact Process



Basic Through Lane LOS

EXISTING 2002 PM PEAK HOUR 2-WAY TRAFFIC CONDITIONS RiverTown DRI

Roadway Link	Geometry	Service Volume ¹	LOS Standard	Annual Count Source	Count Year	AADT	Growth Factor ¹	K Factor	D Factor	Peak Hour Traffic	V/C Ratio	Level of Service
<u>Racetrack Rd</u>												
SR 13 to Bishop Rd	4LD	2950	D	County	2001	7907	1.104%	0.095	1.000	759	0.257	<=D
Bishop Rd to Russell Sampson Rd	2LU	1390	D	County	2001	4358	1.074%	0.095	1.000	418	0.301	<=D
Russell Sampson Rd to I-95	2LU	1390	D	County	2001	4868	1.074%	0.095	1.000	467	0.336	<=D
I-95 to US 1	2LU	1390	D	County	2001	4868	1.074%	0.095	1.000	467	0.336	<=D
<u>Greenbriar Rd</u>												
SR 13 to Project Roadway	2LU	1390	D	County	2001	1702	1.074%	0.095	1.000	163	0.118	<=D
Project Roadway to Roberts Rd	2LU	1390	D	County	2001	1702	1.074%	0.095	1.000	163	0.118	<=D
Roberts Rd to CR 210	2LU	1300	D	County	2001	2430	1.074%	0.096	1.000	236	0.181	<=D

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CHAPTER 2 – Transportation Impact Process



Level of Service	Required Improvement	Level of Service After Improvement
------------------	----------------------	------------------------------------

Basic Through Lane LOS

F	2 Lane to 4 Lane	D
F	2 Lane to 4 Lane	C
F	2 Lane to 4 Lane	C
F	4 Lane to 6 Lane	C
F	2 Lane to 4 Lane	C
F	2 Lane to 4 Lane	C
F	2 Lane to 4 Lane	C
n/a	New 4 Lane Road	C

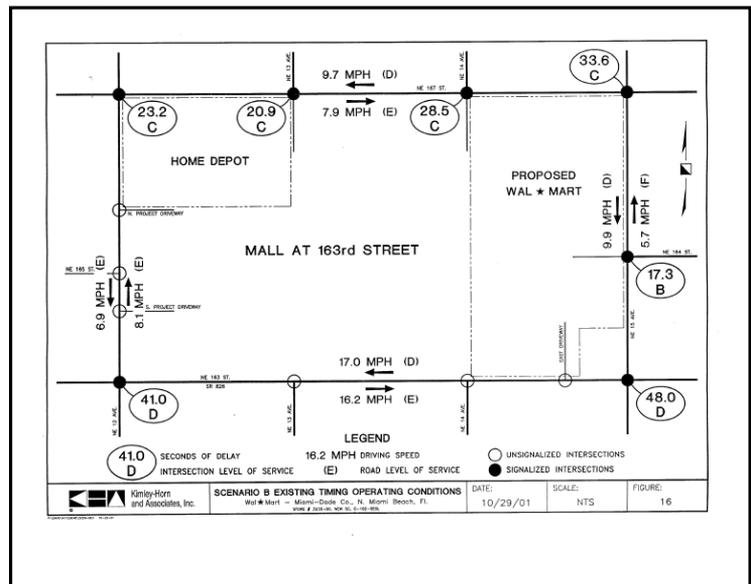
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Short Range – Permitting

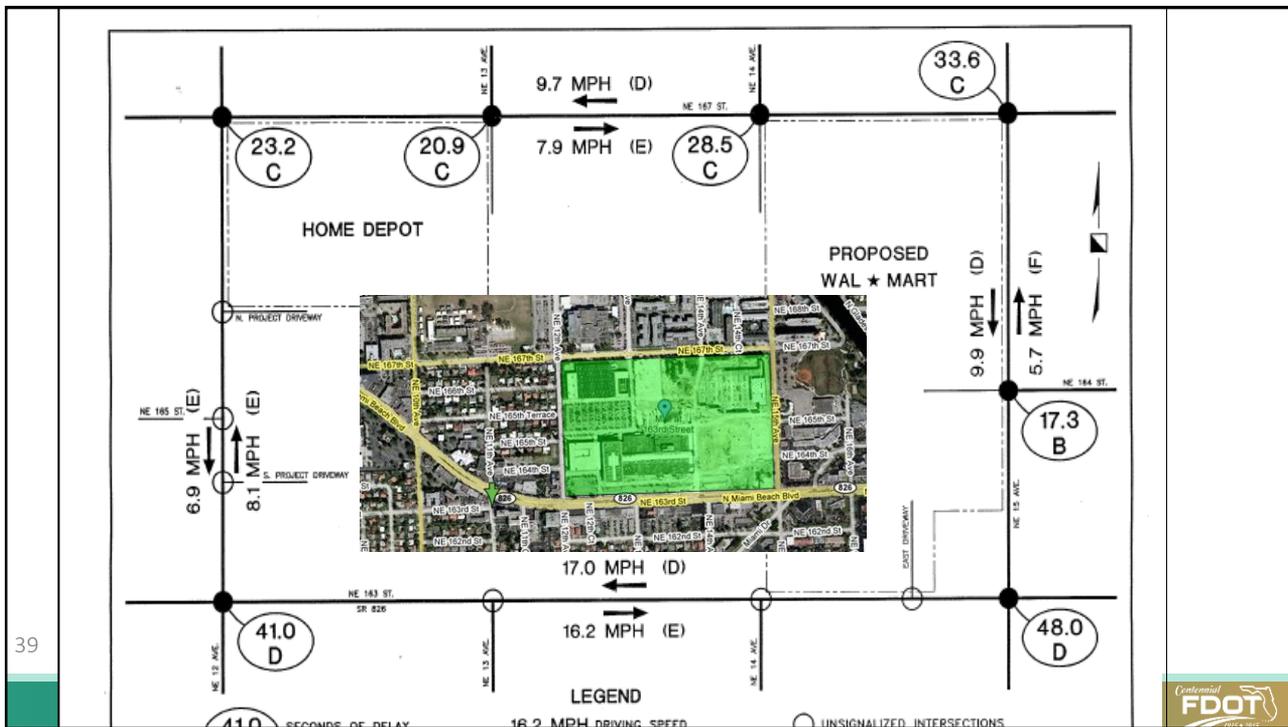
- Access Improvements
- Intersection improvements near site
- Signal Improvements

Short Range

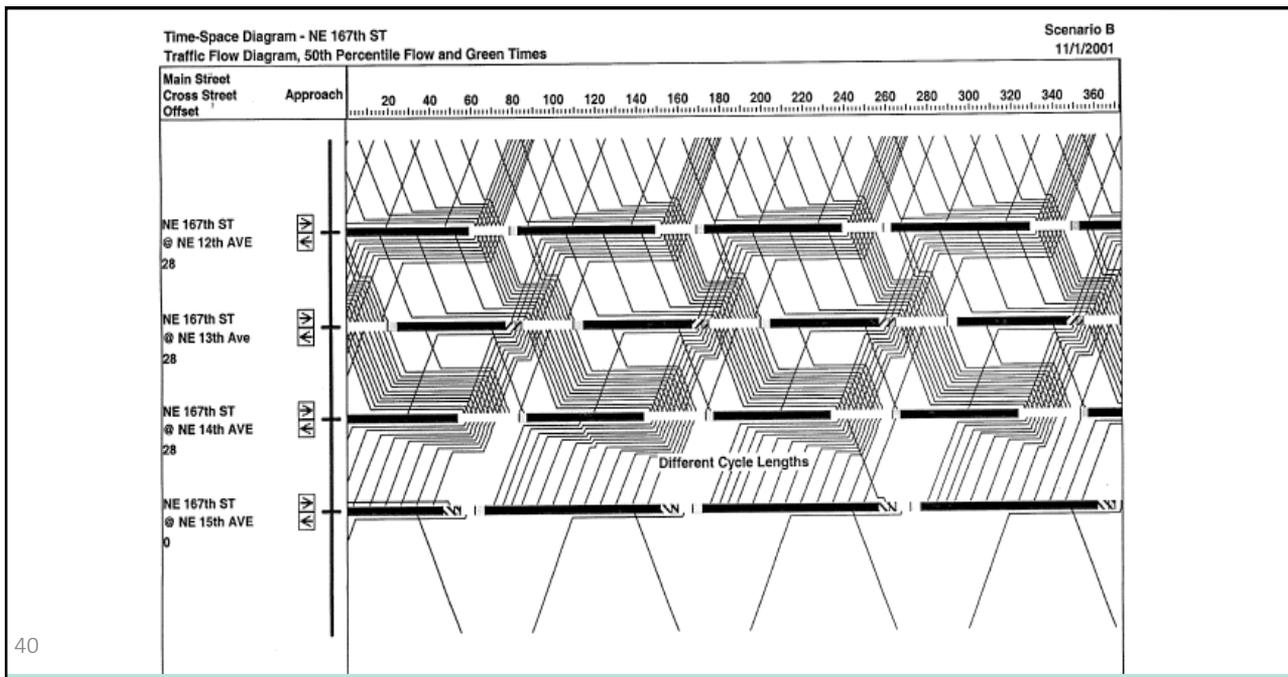


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Queue Analysis

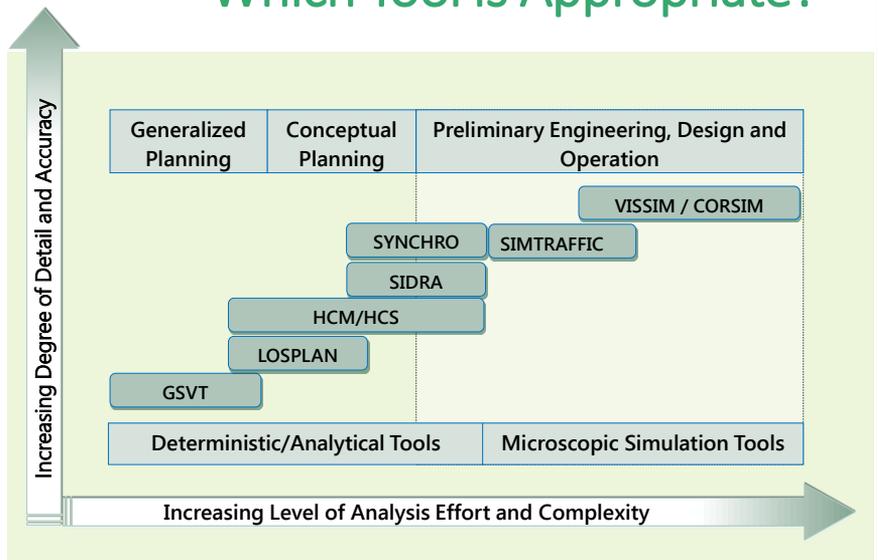
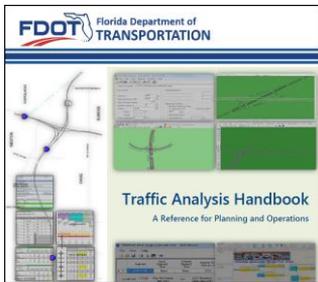
(for signal improvements and median opening changes)



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Which Tool is Appropriate?



Source: 2014 Traffic Analysis Handbook

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http://www.dot.state.fl.us/planning/systems/programs/SM/int/jus/pdfs/Traffic%20Analysis%20Handbook_March%202014.pdf

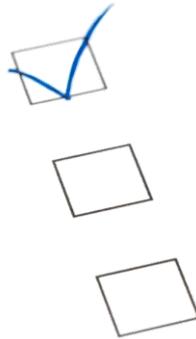


Which tool for what study?

Facility	Level of Analysis	Project Need	Performance MOE	Recommended Software
Networks & Systems	Planning	Forecasting system-wide future demand	vehicle-miles traveled, V/C	GSVT, LOSPLAN, CUBE, HCS
	Preliminary Engineering and Design	Evaluating the performance of the entire network/system	Speed, travel time, LOS, vehicle-miles traveled	SYNCHRO/SIMTRAFFIC, CORSIM, VISSIM
	Operational	Evaluating the performance of the entire network/system	Speed, travel time, LOS	SYNCHRO/SIMTRAFFIC, CORSIM, VISSIM
Multimodal Transportation District (MMTD)	Planning	Planning level assessment of different modes	LOS	GSVT, LOSPLAN, HCS
	Design and operational	Evaluate alternative multimodal improvements Assessing quality of service on a multimodal corridor	Travel time, LOS, queue Travel time, LOS, queue, transit reliability	VISSIM HCS, VISSIM
Intersections	Design	Analyzing unconventional (or complex) intersection	LOS, V/C, delay, queue length	CORSIM, VISSIM
		Analyzing multimodal interactions	LOS	VISSIM, HCS
	Operational	Evaluating the performance of signalized intersection	LOS, V/C, control delay, queue, Phase Failure	HCS, SYNCHRO
Roundabouts	Conceptual Planning	Evaluating the need for roundabout	V/C, LOS	SIDRA, HCS
	Preliminary Engineering and Design	Analyzing roundabout	V/C, LOS	SIDRA, HCS, SYNCHRO
	Operational	Evaluating the performance of roundabout	V/C, LOS, delay	SIDRA, HCM, SYNCHRO
Urban Arterials	Preliminary Engineering and Design	operate	Speed	HCS
		Optimizing signals	Control delay, queue, V/C ratio	SYNCHRO/SIMTRAFFIC
	Operational	Coordinating traffic signals	Travel time, speed	SYNCHRO
Evaluating existing signal timing plans		Travel time, speed	HCS, SYNCHRO	
		Checking the effect of technology application or traffic demand management strategy	Travel time, speed	SYNCHRO/SIMTRAFFIC, VISSIM, CORSIM

Source: [2014 Traffic Analysis Handbook](#)

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Poll

WHAT TRANSPORTATION TOOLS HAVE YOU USED IN YOUR JOB?



Study Hours/Critical Hour

Exhibit 6
Typical Critical Hour Analysis Period for Various Types of Developments

Development	Weekday Street Peak Hour		
	AM	PM	Other
Residential	X	X	
Office	X	X	
Shopping Center		X	(including freestanding Discount Superstores)
Intersection capacity		X	
Access Design		X	Saturday 11:00-15:00
Restaurants		X	11:00-13:00
Fast Food		X	
Dinner Trade		X	

*Adapted From: ANALYSIS OF TRAFFIC IMPACT FOR NEW DEVELOPMENTS
PAUL C. BOX, Skokie, Illinois Public Works Magazine: February 1981*

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Page 26 – TSI Handbook



Exhibit 5
Suggested Study Horizons

Local Government Comprehensive Plans	Existing, short-term (5-year), and long-term (10-year minimum or greater) analyses are required for comprehensive plan elements.
Developments of Regional Impact (DRI)	The year that the first phase of development begins, the anticipated opening year of each major phase of the development (assuming build out and full occupancy of each phase) and the final build-out year (or year of complete development assuming full occupancy) should be considered for all DRI type analyses.
Concurrency Reviews	Typically these developments occur in a single phase. Therefore, the anticipated opening year of the development assuming build out and full occupancy is the only horizon year required. Local government requirements should be reviewed.
Access Permits	Depends on the size and scope of the development. Many will be studied only for the opening year, and larger developments may have longer time horizons. For information on driveway connection permits, please refer to Rule 14-96, Florida Administrative Code .

Time Horizons



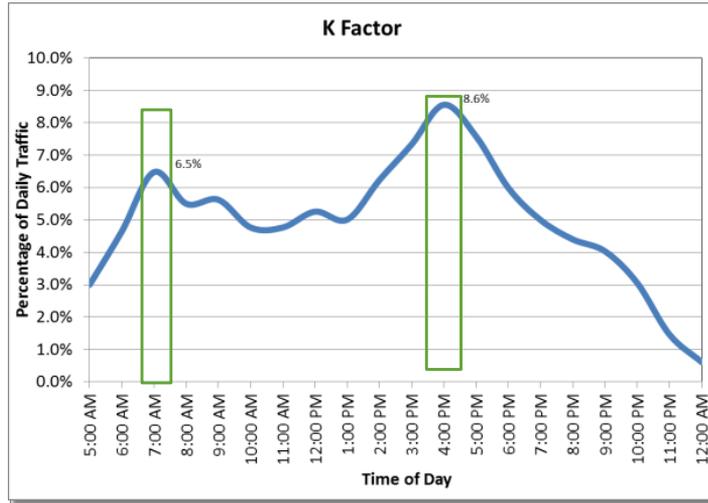
Source: Trevor Stasik Blog

Page 24 – TSI Handbook



K-factor

The proportion of **AADT** that occurs during the peak hour



Morning Peak:
 $.065 * 10000 = 650$

Evening Peak:
 $.086 * 10000 = 860$

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Standard K

- FDOT policy sets the K-factor as a fixed parameter rather than a variable
- It is set based on area type and facility type

Standard K-Factor

Roadway Type	Urbanized		Transitioning/Urban		Rural	
	Large	Other	Transitioning	Urban	Developed	Undeveloped
Arterials	0.08-0.09	0.09	0.09	0.09	0.095	
Freeways	0.08-0.09	0.09	0.09	0.09	0.095	
Highways	0.08-0.09	0.09	0.09	0.105	0.105	

*Core freeways have a lower K-factor

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Existing Conditions & Data Collection



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The LOS Handbook is One Good Guide to Data Collection

Standard Process | 2.3 Data Collection

Transportation Site Impact Handbook April 2014

2.3 Existing Conditions Analysis and Data Collection



The existing traffic information (year, adjustment factors regarding peak season, daily and peak hour traffic) should be discussed during the **Transportation Methodology** component and accepted by the reviewing agencies before conducting traffic counts.

This analysis establishes a basis for comparison of the proposed development. The basic analysis should consist of identifying the operational and physical characteristics of the transportation system using professionally accepted practices. FDOT's guidelines for data collection found in the most current [FDOT Quality/Level of Service Handbook](#). This Handbook also addresses measuring the quality of service for transit, and non-motorized travel.

PDF

QLOS Handbook

2.3.1 Data Collection

Page 30 – TSI Handbook



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<http://www.dot.state.fl.us/planning/systems/programs/sm/los/pdfs/2013%20QLOS%20Handbook.pdf>



What data is collected?

Proposed Site Development Characteristics

- Site locations, boundaries and development
- Anticipated area of influence

Transportation System Data

- Transportation Network
- Transit Service Data
- Transportation Management Organizations
- Pedestrian & Bicycle Facilities
- Planned & programmed Transportation
- Traffic Control Data

Land Use & Demographic Data

- Existing & Future Land Use
- Comprehensive Plan Requirements
- Socioeconomic Data & Forecasts
- Other approved developments & commitments

Land Use & Demographic Data

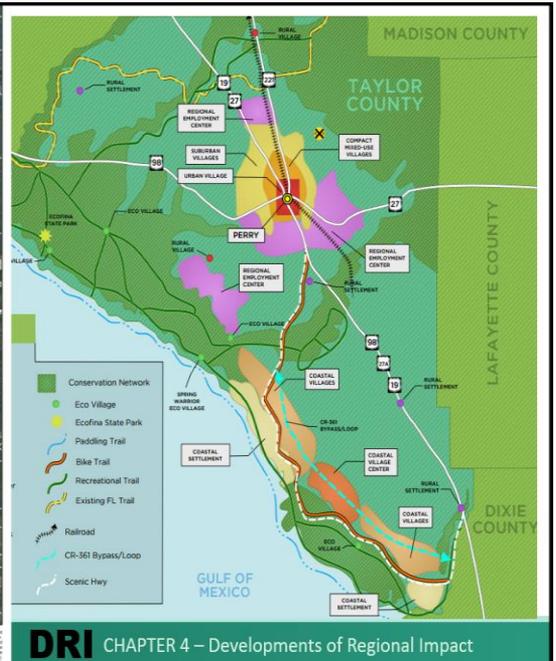
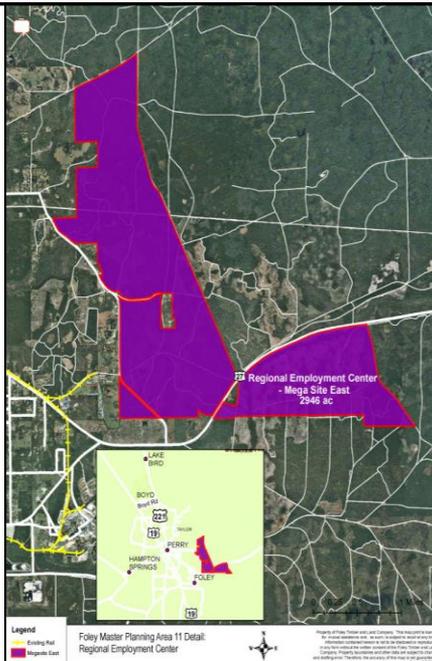
- Existing & Future Land Use
- Comprehensive Plan Requirements
- Socioeconomic Data & Forecasts
- Other approved developments & commitments

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From page 30



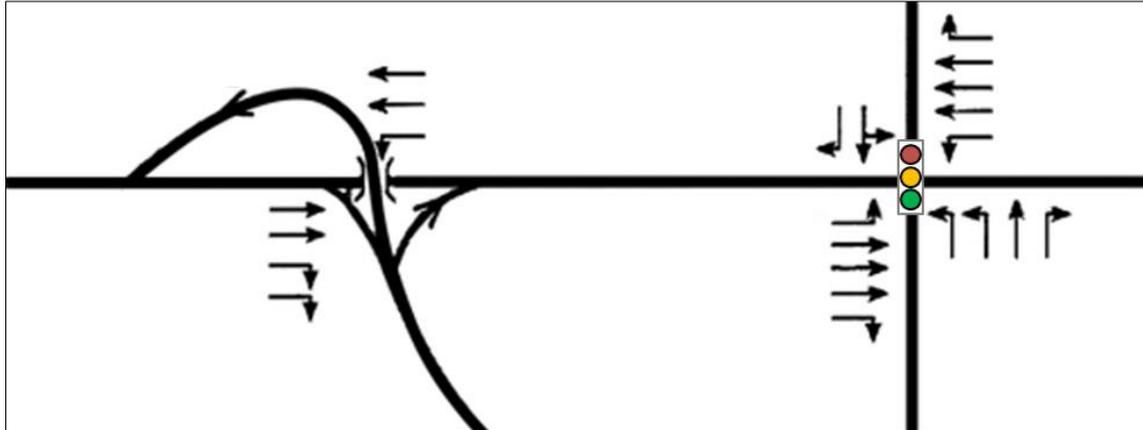
Site Plan Example



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Example Basic Road Information



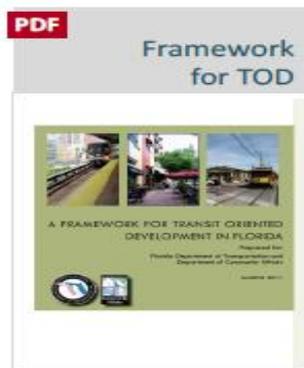
53

Page 31 – TSI Handbook

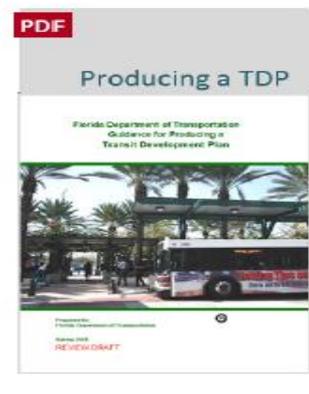


Considering Transit Service

- Think about the density, diversity and distance regarding the proposed development.
- Contact transit agency to determine current and committed service



Data Considerations for Future Transit Service



Additional Resources

- [Guidance for Producing a Transit Development Plan](#)
- [A Framework for Transit Oriented Development in Florida](#)

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Page 31/32 – TSI Handbook

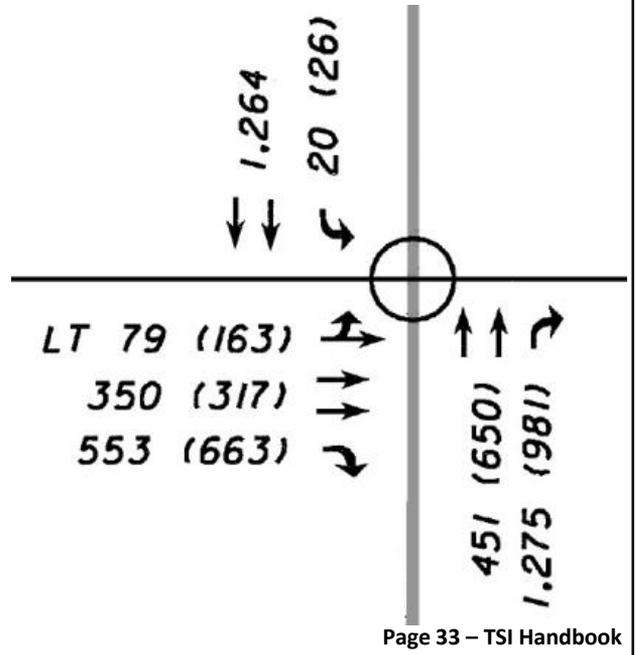


Turning Movement Counts

Exhibit 9 from TSI Handbook

Example of Existing Intersection Counts

Numbers in parenthesis are PM Peak and without are AM Peak

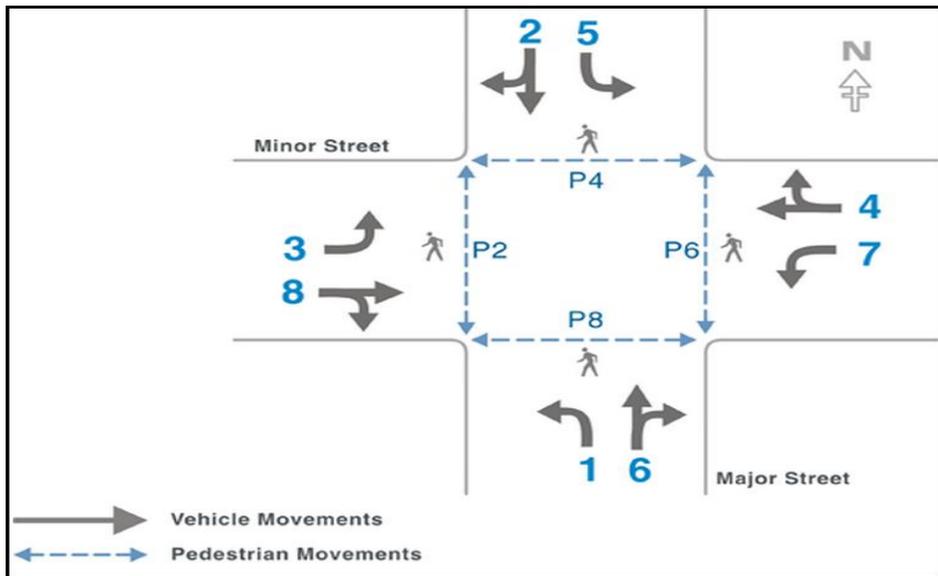


Page 33 – TSI Handbook

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Intersection Pedestrian Counts



Source: FHWA Signal Timing

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Pedestrian LOS



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CHAPTER 2 – Transportation Impact Process



Pedestrian LOS

Factors Affecting Pedestrian Quality of Service

Presence of a sidewalk

Lateral separation of pedestrians and motorized vehicles

- Includes presence of barriers and buffers, i.e. parked cars, trees

Motorized vehicle

- Volume
- Speed



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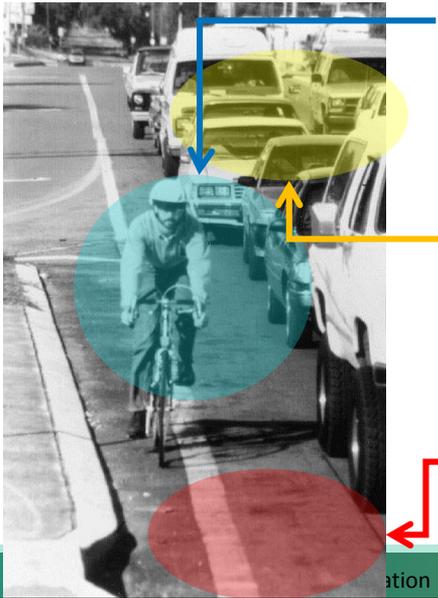
CHAPTER 2 – Transportation Impact Process





Bicycle LOS

Factors Affecting Bicycling Quality of Service



Proximity of bicyclists to motorized vehicles

- Paved shoulder
- Bicycle lane

Motorized vehicle

- Volume
- Speed
- Type

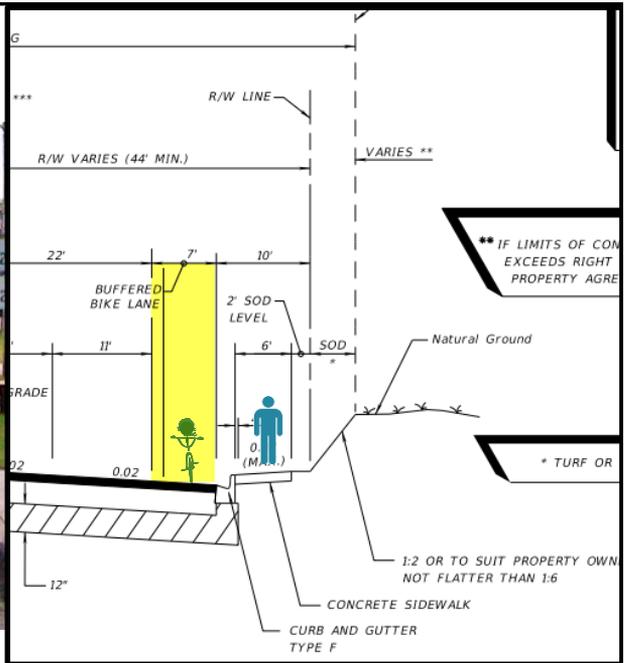
Pavement condition

On-street parking

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Latest FDOT Standard Buffered 7 ft. Bike Lane



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Source: Gainesville, FL



Questions?



Florida Transportation Information DVD

WEB

FTI Request Form



Andrew Young

The DVD contains:

- Current & historical traffic volumes
- Peak & directional factors
- Daily traffic
- Sidewalk and bike lane data



FTI Mobile App

Download Link:
<https://itunes.apple.com/us/app/florida-dot-fti-mobile/id950762901?mt=8>

Florida DOT FTI Mobile

By Northrop Grumman Systems Corporation

Open iTunes to buy and download apps.



View in iTunes

Free

Category: Reference
 Updated: Jan 22, 2015
 Version: 1.1
 Size: 15.8 MB
 Language: English
 Seller: Northrop Grumman Systems Corporation
 © Copyright 2015 Florida Department of Transportation
 Rated 4+

Compatibility: Requires iOS 6.1 or later. Compatible with iPhone, iPad, and iPod touch. This app is optimized for iPhone 5.

Description

Florida Department of Transportation (FDOT) Historical Traffic Data
 The Florida Transportation Information (FTI) app contains a graphical interface to access highway and traffic data collected for the State Highway System and for selected off-system roads. This data is available from one of the

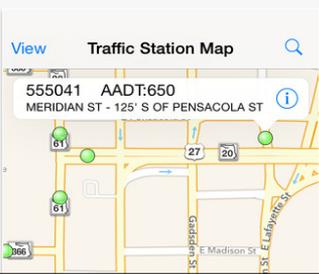
[Florida DOT FTI Mobile Support](#)

What's New in Version 1.1

Updated Application Name, icon graphic, and Copyright information.

iPhone Screenshot

View Traffic Station Map



< AADT Map AADT Details

Local Road Names:
 SR-20/SR-85/EGLIN PKWY/JOHN SIMS PKWY

Combined AADT: 40500

Truck AADT: 1782

Roadway ID: 57040000

From: MONAHAN DR
 To: 4TH AVE

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Florida Traffic Online

Website Link:
<http://www2.dot.state.fl.us/FloridaTrafficOnline/viewer.html>

my **FDOT Florida Traffic Online (2014)**

Transportation Statistics Office
[Help](#) | [Bookmark](#)

Zoom to

State Extent

Florida Counties
 Zoom to a county

Florida Cities
 Zoom to a city

LEGEND

- Florida Turnpike
- Interstates
- Lakes and Rivers
- Counties



Map created for FDOT/TrafficStat 2004-2015

Tools

Start Here

Locator Map

Zoom In

Zoom Out

Pan

Identify

Find

Print

Traffic Reports

Daily Traffic

Truck Traffic

Labels & Layers

Clear

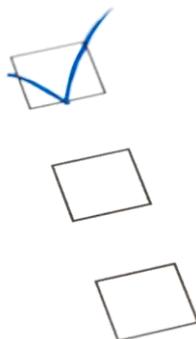
[Accessibility](#) | [Contact Information](#) | [Disclaimer](#)

Zoom In is active

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Poll



BEFORE THIS WEBINAR, WERE YOU FAMILIAR WITH ANY OF THESE RESOURCES?



Importance Of the Field Visit

Top 9 Things to Review with a Field Visit



The aerials are not always right

Why do you need to go out in the field when everything is right there on the aerial? First, because the aerials aren't always right.

The aerials may not be up to date. You may need to adjust your data collection to account for reality. If a traffic study is based on an obsolete road network it would have zero credibility.

Field Review of Physical Features

There are a lot of important details you can't always see on an aerial.

The second reason to go out to the site is that there are a lot of important details you can't always see on an aerial. In addition to verifying the information on your hand sketches is correct, add the following details to them while you are in the field:

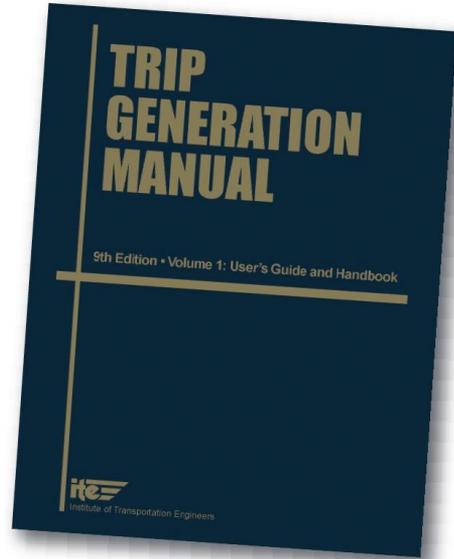
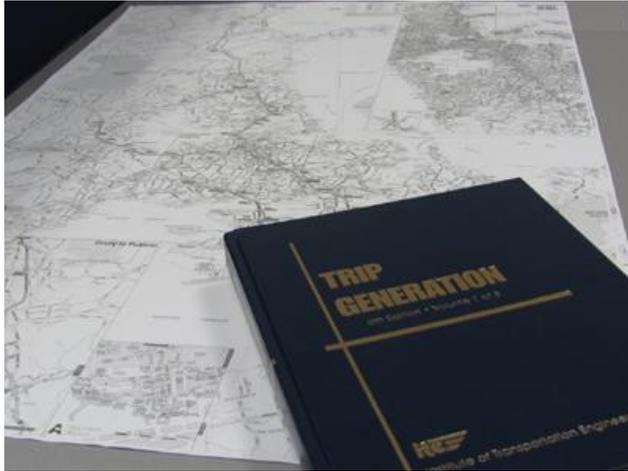
- Transit Stops
- Traffic Signal Operations (Protected Left Turn Phasing, Protected/Permitted Left Turn Phasing, etc.).
- No Turn on Red Restrictions
- Parking Restrictions
- Speed Limits
- Road construction in the area that would impact normal traffic counts
- Construction or signs for new developments near the site
- Excessive grades or slopes that make widening a road/ intersection difficult
- Any objects on corners of intersections that block a clear view of oncoming traffic or pedestrians

We have tried to have the most up to date information. However, due to changes in legislation and acceptable practices, we recommend you check with the links in this handbook.



Next Webinar

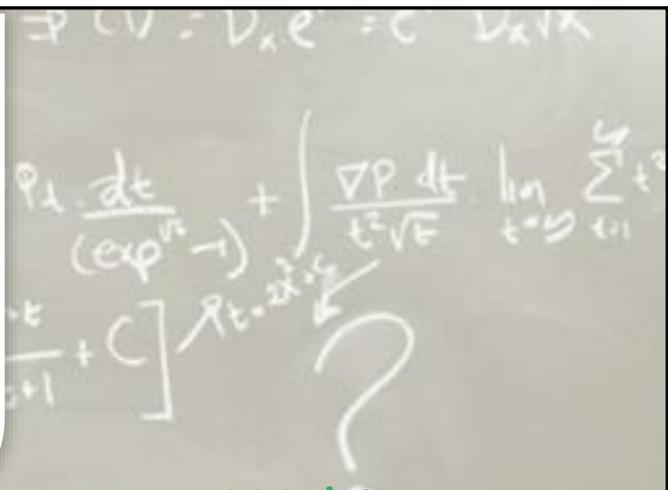
Trip generation



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CHAPTER 2 – Transportation Impact Process



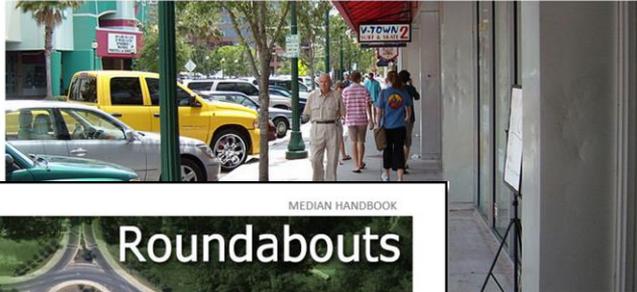
Next Webinar Future Conditions

Next Webinar New Developments at FDOT

- Complete Streets Initiative
- Roundabouts

Roadway Design

Roadway Design / Complete Streets Implementation Complete Streets Implementation



6.0 Roundabouts and Access Management

Roundabouts can provide many benefits when included as part of an overall access management strategy. Roundabouts achieve one primary principal of access management by reducing the number of conflict points. The result is that serious injuries/fatalities are significantly reduced.

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Future Training Sessions

Session 3

The Transportation Impact Process

June 25

2:30- 4:00 PM
(Eastern time)

- Trip Generation of the New Development
- Trip Distribution
- Future Conditions Analysis

Session 4

The Transportation Impact Process

July 23

2:30- 4:00 PM
(Eastern time)

- Future Conditions Analysis (cont.)
- Mitigation Analysis

Session 5

Local Government Comprehensive Plan Reviews

August 20

2:30- 4:00 PM
(Eastern time)

- Comprehensive Plan Amendment Process
- Various Elements

Session 6

Developments of Regional Impact

September 17

2:30- 4:00 PM
(Eastern time)

- Development of Regional Impact Review Process
- Requirements
- Checklists

Session 7

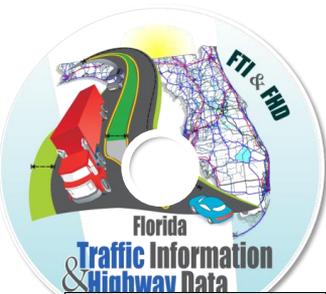
Mitigation

October 29

2:30- 4:00 PM
(Eastern time)

- Strategies to Consider
- Funding Enhanced Mobility






Great Free Resources

- [Florida Transportation Information DVD](#)
- [FDOT FTI App \(iOS\)](#)
- [Florida Traffic Online](#)
- [Driveway Information Guide](#)
- [Quality/Level of Service Handbook](#)
- [Interchange Access Request User's Guide](#)
- [Project Traffic Forecasting Handbook](#)
- [Median Handbook](#)
- [Traffic Analysis Handbook](#)
- [Systems Planning Trainings](#)
- [Transportal.org](#)



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CHAPTER 2 – Transportation Impact Process


Questions?

Gary.Sokolow@dot.state.fl.us

Gina.Bonyani@dot.state.fl.us

Andrew.Young@dot.state.fl.us

HicksNA@cdmsmith.com



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Registration Link: <https://attendee.gotowebinar.com/register/4092694905247726593>


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Fin



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CHAPTER 2 – Transportation Impact Process

