

**TRANSPORTATION CONCURRENCY
REQUIREMENTS AND BEST PRACTICES:**

**Guidelines for Developing and Maintaining
An Effective Transportation Concurrency Management System**

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2555 Shumard Oak Boulevard
Tallahassee, FL 32399-2100

Center for Urban Transportation Research
University of South Florida
4202 E. Fowler Ave., CUT100
Tampa, FL 33620-5375
(813) 974-3120
www.cutr.usf.edu

ACKNOWLEDGEMENTS

DCA

Secretary Thaddeus Cohen
Valerie Hubbard, AICP, Division Director
Diane Quigley, AICP, Project Manager

CUTR Project Staff

Karen E. Seggerman, AICP
Kristine M. Williams, AICP
Pei-Sung Lin, Ph.D., P.E.
Fatih Pirinccioglu

Technical Review

James Baxter, FDOT	Lawrence Kiefer, City of Jacksonville
Matt Betancourt, University of Florida	John Krane, FDOT
Wally Blain, Hillsborough County MPO	Dave Loveland, Lee County DOT
Virgie Bowen, FDOT	Robert Magee, FDOT
Carol Collins, FDOT	Karen McGuire, FDOT
Bob Crawley, FDOT	Betty McKee, FDOT
John Czerepak, FDOT	Jonathan Paul, Alachua County
Suzi Dieringer, Hillsborough County MPO	Amarylis Perez, FDOT
Glenda, Duncan, FDOT	Kim Samson, FDOT
Mike Escalante, North Central FL RPC	Ruth Steiner, University of Florida
Waddah Farah, FDOT	Phil Steinmiller, FDOT
Lea Gabbay, FDOT	Ben Walker, FDOT
Martin Guttenplan, FDOT	Jon Weiss, FDOT
Cheryl Hudson, FDOT	Chon Wong, FDOT
Larry Hymowitz, FDOT	Joe Zambito, Hillsborough County MPO

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A. INTRODUCTION

Concurrency is a growth management concept intended to ensure that the necessary public facilities and services are available concurrent with the impacts of development. To carry out concurrency, local governments must define what constitutes an adequate level of service as well as measure whether the service needs of a new development exceed existing capacity and any scheduled improvements in the capital improvements program for that period. If adequate capacity is not available, then the developer must provide the necessary facility or service improvements to proceed, or provide a monetary contribution toward such improvements, or wait until government provides the necessary improvements.

Among the key features of the 2005 growth management legislation were changes to the concurrency management process. The legislation provides for a more effective concurrency approach through well-defined financial feasibility requirements for capital improvements schedules (CIS) and tightened timelines for concurrency. In addition, the legislation directed local governments to enact concurrency management ordinances by December 1, 2006 that allow for “proportionate share” contributions from developers toward meeting transportation concurrency requirements.

The legislation also directed the Florida Department of Community Affairs (DCA) to provide technical assistance in carrying out provisions of the legislation. DCA contracted with the Center for Urban Transportation Research to provide technical assistance regarding transportation concurrency management resulting in this technical memorandum that documents best practices in local government concurrency management systems. In addition, a recommended practice for reporting de minimis impacts has been developed that addresses report content and formatting in response to the annual de minimis reporting requirement.

Background

Concurrency in Florida is tied to provisions in the state growth management act (§163, F.S.) requiring the adoption of level of service standards, elimination of existing service deficiencies, and provision of infrastructure to accommodate new growth reflected in the comprehensive plan. Plans and development regulations must aim at achieving and maintaining the desired level of service, and comprehensive plans are reviewed by the state for consistency between the capital improvement element and the various element of the plan, including the future land use element.

Rule 9J-5.0055(3), F.A.C., sets forth minimum requirements for satisfying concurrency, and requires local governments to develop and implement a concurrency management system for that purpose. Specifically it states, “Every jurisdiction shall maintain a concurrency management system to ensure that public facilities and services to support development are available concurrent with the impact of development, consistent with the provisions of this Chapter.” Appendix A contains §163.3180(1-10), F.S., Rule 9J-5.019 and 9J-5.0055, F.A.C., pertaining to the transportation element, concurrency, multimodal transportation districts, and proportionate fair share mitigation as well as a review of the 2005 growth management legislation as it pertains to transportation.

In addition to capacity that is available or provided through agreements, Rule 9J-5.0055(3), F.A.C., allows local governments to evaluate transportation concurrency against planned capacity in a five-year schedule of capital improvements (Schedule), which must also reflect the MPO transportation improvement program in urbanized areas per §163.3177(3)(a), F.S. The community must demonstrate that the necessary facilities will be available and adequate to address the impacts of the development within three years of issuing the building permit or its functional equivalent. The

Schedule must include the estimated date of commencement and completion of the project and this timeline may not be eliminated or delayed without a plan amendment approved by DCA.

Current Practice

A variety of concerns have surrounded the implementation of transportation concurrency in Florida. Key among these concerns is that many local governments have not adopted policies regarding concurrency management, have not implemented a concurrency management system (CMS), or, as part of the CMS, have no systematic method for managing transportation concurrency and instead do so through general policies and case-by-case decisions. In addition, many local governments have neither the staff expertise nor funds necessary to retain a consultant to establish and maintain a transportation concurrency management system or review complicated traffic impact analyses for large-scale developments. As a result of the 2005 changes to the Growth Management Act, many local governments are seeking guidance in the development of or refinement of their transportation concurrency management systems.

To determine how other local governments are addressing these challenges, Orange County conducted a survey of transportation concurrency and impact fee practices of county governments in Florida in 2005. The survey was designed to assist county staff and the Concurrency Advisory Group in reviewing Orange County's concurrency management system. As part of this study of local best practices, CUTR obtained the surveys and prepared a general summary of responses. The results found in Appendix B provide insight into county transportation concurrency practices across the state.

In a review of local government concurrency practices in Florida, Timothy Chapin analyzed the methods used by local governments to implement concurrency legislation in their jurisdiction.¹ Chapin noted significant variations in the concurrency policies and practices established by local governments on level of service (LOS) standards and timelines for providing facilities. The majority of local governments studied set LOS standards of "D" or below for interstates and major arterials in their jurisdiction. Many jurisdictions allowed the LOS standards for a road to vary by segment and time of day. Variations also existed based on road type, with major arterials being assigned lower standards than interstates.

Unlike LOS standards, few variations existed for timelines to provide transportation facilities. Generally, jurisdictions allowed the maximum time allotted by state standards to provide transportation facilities (3 years). Most required road improvements to begin one to three years after construction of the development. Chapin speculates that concurrency system variations cause developer frustration with the concurrency process as they face different processes in each jurisdiction. In addition, Chapin believes that residents across the state receive "different service levels for key infrastructure systems and urban services."

Methodology

This report explores and documents transportation concurrency practices from a number of local government concurrency management systems as well as provides recommended language to address certain situations. Best practices are identified to provide guidelines for developing and maintaining an effective transportation concurrency management system.

¹ Chapin, T. 2005. *A Review of Local Government Concurrency Practices in Florida*, DeVoe L. Moore Center: Florida State University.

A cross section of local governments was selected for detailed review of the local concurrency management system (CMS). These communities were selected based on geographic distribution, mix of cities and counties, community scale, and local transportation concurrency practices that included standard, effective, or unique approaches. Ordinances, comprehensive plans, land development regulations, and other concurrency-related documents were obtained for each community and telephone interviews or site visits were conducted to obtain further insight into local practices. Examples of approaches within different concurrency management systems were chosen to illustrate best practices that may be effective in many situations; however, these documents and concurrency management systems were not reviewed for overall compliance with Florida Statutes or the Florida Administrative Code. CMS summaries for the communities in Table 1 are provided in Appendix B of this report:

TABLE 1 Selected Communities for Concurrency Management Systems Review

	Population	Square Miles
Bay County	158,000	764
Broward County	1,623,018	1205
Escambia County	296,709	661
Indian River County	125,000	503
City of Lakeland	91,000	46
City of Ormond Beach	38,000	26
Orlando	201,003	94
Sarasota County	360,000	572
St. Johns County	153,000	609
City of Tallahassee	255,500	96

Overview of a Transportation Concurrency Management System

A CMS includes the establishment and maintenance of a concurrency tracking system and a transportation concurrency application process. The flow chart in Figure 1 illustrates an overview of a typical concurrency management system. The left side of the flow chart (peach color) illustrates the local government's role while the right side (blue color) illustrates the application process.

The local government establishes LOS standards and develops service volumes for each transportation facility incorporating any additional capacity from planned improvements available per state law and the local government comprehensive plan (LGCP) and land development regulations (LDR). Available capacity is generally determined by subtracting existing traffic volume, growth, and approved development trips from the service volume on transportation facilities in the CMS network.

As part of the local government development approval process, applicants must undergo a transportation concurrency review to determine if there is adequate capacity on each of the impacted transportation facilities to accommodate the impact of the proposed new development trips in addition to the existing traffic volume and previously approved development trips at or above the adopted LOS standard. In most cases, project impact is determined by the applicant subject to local government review; however, in some cases, the local government determines the project impact thereby ensuring consistency and adherence to local guidelines. Using the proposed land use including the density and

intensity of development, the applicant first determines if the proposed development trips are considered de minimis (i.e. having only minor impact) per Florida law and local government regulations. If the trips are de minimis, the application is processed and receives a certificate of concurrency. If not, the applicant determines the impact of the development using the local government's traffic impact methodology for trip generation, traffic impact area, and trip distribution.

Next, the resulting impact of development trips on facilities in the concurrency network is compared to the available capacity. If all impacted facilities have adequate capacity, then a certificate of concurrency may be issued. If there is not adequate capacity on one or more of the concurrency facilities, the applicant may be required to perform an operational analysis on the deficient road link in accordance with the local government's traffic impact methodology. If the analysis results in a revised service volume with enough additional capacity to accommodate the proposed development trips, a certificate of concurrency may be issued. If not, the applicant may reduce the size of the development project such that capacity will be adequate, or the local government and the applicant may reach an agreement on improvements to mitigate the impact of the development trips. In this case a certificate of concurrency may be issued, pursuant to a binding development agreement. If adequate capacity is not available and no improvements are scheduled, and no agreement can be reached on mitigation of the impact, the application for transportation concurrency will be denied.

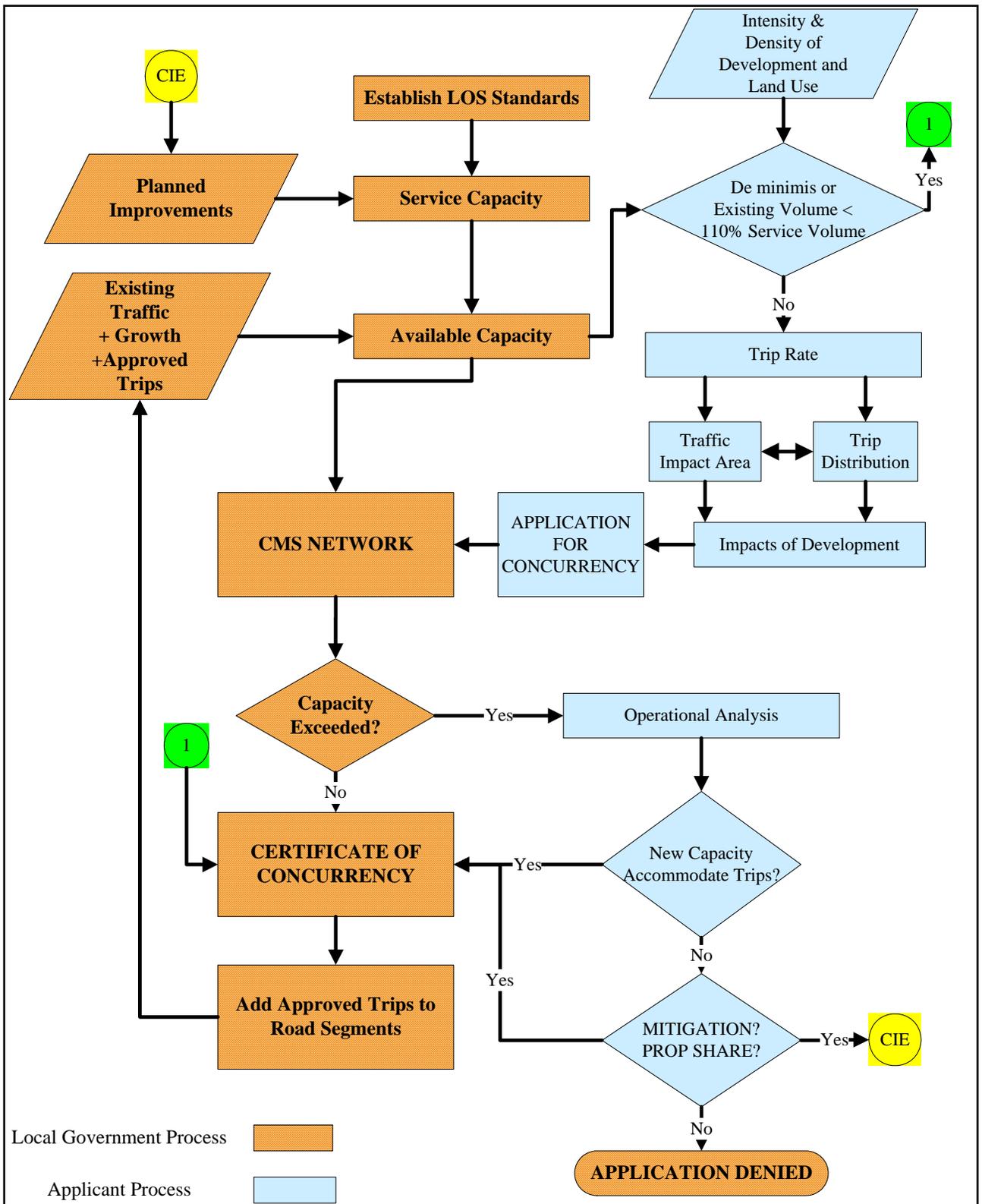


FIGURE 1 Transportation concurrency management system flow chart.

The following best practices are intended as guidelines for transportation concurrency management consistent with and as required by Section 163.3180, F.S., and Rule 9J-5. F.A.C. Because conditions vary throughout the state, it is not the intent that a local government would adopt these guidelines verbatim as they do not address all issues that may arise within a particular context. Local governments should obtain professional planning and legal assistance when adapting any regulatory language to fit local needs.

B. PLANS AND POLICIES

The groundwork for a transportation CMS is found in the local government comprehensive plan. Local governments are required to establish level of service standards for roads and public transit facilities and establish a concurrency management system within their local comprehensive plans. The practices in this section provide guidance for including both level of service standards and a concurrency management system within local government comprehensive plans and land development regulations. Additional guidance is provided for related documents and the inclusion of proportionate fair-share mitigation within the system.

- | |
|---|
| <p>Practice 1: Clearly establish level of service standards for roadways on the Strategic Intermodal System (SIS), including SIS Connectors, roadways on the Florida Intrastate Highway System (FIHS), and roadway facilities funded through the Transportation Regional Incentive Program based on Rule 14-94, F.A.C.</p> <p>Practice 2: Adopt level of service standards for other state and local transportation facilities that reflect the community’s vision for the future and the community’s tolerance for congestion and desire for growth.</p> <p>Practice 3: Use alternative approaches to transportation concurrency to accomplish local planning objectives such as encouraging urban infill and redevelopment, emphasizing use of alternative modes of transportation, or addressing constrained facilities and concurrency deficiencies.</p> <p>Practice 4: Address the details of the concurrency management system in the LDRs and other easy-to-follow manuals or brochures to lead applicants through the concurrency review process .</p> <p>Practice 5: Include provisions for proportionate fair-share mitigation within local government comprehensive plans, land development regulations, and other documents.</p> |
|---|

Practice 1: Clearly establish level of service standards for roadways on the Strategic Intermodal System (SIS), including SIS Connectors, roadways on the Florida Intrastate Highway System (FIHS), and roadway facilities funded through the Transportation Regional Incentive Program based on Rule 14-94, F.A.C.

The 2005 growth management legislation changed the requirement for LOS standards on many state roads. Chapter §163.3180(10), F.S., now requires “With regard to roadway facilities on the Strategic Intermodal System designated in accordance with §§[339.61](#), [339.62](#), [339.63](#), and [339.64](#), the Florida Intrastate Highway System as recognized in §[338.001](#), and roadway facilities funded in accordance with §[339.2819](#) [involving the Transportation Regional Incentive Program (TRIP) funds], local governments shall adopt the level-of-service standard established by the Department of Transportation by rule. For all other roads on the State Highway System, local governments shall establish an adequate level-of-service standard that need not be consistent with any level-of-service standard established by the Department of Transportation.”

Rule 14-94, F.A.C. which establishes LOS standards for state roads has been revised to add references to the SIS and the TRIP and to substantially change the wording of the rule. Table 2 shows the revised Statewide Minimum LOS Standards for facilities outlined in §163.3180, F.S. including the SIS, FIHS facilities, and roads funded using TRIP funds. Local governments must incorporate the revised LOS standards for facilities as outlined in §163.3180, F.S.

TABLE 2 Florida Statewide Minimum Level of Service Standards

STATEWIDE MINIMUM LEVEL OF SERVICE STANDARDS FOR THE STATE HIGHWAY SYSTEM, ROADWAYS ON THE STRATEGIC INTERMODAL SYSTEM (SIS), ROADWAYS ON THE FLORIDA INTRASTATE HIGHWAY SYSTEM (FIHS) AND ROADWAY FACILITIES FUNDED IN ACCORDANCE WITH SECTION 339.2819, FLORIDA STATUTES, THE TRANSPORTATION REGIONAL INCENTIVE PROGRAM (TRIP)				
	SIS AND FIHS FACILITIES		TRIP FUNDED FACILITIES AND OTHER STATE ROADS ³	
	Limited Access Highway ⁴ (Freeway)	Controlled Access Highway ⁴	Other Multilane ⁴	Two- Lane ⁴
Rural Areas	B	B ¹	B	C
Transitioning Urbanized Areas, Urban Areas, or Communities	C	C	C	C
Urbanized Areas Under 500,000	C(D)	C	D	D
Urbanized Areas Over 500,000	D(E)	D	D	D
Roadways Parallel to Exclusive Transit Facilities	E	E	E	E
Inside TCMA ^s	D(E) ²	E ²	-- ²	-- ²
Inside TCEA ^s ² and MMTD ^s ²	-- ²	-- ²	-- ²	-- ²
Level of service standards inside of parentheses apply to general use lanes only when exclusive through lanes exist. 1. For rural two-lane facilities, the standard is C. 2. Means the Department must be consulted as provided by Section 163.3180(5), (7), or (15), Florida Statutes, regarding level of service standards set on SIS or TRIP facilities impacted by TCMA ^s , MMTD ^s , or TCEA ^s respectively. 3. Means the level of service standards for non TRIP facilities may be set by local governments in accordance with Rule 9J-5.0055, F.A.C. 4. It is recognized that certain roadways (i.e., constrained roadways) will not be expanded by the addition of through lanes for physical, environmental, or policy reasons. In such instances, a variance to the level of service may be sought pursuant to Section 120.542, Florida Statutes. NOTE: Level of service letter designations are defined in the Department's 2002 Quality/Level of Service Handbook.				

Source: Rule 14-94, Florida Administrative Code.

Prior to the recent changes, local governments were only required to apply FDOT minimum acceptable LOS standards to FIHS facilities and generally did so by reference. For example, St. Johns County simply stated, "Florida Intrastate Highway System – FDOT minimum acceptable LOS standards." To assure consistency with legislative and rule changes, it is a good idea for local governments to list and categorize roads by SIS, including SIS Connectors, FIHS, Other State Roads, and TRIP to establish LOS standards. The following model language is recommended for generally establishing LOS standards for roads subject to §163, F.S., and subsequent revisions to Rule 14-94, F.A.C., in the local government comprehensive plan:

"The level of service standard for roadways on the Strategic Intermodal System (SIS), including SIS Connectors, roadways on the Florida Intrastate Highway System (FIHS), and roadway facilities per Chapter 163, F.S., funded in accordance with Section 339.2819 Florida Statutes, the Transportation Regional Incentive Program shall be as set forth in Rule 14-94, Florida Administrative Code, as amended and applied as follows:"

Following the previous statement, local governments should list and categorize roads by SIS, FIHS, Other State Roads, and TRIP with the corresponding LOS standard within their comprehensive plan. The entire "Florida Statewide Minimum Level of Service Standards..." table (Table 2) may be included as well. Note that Rule 14-94, F.A.C., as amended, no longer contains definitions for backlogged or constrained facilities; however, such designations may be recognized through the

state’s variance process. A variance to the state’s minimum level of service standards may be sought through the procedures outlined in Section 120.542, F.S., at the FDOT District level requiring illustration of a hardship and a strategy for mitigation.

Practice 2: Adopt level of service standards for other state and local transportation facilities that reflect the community’s vision for the future and the community’s tolerance for congestion and desire for growth.

Local governments may establish their own LOS standards for other state and local transportation facilities, including public transit services in their concurrency networks. When establishing transportation LOS standards, the community sets its level of tolerance for congestion. If a community sets a low LOS standard such as LOS “E,” more capacity may be available for development, but a higher level of congestion will occur on transportation facilities. Conversely, establishing a higher LOS standard such as LOS “C” may provide better mobility (or operating) conditions, but will minimize available capacity and require increased revenues to maintain the higher standard. Local philosophy will determine the appropriate LOS standard for the community.

Note that LOS “F” is sometimes used to indicate a failed facility; however, it is not found as a standard in the FDOT Generalized Tables. Instead, a level of service standard lower than LOS “E” should be indicated using the amount of degradation below LOS “E” that will be allowed such as 110% of LOS “E.” Application of this type of standard can only be adopted once with new trips added in a cumulative fashion until the maximum service volume of the “revised” LOS standard is reached.

LOS standards for other state and local roads may be based on the functional classification of the road, development areas (e.g. urban, rural or transitioning), or a combination of both. For example, Tallahassee/Leon County uses a combination:

“The peak hour roadway level of service for Tallahassee and Leon County is established as follows:

- Outside the Urban Service Area:

Interstate, Limited Access Parkways:	B
Principal Arterials:	C
Minor Arterials:	C
Major and Minor Collectors:	C
Local Streets:	D

- Inside the Urban Service Area :

Interstate, Limited Access Parkways:	C
Principal Arterials:	D**
<i>Except Capital Circle NW from I-10 to SR 20</i>	
Capital Circle NW from I-10 to SR 20:	E
Minor Arterials:	D / E*
Major and Minor Collectors:	D / E*
Local Streets:	D

* For Minor Arterials, and Major and Minor Collectors located inside the Urban Service Area and south of U.S. 90, the Level of Service shall be "D" for purposes of establishing priorities for programming transportation improvements, and "E" for meeting concurrency requirements, to support the Southern Strategy. Roads north of U.S. 90 shall be LOS D for both programming improvement and concurrency purposes.

** The Level of Service for Monroe Street from Gaines Street to Tennessee Street shall be “E.” (Revised Effective 12/10/02).”

Although Tallahassee/Leon County established an LOS standard for local roads, it is not common practice because local roads are generally not included in concurrency networks. St. Johns County uses the following simpler approach for applying LOS standards to roads based on the surrounding development area:

- Rural Area: C
- Transitioning Urbanized Area,
Urban Area, or Community: D
- Urbanized Area: D

It is recommended that local governments use a combination of roadway functional classification, urban service areas, and development areas to establish LOS standards. This approach allows local governments to allow more development and also greater congestion in urban areas where drivers most expect it and restrict development in outlying areas.

Local governments may choose to designate certain roads (those roads that cannot be widened due to physical, political, or other constraints) as constrained and adopt individual LOS standards for these unique or problem locations. St. Johns County establishes a level of service standard for facilities such that “level-of-service must be maintained.” The county’s policy requires that new development trips plus existing and approved trips must be less than or equal to 110% of the adopted LOS within the urbanized area and 105% of the adopted LOS outside the urbanized area).

Regardless of the LOS standard established, it is recommended that both short- and long-term mitigation strategies should be developed for any existing or proposed constrained facilities to relieve congestion on the facility. Mitigation may take the form of congestion management designed to alleviate congested conditions through operational and small-scale physical improvements as well as travel demand management strategies (e.g., ride-sharing, incentives for mass transit use). Roadway capacity improvement options include new reliever roadways, additional capacity on existing parallel routes, and improved connectivity through network additions. Multimodal options include new transit capital facilities (e.g., bus rapid transit corridor) or expansion of bus fleets to increase service frequency.

Local governments are also required to establish LOS standards for public transit facilities and services where transit service is available (§163.3180(1)(a), F.S.). Specific public transit policies varied widely among local government transportation concurrency management systems reviewed. Some local governments provide only transportation disadvantaged service and, therefore, limit their public transit LOS standards to that service. For example, the St. Johns County LOS standard requires that the county be able “to provide transportation disadvantaged services sufficient to accommodate 100,000 passenger trips per year” and applies only to residential development.

The Second Edition of Transit Capacity and Quality of Service Manual (TCQSM), published by the Transportation Research Board in 2003, provides guidance to agencies that are establishing a new transit system, or evaluating or upgrading their current systems. The Manual recommends evaluating the transit systems by use of “Quality of Service” (QOS) measures using qualitative and quantitative performance measures.

The TCQSM discusses evaluation of both fixed route and demand-responsive bus transit systems. Evaluation is categorized into two groups of performance measures: 1) availability, and 2) comfort and convenience. Table 3 is a matrix that combines three elements of a fixed route transit system with these two types of performance measures. Table 4 shows the QOS framework for a demand

responsive system. The performance measures illustrated in Tables 3 and 4 represent only a few categories or types those provided in the TCQSM.

TABLE 3 Fixed Route Transit System with Two Performance Measures

	Transit Stop	Service Measures	
		Route Segment	System
Availability	Frequency	Hours of Service	Service Coverage
Comfort & Convenience	Passenger Load	Reliability	Transit-Auto Travel Time

Source: Transit Capacity and Quality of Service Manual, 2nd Edition. Transportation Research Board. 2003.

TABLE 4 QOS Framework for a Demand Responsive System

	Response Time	Service Measures	
		Service Span	
Availability	On-Time Performance	Trips Not Served	DRT-Auto Travel Time
Comfort & Convenience			

Source: Transit Capacity and Quality of Service Manual, 2nd Edition. Transportation Research Board. 2003.

Practice 3: Use alternative approaches to transportation concurrency to accomplish local planning objectives such as encouraging urban infill and redevelopment, emphasizing use of alternative modes of transportation, or addressing constrained facilities and concurrency deficiencies.

Section 163.3180, F.S., offers alternatives to strict adherence to transportation concurrency in the transportation concurrency exception area, the transportation concurrency management area, the multimodal transportation district, and the long-term concurrency management system. Use of these mechanisms requires a comprehensive plan amendment and the approval of DCA, as well as concurrence from the FDOT if the facility is governed by Rule 14-94, F.A.C.

Transportation Concurrency Exception Area (TCEA)

The transportation concurrency exception area is the most widely used alternative. It allows local governments to reduce barriers to infill and redevelopment, and the incentive for urban sprawl, by allowing development to proceed notwithstanding a failure to meet transportation concurrency, provided there is a community commitment to pursue an alternative transportation system and urban forms that will reduce single occupant vehicle trips and automobile use. The 2005 growth management legislation requires local government comprehensive plans to support and fund mobility strategies that promote the purpose of the concurrency exception. These strategies must address urban design, land use mix, and network connectivity within the TCEA. In addition, the legislation requires local governments to consult with FDOT prior to the designation of TCEAs to assess any impact a TCEA may have on the SIS, as well as to develop plans in cooperation with FDOT to mitigate any impact.

DCA, in conjunction with the University of Florida, recently conducted a review of existing TCEAs in Florida with respect to the requirements of the 2005 Growth Management Legislation. Model evaluation criteria for TCEAs were developed and applied in three pilot communities to test their effectiveness. Study results are published in “A Guide for the Creation and Evaluation of Transportation Concurrency Exception Areas” available on the DCA website.

One example of a TCEA is in the City of Gainesville, Florida. The Concurrency Management Element of the Gainesville Comprehensive Plan advances the concepts of multimodal transportation, with a goal to, “Establish a transportation concurrency exception area (TCEA), which promotes and enhances urban redevelopment, infill development [and] a variety of transportation choices and opportunities including automotive, pedestrian, bicycle and transit...”² The TCEA covers a majority of the city limits and is broken into two sub-areas, Zones A & B. To encourage redevelopment of the eastern portion of the city and the area near the University of Florida (Zone A), development or redevelopment in Zone A must provide the following in order to meet the TCEA requirements:

- sidewalk connections from the development to existing and planned public sidewalks along the development frontage;
- cross-access connections/easements or joint driveways, where available and economically feasible;
- deeding of land or conveyance of required easements along the property frontage to the city, as needed for the construction of public sidewalks, bus-turn out facilities and/or bus shelters;
- closure of existing excessive, duplicative, or unsafe curb cuts or narrowing or overly wide curb cuts at the development site; and,
- provide safe and convenient on-site pedestrian circulation such as sidewalks and crosswalks connecting buildings and parking areas at the development site.

The remaining parts of the TCEA (Zone B), must meet the same requirements as Zone A, plus additional development requirements depending upon the proportional impact of the new development on the roadway system. Those requirements will relate to the particular site and transportation conditions where the development is located. Multimodal requirements include, but are not limited to:

- Construction of bus shelters.
- Construction of bus turn-out facilities.
- Provision of bus pass programs provided to residents and/or employees of the development.
- Widening of existing public sidewalks to increase pedestrian mobility and safety.
- Deeding of land for the addition and construction of bicycle lanes.
- Provision of ride sharing or van pooling programs.
- Provision of park and ride facilities.
- Business operations that can prove to have limited or no peak hour roadway impact.
- Provision of shading through awnings or canopies over public sidewalk areas to promote pedestrian traffic and provide protection from the weather so that walking is encouraged.
- Enhancements to the city’s greenway system which increase its utility as a multimodal transportation route.
- Clustering of and design of the development for maximum density at the site which preserves open space, reduces the need for development of vacant lands, enhances multimodal opportunities, and provides transit-oriented densities or intensities.

² Ordinance 050374, Article III, Division 2, Concurrency Management. Gainesville, Florida. Adopted September 26, 2005.

- Construction of new road facilities which provide alternate routes to reduce congestion.

Additionally, the TCEA provides for additional regulation of automobile-oriented development such as drive-through facilities, surface parking lots, car washes and gas stations to minimize the impact of these land uses on the transportation system in the TCEA area. The TCEA also regulates the visual characteristics of roadways in the area through streetscaping and landscaping standards in order to create a more appealing environment that supports multimodal transportation opportunities.

Transportation Concurrency Management Area (TCMA)

The second alternative, transportation concurrency management areas, are also designed to promote infill development and redevelopment. A TCMA “must be a compact geographic area with an existing network of roads where multiple, viable alternative travel paths or modes are available for common trips” (Section 163.3180(7), F.S.). The TCMA allows an LOS standard to be applied areawide rather than on individual road segments.

The City of Orlando’s TMA approach served as the impetus for the TCMA allowed by Section 163.3180(7), F.S. The city adopted level of service measures that make use of traffic performance districts. Rather than evaluate the performance of individual roadway segments the district approach averages level of service for the various complementary facilities within a sizeable geographic district. Concurrency is evaluated based on the district-wide performance measure. The city’s transportation concurrency management system monitors available capacity in each of 15 Transportation Performance Districts, (TPDs) three of which are designated as Transportation Management Areas (TMAs).

Orlando’s Concurrency Management Regulations, Section 59.308 Concurrency Evaluation for Roads defines the TMAs as compact geographic areas that offer opportunities for higher-density, mixed-use development and alternative modes of transportation. Orlando’s three designated transportation management areas must:

- further the goals, objectives, and policies of the state plan, comprehensive regional policy plan and the city's Growth Management Plan;
- encourage compact urban development, redevelopment, urban infill, and mixed use development;
- contain a complete, integrated network of arterial and collector roadways and include roads that serve related purposes;
- support concentrated mass transit services, and include transportation management and demand management programs; and,
- qualify as geographically compact areas, and be supported by traffic performance district descriptions.

Orlando monitors LOS in the TMAs based on the percent of lane miles that meet established LOS standards. Eighty-five percent of lane miles or more must meet roadway LOS standards in each performance district. If a moratorium is required, it is established across that entire performance district until the level of service is restored through a transportation improvement. The Transportation Element of the city’s Growth Management Plan establishes that, “The City shall permit development, consistent with the Trip Allocation Program, that will support the Future Land Use Element and which will further the goals, objectives and policies of the Growth Management Plan.” A detailed description of the Trip Allocation Program is found in Section 59.308 of the Orlando City Code. Characteristics of this Program include:

- using a trip allocation model to monitor the proportion of trip ends allocated to traffic analysis zones within each performance district to determine available capacity;
- using a Transportation Primary Impact Area approach that involves a select roadway analysis to determine which zones in the region are contributing to a roadway deficiency and then reducing trip allocations by a proportionate fair share of the city’s trips from those zones which are outside of the Transportation Primary Impact Area;
- basing concurrency on three capacity thresholds that reflect whether district capacity is (1) sufficient, (2) limited, and trips must be transferred from adjacent zones, or (3) extremely limited and a capacity improvement may be necessary; and,
- revalidating the trip allocation model annually based on development permit data and trip allocation reservations.

Multimodal Transportation District (MMTD)

The third alternative, the multimodal transportation district is an area where primary priority is placed on “assuring a safe, comfortable, and attractive pedestrian environment, with convenient interconnection to transit” (Section 163.3180(15)(a), F.S.). Communities must incorporate community design features that reduce vehicular usage while supporting an integrated multimodal transportation system. Common elements include the presence of mixed-use activity centers, connectivity of streets and land uses, transit-friendly design features, and accessibility to alternative modes of transportation. Multimodal transportation districts (MMTDs) must include level of service standards for bicycles, pedestrians, and transit as well as roads.

The Florida Department of Transportation has developed a *Multimodal Transportation Districts and Areawide Quality of Service Handbook* (FDOT 2004) to provide guidance on the designation and planning of MMTDs as provided in Florida’s growth management legislation. The handbook provides for MMTD designation in a downtown or urban core area, regional activity center, or traditional town or village in accordance with certain criteria. In these areas, planning efforts would focus on enhancing multimodal elements, guiding redevelopment, and encouraging appropriate infill. An MMTD could also be applied to a new or emerging area, where adopted plans and regulations would need to ensure the internal and external connectivity, a mix of uses, densities, and urban design features necessary to support alternative modes of transportation.

The only approved MMTD in Florida is in Destin, Florida. The city established its MMTD through objectives in the Transportation Element of the City of Destin Comprehensive plan in 2001. The MMTD is specifically established with the following objective:

The City hereby designates ...as a Multimodal Transportation District (MTD) pursuant to Florida Statutes - Chapter 163.3180(15)(a) and as designated on Map . . ., Multimodal District Boundaries of the Transportation Element and Map . . . of the Future Land Use Element. A MTD allows for a creative approach to concurrency by establishing performance measures for non-auto travel modes. In this district priority is placed on establishing a safe, convenient, and attractive pedestrian environment. Good pedestrian access and convenient connections to future transit service shall be promoted/required in this district.

Policies call for the establishment of performance measures within the MTD, development of design guidelines for pedestrian and transit facilities, consideration of impact fee credits as an MTD incentive, establishment of non-auto LOS standards, and incorporation of bicycle parking standards in the land development regulations.

All Concurrency Management Areas

Each of the alternatives described above offer local governments the opportunity to meet local planning objectives while meeting the intent of concurrency. Regardless of the alternative, local governments with existing or proposed TCEAs, TCMAAs, or MMTDs must consult with the FDOT to assess potential impacts on the adopted LOS standards established for the SIS and, if necessary, to develop mitigation plans for any impacts.

Many local governments have existing transportation concurrency deficiencies and should strive to ensure capacity improvement projects or other alternatives designed to correct existing deficiencies (e.g. multimodal improvements and long-term policies in the CIE) are included in the capital improvement schedule of the capital improvement element. They may choose to adopt a unique LOS standard for deficient facilities such that “level-of-service must be maintained (110% of adopted LOS within the urbanized area and 105% of adopted LOS outside the urbanized area). As shown earlier, the City of Tallahassee adopted individual LOS standards for specific roads. The city’s comprehensive plan policies outline their intent to resolve LOS issues on the affected facilities as follows:

Policy 1.4.1b. It is intended that the LOS standards of “E” for Capital Circle NW from I-10 to SR 20 be a temporary LOS standard for the purposes of allowing development to proceed on an interim basis. It is also intended that all road projects necessary to increase the LOS standard on this roadway from “E” to “D” remain a high priority and be accomplished as soon as possible, within the constraints of available revenues. When construction of the road projects necessary to provide a sufficient increase in capacity along any portion of Capital Circle NW between I-10 and SR 20 is within three years from the date a development order is issued, consistent with existing concurrency management procedures, a comprehensive plan amendment to change the adopted LOS Standard of “E” to an LOS Standard of “D” for the improved portion only shall be initiated during the next possible amendment cycle.

Policy 1.4.1c. The LOS Standard of “E” for Capital Circle NW from I-10 to SR 20 shall be defined for concurrency purposes as the current maximum service volume for LOS “D” as indicated by the City or County concurrency system plus 10%.

Mitigation plans should be developed for constrained facilities such as new parallel routes, additional capacity on existing parallel routes, improved connectivity, or multimodal options. To implement these mitigation plans, a local government may adopt a long-term concurrency management system that includes “a planning period of up to 10 years for specially designated districts or areas where significant backlogs exist.” Local governments that develop a long term concurrency management system must adopt a corresponding ten-year capital improvement element. Under specific circumstances, the long-term concurrency management system and corresponding capital improvements schedule may span up to 15 years.

Transit-Oriented Concurrency

Broward County addresses transportation concurrency using two types of concurrency districts: transit-oriented concurrency districts, and standard concurrency districts. Within the Broward County Code, these districts are defined both geographically and conceptually. A Standard Concurrency District is an area where roadway improvements are anticipated to be the dominant form of transportation enhancement. A Transit Oriented Concurrency District is a compact geographic area with an existing network of roads where multiple, viable alternative travel paths or modes are available for common trips. The distinction is important, because each type of concurrency district carries with it a different set of standards for adequacy determination. The LOS for roadways are

conventional, whereas, the relevant LOS standards for transit-oriented concurrency districts address transit headways and the establishment of neighborhood transit centers and additional bus routes, and are broken down on the individual district level.

The county charges an assessment, the Transit Concurrency Assessment (TCA), as a vehicle for meeting concurrency requirements in Transit Oriented Concurrency Districts. Revenues from the TCAs are used to fund enhancements to the County Transit Program (established by the County Commission) located in the district where the proposed development will occur. More information on Broward County’s approach can be found in Appendix C.

Practice 4: Address the details of the concurrency management system in the LDRs and other easy-to-follow manuals or brochures to lead applicants through the concurrency review process .

To carry out the objectives and policies for establishing a concurrency management system, local governments must “adopt land development regulations which specify and implement provisions of the concurrency management system and, as a minimum, provide a program that ensures that development orders and development permits are issued in a manner that will not result in a reduction in the levels of service below the adopted level of service standards for the affected facility.” (Rule 9J-5.0055(1)(e), F.A.C.) Because each CMS is designed to work in conjunction with the local government’s existing development approval process, an entire chapter or article of their land development regulations is generally devoted to concurrency management. Our review of concurrency management systems revealed that this chapter should include, but is not limited to the following:

Purpose and intent. A concurrency management chapter often begins with a purpose and intent. This section states the purpose the CMS will serve “to ensure that adequate public facilities are available with impact of development” and may reference the state legislation mandating a CMS.

Geographic service area. The geographic service area of a CMS is typically defined here. If the geographic service area is different for the various public facilities or utilities governed by concurrency, each service area must be defined separately. In addition, local governments may list utilities and facilities addressed by CMS.

Tracking and reporting systems. The description of and implementation process for monitoring and reporting systems are included in this chapter. It is recommended that local governments have separate tracking and reporting systems for concurrency especially for transportation concurrency.

De minimis exceptions. As allowed by state legislation, this section includes a definition of developments that have a de minimis impact. Furthermore, most local governments list the developments or development activities considered to be de minimis. Florida law defines de minimis impact as “an impact that would not affect more than 1 percent of the maximum volume at the adopted level of service of the transportation facility as determined by the local government.” (§163.3180(6), F.S.) Developments with de minimis impacts may be exempted from the transportation concurrency determination process of local governments. However, there is a limit to de minimis impact on any given road link. If a road link is at or exceeds 110% of its service capacity, no further developments are to be approved on that link under the de minimis provision until the necessary improvements are in place and the roadway is operating within 110% of its service capacity.

Concurrency exemptions. In addition to de minimis exceptions, some local governments exempt specific types of development from concurrency, which would be listed in this section (e.g.

improvements that would not add to the density or intensity of the existing land use such as any renovation to residential structures that do not increase the overall number of units or the type of units; and renovations to non-residential buildings that do not result in an increase in gross square footage for any use).

Concurrency certificates. Depending on the complexity of the CMS and the size of the local government, different types of certificates may be issued. This section establishes when a concurrency certificate is issued (usually along with other permits such as development permits, final plat approvals, or building permits), as well as the duration of the certificate and conditions for its extension.

Concurrency evaluation process. A key component of the concurrency management chapter of the LDRs is the explanation of the concurrency evaluation process. General procedures and conditions to be applied to every facility and utility are described along with the administrative process to be followed. The administrative process may contain the responsibilities of local government departments, as well as the data reporting and maintenance methodology. The specific process for each utility and facility type is explained separately, with the transportation concurrency evaluation process often discussed in the greatest detail.

Traffic study methodology. A traffic study, typically required for large development applications, must follow specific methodology. Some local governments include traffic study methodology as a separate section in their LDRs while others provide supplementary documents for traffic study procedures and merely reference them here.

Adopted level of service standards. Adopted LOS standards for utilities and facilities contained in related elements of the local government comprehensive plan are either listed here or referenced.

Mitigation. If adequate public facilities are not available for a development, local governments may allow a developer to mitigate the impacts of the proposed development. Mitigation procedures including acceptable and unacceptable mitigation methods are listed here along with other options including alternatives to mitigation such as reducing the scale of the development and/or phasing the project.

Vested rights. Application and determination of vested rights are contained in this section. Vested rights usually include development approvals issued prior to the adoption of concurrency. This section outlines the process a developer must follow to receive a vested rights determination and, therefore, avoid the concurrency process.

Appeal process. This section explains the procedure for appealing a concurrency determination and identifies the responsible departments or officers.

While the local government comprehensive plan and the land development regulations establish the legal and operational framework for a transportation concurrency management system, local governments often develop a variety of documents that provide general information and guidance through the process. These documents may be given to applicants that visit the local government offices seeking information or placed on the local government website for easy access.

The provision of this type of additional information takes many forms. For example, the City of Lakeland website includes both “Frequently Asked Questions” and a “Memorandum” that provides a general description of the city’s concurrency and traffic review study requirements. Both documents are good practices for providing applicants with basic information regarding transportation concurrency and are available on the city’s website: www.lakelandgov.net/commdev/planning/.

Indian River County has developed a simple table that provides basic concurrency information as illustrated in Figure 2. It relates the type of development order an applicant is seeking with types of concurrency approvals and their duration along with other pertinent information. Materials provided should include detailed instructions to ensure that applicants have enough information to submit complete applications.

FIGURE 2 Example of information provided to applicants.

Indian River County Concurrency Information

Type of Concurrency	Type of Development Order	How Long is Concurrency Good For?	Payment of Impact Fees and Capacity Charges Required	Is Project Vested For Appropriate Capacities?	Do Additional Impact Fees or Capacity Charges Payable When the Rate Increases?
CCCN (Conditional)	Conceptual Development Orders: <ul style="list-style-type: none"> ➢ Land Use Amendments ➢ Rezonings ➢ Preliminary PD Plans ➢ Preliminary Plats ➢ Conceptual Plan Approvals 	Only for the day that the concurrency certificate is issued (does not vest concurrency, only provides a "snapshot" evaluation)	NO	NO	N/A
CC11, CC15, VBI1, VBI5 (Initial 1 and 5 year)	Initial Development Orders: <ul style="list-style-type: none"> ❖ Site Plans ❖ Land Development Permits or Land Development Permit Waivers ❖ Changes in Use that Increase Density or Intensity 	CC11 or VBI1- for 1 year CC15 or VBI5- for 5 years (vest concurrency)	YES	YES, CC11 or VBI1 - one year CC15 or VBI5 - five years	YES, payable at the time of final concurrency associated with the building permit
CFEE (final) RSF5	Final Development Orders: <ul style="list-style-type: none"> ☐ Building Permits ☐ Change of Use Requiring a new CO 	As long as building permit is active or CO issued (allows for issuance of building permit)	NO	YES	YES
CINF or VBIF (Combination Initial/Final)	Initial Development Orders: <ul style="list-style-type: none"> ❖ Site Plans ❖ Land Development Permits or Land Development Permit Waivers ❖ Changes in Use that Increase Density or Intensity 	6 months to pull building permit then as long as building permit is active or if CO is issued (vests concurrency and allows for issuance of building permit)	YES	YES	NO, unless building permit is not pulled within 6 months or if building permit expires. If concurrency or building permit expires, applicant must apply for new concurrency certificate and pay fees applicable at that time.
RSF, VBSF, MHSF	Final Development Orders: <ul style="list-style-type: none"> ☐ Single Family Building Permits ☐ Mobile Home Tie-Down Permits 	As long as building permit is active or if CO is issued (vests concurrency and allows for issuance of building permit)	YES	YES	NO, unless building permit expires

CINF - Concurrency initial final; valid for six months.
 CC11 - Concurrency initial one year; valid for one year, additionally needs final concurrency (CFEE).
 CC15 - Concurrency initial five years; valid for five years (traffic impact fees cannot be refunded).
 CCCN - Concurrency conditional; for land use amendments, rezonings, and preliminary plats only.
 VBI1 - Vero Beach Concurrency vest one year
 VBI5 - Vero Beach Concurrency vest five years
 RSF - Residential single family
 VBSF - Vero Beach single family
 MHSF - Mobile home single family

Source: Indian River County, Florida

Practice 5: Include provisions for proportionate fair-share mitigation within local government comprehensive plans, land development regulations, and other documents.

In addition to updating comprehensive plans to revise LOS standards for state and other roads, local governments will also need to update comprehensive plans, LDRs, and other documents such as “Frequently Asked Questions” to include provisions for proportionate fair-share mitigation. The 2005 amendments to Florida’s growth management legislation directed local governments to enact concurrency management ordinances by December 1, 2006 that allow for “proportionate share” contributions from developers toward concurrency requirements (see §163.3180(16), F.S.). The intent of the proportionate fair-share option is to provide applicants for development an opportunity to proceed under certain conditions, notwithstanding the failure of transportation concurrency, by contributing their share of the cost of improving the impacted transportation facility.

It is necessary for a local government to have a concurrency management system in place prior to the adoption of a proportionate fair-share ordinance. The newly adopted proportionate fair-share requirements would not apply until a deficiency is identified through the local concurrency management system. Local governments that have yet to establish a concurrency management system will need to do so prior to implementing a proportionate fair-share mitigation program. The following language is one model recommended for generally establishing proportionate fair-share mitigation in the local government comprehensive plan:

OBJECTIVE: Establish a method whereby the impacts of development on transportation facilities can be mitigated by the cooperative efforts of the public and private sectors, to be known as the Proportionate Fair-Share Program.

POLICY: The [City/County] shall include within the [Land Development Code] the standards and guidelines under which the [City/County] shall permit the payment of proportionate fair-share contributions to mitigate locally and regionally significant transportation impacts consistent with Chapter 163.3180(16), Florida Statutes and the [Land Development Code]. Such standards and guidelines shall provide that the County shall not rely on transportation facilities in place or under actual construction more than 3 years after the issuance of a building permit, except as provided in Chapter 163.3180(16), Florida Statutes.

In accordance with §163.3180(16), F.S., the Florida Department of Transportation (FDOT) developed a model ordinance for proportionate fair-share contributions for use by local governments. The model proportionate fair-share ordinance is available on the FDOT website at <http://www.dot.state.fl.us/planning/gm/pfso/>. The model ordinance provides a series of options that are intended as a framework for proportionate fair-share programs. The ordinance language sets forth the proportionate fair-share mitigation options in a manner consistent with and as required by §163.3180(16), F.S., and has been crafted to tie to existing local government concurrency management systems. Because conditions vary throughout the state, it is not the intent that a local government would adopt the ordinance verbatim as it does not address all issues that may arise within a particular context. Rather, the model ordinance is a technical assistance product that local governments will need to consider and adapt to their situations. The model ordinance also contains some optional features that a local government may consider depending upon their needs.

- Minor Project (4-29.9 Peak Hour Trips) - \$250.00
- Minor Project reviewed in conjunction
with other development review application - No Fee
- Major Project (30+ Peak Hour Trips) - \$840.00
- Modification - \$125.00

A few local governments reviewed do not charge a specific fee for concurrency review. Ormond Beach imposes a \$110 fee for Non-Binding Concurrency letters, and then includes fees for binding determinations within its development order fees. Bay County fees are included in the Development Order application fee of \$600 for most developments; \$665 for subdivisions. Bay County fees will be updated in 2006 and will include a fee for proportionate fair-share mitigation review estimated to be \$575. Likewise in Sarasota County, there is no specific fee for the concurrency determination per se. Rather, it is part of development plan review. The base fee for plan review ranges from \$1,500 for Subdivision Construction plans to \$4,000 for Commercial Plans. The actual plan review fee is dependent on development types, size and review process and is specified in the fee calculation sheets, which are available on the Sarasota County website <http://www.co.sarasota.fl.us>. Local governments should consider establishing fees for concurrency cover administrative costs. .

Practice 7: Provide both informal and formal concurrency determinations.

Most local governments provide two “levels” of concurrency that can be described as informal and formal. An informal concurrency determination is non-binding and may be either written or verbal. This informal determination merely estimates the availability of capacity for a proposed project; however, it does not guarantee that adequate capacity will be available at the time application for a formal concurrency determination is made. A formal concurrency review results in the issuance of a concurrency certificate concurrent with or prior to development permit approval. This concurrency certificate is binding and reserves projects trips for the applicant.

A few local governments have more complex systems. In Sarasota County, transportation concurrency is reviewed at each stage of the development review process. Although trips are entered into their system throughout the review process, trips generated from a development are considered reserved for concurrency only at the time of construction plan approval. The project trips continue to be reserved after approval of the construction plan, and for as long as the project is under construction.

The City of Tallahassee has a more formalized approach. A preliminary concurrency assessment must be made within eight calendar days after receiving complete and sufficient application. If a preliminary review indicates that the project meets the concurrency requirements a "Preliminary" Certificate of Concurrency is issued on the project. This "Preliminary" Certificate of Concurrency is good for 28 calendar days and enables the applicant to proceed with an application for development approval. A final concurrency review is conducted after final land use approval is received. If a project has been determined to meet the concurrency requirements, a "Final" Certificate of Concurrency will be issued to the applicant and capacity will be reserved for the project. The "Final" Certificate of Concurrency allows an environmental permit application and a building permit application to be accepted.

Finally, Indian River County issues the following three types of concurrency certificates:

- Conditional Concurrency Certificate: Purpose of this certificate is to satisfy the concurrency requirement for conceptual development orders and conceptual approval of initial development

orders. This certificate does not guarantee availability of adequate facilities during the time of initial or final development order.

- Initial (or Initial/Final) Concurrency Certificate: This certificate is valid for one year or five years depending on the applicant's preference. Prior to issuance of this certificate the applicant must pay all impact fees and utility capacity charges. In order to obtain a five year certificate the applicant must sign a waiver of the right to receive a refund of traffic impact fees.
- Final Concurrency Certificate: This certificate is valid for six months after issuance. If the applicant obtains a building permit during that time period this certificate will not expire as long as the building permit is active.

Practice 8: Ensure that the duration of concurrency reservations meets local needs.

Concurrency reservations for unbuilt developments can tie up capacity indefinitely unless limits on the duration of concurrency reservations are established. Without these limits, a road may be operating at an acceptable level of service while "failing" on paper. For example, a concurrency certificate could expire after one year if construction has not commenced. There is little consistency regarding the duration of a concurrency certificate among the concurrency management systems reviewed for this project. Common elements are that the duration is based on the type of development approval and the timeframe in which construction activity begins.

In Bay County, a certificate of concurrency is valid until its accompanying development order expires. If the development order has no expiration date, the certificate is valid for six months from the development order issuance date. The certificate is automatically extended with any development order extensions up to one year.

Durations of concurrency certificates for the City of Ormond Beach are very specific to the type of development approval as follows:

- site plan approvals: one year from the date of sign-off approval;
- special exceptions: one year from the date of approval by the City Commission;
- preliminary plats: 18 months from the date of approval by the City Commission;
- final plats: 18 months from the date of approval by the City Commission if final plat is not recorded; (If the final plat is recorded but development permit is not issued the certificate expires in two years from the date of recording. Time period for expiration of certificates approved prior to the code, begins with the effective date (January 1, 1992) of the code.);
- subdivision construction permits: one year from the date of issuance;
- planned developments: two years from the date of approval by the City Commission; and,
- building permits: until the accompanying building permit expires.

Escambia County allocates new development trips to each impacted roadway segment during the issuance of a development order. Durations of certificates are as follows for different development types:

- preliminary plat (subdivision): capacity is allocated for a period of four years provided construction plans are submitted within two years. If the construction plans are not submitted within two years the certificate will expire;
- site plan (non-residential): capacity is allocated for a period of 18 months; and,
- planned unit development (PUD), phased development, long term projects or DRI: capacity is allocated for the period established in an enforceable development agreement.

Sarasota County does not issue concurrency certificates. A land development construction plan approval is a "final development order" and can reserve trips for the time the development order is

valid. Generally, construction authorization allows two years for construction activity to commence, and once construction has begun the project trips may be reserved for the duration of the project. Therefore, multi-phase developments could be vested for several years, as long as there is continuous construction activity onsite.

Some local governments tie concurrency duration to the payment of impact fees. This ensures that the local government has received the impact fees necessary to support transportation improvements although a developer has not started project construction. In St. Johns County, a final concurrency certificate is valid for two years after the date it is issued. During that time, if the applicant obtains construction plan approval, final subdivision plat approval, or a building permit, then the certificate is valid as long as those documents are valid. In addition, the certificate can be extended three years if the applicant pays the impact fees and waives the right to a refund of impact fees prior to the expiration of the final concurrency certificate.

Similarly, in Tallahassee, an applicant who receives a concurrency certificate reserves capacity for up to two years prior to receiving a final development order provided all impact fees and other infrastructure costs required for the development are paid up front. A concurrency certificate is valid for the term of the development order (site plan, plat, or permit) associated with the certificate or two (2) years from date of issuance if no term is specified. A request can be made to extend both the development order and the concurrency certificate up to six months unless development has not commenced or another applicant is waiting for the capacity.

As mentioned earlier, Indian River County requires the applicant to pay all impact fees and utility capacity charges in order to receive an Initial (or Initial/Final) Concurrency Certificate. The applicant must sign a waiver of the right to receive a refund of traffic impact fees in order to receive a certificate that is valid up to five years.

Practice 9: Establish a systematic method for monitoring capacity on transportation facilities.

A key element of a transportation concurrency management system is a method for tracking or monitoring concurrency – that is, tracking proposed trips along with existing traffic in order to compare estimated future traffic volume to the minimum acceptable level-of-service volume in the peak hour/peak direction. This tracking system enables a local government to determine whether the impact of proposed development trips on the transportation system will cause the level of service to drop below the adopted minimum acceptable level. Both state and local roads should be included in the concurrency network. Local governments use various forms of tracking systems ranging from simple Microsoft Excel spreadsheets to web-based intranet sites.

The simplest concurrency tracking system consists of a basic Microsoft Excel spreadsheet that is updated manually by local government staff. A spreadsheet tracking system is primarily used for the road system by segment or link and provides a “snapshot” of transportation concurrency. “At a glance,” both local government staff and applicants can observe the availability of capacity on any given road link.

The Excel spreadsheet is set up with each link or segment of the road network as a “row” and each input variable as a “column” which is illustrated in Figure 4. Table 5 comprises the input variables that are commonly used as recommended column headers along with a description of the information to be contained in the column and source for the information. The number of columns a local government may include in a spreadsheet tracking system is not limited; however, thought should be

given to the printed appearance of the final product. Printouts can be simplified by the feature that enables the user to “hide” certain columns, thus limiting the amount of information viewed or printed.

Use of the Excel spreadsheet enables local governments to increase the complexity of the tracking system as needed or wanted. The Bay County Planning and Zoning Department uses an Excel spreadsheet to track concurrency, they also informally track other information pertinent to their spreadsheet tracking system. (Separate “tabs” or worksheets are used to track concurrency on state and county road segments, development orders, intersection level of service, and future growth on state and county roads (through 2030). Worksheet entries or cells are appropriately linked to cells in other worksheets to automatically update information throughout the spreadsheet and make necessary calculations. The spreadsheet is manually updated as applications for development orders are reviewed and approved.

The City of Lakeland monitors transportation concurrency using an Excel spreadsheet system in another way. Their system is based on data from the Polk County concurrency management system. Different than many basic spreadsheet tracking systems, this spreadsheet includes each road link on a separate “tab” or worksheet. Each pending or approved development is listed on the worksheet as illustrated in the City of Lakeland CMS Summary found in Appendix C. Trips are only encumbered on links when the development is approved.

TABLE 5 CMS Spreadsheet Column Headers

COLUMN HEADER	DESCRIPTION	SOURCE
Road Link #	Number assigned to a road link.	Assigned by local government.
Road	Name of the road.	Official road name according to the agency with jurisdiction.
From / To	Defines the start and end points of a road link.	State road links are established by FDOT. County/city road links are established by the local government with jurisdiction over the road. Link limits coincide with other road links, traffic signals, and/or other notable intersections and are shorter in urban areas than rural areas.
# of Lanes	Number of road lanes; often includes a “U,” “D,” or “O” to indicate undivided, divided or one-way.	From each road link. The number of lanes should be constant for the length of the link.
Area Type	Development area, e.g. urban, rural	As established by the local government comprehensive plan.
Functional Classification	Functional classification of the road.	FDOT for state and federal roads. As established by the agency with jurisdiction over the road.
Length	Length of the road link in miles.	Established by the link limits.
Signal Spacing or Capacity Group	Number of signals per mile or FDOT capacity group.	Signal locations or FDOT 2002 Quality/Level of Service Handbook.
Count Station	Count Station number associated with the link; may be FDOT, county, or city; used as an easy reference number for the link.	FDOT has count stations for each link on state roads as well as other locations. The local government should establish regular count stations for roads under its jurisdiction.
Source and Date of Count	Date the traffic count shown was taken and agency taking the count.	As established by the agency responsible for the traffic count.
Traffic Count AADT	Average annual daily traffic (AADT) count on link.	As established by the agency responsible for the traffic count.
Annual Growth Factor	Factor used to estimate annual	Calculated by agency with jurisdiction

COLUMN HEADER	DESCRIPTION	SOURCE
	growth.	based on previous growth rate.
K Factor	Factor used to convert AADT to peak hour traffic. K100 is 100 th highest peak hour traffic divided by AADT and used for roadway LOS analysis.	Calculated by agency with jurisdiction based on previous traffic counts.
D Factor	Factor used to convert peak hour traffic to peak hour/peak direction .	Calculated by agency with jurisdiction based on previous traffic counts.
Existing PH PD Volume	Annual daily traffic counts adjusted to determine the peak hour peak direction volume.	(AADT x "K Factor" x "D Factor")
Approved Trips	Development trips approved and reserved on the link through a certificate of concurrency. Does not include De minimis trips.	Compiled by the local government as trips are approved.
De Minimis Trips	Trips generated by developments having de minimis impact as defined in the local government comprehensive plan and LDRs and §163.3180, F.S.	Compiled by the local government as building permits are issued for projects with "de minimis" impact.
Total Committed PH PD Traffic	Existing PH PD volume plus the total number of approved trips that are anticipated on the road network.	(Existing PH PD Volume + Approved Trips + De Minimis Trips)
LOS Standard	LOS standard adopted for the link by letters A-E.	State roads per §14-92, F.A.C. as amended. For all other roads, as established in the local government comprehensive plan
PH PD Service Volume	Adopted service volume/capacity (min acceptable LOS) during the peak hour in the peak direction per the adopted LOS standard and the geometric characteristics of the road link.	FDOT 2002 Quality/Level of Service Handbook.
Traffic Analysis Service Volume	New service volume for the link based on a detailed traffic analysis approved by the local government.	This revised service volume is adopted by the local government (and FDOT, where appropriate) and is based on an accepted detailed traffic analysis.
Volume/Capacity Ratio	Total Committed PH PD traffic volume divided by either the PH PD Service Volume or approved Traffic Analysis Service Volume.	$\frac{\text{Total Committed PH PD Traffic}}{\text{PH PD Service Volume or Traffic Analysis Service Volume}} \times 100$
Remaining Capacity	The remaining capacity available on the link.	PH PD Service Volume (or Traffic Analysis Service Volume) - Total Committed PH PD Traffic Volume
Link Status	Existing LOS; may also include terms such as "Critical" "Deficient"	Determined by comparing the Total Committed PH Traffic with the PH PD Service Volume
110% Service Volume	110 % of the PH PD Service Volume or Traffic Analysis Service Volume.	110 % x PH PD Service Volume
Hurricane Evacuation Route	Indicate whether or not the link is a Hurricane Evacuation Route with a "Y" or "N."	As established in the local government comprehensive plan.
Planned Improvements	Planned improvements to deficient road links.	Capital improvement element of local government comprehensive plan.

Some local governments have more complex concurrency tracking systems that track concurrency for transportation as well as other public facilities with concurrency requirements such as sanitary sewer, solid waste, drainage, potable water, and parks and recreation. Using a computerized database called CDPLUS, Indian River County is one example. Each county department has access to the concurrency management system via their desktop computer. The Planning Department "sets up" a

project in the system and notifies the appropriate county departments. When all reviews are complete, the Chief of Planning issues the concurrency certificate. Upon this approval, the computer program automatically encumbers links in the transportation system with project trips. In addition, the system encumbers links with the “cumulative effect of all single-family permits” on a quarterly basis. As projects are approved, traffic analysis zone (TAZ) socioeconomic data is updated and new vested traffic volumes are generated for each segment using the FSUTMS model. The system not only addresses transportation system but all other facilities subject to concurrency as well. The benefit of this approach over spreadsheets is the automation of project tracking which can be particularly useful when a local government processes a large number of permits.

Practice 10: Identify sources of information to update and maintain critical traffic data and other information in the tracking system.

Regardless of the type of concurrency tracking system used by a local government, the traffic data used as basic inputs to the system must be maintained on a regular basis. Critical traffic data includes traffic counts, service volumes, and new capacity availability that may result from planned improvements.

Traffic counts are the most basic input variable to a transportation concurrency management system because they establish a basis for measuring road capacity for new development. Traffic counts for state roads are available from the FDOT while traffic counts on all other roads must be collected by the agency with jurisdiction over the road or a designee (e.g. the applicant/developer). Funding for traffic counts may be available through the local metropolitan planning organization (MPO).

The FDOT annually conducts traffic counts on each segment of the state’s highway system. The annual average daily traffic, known as AADT, is computed by multiplying the traffic by a seasonal adjustment factor that provides an adjustment for the week of the year that the count was taken and by an axle correction factor that provides an adjustment for the number of trucks using the road. Average Annual Daily Traffic Reports are available annually by county from the FDOT Transportation Statistics Office and on their website: <http://www.dot.state.fl.us/Planning/statistics/trafficdata/>.

The website describes the information provided in the report stating, “This report provides the Annual Average Daily Traffic . . . for every segment of Florida’s State Highway System. Annual Average Daily Traffic (AADT) is the total volume of traffic on a highway segment for one year, divided by the number of days in the year. Both directions of traffic volumes are reported as well as total two-way volumes. Actual AADT, K, D, and T data are collected from permanent, continuous counters. AADT, K, D and T are *estimated* for all other locations using portable counters. The information collected from Traffic Adjustment Data Sources are used to determine the traffic adjustment factors: Axle Correction Factors, Percent Trucks, and Seasonal Volume Factors. These adjustment factors are applied to short-term traffic counts taken by portable axle and vehicle counters to estimate AADT, K, D, and T for every section break of the State Highway System.”³

Most local governments reviewed conduct annual traffic counts on roads within their jurisdiction to use as an input to their transportation concurrency tracking system. In locations where traffic counts are not conducted annually, alternative methods are used such as requiring applicants for developments that impact specific road segments to provide traffic counts for those segments as part of their traffic impact study. In Escambia County, traffic counts are conducted only every two to three years on roads where existing and committed traffic consumes less than 50% of the available capacity.

³ <http://www.dot.state.fl.us/Planning/statistics/trafficdata/AADT/aadt.htm>.

Service volumes or capacities are established in the FDOT's Level of Service Tables (FDOT Tables) according to the functional classification of the road, its geometric characteristics, and the adopted LOS standard. Versions of the FDOT Tables, based on the TRB *Highway Capacity Manual*, have historically been used to establish level of service volumes by road segment or link. Local governments not only use the FDOT Tables to establish service volumes for state facilities as required, they also use these Tables to establish service volumes for county and city roads. The updated references for service volumes are:

- Florida Department of Transportation's 2002 Quality/Level of Service Handbook; and,
- Transportation Research Board *Highway Capacity Manual 2000*.

Local governments use a variety of computerized systems to track various data and processes. Data contained in these systems can be used to augment the concurrency management system. For example, a combination of systems is used to track transportation concurrency in Escambia County. The county's computer database (Paradox) is used to monitor information for each individual development project including whether a project is "pending" or "approved," as well as the number of trips allocated to the project. Transportation concurrency is tracked using an Excel spreadsheet in combination with the information found in the Paradox system. When projects are approved through the County's Development Review Committee, trips are manually placed in the spreadsheet and subtracted from the available capacity. Every six months, developments are reviewed to identify what certificates of occupancy were issued at least one year prior to the date. If new traffic counts have been taken on that facility within the year, the trips are assumed to be included in the traffic counts and "approved trips" are removed from the spreadsheet.

Although St. Johns County currently uses a spreadsheet tracking system, they are moving closer to incorporating concurrency review into their automated development review process. The county maintains a Transportation Analysis Spreadsheet (TAS) that is manually updated with newly approved project traffic on the 2nd and 4th Thursday of each month after the Concurrency Review Committee Meetings. Additionally, the TAS is updated with new traffic counts every year. When new traffic counts are received, the trips from those projects built before the new traffic counts were taken are released from the concurrency system. One staff member is responsible for updating the information in the TAS.

Since December 2004, St. Johns County has been monitoring development projects using an automated concurrency review system, a web-based intranet system called WATS (Web-based Application Tracking System). This computer system was initiated in 2000 with an application review system linking together all related applications. Information needed for concurrency tracking is now automatically updated in the concurrency tracking system; such as approved construction plans, plats, building permits. At some point, the county may incorporate the Transportation Analysis Spreadsheet into the system to enable automatic tracking rather than using Excel. The computer-based system was developed by in-house programmers enabling modifications and updates as needed.

Properties with vested developments rights obtained prior to the adoption of the state's growth management laws and implementation of concurrency are exempt from concurrency. This previously approved development can generate thousands of new trips which are often ignored in concurrency management systems. Failure to account for these trips results in an undercounting of approved trips and, ultimately, roadway deficiencies earlier than originally anticipated. Inclusion of previously vested trips is a crucial factor in the use of a CMS as a planning tool in the provision of transportation facilities concurrent with development.

A unique feature of the St. Johns County Transportation Analysis Spreadsheet (TAS) is the inclusion of “Exempt Development Traffic.” The county recognized that standard growth factors applied to annual daily traffic volumes would not begin to account for all of the potential traffic that will be generated by development approved prior to adoption of concurrency regulations in St. Johns County (prior to 3/1/1991) referred to as “exempt development.” Because there are no traffic studies or development schedules for these developments, the county needed a method to estimate those traffic volumes. They created a formula based on existing traffic volumes and annual traffic growth rates (from FDOT). The resulting volume is shown as “Exempt Development Traffic” in the TAS and is updated annually. The formula is: $\text{New Peak Hour Traffic} \times \text{Annual Growth Rate} = \text{“Exempt Development Traffic.”}$ For example, if the 2005 Peak Hour Traffic on a segment is 261 and the annual growth rate for the segment is .012, then the Exempt Development Traffic is $261 \times .012 = 3$ additional trips “reserved” on the segment to accommodate “Exempt Development Traffic.” Basically, this approach adds an additional year of traffic (per the annual growth rate) to each segment to account for exempt development trips.

This was the only concurrency management system reviewed that included a mechanism to account for development trips approved prior to the establishment of the concurrency management system. It would be prudent for local governments to use this formula or one of their own that more accurately accounts for previously vested trips.

St. Johns County Transportation Analysis Spreadsheet																				
*2005 Release of Reserved Concurrency Trips For Built Development Not Completed																				
Updated with 2004 FDOT Traffic Counts and 2005 St. Johns County Traffic Counts																				
Updated Through: 11/30/05																				
MRN LINK ID	FDOT COUNT STN.	ROADWAY	FROM/TO	AREA TYPE	APPRVD ROAD TYPE	PLANG AREA	LOS STND.	SEGMENT LENGTH (MI.)	DATE OF COUNT	TRAFFIC COUNT AADT	ANNUAL GROWTH FACTOR	LINK K FACTOR	2005 PK HR TRAFFIC	EXEMPT DEVEL TRAFFIC	APPRVD CONC TRAFFIC	TOTAL COMMITTED PK HR TRAFFIC	PERCENT SERVICE VOLUME UTILIZED	LINK STATUS	TRAFFIC STUDY SERVICE VOLUME	APPRVD PK HR SERVICE VOLUME
1		11th Street	SR A1A to A1A Beach Blvd.	UZ	2UC	4S	D	0.68	ADT05	990	1.015	0.096	95	1	3	99	8.9%	OK	1,110	1,110
2		16th Street	SR A1A to A1A Beach Blvd.	UZ	2UC	4S	D	0.78	ADT05	2,084	1.015	0.096	200	3	3	206	18.6%	OK	1,110	1,110
3		A Street	SR A1A to A1A Beach Blvd.	UZ	2UC	4S	D	0.57	ADT05	1,681	1.015	0.096	161	2		163	14.7%	OK	1,110	1,110
4		A. Nease Rd./Vermont Blvd.	SR 207 to Co. Landfill Entrance	TR	2MiC	2S	D	2.45	ADT05	941	1.071	0.098	92	7	16	115	7.2%	OK	1,590	1,590
5		Allen Nease Rd.	Co. Landfill Entrance to CR 214	TR	2MiC	2S	D	1.23	ADT05	632	1.071	0.098	62	4	16	82	5.2%	OK	1,590	1,590
7		Canal Blvd.	CR 210A (Roscoe Blvd) to CR 210 (Palm Vly Rd)	UZ	2UC	1E	D	0.76	ADT05	2,743	1.012	0.095	261	3	190	454	59.7%	OK	760	760
8		Cowpen Branch Rd.	CR 13 to SR 206	RU	2MiC	2S	C	3.99	ADT05	246	1.071	0.098	24	2		26	3.5%	OK	740	740
10		CR 13	CR 204 to Cowpen Branch Rd.	RU	2MaC	2S	C	4.92	ADT05	1,439	1.071	0.098	141	10		151	20.4%	OK	740	740
11		CR 13	Cowpen Branch Rd. to George Miller Rd.	RU	2MaC	2S	C	2.47	ADT05	1,400	1.071	0.098	137	10	10	157	21.2%	OK	740	740
12		CR 13	George Miller Rd. to SR 207 (W)	RU	2MaC	2S	C	2.27	ADT05	2,920	1.071	0.098	286	20	17	323	43.6%	OK	740	740
13		CR 13	SR 207 (W) to SR 207 (E)	RD	2MaC	2S	C	1.59	ADT05	1,356	1.071	0.097	132	9		141	12.8%	OK	1,100	1,100
14	15	CR 13	SR 207 to CR 13A	RU	2MaC	2S	C	2.71	ADT05	1,349	1.071	0.098	132	9	52	193	26.1%	OK	740	740
15		CR 13	CR 13A to CR 214	RU	2MaC	2S	C	7.39	ADT05	606	1.071	0.098	59	4	10	73	9.9%	OK	740	740
16		CR 13	CR 214 to CR 208	RU	2MaC	2N	C	6.36	ADT05	811	1.047	0.098	79	4	26	109	14.7%	OK	740	740
17		CR 13	CR 208 to SR 16	TR	2MaC	2N	D	5.37	ADT05	1,012	1.047	0.098	99	5	152	256	16.1%	OK	1,590	1,590
18		CR 13A	CR 13 to CR 305	RU	2MaC	2S	C	0.97	ADT05	1,651	1.071	0.098	162	11	65	238	32.2%	OK	740	740
19		CR 13A	CR 305 to CR 214	RU	2MaC	2S	C	4.48	ADT05	1,422	1.071	0.098	139	10	85	234	31.6%	OK	740	740
20		CR 13A	CR 214 to CR 208	TR	2MaC	2N	D	3.76	ADT05	2,003	1.047	0.098	196	9	220	425	26.7%	OK	1,590	1,590
21.1		CR 13A	CR 208 to Samara Lakes Parkway	TR	2MaC	2N	D	2.85	ADT05	2,078	1.131	0.098	204	27	606	837	52.6%	OK	1,590	1,590
21.2		CR 13A	Samara Lakes Parkway to SR 16	TR	4MaC	2N	D	1.50	ADT05	4,276	1.131	0.098	419	55	1,850	2,324	82.7%	OK	2,810	2,810
22		CR 13B (Fruit Cove Rd)	SR 13 to SR 13	UZ	2UC	1W	D	2.38	ADT05	4,918	1.091	0.095	467	42	536	1,045	94.1%	CRITICAL	1,110	1,110
23.1	286	CR 16A	SR 13 to CR 210	TR	2MaC	2N	D	0.67	ADT05	6,916	1.131	0.098	678	89	169	936	62.8%	OK	1,490	1,490
23.2		CR 16A	CR 210 to Leo Maguire Rd.	TR	2MaC	2N	D	4.23	ADT05	1,823	1.131	0.098	179	23	489	691	43.5%	OK	1,590	1,590
24		CR 16A	Leo Maguire Rd. to SR 16	TR	2MaC	2N	D	2.53	ADT05	2,049	1.131	0.098	201	26	282	509	32.0%	OK	1,590	1,590
25.1		CR 16A (Lewis Spdwy)	SR 16 to Varella Ave	UZ	2UC	3N	D	0.98	ADT05	6,273	1.066	0.096	602	40	370	1,012	72.8%	OK	1,390	1,390
25.2		CR 16A (Lewis Spdwy)	Varella Ave. to Woodlawn Rd.	UZ	2UC	3N	D	0.35	ADT05	4,791	1.066	0.096	460	30	437	927	66.7%	OK	1,390	1,390
26		CR 16A (Lewis Spdwy)	Woodlawn Rd. to SR 5 (US 1)	UZ	2UC	3N	D	1.07	ADT05	6,540	1.066	0.096	628	41	518	1,185	85.3%	OK	1,390	1,390
27		CR 203 (Ponte Vedra Blvd)	SR A1A to CR 210 (Corona Rd)	UZ	2UC	1E	D	4.27	ADT04	3,904	1.012	0.095	375	4	78	457	41.2%	OK	1,110	1,110
28.1		CR 203 (Ponte Vedra Blvd)	CR 210 (Corona Rd) to CR 210A (Solana Rd)	UZ	2UC	1E	D	0.65	ADT04	3,092	1.012	0.095	297	4	6	307	27.7%	OK	1,110	1,110
28.2		CR 203 (Ponte Vedra Blvd)	CR 210A (Solana Rd) to Duval Co. Line	UZ	2UC	1E	D	1.77	ADT04	2,989	1.012	0.095	287	3	30	320	28.8%	OK	1,110	1,110
29		CR 204	CR 13 to SR 5 (US 1)	RU	2MaC	2N	C	5.55	ADT05	2,674	1.071	0.098	262	19	28	309	41.8%	OK	740	740
30		CR 208	CR 13 to Joe Ashton Rd.	TR	2MaC	2N	D	4.03	ADT05	815	1.047	0.098	80	4	60	144	9.1%	OK	1,590	1,590
31		CR 208	Joe Ashton Rd. to CR 13A	TR	2MaC	2N	D	2.37	ADT05	3,416	1.047	0.098	335	16	262	613	38.6%	OK	1,590	1,590
32		CR 208	CR 13A to SR 16	TR	2MaC	2N	D	4.91	ADT05	4,281	1.131	0.101	432	56	1,087	1,575	93.8%	CRITICAL	1,680	1,680
33		CR 210	CR 16A to Greenbriar Rd.	TR	2MaC	2N	D	3.00	ADT05	6,790	1.131	0.098	665	87	814	1,566	98.5%	CRITICAL	1,590	1,590
34.1	287	CR 210	Greenbriar Rd. to Cimarrone Blvd.	TR	2MaC	1W	D	2.64	ADT05	16,464	1.131	0.093	1531	200	1,388	3,119	149.2%	DEFICIENT	2,090	2,090
34.2		CR 210	Cimarrone Blvd. to CR 2209	TR	4MaC	1W	D	0.85	ADT05	17,124	1.131	0.093	1593	208	2,184	3,985	95.1%	CRITICAL	4,190	4,190
34.3		CR 210	CR 2209 to Leo Maguire Parkway	TR	4MaC	1W	D	1.10	ADT05	17,872	1.131	0.093	1662	217	2,869	4,748	113.3%	DEFICIENT	4,190	4,190
35		CR 210	Leo Maguire Parkway to SR 9 (I-95)	TR	4MaC	1W	D	0.39	ADT05	19,487	1.131	0.096	1871	244	2,886	5,001	119.4%	DEFICIENT	4,190	4,190
36.1	288	CR 210	SR 9 (I-95) to C.E. Wilson Road	TR	4MaC	1E	D	0.40	ADT05	10,342	1.131	0.096	993	130	2,098	3,221	91.5%	CRITICAL	3,520	3,520
36.2		CR 210	C.E. Wilson Road to SR 5 (US 1)	TR	2MaC	1E	D	2.94	ADT05	10,649	1.131	0.090	958	125	1,101	2,184	112.8%	DEFICIENT	1,940	1,940
37	285	CR 210 (Palm Valley Rd)	SR 5 (US 1) to CR 210A (Roscoe Blvd)	TR	2MaC	1E	D	5.69	ADT05	13,671	1.079	0.096	1312	104	626	2,042	99.6%	CRITICAL	2,050	2,050
38		CR 210 (Palm Valley Rd)	CR 210A (Roscoe Blvd) to Mickler Rd.	UZ	2UC	1E	D	1.36	ADT05	14,024	1.079	0.095	1332	106	378	1,816	130.6%	DEFICIENT	1,390	1,390
39		CR 210 (Palm Valley Rd)	Mickler Rd. to Canal Blvd.	UZ	2UC	1E	D	1.98	ADT05	12,809	1.012	0.095	1217	14	420	1,651	99.5%	CRITICAL	1,660	1,660
40	289	CR 210 (Palm Valley Rd)	Canal Blvd. to SR A1A	UZ	2UC	1E	D	1.43	ADT04	15,221	1.012	0.095	1463	17	493	1,973	101.7%	DEFICIENT	1,940	1,940
41		CR 210 (Corona Rd)	SR A1A to CR 203 (Ponte Vedra Blvd)	UZ	2UC	1E	D	0.59	ADT05	6,825	1.012	0.095	648	8	80	736	77.5%	OK	950	950
42		CR 210A (Roscoe Blvd)	CR 210 (Palm Valley Rd) to Canal Blvd.	UZ	2UC	1E	D	3.26	ADT05	3,278	1.012	0.095	311	4	134	449	40.5%	OK	1,110	1,110
43.1		CR 210A (Roscoe Blvd)	Canal Blvd. to TPC Blvd.	UZ	2UC	1E	D	3.09	ADT05	3,885	1.012	0.095	369	4	164	537	48.4%	OK	1,110	1,110
43.2		CR 210A (Solana Rd)	TPC Blvd. to SR A1A	UZ	2UC	1E	D	1.41	ADT05	10,692	1.012	0.095	1016	12	176	1,204	71.2%	OK	1,690	1,690
43.3		CR 210A (Solana Rd)	SR A1A to CR 203 (Ponte Vedra Blvd)	UZ	2UC	1E	D	0.65	ADT05	4,325	1.012	0.095	411	5	37	453	47.7%	OK	950	950
44		CR 214	CR 13 to CR 13A	RU	2MaC	2S	C	3.68	ADT05	1,466	1.047	0.098	144	7	119	270	36.5%	OK	740	740
45		CR 214	CR 13A to Allen Nease Rd.	TR	2MaC	2S	D	5.21	ADT05	1,407	1.047	0.098	138	6	159	303	19.1%	OK	1,590	1,590
46		CR 214	Allen Nease Rd. to Holmes Blvd.	TR	2MaC	3S	D	4.28	ADT05	4,179	1.047	0.098	410	19	190	619	38.9%	OK	1,590	1,590
47		CR 214 (W. King St)	Holmes Blvd. to Volusia St.	UZ	2UC	3S	E	0.64	ADT05	10,345	1.047	0.096	993	47	455	1,495	101.0%	DEFICIENT	1,480	1,480

FIGURE 3 Example of a spreadsheet tracking system

Source: St. Johns County, Florida.

Practice 11: Determine when the “new” capacity from planned transportation improvements should be made available.

The time at which “new” or planned road capacity due to a programmed improvement is made available for concurrency determinations is an important consideration. Florida Statutes establish a minimum that “transportation facilities needed to serve new development shall be in place or under actual construction within three years after the local government approves a building permit or its functional equivalent that results in traffic generation” (§163.3180(2)(c), F.S.). Most local government transportation concurrency systems follow this three-year timeframe and allocate the “new” service volume in their tracking system when a project’s construction is scheduled within the first three years of its capital improvement schedule.

Local governments can establish a more conservative policy; for example, planned capacity could be excluded from use for concurrency determinations or allowed only if the capacity improvement project’s construction is scheduled within the first or second year of the capital improvement schedule. The most conservative option allows “new” capacity for scheduled projects only where a road construction contract has been executed. A more conservative policy increases the opportunity for local governments to collect proportionate fair-share contributions on deficient roadways and free up funds for use elsewhere on the system. All projects shown in the five-year capital improvements schedule must be financially feasible.

According to Sarasota County regulations, for example, the added capacity from a road or intersection improvement under construction or in the first year of the capital improvement program (CIP) can be considered available for new development trips. There is an exception for economic development that allows improvement projects contained in the second or third year of the CIP to be considered as available capacity if the development is located in a designated Major Employment Center (MEC) shown on the county land use map.

In another example, Indian River County allows additional capacity for a road link to be taken into consideration if the facility is in place or under construction at the time the development order or permit is issued, or transportation facilities will be under construction or in place not more than two years after a building permit for the development is issued per the county’s CIE or the FDOT 5-year Work Program, or via a binding executed agreement or enforceable development agreement between the county and the developer.

Practice 12: Establish a method for determining proposed development trip impacts on road segments and thresholds for requiring a detailed traffic impact study.

Each local government must establish what to require of applicants in order to determine the number of new trips from a proposed development that will impact road segments. Specific thresholds for review ensure that all applicants are treated equally. The traffic impacts of development may be considered de minimis, minor, or major. Some development, such as a single-family home, has a de minimis impact – that is, an impact so minor that it is exempt from concurrency review.⁴ Projects

⁴ Florida law defines de minimis impact as “an impact that would not affect more than 1 percent of the maximum volume at the adopted level of service of the transportation facility as determined by the local government.” (§163.3180(6), F.S.) In addition, if a road link is at or exceeds 110% of its service capacity, no further developments with de minimis impact are to be approved until the necessary improvements are in place and the roadway is operating within 110% of its service capacity.

generating from 50 to 99 trips during the peak hour require only a minor traffic review that can easily be prepared by the applicant or local government staff.

Local government staff, such as in Bay and Escambia Counties, often prepare transportation concurrency analyses for small and mid-sized developments with minor traffic impacts whereas applicants for large developments are required to prepared traffic impact studies. In St. Johns County, small projects, generating less than four average weekday peak hour trips, are considered to have negligible impact on the transportation system. For minor projects, generating four to 30 average weekday peak hour trips, a minor traffic review is required.

Projects generating 100 or more peak hour trips generally require preparation of a detailed traffic impact study (TIS). A traffic impact study provides a method for determining whether the trips generated from a proposed development would exceed the available roadway capacity at the adopted LOS standard and to identify the need for any improvements to the adjacent road system.

It is recommended that each local government establish its own threshold for requiring applicants to prepare a traffic impact study based on local needs and policy. A threshold of 100 new vehicle trips during the adjacent roadway's peak traffic hour or the development's peak hour is recommended as a quantitative criterion to trigger a traffic impact study. Local needs and policies can serve as a guide to local governments in determining an appropriate threshold. For example, a local government may base its threshold on the overall availability of capacity on the transportation system. Those with a great deal of available capacity may consider a higher threshold based on the system's ability to accommodate additional traffic. On the other hand, if system capacity is limited, a local government may want to set a lower threshold to have greater control over impacts to the system.

In addition to trip generation, a recommended additional criterion for requiring a TIS, particularly for concurrency, is whether the LOS on a road or intersection in the vicinity of the proposed development is near or below the adopted LOS standard. This criterion should even apply to developments with a de minimis impact in the event the 110% LOS standard has been exceeded.⁵

Trip Generation. Determining trip generation is the first step in understanding the potential impact of any development. The recommended practice to estimate proposed development trip generation is through the use of the latest edition of the Institute of Transportation Engineers (ITE) *Trip Generation* (currently the 7th Edition). Trip generation is determined by applying either average trip generation rates or trip generation equations of land uses based on regression analysis. Chapter 3 of the *Trip Generation Handbook, Second Edition* provides detailed discussions on the proper selection of rates or equations; however, equations are generally preferable because they provide a more realistic relationship between the development unit and generated trips.

Some applications may entail the use of information in addition to the Trip Generation Handbook. If local trip generation rates for sites comparable to the proposed development are available, local governments should require the use of that data to determine if any adjustment is needed. If there is no land use code in the Trip Generation Handbook for a specific development, a local government

⁵ Florida law defines de minimis impact as "an impact that would not affect more than 1 percent of the maximum volume at the adopted level of service of the transportation facility as determined by the local government." (§163.3180(6), F.S.) Thus, developments with de minimis impacts are exempted from the transportation concurrency determination process of local governments. However, there is a limit to de minimis impact on any given road link. If a road link is at or exceeds 110% of its service capacity, no further developments with de minimis impact are to be approved until the necessary improvements are in place and the roadway is operating within 110% of its service capacity.

may require the applicant to either use the equations or rates of a similar land use or conduct trip generation studies at sites with characteristics similar to those of the proposed development.

Typically, peak hour congestion during the evening commute is the major concern. Therefore, the trip generation used for traffic impact studies should be the number of trips generated from a proposed development during PM peak hours of both directions of the roadway. In some cases, such as when traffic problems are experienced during AM peak hours, more development trips are generated during AM peak than PM peak hour, or during the development's peak hour (i.e., Saturday noon), trips generated during those peak hours may also be considered for analyzing that specific period.

In addition, the peak hours of the land use can also be important for specific land uses, such as regional shopping centers, where localized impacts can occur during off-peak times of the roadway. In these situations, trips generated during specific hours of the weekend should be included in the traffic impact study. Table 6 is an example of typical peak traffic flow for different land uses.

TABLE 6 Typical Peak Hour Traffic Flow

Land Use	Typical Peak Hours
Residential	7:00-9:00 AM weekday 4:00-6:00 PM weekday
Regional Shopping Center	5:00-6:00 PM weekday 12:30-1:30 PM Saturday 2:30-3:30 PM Saturday
Office	7:00-9:00 AM weekday 4:00-6:00 PM weekday
Industrial	Varies
Recreational	Varies
Hospital	Varies based on shift changes
School	Varies based on school starting and release time

To avoid overestimating the net new trips on adjacent roadways, pass-by trips and diverted linked trips for specific land uses, such as retail and service, are considered in trip generation rates. A pass-by trip is an intermediate stop made on the way from an origin to a primary destination. Diverted linked trips are trips traveling on a nearby roadway that are diverted via another road to the trip generator. These trip rates must be applied using the appropriate land use when calculating trip generation. Pass-by and diverted linked are specifically addressed in Chapter 5 of the ITE Trip Generation Handbook and should be justified within the TIS, in compliance with the Handbook as well as the Florida Department of Transportation's Site Impact Handbook (as applicable to developments of regional impact), and not exceed the maximum allowable pass-by percentage of 10 percent of the adjacent roadway volumes.

Most available trip generation rates and equation data have been developed based on single land uses and simply combining these data fails to reflect the potential for internal capture. Therefore, internal trip capture estimation for mixed-use developments is typically addressed by requiring applicants to propose a methodology for local review and approval. Internal capture is a percentage reduction in trips to account for trips made among land uses internal to the site. A method to compute the internal capture percentage is addressed in the ITE Trip Generation Handbook. National Cooperative Highway Research Program (NCHRP) Project 8-51 is currently underway to enhance internal trip capture estimation for mixed-use developments.

Trip Distribution and Trip Assignment. Trips expected to be generated from a proposed development must next be distributed and assigned to the surrounding roadway system so that impacts on roadway

links and intersections can be analyzed. Trip distribution methods produce estimates of trip origins and destinations, whereas trip assignment produces estimates of the amount of development trips that use certain routes on the roadway network between origins and destinations. How far a trip will be tracked on the network is based on the impact area thresholds a local government applies, as discussed in the traffic impact section. Peak hour trip distribution diagrams illustrating trip distribution and the impacted roadway segments and intersections within the traffic impact area including existing traffic, background traffic (existing traffic plus vested traffic), project traffic, and total future traffic (background plus project) should be provided to the local government.

When determining the number of trips entering and exiting a site, it is common practice to include net new trips (also called as primary trips in many guidelines and studies), diverted linked trips and pass-by trips, and to exclude internal capture trips. This is because primary trips, diverted linked trips and pass-by trips are categorized as external trips to the development, which will be analyzed for link and intersection analysis in a traffic impact study, and the internal capture trips will not be included in those analysis. Most metropolitan planning organizations (MPOs) and state departments of transportation (DOTs) have trip distribution projections for a base year and future years. These data are generally adopted by local governments with some modifications and can be used for trip distribution and assignment in a traffic impact study of a proposed development. Trip assignments can be accomplished either manually or with applicable computer models. A number of computer software packages are designed to handle trip distribution and trip assignment tasks.

When performing trip distribution and assignment, most local governments in Florida use the Florida Standard Urban Transportation Model Structure (FSUTMS) software and socio-economic and network data sets of the MPO. The MPO data is modified as necessary for use in evaluating a specific project. A few local governments use methods other than FSUTMS. The City of Tallahassee, for example, uses QRS II software (also used in highway and transit forecasting) in conjunction with the most current socio-economic and network data by traffic analysis zone (TAZ) obtained from Tallahassee-Leon MPO for trip distribution and assignment. Indian River and St. Johns Counties require trip distribution and assignment to be in compliance with accepted traffic engineering principles as documented in NCHRP Report 187 “Quick Response Urban Travel Estimation Techniques and Transferable Parameters Guide.” A gravity model can also be used for this purpose.

An important change is the transition currently underway to adopt a new modeling engine for FSUTMS, known as Cube Voyager. With the advancement of computing technology and increasing demand for travel forecasting models to evaluate transportation policies and strategies, the Florida Model Task Force (MTF) recently adopted Cube Voyager as the main modeling engine for FSUTMS, a decision supported by the Florida Department of Transportation (FDOT) Systems Planning Office.⁶ New features of FSUTMS/CUBE include aspects of traffic signal operations and traffic simulation that were not covered in the past. The new program is a Windows based and more user friendly than the DOS-based operating system of FSUTMS.

In summary, the preferred approach to performing trip distribution and assignment is to use FSUTMS/CUBE software in conjunction with the most current socio-economic and network data maintained by the MPO. Areas outside of MPOs can use either the gravity model or locally

⁶ Florida Department of Transportation, Systems Planning Office. *FSUTMS New Standards and Enhancements – A User Oriented Approach, A Florida Model Task Force White Paper*. January 2006. www.dot.state.fl.us/Planning/mf/06docs/whitepaper.pdf.

acceptable trip distribution model. The gravity model is based on the likelihood that the number of trips between two zones is proportional to the magnitude of each zone, and inversely proportional to the distance between two zones. Another simple method is to distribute the trips based on the proportion of traffic volumes. Due to approved developments and planned improvements in the horizon in the studies area, the network and socio-economic data obtained from local MPO would then need to be checked and modified as necessary by transportation planning or growth management staff prior to being found suitable for a specific project. Before performing trip distribution and assignment, the capacities of certain planned transportation improvements and land uses must be properly incorporated into the model to reflect the future roadway network at the time of completion of the proposed development. Then the trips generated by the proposed development can be properly distributed and assigned to the surrounding roadway system.

Regardless of the method used for trip distribution, it should be estimated and analyzed for the horizon year of the proposed development. The trip distribution should be depicted as a percentage for each zone or direction of travel. For trip assignment, if a detailed analysis is required to account for pass-by and/or diverted linked trips, then separate trip assignments for net new trips (or primary trips), pass-by trips and diverted linked trips (if any) need to be performed first. The final trip assignment for the proposed development is the summation of these separately assigned trips for net new trips (or primary trips), pass-by trips and diverted linked trips (if any). When there is more than one driveway for a development site, then proper logical routing and multiple paths should be used to ensure realistic driveway volumes.

D. TRAFFIC IMPACT STUDY METHODOLOGY

A traffic impact study (TIS) provides a method for determining whether the trips generated from a proposed development would exceed the available roadway capacity at the adopted level of service and to identify the need for any improvements. Most local governments have a written methodology for preparing a TIS contained in their land development regulations or a separate guideline or manual. The best practices for traffic impact study methodology are discussed in this section; Traffic impact studies should address peak hour/peak season traffic in compliance with Rule 9J-5.019, F.A.C.

Practice 13:	Define the “traffic impact area.”
Practice 14:	Establish a procedure for analyzing level of service for segments and intersections.
Practice 15:	Broaden the traffic impact study methodology to address multimodal needs and mitigation.

Practice 13: Define the “traffic impact area.”

The traffic impact area (TIA) is the boundary of the study area for a traffic impact study, also known as the area of significant impact or traffic influence area. There are two main reasons to define an adequate traffic impact area. An excessively large traffic impact area may unnecessarily increase both the cost and time needed for study preparation and review. Alternatively, an inappropriately small traffic impact area may fail to include roadway segments and/or intersections that would need to be improved to accommodate the trips generated by a proposed development to maintain the adopted LOS standards. The TIA should minimally include all site access drives, adjacent roadways and major intersections, plus the first signalized intersection in each direction from the site. Additional area may be added based on the size of the development and any site-specific or local policy issues, as well as sound judgment. Currently, local governments in Florida use several different approaches to determine the traffic impact area for a proposed development.

Whether an area is urban or rural is a factor to consider when choosing traffic impact area approach, because traffic characteristics differ by area-type. In urban areas, the LOS standards are generally LOS C or D for less congested areas and LOS D or E for more congested areas. These LOS standards reflect not only the user’s expectations of the roadways, but also the local government’s limited financial ability to maintain a higher level of service. Peak hour congestion is the major concern in urban areas. In rural areas, the LOS standard for arterials and collectors is LOS C. Peak hour congestion is generally not serious and daily trips are often used for analysis rather than peak hour trips. Because rural areas do not have a dense road network, fewer facilities will be impacted but often for greater distances.

The level of service (LOS) of a roadway segment is, for the most part, measured by average arterial speed and arterial type as addressed in the Highway Capacity Manual (HCM). Therefore, the vehicle capacity or maximum service volume (MSV) for the adopted LOS standard of a roadway segment is mainly dependent on roadway facility type, segment length, and free flow speed of the segment. The traffic impact area for a development in an urban or rural area can vary significantly based on the approach. Summaries of the major approaches reviewed for this study including the advantages and disadvantages are below.

Urban scenario

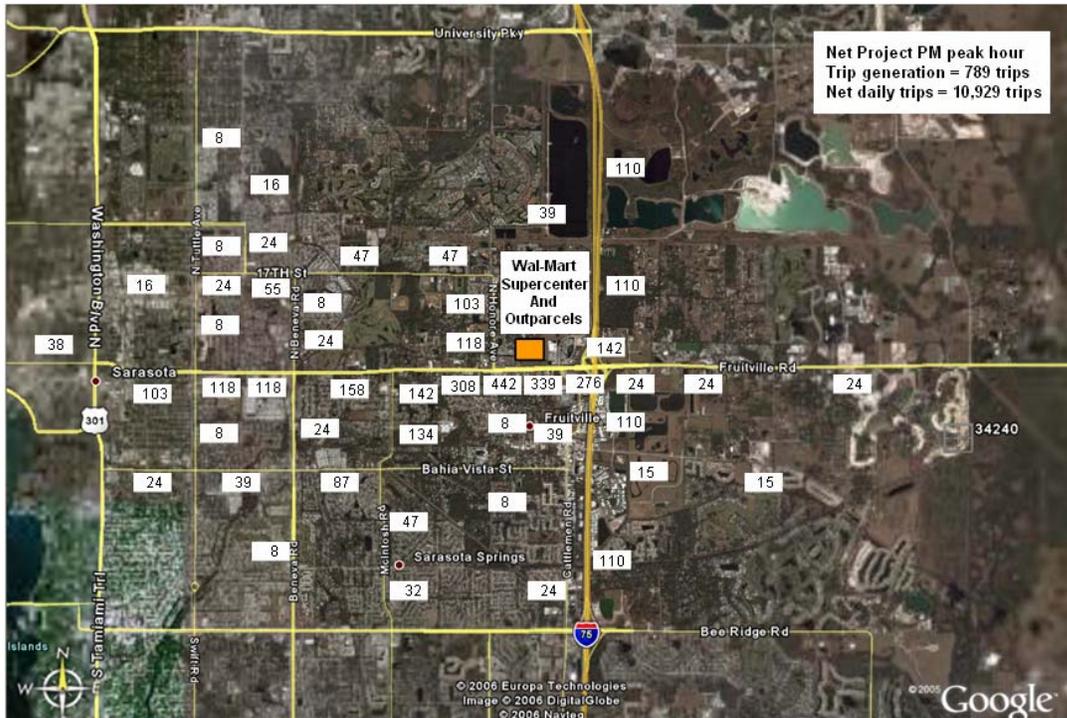


FIGURE 4 Urban example: PM peak hour project trip distribution.

Rural scenario



FIGURE 5 Rural example: PM peak hour project trip distribution.

Approach 1: Net PM peak-hour project trips on roadway segments greater than or equal to 5% Level of Service C capacity

The TIA is determined using the traffic volume that is greater than or equal to 5% of the LOS C PM peak hour capacity. If the number of net PM peak-hour trips from a development distributed to a roadway segment is at least 5% of the segment LOS C capacity, the roadway segment is “significantly impacted” by the development and, therefore, subject to analysis for concurrency.

This approach has some disadvantages. The more lanes and, thus, more overall capacity of a facility will result in a large LOS C service volume. As a result, few segments and/or intersections will appear as significantly impacted. One way to compensate for this would be to decrease the percentage applied, for example, from 5% to 3%.

In addition, impacted roadway segments may not be continuous due to variations in LOS C capacity—for example, where a segment is excluded but lies between two impacted segments on the same roadway due to different roadway capacities (e.g., 2-lane vs. 4-lane section of an arterial). This issue can be resolved by requiring an analysis of all road segments on a facility from the development site to the furthest significantly impacted segment. Another disadvantage of this approach is that it is based on link-by-link evaluation and therefore does not provide a systems perspective nor does it recognize multimodal needs and options.

Urban scenario



FIGURE 6 Approach 1: net PM peak hour project trips greater than or equal to 5% LOS C capacity.

Rural scenario



FIGURE 7 Approach 1: net PM peak hour project trips greater than or equal to 5% LOS C capacity.

Approach 2: Net PM peak hour directional project trips on roadway segments greater than or equal to 5% of adopted LOS capacity and 1% for critical deficient roadway segments

Similar to Approach 1, this approach emphasizes PM peak directional volumes and applies a smaller impact threshold to critically deficient roads. Using this approach, a significant impact is deemed to occur when the PM peak hour vehicle trips from a proposed development project are projected to consume 5% or more of the directional service volume (at the adopted LOS) of a roadway segment. In addition, a significant impact is deemed to occur on a critically deficient⁷ roadway segment when the PM peak hour vehicle trips from a proposed development project are projected to consume 1% or more of the directional service volume (at the adopted LOS) of a roadway segment.

The specific advantage of this approach is that it provides for a stricter measure of potential impacts (1% versus 5%) to a critically deficient roadway segment or one that will be critically deficient based on projected traffic demand. While some of the disadvantages of this approach are similar to those for Approach 1, there are others. This approach focuses only on the peak direction during the PM peak hours ignoring potential impacts of the proposed development in the non-peak direction and during the AM peak hour. In addition, the TIA will vary along with differing LOS standards. The service volume for LOS D or E is a greater number than the service volume for LOS C thus allowing a greater number of vehicles to consume capacity before the impact is determined significant.

⁷ A critically deficient roadway segment means the PM peak hour directional volume on the roadway segment exceeds the directional service volume (at the adopted LOS) based on existing traffic counts, OR the total (future) PM peak hour directional volume on the roadway segment will exceed 120% of the directional service volume (at the adopted LOS) based on projected traffic demands.

Urban scenario

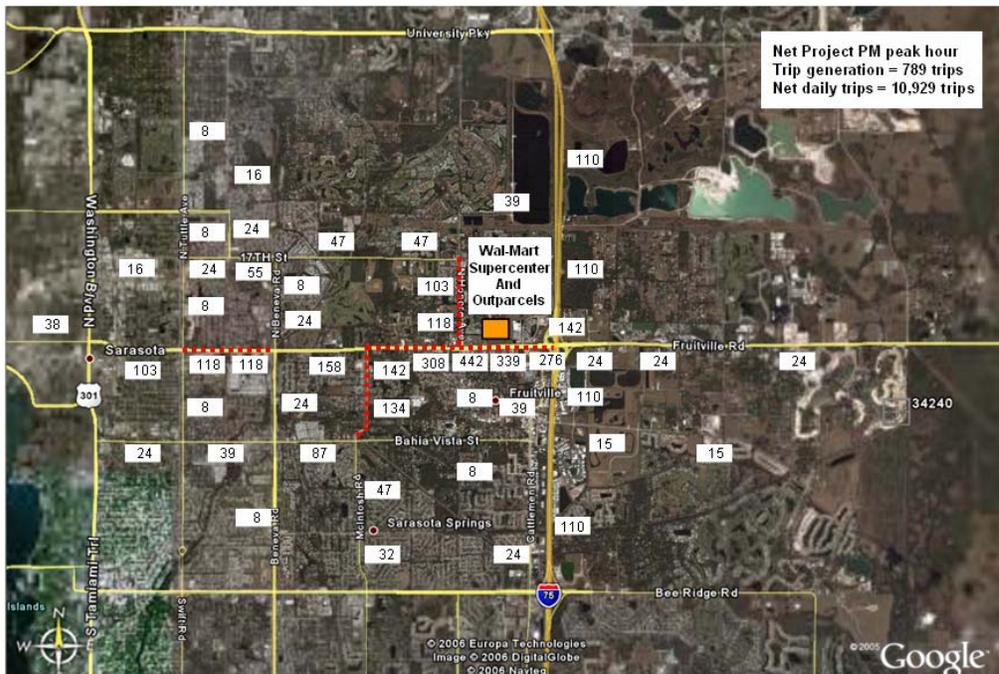


FIGURE 8 Approach 2: net PM peak hour project directional trips greater than or equal to 5% adopted LOS capacity and 1% for critical deficient roadway segment.

Rural scenario



FIGURE 9 Approach 2: net PM peak hour project directional trips greater than or equal to 5% adopted LOS capacity and 1% for critical deficient roadway segments.

Approach 3: Roadway segments receiving at least 5% net project PM peak-hour trips

All roadway segments that receive 5% or more of the net development PM peak hour trips are considered significantly impacted. It focuses on the percentage of net PM peak hour trips distributed on a roadway segment relative to the total net PM peak hour trips generated by the development rather than the actual number of trips on the roadway segment. The resulting TIA is relatively large when compared to other approaches; however, it may be beneficial to use where there are many potentially deficient facilities and the local government needs to curb development. This approach has the potential to track the impact of development far beyond just a few miles.

One advantage is that this approach recognizes that both large and small developments with similar types of uses may have similar traffic impact areas, regardless of the number of trips they generate. This can also be considered a disadvantage because a small office development may need to analyze the same area as a larger office development of similar type. As with most approaches currently in use, it does not provide a systems perspective, nor does it recognize multimodal needs and options.

Urban scenario

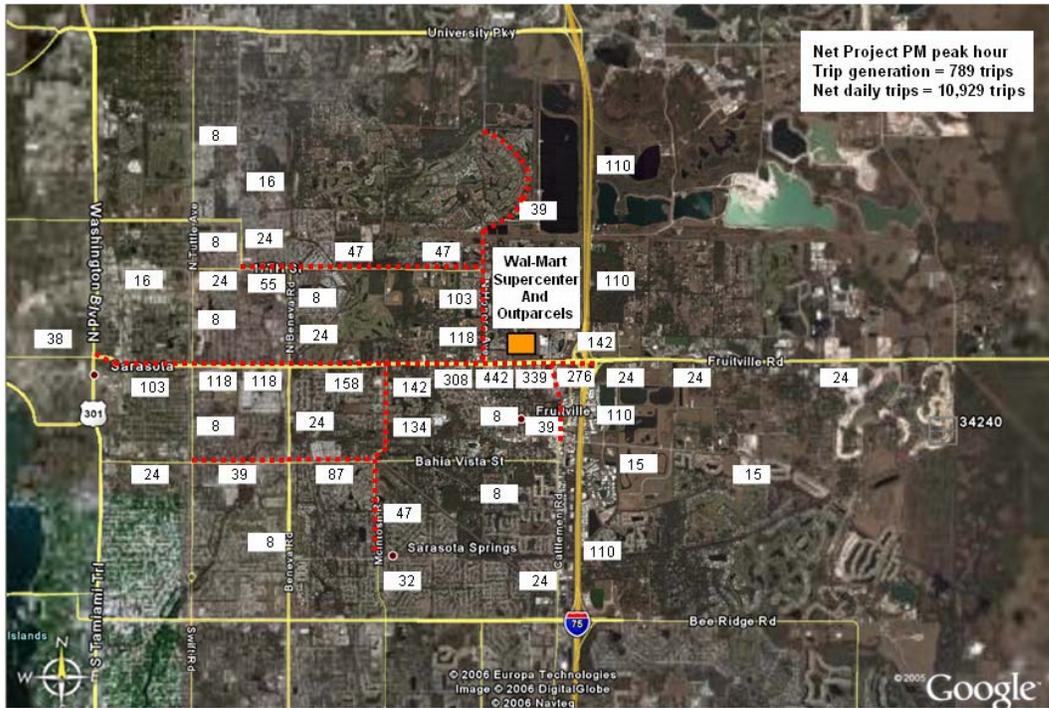


FIGURE 10 Approach 3: roadway segment receiving at least 5% net project PM peak-hour trips.

Rural scenario

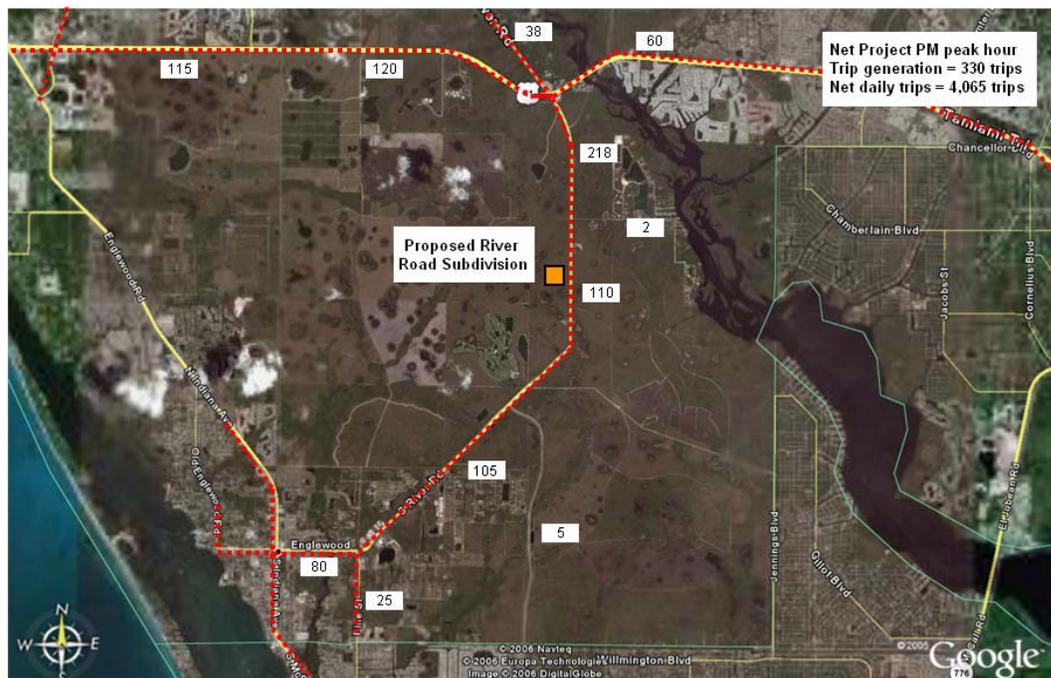


FIGURE 11 Approach 3: roadway segment receiving at least 5% net project PM peak-hour trips.

Approach 4: Roadway segments with net PM peak hour project trips accounting for at least 5% of the average daily traffic (ADT) generated by the development

This approach determines the traffic impact area based on the ratio of net PM peak hour development trips to its average development daily traffic on roadway segments. If the ratio for a roadway segment is greater than or equal to 5%, the segment is considered significantly impacted. In this approach, as with Approach 3, a small development may have similar traffic impact area to a large development.

There are several disadvantages to this method. The traffic impact area is generally small because most distributed PM peak link trips from a development do not reach 5% of its development ADT. As a result, few segments and/or intersections will appear as significantly impacted. Neither the consumption of roadway capacity nor the number of trips distributed to roadway segments is considered. Finally, this is also a link-by-link approach that fails to recognize multimodal needs.

Urban scenario

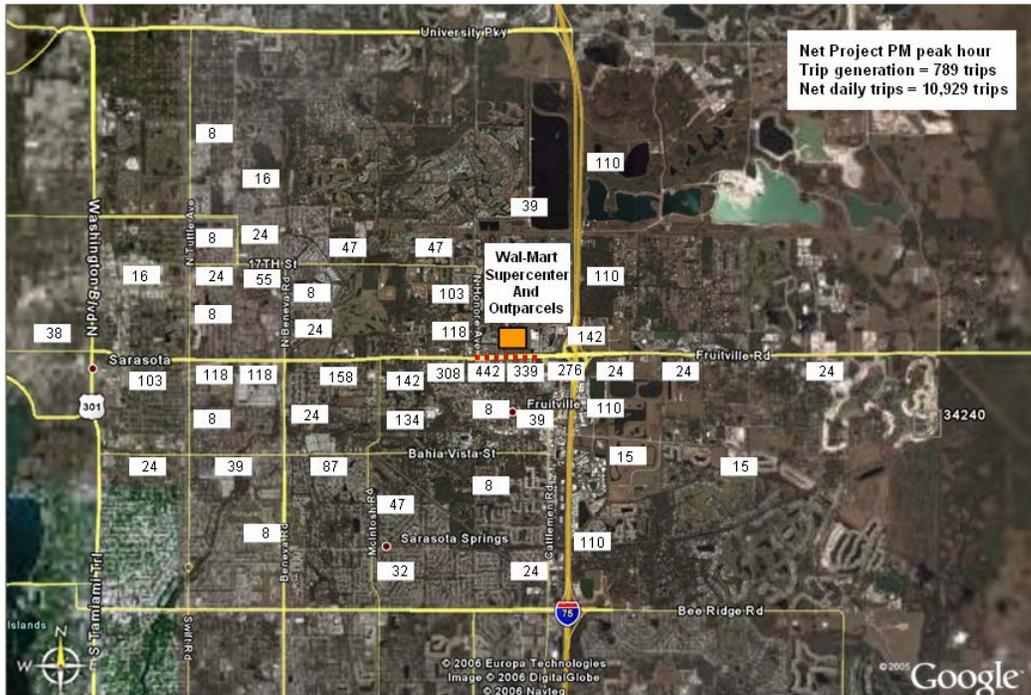


FIGURE 12 Approach 4: net PM peak hour project trips account for 5% of project ADT.

Rural scenario



FIGURE 13 Approach 4: net PM peak hour project trips account for 5% of project ADT.

Approach 5: Daily project trips account for at least 10% of ADT in urban areas and at least 20% of ADT in rural areas

A roadway segment will be included in the TIA if the daily development traffic on a segment accounts for at least 10% of a segment's ADT in urban areas or 20% of a segment's ADT in rural areas. This approach determines the traffic impact area based on the ratio of daily trips from a development to the total daily traffic of a roadway segment. This approach is useful when peak-hour traffic is not a concern such as in rural areas. It does not provide a systems perspective, nor does it recognize multimodal needs and options.

Urban scenario

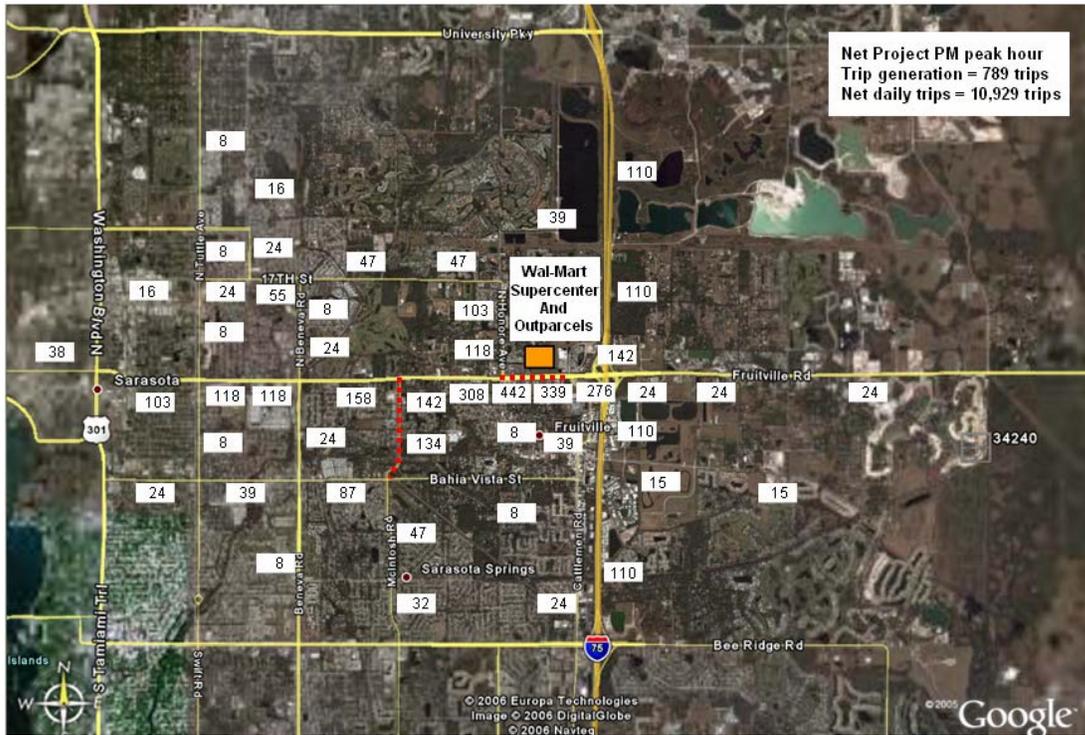


FIGURE 14 Approach 5: project daily trips account for at least 10% of ADT.

Rural scenario



FIGURE 15 Approach 5: project daily trips accounting for at least 20% of ADT.

Approach 6: Influence area in terms of maximum radius from the project based on net development daily trip distribution

This approach determines the TIA based on a radius from the development; each access point is considered a center of the maximum radius. All roads segments within the radius are subject to concurrency. Intersection review must be performed where, over the build-out period of the project, the net development trips would be greater than or equal to 10% of the Annual Average Daily Traffic (AADT) on any link that lies in whole or in part within the project's radius of influence and connects to a major intersection.

This approach provides more of a system-wide perspective because it requires every segment in the radius to be reviewed for concurrency. A disadvantage is that it limits the boundary for a traffic impact study even when development trips are mainly distributed along a major corridor possibly further than the required radius. Another disadvantage is that it may ignore a large number of corridor trips outside the maximum radius area if the influence area radii are too small.

Urban scenario

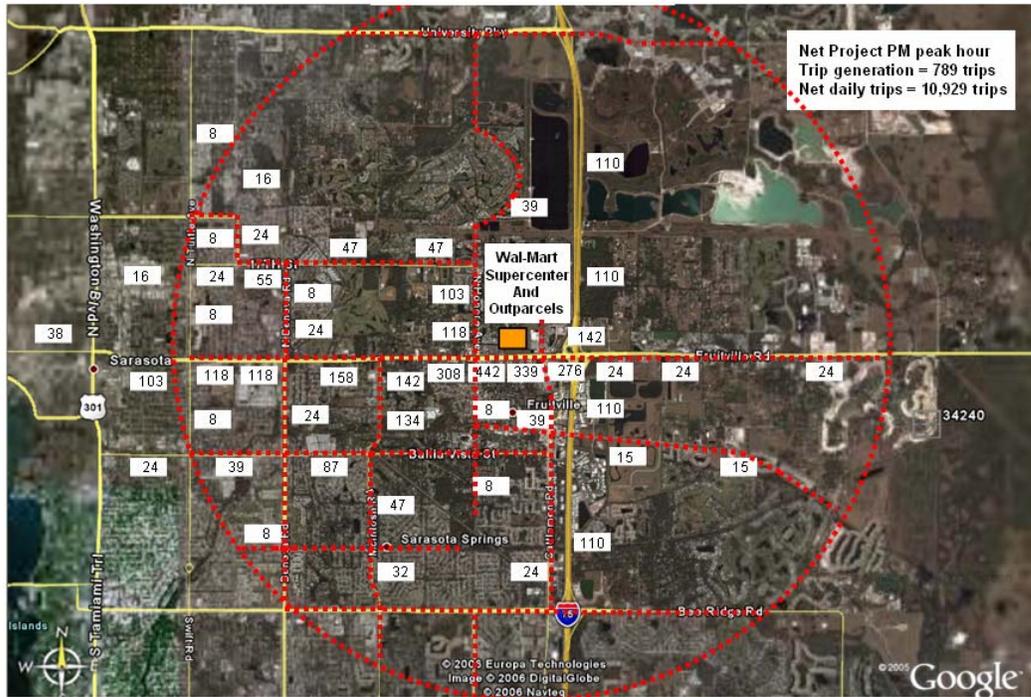


FIGURE 16 Approach 6: influence area in terms of maximum radius based on net daily trip distribution.

Rural scenario

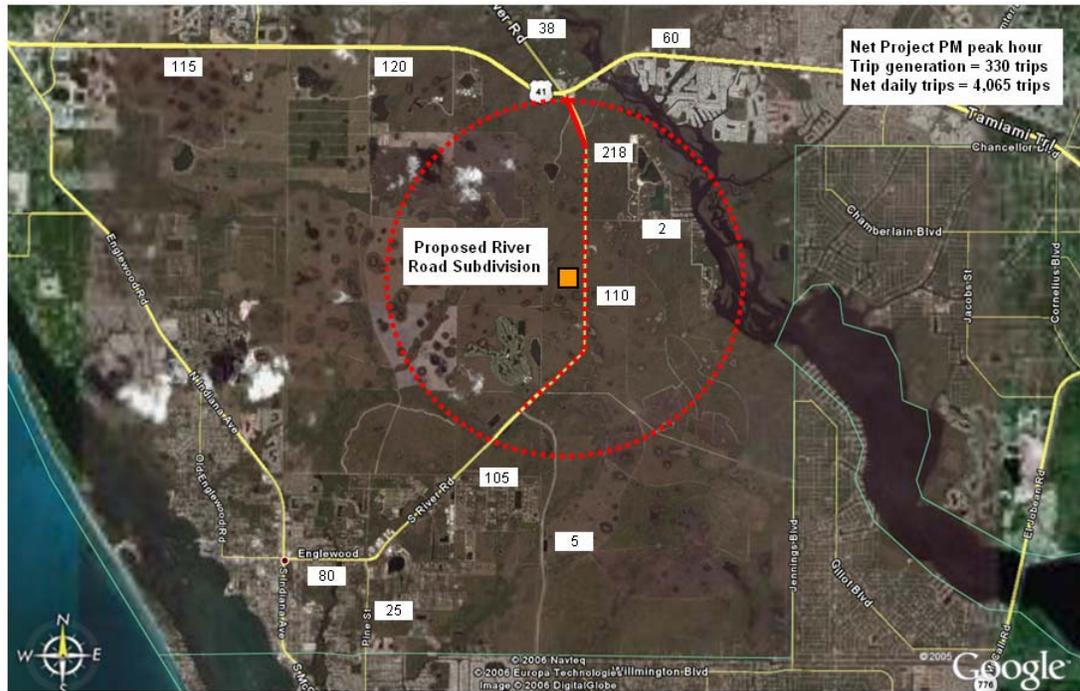


FIGURE 17 Approach 6: influence area in terms of maximum radius based on net daily trip distribution.

Recommended Traffic Impact Area

This detailed discussion of traffic impact area approaches provides some insight into their relative effectiveness. Using this information, the following is a recommended traffic impact area:

1. Include each directly impacted collector or arterial (either directly or via a network of local or private streets) and intersections, both signalized and unsignalized) at each end;
2. Include each segment where the PM peak hour project trips on the segment are greater or equal to 3% of the LOS C capacity of the segment or if project trips on the segment are greater than or equal to 75; and
3. Include each segment operating at more than 90% of the adopted LOS MSV where the PM peak hour project trips are greater or equal to 1% of the LOS C capacity of the segment ; or if project trips on the segment are greater than or equal to 25;

Urban scenario



FIGURE 18 Recommendation for urban developments: min (3% LOS C capacity, 75 trips), and min(1% LOS C capacity, 25 trips) for critical deficient roadway segments.

Practice 14: Establish a procedure for analyzing level of service for segments and intersections.

The analysis procedures of traffic impact studies were similar among the local governments evaluated for this study. Most required analysis of both roadway segments and associated intersections within the traffic impact area, the only difference being that some local governments have specific criteria to determine which intersections are required for detailed analysis. Most also determined transportation concurrency based on the LOS of each roadway segment within the traffic impact area under the “existing plus vested plus project traffic” scenario. Highway Capacity Software (HCS), SYNCHRO and ART-PLAN are commonly used for traffic impact analysis. Using the results of this research and a review of current ITE guidelines on transportation impact analysis for site development, the following analysis procedure is recommended for traffic impact studies.

The first step is to determine the traffic impact area. The second step is to conduct an initial LOS review of all roadway segments within the traffic impact area based on the local government concurrency management tracking system (e.g., spreadsheet, computer program, generalized LOS table) to determine if capacity is available for the proposed development trips. If the segment’s maximum adopted service volume will be exceeded or potentially be exceeded by adding the project trips to the existing plus background traffic volume, a segment analysis must be conducted. For concurrency purposes, the existing volume means typical the peak hour volume during peak season. The background traffic volume includes approved development trips and growth (if any). For any deficient or constrained facility within the traffic impact area, a detailed analysis must be provided. Strategies must be in place to bring deficient any facility back to its adopted LOS standard.

The third step of the analysis procedure is to determine which signalized intersections must be analyzed—either based on the need to support the link analysis or specific local warrants for signalized intersection analysis within the traffic impact area. Because the segment LOS is highly dependent on the signalized intersection analysis, this analysis should be required for the intersections at both ends of the impacted link. For some traffic concurrency methods (e.g., Hillsborough County), intersection reviews are required for some specific intersections based on its criteria.

The fourth step is to perform a detailed analysis using HCS intersection analysis for the intersections at each end of the road segment and HCS arterial roadway analysis for the roadway segment. Pursuant to local government approval, other software, such as SYNCHRO and TRANPLAN, may also be used to perform intersection and roadway segment analysis. At least two scenarios should be analyzed for a development under consideration: (1) Existing plus vested traffic conditions; and, (2) Existing plus vested plus project traffic conditions. Depending upon state law and local policy, the capacity from committed roadway and/or intersection improvements could also be considered in the detailed analysis.

The fifth step is to determine whether transportation concurrency can be met for each roadway segment, and intersection LOS standards can be met for each intersection. This step also includes the identification of any improvement required for the proposed development to meet transportation concurrency. From the traffic impact study, transportation concurrency can be determined by comparing each segment LOS from the analysis to its adopted segment LOS within the traffic impact area. Any required improvements and implementation strategy can also be identified through the traffic impact study. The recommended analysis procedure can be modified by local governments to better meet their needs. It is essential to conduct an adequate traffic impact study for a proposed development if required to ensure the trips generated from a proposed development do not exceed the roadway capacity at the adopted LOS standard.

Practice 15: Broaden the traffic impact study methodology to address multimodal needs and mitigation.

The majority of traffic impact study methodologies remains focused on the impact of automobile trips on the road network. The next logical step in advancing these methodologies is the inclusion of requirements to address the multimodal impacts. The City of Rockville, Maryland has done just that by enacting a Comprehensive Transportation Review (CTR) Methodology in September 2004 to evaluate the impacts of new development on the transportation system. This methodology requires applicants to analyze site access and circulation as well as impacts on pedestrian, bicycle, and transit facilities in addition to the impact of automobile trips.

The transportation issues facing Rockville are comparable to those of many Florida communities. Rockville is located in the Washington D.C. metropolitan area and is characterized by lower density suburban style development. Given the regional context, the city experiences a significant amount of through traffic on its major thoroughfares. The transportation plan describes the city as follows:

“The suburban nature of many areas in Rockville makes people dependent on the automobile. Residential neighborhoods are separated from commercial areas. Cul-de-sacs and dead end streets divide uses that are physically proximate. Some neighborhoods have no sidewalk or walkway system. There is competition between the automobile and pedestrians at intersections. All of these factors force many residents to disregard walking as a viable means of transportation.”

As a result, Rockville is moving away from mitigation measures related primarily to providing additional roadway capacity through physical improvements and is encouraging mitigation for alternative modes (e.g., ridesharing programs, shuttles to transit stations, installation of pedestrian and bicycle facilities, etc.). Applicants may be obligated to contribute toward the improvement of offsite transportation and safety facilities to help address identified safety hazards for all modes.

Of particular interest is the city’s methodology for determining mitigation for alternative modes and corresponding “trip” credits. Under the methodology, developments that generate 30 or more total peak hour site trips must conduct an off-site analysis for all transportation modes, as they are deemed to have a measurable traffic impact (see Table 7). Smaller developments must evaluate on-site multimodal access and circulation needs.

Off-site analyses include an assessment of major intersections that are impacted by the development and non-auto facilities that lead to the development. The goal of the off-site analyses is to “ensure that the site can be accessed safely and efficiently through various modes and that adequate transportation facilities are in place to support the subject development without detriment to the overall transportation system.” Below is a summary of components of the CTR:

- Component A - Introduction and Existing Conditions: Project description.
- Component B - Site Access & Circulation: Analysis of internal circulation, entrance configurations, vehicular access and other relevant access and on-site features; the Proposed Site Access and Circulation Transportation Statement; and the Proposed Conditions Site Plan.
- Component C - Automobile Traffic Analysis (Off-Site): Analysis of auto traffic using the technical guidelines for traffic analysis in the traffic study area.

- Component D - Non-Auto Off-Site Analysis: Analysis of access to the development from activity centers via alternative modes of transportation using the guidelines for creating an inventory of pedestrian, bicycle, and transit facilities in the non-auto study area and for analyzing intersection safety ratings for these modes of transportation.
- Component E - Summary, Mitigation, and Credits: Summary of the report findings and impacts; recommended mitigation plans.

TABLE 7 Components Required Per Peak Hour Trips

Total Peak Hour Site Trips*	Required TR Components
Less than 30	Component A - Introduction Component B - Site Access and Circulation Component E - Summary, Mitigation and Credits
30 or more	All Components Required

Source: Comprehensive Transportation Review Methodology. Rockville, Maryland.

The Rockville procedures for on- and off-site analysis provide insight into how to evaluate multimodal needs for the purpose of determining appropriate improvements. A more detailed summary of this approach can be found in Appendix D.

E. DE MINIMIS TRIP REPORTING

The 2005 growth management legislation also requires an accounting of de minimis trips which are those trips generated from development activities considered so minor that they are exempt from concurrency; however, de minimis trips may not be approved on roadways operating at or below 110% of their adopted capacity. Unfortunately, many local governments have not been keeping accurate counts of approved de minimis impacts. In local governments where traffic counts are not performed on an annual basis, it could not be determined if the 110 percent provision was exceeded. The new legislation (§163.3180(6), F.S.) requires this accounting and annual reporting of de minimis trips stating, “. . . Each local government shall maintain sufficient records to ensure that the 110-percent criterion is not exceeded. Each local government shall submit annually, with its updated capital improvements element, a summary of the de minimis records. . .”

Florida law defines de minimis impact as “an impact that would not affect more than 1 percent of the maximum volume at the adopted level of service of the transportation facility as determined by the local government.” (§163.3180(6), F.S.) Developments with de minimis impacts may be exempted from the transportation concurrency determination process of local governments. However, there is a limit to de minimis impact on any given road link. If a road link is at or exceeds 110% of its service capacity, no further developments, including those with de minimis impact, should be approved until the necessary improvements are in place and the roadway is operating within 110% of its service capacity. Single family homes on existing lots are still deemed to have de minimis impact regardless of the level of deficiency of the roadway except if the impacted road is a hurricane evacuation route. No impact, including single-family homes may be considered de minimis if it would cause any designated hurricane evacuation route to exceed its adopted level of service capacity.

In his review of local government concurrency practices in Florida, Chapin reviewed de minimis standards.⁸ Of the jurisdictions with established de minimis standards, most had transportation specific standards that ranged from 0% to 1% of the maximum adopted LOS capacity. Chapin cited the cities of Tallahassee, Saint Petersburg, Tampa, Sarasota, Gainesville, Fort Lauderdale and the counties of Leon, Escambia, and Martin as local governments that had adopted the 1% maximum LOS standard (per §163.3180(6), F.S.). Although many of the jurisdictions Chapin studied used percentages to determine their de minimis standards, some use alternative methods. These alternative methods included square footage of space, number of dwelling units, or the average daily trips measured.

Jurisdictions quantify de minimis impacts in a variety of ways. Some governments, such as St. Johns County, only consider the impact of single family units as de minimis, whereas some local governments define de minimis impacts based on the type and density of development. Sarasota County, for example, defines single family units and non-residential units up to 1500 square feet as developments having de minimis impacts. More commonly, local governments use the definition of de minimis impacts provided in legislation (1% or less impact on adjacent road link).

De minimis impacts seem to have a little or no affect on roadway networks if they are considered individually; however, their cumulative impact may lead to congestion and operational problems where traffic counts of roadways are not taken on an annual basis or where a road link has already reached its capacity. Our review of local concurrency management systems found that few local governments have been accounting for de minimis trips in their concurrency tracking systems. This is

⁸ Chapin, T. 2005. *A Review of Local Government Concurrency Practices in Florida*, DeVoe L. Moore Center: Florida State University.

the reason that such accounting was required in the 2005 amendments to Florida growth management legislation.

At the local government level, recording of de minimis trips might also be an issue of coordination between internal departments. Developments with de minimis impact, which do not go through the standard concurrency process, might be permitted by the responsible department without recording the trips from those developments. Therefore, local governments will need to establish a process to ensure that information on de minimis trips is recorded and provided to the concurrency administrator. For example, the department issuing building permits could be required to record approved de minimis trips by road link and send the necessary information to the department responsible for tracking transportation concurrency. In addition, the concurrency administrator would need to inform the department issuing building permits of road links where de minimis trips are no longer permitted. A more complex, but effective solution, would be to implement a computer system which automatically provides other departments with the necessary information if a building permit or other related approvals are issued. Those local governments that already use a more complex computer database for development permitting and concurrency review will easily be able to account for de minimis trips.

Report Content and Format

This recommended report content and format is provided to assist local governments with de minimis trip reporting. De minimis records must be submitted at the time of the capital improvement element annual update (§163.3180(6), F.S.). Records may be submitted in a descriptive report with a table summary containing appropriate elements of the tracking system including the de minimis records. Important components of the report should include:

- definition and approval process of developments having de minimis impact;
- existing conditions and deficiencies road links;
- de minimis trip activity on all road links; and,
- planned improvements included in the local government's capital improvement element that resolve existing deficiencies.

Regardless of the method a local government uses for tracking concurrency, a simple table or spreadsheet may be used to summarize all the information required by DCA including deficiencies on the road network and corresponding planned improvements. Records required for the report should be transferred from the concurrency tracking system. Table 8 indicates column headers for the spreadsheet.

TABLE 8 De Minimis Trip Report Column Headers

COLUMN HEADER	DESCRIPTION	SOURCE
Road Link #	Number assigned to a specific road link.	Created and assigned by local government.
Road	Name of the Road.	Official road name according to the agency with jurisdiction.
From / To	Defines the start and end points of a road link.	County/city road links are established by the local government with jurisdiction over the road. Link limits often coincide with other road links, traffic signals, and/or other notable intersections and are shorter in urban areas than rural areas.
Existing PH PD Volume	Annual daily traffic counts adjusted to determine the peak hour peak direction volume.	(AADT x "K Factor" x "D Factor")
Approved Trips	Development trips approved and reserved on the link through a certificate of concurrency. Does not include de minimis trips.	Compiled by the local government as trips are approved.
De Minimis Trips	Trips generated by developments having de minimis impact as defined in the local government comprehensive plan and land development regulations in accordance with §163.3180, F.S.	Compiled by the local government as building permits are issued for projects with "de minimis" impacts
Total Committed PH PD Traffic	The existing traffic volume plus the total number of approved trips anticipated on the road link.	(Existing PH PD Volume + Approved Trips + De Minimis Trips)
LOS Standard	LOS standard adopted for the link by letters A-F.	State roads per Rule 14-92, F.A.C. as amended. For all other roads, as established in the local government comprehensive plan
PH PD Service Volume	Service volume for the minimum acceptable LOS during the peak hour in the peak direction according to the adopted LOS standard and the geometric characteristics of the link.	FDOT 2002 Quality/Level of Service Handbook.
Traffic Analysis Service Volume	New service volume for the link based on a traffic analysis.	This revised service volume is adopted by the local government (FDOT, where appropriate) is based on an accepted traffic analysis.
110% Service Volume	110 % of the PH PD Service Volume or Traffic Analysis Service Volume. Indicates availability of "de minimis" capacity.	Calculation.
110% Service Volume Exceeded?	If the Total Committed PH PD Traffic is greater than or equal to 110% Service Volume, indicate 'Y' or "N."	
Hurricane Evacuation Route	Indicates if link is a Hurricane Evacuation Route with a "Y" or "N." Once Total Committed PH PD Traffic is equal to 110% of the PH PD Service Volume, no de minimis trips may be approved.	As established in the local government comprehensive plan.
Planned Improvements	Planned improvements to road links.	Capital improvement element of local government comprehensive plan.

F. CONCLUSION

Little research has been conducted in Florida on the practical application of concurrency management and the elements of concurrency management systems. This study presents basic guidance for local transportation concurrency management systems based on a limited sampling of current practices. As such, it represents an important first step toward greater understanding of how to implement transportation concurrency. However, further research is needed to advance the state of the practice, including more detailed study of the evolution of concurrency management systems and how best to accomplish concurrency as a local government transitions from simple to more complex systems or multimodal options. In addition, this study uncovered several continuing issues. Key among these is an apparent disconnect between long range transportation planning and concurrency management. One would assume that a roadway nearing its capacity would warrant a higher priority for improvement. Therefore, concurrency should be an important factor in determining transportation improvement priorities, as well as the need for land use changes and mobility options.

Another issue is that many communities do not have a method for systematically tracking development trips. Without systematic tracking of trips, it is unclear how a local government can maintain concurrency. Some areas, particularly small towns or rural communities that have yet to experience growth pressure, would benefit from the development of a concurrency management system. When development does begin to increase, they will be ready to appropriately measure and address the transportation impact of development proposals. A simple basic spreadsheet for concurrency would prove useful to smaller local governments. Software programs can be considered as they grow and expand.

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APPENDIX A: CONCURRENCY LAWS AND REGULATIONS

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F.S. Chapter 163.3180 (Sections 1-10) Concurrency

(1)(a) Sanitary sewer, solid waste, drainage, potable water, parks and recreation, schools, and transportation facilities, including mass transit, where applicable, are the only public facilities and services subject to the concurrency requirement on a statewide basis. Additional public facilities and services may not be made subject to concurrency on a statewide basis without appropriate study and approval by the Legislature; however, any local government may extend the concurrency requirement so that it applies to additional public facilities within its jurisdiction.

(b) Local governments shall use professionally accepted techniques for measuring level of service for automobiles, bicycles, pedestrians, transit, and trucks. These techniques may be used to evaluate increased accessibility by multiple modes and reductions in vehicle miles of travel in an area or zone. The Department of Transportation shall develop methodologies to assist local governments in implementing this multimodal level-of-service analysis. The Department of Community Affairs and the Department of Transportation shall provide technical assistance to local governments in applying these methodologies.

(2)(a) Consistent with public health and safety, sanitary sewer, solid waste, drainage, adequate water supplies, and potable water facilities shall be in place and available to serve new development no later than the issuance by the local government of a certificate of occupancy or its functional equivalent. Prior to approval of a building permit or its functional equivalent, the local government shall consult with the applicable water supplier to determine whether adequate water supplies to serve the new development will be available no later than the anticipated date of issuance by the local government of a certificate of occupancy or its functional equivalent.

(b) Consistent with the public welfare, and except as otherwise provided in this section, parks and recreation facilities to serve new development shall be in place or under actual construction no later than 1 year after issuance by the local government of a certificate of occupancy or its functional equivalent. However, the acreage for such facilities shall be dedicated or be acquired by the local government prior to issuance by the local government of a certificate of occupancy or its functional equivalent, or funds in the amount of the developer's fair share shall be committed no later than the local government's approval to commence construction.

(c) Consistent with the public welfare, and except as otherwise provided in this section, transportation facilities needed to serve new development shall be in place or under actual construction within 3 years after the local government approves a building permit or its functional equivalent that results in traffic generation.

(3) Governmental entities that are not responsible for providing, financing, operating, or regulating public facilities needed to serve development may not establish binding level-of-service standards on governmental entities that do bear those responsibilities. This subsection does not limit the authority

of any agency to recommend or make objections, recommendations, comments, or determinations during reviews conducted under s. 163.3184.

(4)(a) The concurrency requirement as implemented in local comprehensive plans applies to state and other public facilities and development to the same extent that it applies to all other facilities and development, as provided by law.

(b) The concurrency requirement as implemented in local comprehensive plans does not apply to public transit facilities. For the purposes of this paragraph, public transit facilities include transit stations and terminals, transit station parking, park-and-ride lots, intermodal public transit connection or transfer facilities, and fixed bus, guideway, and rail stations. As used in this paragraph, the terms "terminals" and "transit facilities" do not include airports or seaports or commercial or residential development constructed in conjunction with a public transit facility.

(c) The concurrency requirement, except as it relates to transportation facilities and public schools, as implemented in local government comprehensive plans, may be waived by a local government for urban infill and redevelopment areas designated pursuant to s. 163.2517 if such a waiver does not endanger public health or safety as defined by the local government in its local government comprehensive plan. The waiver shall be adopted as a plan amendment pursuant to the process set forth in s. 163.3187(3)(a). A local government may grant a concurrency exception pursuant to subsection (5) for transportation facilities located within these urban infill and redevelopment areas.

(5)(a) The Legislature finds that under limited circumstances dealing with transportation facilities, countervailing planning and public policy goals may come into conflict with the requirement that adequate public facilities and services be available concurrent with the impacts of such development. The Legislature further finds that often the unintended result of the concurrency requirement for transportation facilities is the discouragement of urban infill development and redevelopment. Such unintended results directly conflict with the goals and policies of the state comprehensive plan and the intent of this part. Therefore, exceptions from the concurrency requirement for transportation facilities may be granted as provided by this subsection.

(b) A local government may grant an exception from the concurrency requirement for transportation facilities if the proposed development is otherwise consistent with the adopted local government comprehensive plan and is a project that promotes public transportation or is located within an area designated in the comprehensive plan for:

1. Urban infill development,
2. Urban redevelopment,
3. Downtown revitalization, or
4. Urban infill and redevelopment under s. 163.2517.

(c) The Legislature also finds that developments located within urban infill, urban redevelopment, existing urban service, or downtown revitalization areas or areas designated as urban infill and redevelopment areas under s. 163.2517 which pose only special part-time demands on the transportation system should be excepted from the concurrency requirement for transportation facilities. A special part-time demand is one that does not have more than 200 scheduled events during any calendar year and does not affect the 100 highest traffic volume hours.

(d) A local government shall establish guidelines in the comprehensive plan for granting the exceptions authorized in paragraphs (b) and (c) and subsections (7) and (15) which must be consistent

with and support a comprehensive strategy adopted in the plan to promote the purpose of the exceptions.

(e) The local government shall adopt into the plan and implement strategies to support and fund mobility within the designated exception area, including alternative modes of transportation. The plan amendment shall also demonstrate how strategies will support the purpose of the exception and how mobility within the designated exception area will be provided. In addition, the strategies must address urban design; appropriate land use mixes, including intensity and density; and network connectivity plans needed to promote urban infill, redevelopment, or downtown revitalization. The comprehensive plan amendment designating the concurrency exception area shall be accompanied by data and analysis justifying the size of the area.

(f) Prior to the designation of a concurrency exception area, the Department of Transportation shall be consulted by the local government to assess the impact that the proposed exception area is expected to have on the adopted level-of-service standards established for Strategic Intermodal System facilities, as defined in s. 339.64, and roadway facilities funded in accordance with s. 339.2819. Further, the local government shall, in cooperation with the Department of Transportation, develop a plan to mitigate any impacts to the Strategic Intermodal System, including, if appropriate, the development of a long-term concurrency management system pursuant to subsection (9) and s. 163.3177(3)(d). The exceptions may be available only within the specific geographic area of the jurisdiction designated in the plan. Pursuant to s. 163.3184, any affected person may challenge a plan amendment establishing these guidelines and the areas within which an exception could be granted.

(g) Transportation concurrency exception areas existing prior to July 1, 2005, shall meet, at a minimum, the provisions of this section by July 1, 2006, or at the time of the comprehensive plan update pursuant to the evaluation and appraisal report, whichever occurs last.

(6) The Legislature finds that a de minimis impact is consistent with this part. A de minimis impact is an impact that would not affect more than 1 percent of the maximum volume at the adopted level of service of the affected transportation facility as determined by the local government. No impact will be de minimis if the sum of existing roadway volumes and the projected volumes from approved projects on a transportation facility would exceed 110 percent of the maximum volume at the adopted level of service of the affected transportation facility; provided however, that an impact of a single family home on an existing lot will constitute a de minimis impact on all roadways regardless of the level of the deficiency of the roadway. Further, no impact will be de minimis if it would exceed the adopted level-of-service standard of any affected designated hurricane evacuation routes. Each local government shall maintain sufficient records to ensure that the 110-percent criterion is not exceeded. Each local government shall submit annually, with its updated capital improvements element, a summary of the de minimis records. If the state land planning agency determines that the 110-percent criterion has been exceeded, the state land planning agency shall notify the local government of the exceedance and that no further de minimis exceptions for the applicable roadway may be granted until such time as the volume is reduced below the 110 percent. The local government shall provide proof of this reduction to the state land planning agency before issuing further de minimis exceptions.

(7) In order to promote infill development and redevelopment, one or more transportation concurrency management areas may be designated in a local government comprehensive plan. A transportation concurrency management area must be a compact geographic area with an existing network of roads where multiple, viable alternative travel paths or modes are available for common trips. A local government may establish an areawide level-of-service standard for such a transportation concurrency management area based upon an analysis that provides for a justification

for the areawide level of service, how urban infill development or redevelopment will be promoted, and how mobility will be accomplished within the transportation concurrency management area. Prior to the designation of a concurrency management area, the Department of Transportation shall be consulted by the local government to assess the impact that the proposed concurrency management area is expected to have on the adopted level-of-service standards established for Strategic Intermodal System facilities, as defined in s. 339.64, and roadway facilities funded in accordance with s. 339.2819. Further, the local government shall, in cooperation with the Department of Transportation, develop a plan to mitigate any impacts to the Strategic Intermodal System, including, if appropriate, the development of a long-term concurrency management system pursuant to subsection (9) and s. 163.3177(3)(d). Transportation concurrency management areas existing prior to July 1, 2005, shall meet, at a minimum, the provisions of this section by July 1, 2006, or at the time of the comprehensive plan update pursuant to the evaluation and appraisal report, whichever occurs last. The state land planning agency shall amend chapter 9J-5, Florida Administrative Code, to be consistent with this subsection.

(8) When assessing the transportation impacts of proposed urban redevelopment within an established existing urban service area, 110 percent of the actual transportation impact caused by the previously existing development must be reserved for the redevelopment, even if the previously existing development has a lesser or nonexistent impact pursuant to the calculations of the local government. Redevelopment requiring less than 110 percent of the previously existing capacity shall not be prohibited due to the reduction of transportation levels of service below the adopted standards. This does not preclude the appropriate assessment of fees or accounting for the impacts within the concurrency management system and capital improvements program of the affected local government. This paragraph does not affect local government requirements for appropriate development permits.

(9)(a) Each local government may adopt as a part of its plan, long-term transportation and school concurrency management systems with a planning period of up to 10 years for specially designated districts or areas where significant backlogs exist. The plan may include interim level-of-service standards on certain facilities and shall rely on the local government's schedule of capital improvements for up to 10 years as a basis for issuing development orders that authorize commencement of construction in these designated districts or areas. The concurrency management system must be designed to correct existing deficiencies and set priorities for addressing backlogged facilities. The concurrency management system must be financially feasible and consistent with other portions of the adopted local plan, including the future land use map.

(b) If a local government has a transportation or school facility backlog for existing development which cannot be adequately addressed in a 10-year plan, the state land planning agency may allow it to develop a plan and long-term schedule of capital improvements covering up to 15 years for good and sufficient cause, based on a general comparison between that local government and all other similarly situated local jurisdictions, using the following factors:

1. The extent of the backlog.
2. For roads, whether the backlog is on local or state roads.
3. The cost of eliminating the backlog.
4. The local government's tax and other revenue-raising efforts.

(c) The local government may issue approvals to commence construction notwithstanding this section, consistent with and in areas that are subject to a long-term concurrency management system.

(d) If the local government adopts a long-term concurrency management system, it must evaluate the system periodically. At a minimum, the local government must assess its progress toward improving levels of service within the long-term concurrency management district or area in the evaluation and appraisal report and determine any changes that are necessary to accelerate progress in meeting acceptable levels of service.

(10) With regard to roadway facilities on the Strategic Intermodal System designated in accordance with ss. 339.61, 339.62, 339.63, and 339.64, the Florida Intrastate Highway System as defined in s. 338.001, and roadway facilities funded in accordance with s. 339.2819, local governments shall adopt the level-of-service standard established by the Department of Transportation by rule. For all other roads on the State Highway System, local governments shall establish an adequate level-of-service standard that need not be consistent with any level-of-service standard established by the Department of Transportation. In establishing adequate level-of-service standards for any arterial roads, or collector roads as appropriate, which traverse multiple jurisdictions, local governments shall consider compatibility with the roadway facility's adopted level-of-service standards in adjacent jurisdictions. Each local government within a county shall use a professionally accepted methodology for measuring impacts on transportation facilities for the purposes of implementing its concurrency management system. Counties are encouraged to coordinate with adjacent counties, and local governments within a county are encouraged to coordinate, for the purpose of using common methodologies for measuring impacts on transportation facilities for the purpose of implementing their concurrency management systems.

F.A.C. Rule 9J-5.019 (Sections 1-5) Transportation Element.

(1) APPLICATION AND PURPOSE. A local government which has all or part of its jurisdiction included within the urban area of a Metropolitan Planning Organization (MPO) pursuant to Section 339.175, F.S., shall prepare and adopt a transportation element consistent with the provisions of this Rule and Chapter 163, Part II, F.S. Local governments that are not located within the urban area of a MPO shall adopt traffic circulation, mass transit, and ports, aviation and related facilities elements consistent with the provisions of this rule and Chapter 163, Part II, F.S., except that local governments with a population of 50,000 or less, as determined under Section 186.901, F.S., shall not be required to prepare mass transit or ports, aviation and related facilities elements. Within a designated MPO area, the transportation elements of the local plans shall be coordinated with the long range transportation plan of the MPO. The purpose of the transportation element shall be to plan for a multimodal transportation system that places emphasis on public transportation systems.

(2) EXISTING TRANSPORTATION DATA REQUIREMENTS. The element shall be based upon the following data requirements pursuant to subsection 9J-5.005(2), F.A.C., of this chapter.

(a) The general location of the following transportation system features shall be shown on an existing transportation map or map series:

1. Road System:
 - a. Collector roads;
 - b. Arterial roads;
 - c. Limited and controlled access facilities;
 - d. Significant Parking facilities, as determined by the local government.
2. Public Transit System:
 - a. Public transit routes or service areas;
 - b. Public transit terminals and transfer stations;
 - c. Public transit rights-of-way and exclusive public transit corridors;
3. Significant bicycle and pedestrian ways, as determined by the local government;

4. Port facilities;
 5. Airport facilities including clear zones and obstructions;
 6. Freight and passenger rail lines and terminals; and
 7. Intermodal terminals and access to intermodal facilities.
 8. The existing functional classification and maintenance responsibility for all roads;
 9. The number of through lanes for each roadway;
 10. The major public transit trip generators and attractors based upon the existing land use map or map series;
 11. Designated local and regional transportation facilities, critical to the evacuation of the coastal population prior to an impending natural disaster.
- (b) The existing transportation map or map series shall identify the following:
1. Existing peak hour, peak direction levels of service for roads and mass transit facilities and corridors or routes; and
 2. Capacity of significant parking facilities and duration limitations (long-term or short-term), where applicable.
- (3) TRANSPORTATION ANALYSIS REQUIREMENTS. The element shall be based upon the following analyses which address all modes of transportation and support the comprehensive plan pursuant to subsection 9J-5.005(2), F.A.C.
- (a) An analysis of the existing transportation system levels of service and system needs based upon existing design and operating capacities; most recently available estimates for average daily and peak hour vehicle trips; existing modal split and vehicle occupancy rates; existing public transit facilities, including ridership by route, peak hour capacities and headways; population characteristics, including transportation disadvantaged; and the existing characteristics of the major trip generators and attractors within the community.
- (b) An analysis of the availability of transportation facilities and services to serve existing land uses.
- (c) An analysis of the adequacy of the existing and projected transportation system to evacuate the coastal population prior to an impending natural disaster.
- (d) An analysis of the growth trends and travel patterns and interactions between land use and transportation, and the compatibility between the future land use and transportation elements, including land use compatibility around airports.
- (e) An analysis of existing and projected intermodal deficiencies and needs such as terminals, connections, high occupancy vehicle lanes, park-and-ride lots and other facilities.
- (f) An analysis of the projected transportation system levels of service and system needs based upon the future land use categories, including their densities or intensities of use as shown on the future land use map or map series, and the projected integrated transportation system. The analysis shall demonstrate integration and coordination among the various modes of transportation, including rail, airport and seaport facilities. The analysis shall address the need for new facilities and expansions of alternative transportation modes to provide a safe and efficient transportation network and enhance mobility. The methodologies used in the analysis, including the assumptions used, modeling applications, and alternatives considered shall be included in the plan support document. The analysis shall address the effect of transportation concurrency management areas, if any pursuant to subsection 9J-5.0055(5), F.A.C., and the effect of transportation concurrency exceptions, if any, pursuant to subsections 9J-5.0055(6) and (7), F.A.C.

(g) The analysis shall consider the projects planned for in the Florida Department of Transportation's Adopted Work Program, long range transportation plan and transportation improvement program of the metropolitan planning organization, and the local transportation authority(ies), if any, and compatibility with the policies and guidelines of such plans.

(h) The analysis shall demonstrate how the local government will maintain its adopted level of service standards for roads and transit facilities within its jurisdiction and how the level of service standards reflect and advance the purpose of this section and the goals, objectives, and policies of the future land use element and other elements of the comprehensive plan.

(i) The analysis shall explicitly address and document the internal consistency of the plan, especially its provisions addressing transportation, land use, and availability of facilities and services.

(j) An analysis which identifies land uses and transportation management programs necessary to promote and support public transportation systems in designated public transportation corridors.

(k) For multimodal transportation districts established pursuant to Sections 163.3180(15)(a) and (b), F.S., an analysis demonstrating that the proposed community design elements, including the transportation system and the land use distribution, densities and intensities, will reduce vehicle miles of travel and support an integrated, multimodal transportation system that achieves the objectives of the paragraphs cited above.

(4) REQUIREMENTS FOR TRANSPORTATION GOALS, OBJECTIVES AND POLICIES.

(a) The element shall contain one or more goal statements which establish the long-term end toward which transportation programs and activities are ultimately directed.

(b) The element shall contain one or more specific objectives for each goal statement which address the requirements of subsections 163.3177(6)(b), (6)(j), (7)(a), and (7)(b), F.S., and which:

1. Provide for a safe, convenient, and energy efficient multimodal transportation system;
2. Coordinate the transportation system with the future land use map or map series and ensure that existing and proposed population densities, housing and employment patterns, and land uses are consistent with the transportation modes and services proposed to serve these areas;
3. Coordinate the transportation system with the plans and programs of any applicable metropolitan planning organization, transportation authority, Florida Transportation Plan and Florida Department of Transportation's Adopted Work Program;
4. Address the provision of efficient public transit services based upon existing and proposed major trip generators and attractors, safe and convenient public transit terminals, land uses and accommodation of the special needs of the transportation disadvantaged;
5. Provide for the protection of existing and future rights-of-way from building encroachment;
6. Coordinate the siting of new, or expansion of existing, ports, airports, or related facilities with the future land use, coastal management, and conservation elements;
7. Coordinate the surface transportation access to ports, airports, or related facilities with the traffic circulation system shown on the traffic circulation maps or map series;
8. Coordinate with any ports, airports, or related facilities plans of the appropriate ports, airports or related facilities provider, United States Army Corps of Engineers, Federal Aviation Administration, metropolitan planning organization, military services, or resource planning and management plan prepared pursuant to Chapter 380, F.S., and approved by the Governor and Cabinet, the Florida Department of Transportation 5-Year Transportation Plan, and the Continuing Florida Aviation System Planning Process as adopted; and

9. Ensure that access routes to ports, airports, or related facilities are properly integrated with other modes of surface or water transportation.
10. For multimodal transportation districts established pursuant to Sections 163.3180(15)(a) and (b), F.S., provide for a safe, comfortable and attractive pedestrian environment with convenient interconnection to public transportation.

(c) The element shall contain one or more policies for each objective which address implementation activities for the:

1. Establishment of level of service standards at peak hour for roads and public transit facilities within the local government's jurisdiction. For facilities on the Florida Intrastate Highway System as defined in Section 338.001, F.S., the local governments shall adopt the level of service standards established by the Department of Transportation by rule. With the concurrence of the Department of Transportation, a local government may establish level of service standards for general lanes in urbanized areas as specified in Section 163.3180(10), F.S. For all other facilities on the future traffic circulation map, local governments shall adopt adequate level of service standards. These level of service standards shall be adopted to ensure that adequate facility capacity will be provided to serve the existing and future land uses as demonstrated by the supporting data and analysis in the comprehensive plan;
2. Control of the connections and access points of driveways and roads to roadways;
3. Establishment of parking strategies that will promote transportation goals and objectives;
4. For existing or future transportation rights-of-way and corridors designated in the local government comprehensive plan, establish measures for their acquisition, preservation, or protection;
5. Establishment of land use and other strategies to promote the use of bicycles and walking;
6. Establishment of transportation demand management programs to modify peak hour travel demand and reduce the number of vehicle miles traveled per capita within the community and region;
7. Establishment of transportation system management strategies as appropriate to improve system efficiency and enhance safety;
8. Coordination of roadway and transit service improvements with the future needs of seaports, airports, and other related public transportation facilities;
9. Establishment of land use, site and building design guidelines for development in exclusive public transit corridors to assure the accessibility of new development to public transit;
10. Establishment of numerical indicators against which the achievement of the mobility goals of the community can be measured, such as modal split, annual transit trips per capita, automobile occupancy rates;
11. Establishment of strategies, agreements and other mechanisms with applicable local governments and regional and state agencies that demonstrate the areawide coordination necessary to implement the transportation, land use, parking and other provisions of the transportation element;
12. A coordinated and consistent policy with the future land use element to encourage land uses which promote public transportation in designated public transportation corridors;
13. Establishment of strategies to facilitate local traffic to use alternatives to the Florida Intrastate Highway System to protect its interregional and intrastate functions;
14. Development of strategies to address intermodal terminals and access to airport, rail and seaport facilities;
15. Provision of safe and convenient on-site traffic flow, considering needed motorized and non-motorized vehicle parking;
16. Establishment of measures for the acquisition and preservation of existing and future public transit rights-of-way and exclusive public transit corridors;

17. Promotion of ports, airports, and related facilities development and expansion consistent with the future land use, coastal management, and conservation elements;
18. Mitigation of adverse structural and non-structural impacts from ports, airports, or related facilities upon adjacent natural resources and land uses;
19. Protection and conservation of natural resources within ports, airports and related facilities;
20. Coordinated intermodal management of surface and water transportation within ports, airports and related facilities; and
21. Protection of ports, airports, or related facilities from the encroachment of incompatible land uses.
22. For multimodal transportation districts established pursuant to Sections 163.3180(15)(a) and (b), F.S., provide an interconnected network of streets and related facilities, such as sidewalk condition, availability and connectivity, street crossing convenience, transit proximity to origins and destinations, convenience and reliability of transit facilities, and roadway conditions for bicycles including lane width, surface condition, and separation from motor vehicle traffic, so as to promote walking and bicycling that is coordinated with land uses and other community design features and ensures convenient access to public transportation.

(5) FUTURE TRANSPORTATION MAP.

(a) The general location of the following transportation system proposed features shall be shown on the future transportation map or map series:

1. Road System:
 - a. Collector roads;
 - b. Arterial roads;
 - c. Limited and controlled access facilities;
 - d. Local roads, if being used to achieve mobility goals;
 - e. Parking facilities that are required to achieve mobility goals;
2. Public transit system:
 - a. Public transit routes or service areas;
 - b. Public transit terminals and transfer stations;
 - c. Public transit rights-of-way and exclusive public transit corridors;
3. Transportation concurrency management areas pursuant to subsection 9J-5.0055(5), F.A.C., if any;
4. Transportation concurrency exception areas pursuant to subsection 9J-5.0055(6), F.A.C., if any;
5. Significant bicycle and pedestrian facilities;
6. Port facilities;
7. Airport facilities including clear zones and obstructions;
8. Freight and passenger rail lines; and
9. Intermodal terminals and access to such facilities.

(b) The future transportation map or map series shall identify the following:

1. The functional classification and maintenance responsibility for all roads;
2. The number of proposed through lanes for each roadway;
3. The major public transit trip generators and attractors based upon the future land use map or map series;
4. Projected peak hour levels of service for all transportation facilities for which level of service standards are established; and
5. Designated local and regional transportation facilities critical to the evacuation of coastal population prior to an impending natural disaster.

163.3180(15)(a) Multimodal transportation districts may be established under a local government comprehensive plan in areas delineated on the future land use map for which the local comprehensive plan assigns secondary priority to vehicle mobility and primary priority to assuring a safe, comfortable, and attractive pedestrian environment, with convenient interconnection to transit. Such districts must incorporate community design features that will reduce the number of automobile trips or vehicle miles of travel and will support an integrated, multimodal transportation system. Prior to the designation of multimodal transportation districts, the Department of Transportation shall be consulted by the local government to assess the impact that the proposed multimodal district area is expected to have on the adopted level-of-service standards established for Strategic Intermodal System facilities, as defined in s. 339.64, and roadway facilities funded in accordance with s. 339.2819. Further, the local government shall, in cooperation with the Department of Transportation, develop a plan to mitigate any impacts to the Strategic Intermodal System, including the development of a long-term concurrency management system pursuant to subsection (9) and s. 163.3177(3)(d). Multimodal transportation districts existing prior to July 1, 2005, shall meet, at a minimum, the provisions of this section by July 1, 2006, or at the time of the comprehensive plan update pursuant to the evaluation and appraisal report, whichever occurs last.

(b) Community design elements of such a district include: a complementary mix and range of land uses, including educational, recreational, and cultural uses; interconnected networks of streets designed to encourage walking and bicycling, with traffic-calming where desirable; appropriate densities and intensities of use within walking distance of transit stops; daily activities within walking distance of residences, allowing independence to persons who do not drive; public uses, streets, and squares that are safe, comfortable, and attractive for the pedestrian, with adjoining buildings open to the street and with parking not interfering with pedestrian, transit, automobile, and truck travel modes.

(c) Local governments may establish multimodal level-of-service standards that rely primarily on nonvehicular modes of transportation within the district, when justified by an analysis demonstrating that the existing and planned community design will provide an adequate level of mobility within the district based upon professionally accepted multimodal level-of-service methodologies. The analysis must also demonstrate that the capital improvements required to promote community design are financially feasible over the development or redevelopment timeframe for the district and that community design features within the district provide convenient interconnection for a multimodal transportation system. Local governments may issue development permits in reliance upon all planned community design capital improvements that are financially feasible over the development or redevelopment timeframe for the district, without regard to the period of time between development or redevelopment and the scheduled construction of the capital improvements. A determination of financial feasibility shall be based upon currently available funding or funding sources that could reasonably be expected to become available over the planning period.

(d) Local governments may reduce impact fees or local access fees for development within multimodal transportation districts based on the reduction of vehicle trips per household or vehicle miles of travel expected from the development pattern planned for the district.

163.3180 (16) It is the intent of the Legislature to provide a method by which the impacts of development on transportation facilities can be mitigated by the cooperative efforts of the public and private sectors. The methodology used to calculate proportionate fair-share mitigation under this section shall be as provided for in subsection (12).

(a) By December 1, 2006, each local government shall adopt by ordinance a methodology for assessing proportionate fair-share mitigation options. By December 1, 2005, the Department of

Transportation shall develop a model transportation concurrency management ordinance with methodologies for assessing proportionate fair-share mitigation options.

(b)1. In its transportation concurrency management system, a local government shall, by December 1, 2006, include methodologies that will be applied to calculate proportionate fair-share mitigation. A developer may choose to satisfy all transportation concurrency requirements by contributing or paying proportionate fair-share mitigation if transportation facilities or facility segments identified as mitigation for traffic impacts are specifically identified for funding in the 5-year schedule of capital improvements in the capital improvements element of the local plan or the long-term concurrency management system or if such contributions or payments to such facilities or segments are reflected in the 5-year schedule of capital improvements in the next regularly scheduled update of the capital improvements element. Updates to the 5-year capital improvements element which reflect proportionate fair-share contributions may not be found not in compliance based on ss. 163.3164(32) and 163.3177(3) if additional contributions, payments or funding sources are reasonably anticipated during a period not to exceed 10 years to fully mitigate impacts on the transportation facilities.

2. Proportionate fair-share mitigation shall be applied as a credit against impact fees to the extent that all or a portion of the proportionate fair-share mitigation is used to address the same capital infrastructure improvements contemplated by the local government's impact fee ordinance.

(c) Proportionate fair-share mitigation includes, without limitation, separately or collectively, private funds, contributions of land, and construction and contribution of facilities and may include public funds as determined by the local government. The fair market value of the proportionate fair-share mitigation shall not differ based on the form of mitigation. A local government may not require a development to pay more than its proportionate fair-share contribution regardless of the method of mitigation.

Specific Authority 163.3177(9), (10) F.S. Law Implemented 163.3177(1), (3), (5), (8), (9), (10), 163.3178, 163.3180(13), (15) F.S. History—New 3-23-94, Amended 3-21-99, 2-25-01.

F.A.C. Rule 9J-5.0055 (Sections 1, 2, 3c, 4-9) Concurrency Management System.

The purpose of the concurrency management system is to establish an ongoing mechanism which ensures that public facilities and services needed to support development are available concurrent with the impacts of such development.

(1) **GENERAL REQUIREMENTS.** Each local government shall adopt, as a component of the comprehensive plan, objectives, policies and standards for the establishment of a concurrency management system. The concurrency management system will ensure that issuance of a development order or development permit is conditioned upon the availability of public facilities and services necessary to serve new development, consistent with the provisions of Chapter 163, Part II, F.S., and this rule. The concurrency management system shall include:

(a) A requirement that the local government shall maintain the adopted level of service standards for roads, sanitary sewer, solid waste, drainage, potable water, parks and recreation, mass transit, if applicable, and public schools if imposed by local option.

(b) A requirement that the local government Capital Improvements Element, as provided by Rule 9J-5.016, F.A.C., of this chapter, shall set forth a financially feasible plan which demonstrates that the adopted level of service standards will be achieved and maintained.

(c) A system for monitoring and ensuring adherence to the adopted level of service standards, the schedule of capital improvements, and the availability of public facility capacity.

(d) Guidelines for interpreting and applying level of service standards to applications for development orders and development permits and determining when the test for concurrency must be met. The latest point in the application process for the determination of concurrency is prior to the approval of an application for a development order or permit which contains a specific plan for development, including the densities and intensities of development.

(e) A requirement that the local government shall adopt land development regulations which specify and implement provisions of the concurrency management system and, as a minimum, provide a program that ensures that development orders and development permits are issued in a manner that will not result in a reduction in the levels of service below the adopted level of service standards for the affected facility.

(2) LEVEL OF SERVICE STANDARDS.

(a) For the purpose of the issuance of development orders and development permits, local governments must adopt level of service standards for public facilities and services located within the area for which such local government has authority to issue development orders and development permits. For the purposes of concurrency, public facilities and services include the following for which level of service standards must be adopted under Chapter 9J-5, F.A.C.:

1. Roads, subparagraph 9J-5.019(4)(c)1., F.A.C.
2. Sanitary sewer, sub-subparagraph 9J-5.011(2)(c)2.a., F.A.C.
3. Solid waste, sub-subparagraph 9J-5.011(2)(c)2.b., F.A.C.
4. Drainage, sub-subparagraph 9J-5.011(2)(c)2.c., F.A.C.
5. Potable water, sub-subparagraph 9J-5.011(2)(c)2.d., F.A.C.
6. Parks and Recreation, subparagraph 9J-5.014(3)(c)4., F.A.C.
7. Mass transit, subparagraph 9J-5.019(4)(c)1., F.A.C., if applicable.
8. Roads and public transit, subparagraph 9J-5.019(4)(c)1., F.A.C.
9. Public schools, subparagraph 9J-5.025(3)(c)7., F.A.C., if imposed by local option.

(b) A local government, at its option, may make additional public facilities and services subject to the concurrency management system. Level of service standards of such additional facilities must be adopted in the local government comprehensive plan. A local government may adopt multimodal level of service standards for transportation facilities, as authorized in Section 163.3180(15)(a), F.S., using the Florida Department of Transportation methodology for multimodal level of service standards or other professionally accepted methodologies. If a local government desires to extend the concurrency requirement to public schools, the local government shall adopt the necessary amendments as specified in Section 163.3180(13), F.S., including a public school facilities element

and interlocal agreement for school concurrency which are determined to be in compliance with the requirements of law. The local government and school board shall jointly establish level of service standards that apply district-wide to all public schools of the same type including elementary, middle, and high schools as well as special purpose facilities such as magnet schools. Local governments and school boards shall have the option of utilizing tiered level of service standards as provided in subparagraph (d) of this section. If the local government chooses to apply school concurrency on less than a district-wide basis, such as utilizing school attendance zones or larger school concurrency service areas, the local government and school board shall have the burden to demonstrate in the comprehensive plan that the utilization of school capacity is maximized to the greatest extent possible.

(c) For facilities on the Florida Intrastate Highway System as defined in Section 338.001, F.S., the local governments shall adopt the level of service standards established by the Department of Transportation by rule. With the concurrence of the Department of Transportation, local governments may establish level of service standards for general lanes in urbanized areas as specified in Section 163.3180(10), F.S. For other roads local governments shall adopt adequate level of service standards. These level of service standards shall be adopted to ensure that adequate facility capacity will be provided to serve the existing and future land uses as demonstrated by the supporting data and analysis in the comprehensive plan.

(d) A local government may desire to have a tiered, two-level approach for the level of service standard. To utilize a tiered approach, the local government must adopt an initial level of service standard as a policy to be utilized for the purpose of the issuance of development orders and development permits. A second policy may be included which adopts a higher level of service standard by a date certain to be utilized for the purpose of the issuance of development orders and permits. The specific date for this second policy to become effective must be included in the plan. The plan must set forth the specific actions and programs for attaining the higher level of service by the specified date. If the identified actions and programs are not attained by the specified date, the local government comprehensive plan must be amended to specify the level of service standard that will be utilized and be binding for the purpose of the issuance of development orders and permits.

(3) **MINIMUM REQUIREMENTS FOR CONCURRENCY.** Every jurisdiction shall maintain a concurrency management system to ensure that public facilities and services to support development are available concurrent with the impact of development, consistent with the provisions of this Chapter.

(c) For transportation facilities (roads and mass transit designated in the adopted local government comprehensive plan), at a minimum, a local government shall meet the following standards to satisfy the concurrency requirement, except as otherwise provided in subsections (4)-(7) of this section.

1. At the time a development order or permit is issued, the necessary facilities and services are in place or under construction; or
2. A development order or permit is issued subject to the conditions that the necessary facilities and services needed to serve the new development are scheduled to be in place or under actual construction not more than three years after issuance of a certificate of occupancy or its functional equivalent as provided in the adopted local government five-year schedule of capital improvements. The schedule of capital improvements may recognize and include transportation projects included in the first three years of the applicable, adopted Florida Department of Transportation five year work program. The Capital Improvements Element must include the following policies:
 - a. The estimated date of commencement of actual construction and the estimated date of project completion.
 - b. A provision that a plan amendment is required to eliminate, defer, or delay construction of any road or mass transit facility or service which is needed to

- maintain the adopted level of service standard and which is listed in the five-year schedule of capital improvements; or
3. At the time a development order or permit is issued, the necessary facilities and services are the subject of a binding executed agreement which requires the necessary facilities and services to serve the new development to be in place or under actual construction no more than three years after the issuance of a certificate of occupancy or its functional equivalent; or
 4. At the time a development order or permit is issued, the necessary facilities and services are guaranteed in an enforceable development agreement, pursuant to Section 163.3220, F.S., or an agreement or development order issued pursuant to Chapter 380, F.S., to be in place or under actual construction not more than three years after issuance of a certificate of occupancy or its functional equivalent. [Section 163.3180(2)(c), F.S.]
 5. For the purpose of issuing a development order or permit, a proposed urban redevelopment project located within a defined and mapped Existing Urban Service Area as established in the local government comprehensive plan pursuant to Section
 6. 163.3164(29), F.S., shall not be subject to the concurrency requirements of subparagraphs 9J-5.0055(3)(c)1.-4., F.A.C., of this chapter for up to 110 percent of the transportation impact generated by the previously existing development. For the purposes of this provision, a previously existing development is the actual previous built use which was occupied and active within a time period established in the local government comprehensive plan. [Section 163.3180(8), F.S.]
 7. For the purpose of issuing a development order or permit, a proposed development may be deemed to have a de minimis impact and may not be subject to the concurrency requirements of subparagraphs 9J-5.0055(3)(c)1.-4., F.A.C., only if all of the conditions specified in subsection 163.3180(6), F.S., are met. [Section 163.3180(6), F.S.]
 8. A development order or permit within a designated multimodal transportation district may be issued provided the planned community design capital improvements are included in a financially feasible long range schedule of improvements for the development or redevelopment time-frame for the district, without regard to the period of time between development or redevelopment and the scheduled construction of the capital improvements as specified in Section 163.3180(15)(c), F.S.

(4) **LONG TERM TRANSPORTATION CONCURRENCY MANAGEMENT SYSTEMS.** To correct existing deficiencies in transportation facilities and to set priorities for reducing the backlog on transportation facilities, local governments are authorized to adopt, as a part of the comprehensive plan, a long-term transportation concurrency management system with a planning period of up to 10 years that meets the following requirements:

(a) To implement a long-term transportation concurrency management system, a local government must designate in the comprehensive plan specific areas where significant backlogs presently exist. These areas must be delineated on an adopted comprehensive plan map and must be consistent with other elements of the comprehensive plan including the future land use map.

(b) The long term concurrency management system must be a financially feasible system to ensure that existing deficiencies are corrected within the 10 year period and establish priorities for addressing backlogged facilities. This may be accomplished by adopting a long-term schedule of capital improvements for transportation facilities for up to 10 years for the special concurrency districts or areas. The long-term schedule of capital improvements must include the transportation facilities required to correct existing deficiencies as well as to accommodate new development, and shall provide a realistic, financially feasible funding system – 336 based on currently available revenue sources which must be adequate to fund the scheduled improvements. The schedule must also include the estimated date of commencement of actual construction and the estimated date of

project completion. This schedule may be relied on as a basis for issuing development permits which meet concurrency requirements in lieu of the provision of subparagraphs 9J-5.0055(3)(c)1.-4., F.A.C., of this chapter.

(c) A policy in the local comprehensive plan that a plan amendment shall be required to eliminate, defer, or delay construction of any road or public transit facility or service which is needed to maintain the adopted level of service standard and which is listed in the long-term schedule of capital improvements, if established.

(d) As part of a long-term transportation concurrency management system, a local government may adopt policies in its comprehensive plan to establish interim level of service standards on certain facilities in long-term concurrency areas for the purpose of the issuance of development orders and permits in these districts. The local government may establish a schedule for achieving specified improvements in the interim level of service standards for intervals of time in the future. The plan should set forth specific actions and programs including a monitoring program for achieving the scheduled improvements in the interim levels of service. This monitoring program should require that in the event that the identified actions and programs are not attained as scheduled, the local government comprehensive plan should be amended to specify the default level of service standards that will be utilized and be binding for the purpose of the issuance of development orders and permits.

(e) Local governments with a severe backlog of transportation facilities may request the Department's approval for a planning period of up to 15 years for establishing a long-term transportation concurrency management system which meets the requirements of subsection 9J-5.0055(4), F.A.C., of this chapter. A local government seeking such an approval must demonstrate that its transportation backlog for existing development cannot be adequately addressed with a 10-year plan. In considering such a request, the department's analysis shall include a comparison of the circumstances of the requesting local government with the general situation facing similarly situated jurisdictions, using the following criteria:

1. The extent of the backlog.
2. Whether the backlog is on local or state roads.
3. The cost of eliminating the backlog.
4. The local government's tax and other revenue raising efforts.

(5) **TRANSPORTATION CONCURRENCY MANAGEMENT AREAS.** The purpose of this optional alternative transportation concurrency approach is to promote infill development or redevelopment within selected portions of urban areas in a manner that supports the provision of more efficient mobility alternatives, including public transit. As a coordinated approach to land use and transportation development, it may employ the use of an areawide level of service standard and an accommodation and management of traffic congestion. A transportation concurrency management area is a compact geographic area with existing or proposed multiple, viable alternative travel paths or modes for common trips.

(a) An areawide level of service standard may be established for specified facilities, and must be maintained, as a basis for the issuance of development orders and permits within one or more designated transportation concurrency management areas. Areawide level of service standards may only be established for facilities with similar functions serving common origins and destinations. Designation of each transportation concurrency management area and establishment of areawide level of service standards within such areas must be supported by data and analysis in the local government comprehensive plan support document which:

1. Demonstrate that the transportation concurrency management areas, as designated, are compatible with and further the various portions and elements of the local comprehensive plan.
2. Provide a justification of the size and boundaries of each transportation concurrency management area for consistency with the purpose of this subsection.
3. Demonstrate that transportation concurrency management areas as designated contain an integrated and connected network of roads and provide multiple, viable alternative travel paths or modes for common trips.
4. Demonstrate the basis for establishing the areawide level of service standards and determine existing and projected transportation service and facility requirements that will support the established areawide level of service standard.
5. Demonstrate that the established areawide level of service and other transportation services and programs will support infill development or redevelopment.
6. Demonstrate that the planned roadway improvements and other services and programs such as, transportation system management (TSM) and/or transportation demand management (TDM) strategies and incentives to use public transit (such as parking policies and provision of intermodal transfers), will accomplish mobility within and through each concurrency management area.

(b) Transportation concurrency management areas established pursuant to this subsection shall be delineated on the future conditions maps, including the future traffic circulation map or transportation map, as applicable, of a local government comprehensive plan consistent with this subsection. The areawide level of service standards and associated maximum service volumes must be established as policies in the comprehensive plan. Transportation concurrency management areas may transcend jurisdictional boundaries when appropriate and must be designated in each applicable comprehensive plan consistent with the provisions of this subsection. A local government should coordinate with the Department of Transportation, and if applicable, the metropolitan planning organization when designating transportation concurrency management area boundaries.

(c) The local comprehensive plan shall contain objectives and policies which specify actions and programs to promote infill development and redevelopment. A local government shall adopt and maintain an integrated and internally consistent transportation, land use, and capital improvement planning program for each concurrency management area to maintain the established areawide level of service standard.

(6) **TRANSPORTATION CONCURRENCY EXCEPTION AREAS.** The purpose of this flexible transportation concurrency option approach is to reduce the adverse impact transportation concurrency may have on urban infill development and redevelopment and the achievement of other goals and policies of the state comprehensive plan, such as promoting the development of public transportation. Under limited circumstances, it allows exceptions to the transportation concurrency requirement in specifically defined urban areas of a jurisdiction. The exceptions provide flexibility for concurrency management in order to encourage the application of a wide range of planning strategies that correspond with local circumstances of a specific geographic area. The exceptions apply to all land uses and development and types of facilities within expressly excepted areas. Local governments must specifically consider the impacts of the exception areas on the Florida Intrastate Highway System.

(a) In order to exercise the option of establishing a transportation concurrency exception area, a local government must designate in its comprehensive plan a specific geographic area, or areas, of transportation concurrency exception, consistent with the purpose of this subsection. A proposed development located in a designated exception area shall not be subject to the requirements of

subparagraphs 9J-5.0055(3)(c)1.-4., F.A.C., of this chapter. The designation of a transportation concurrency exception area may include:

1. A specific geographic area, or areas, delineated in the local government comprehensive plan for urban infill development pursuant to Section 163.3164(27), F.S. The local comprehensive plan shall contain objectives and policies which specify actions and programs to promote urban infill development. An area delineated for urban infill development shall meet the following requirements.
 - a. The area contains not more than 10 percent developable vacant land. The developable vacant land shall not include water bodies and land designated for conservation use, natural reservations, public road rights of way, public recreation sites, or related activities or uses designated in the local government's comprehensive plan as unavailable for development.
 - b. For areas where residential use is the predominant type of use comprising greater than 60 percent of the developed land, the average residential density shall be at least five dwelling units per gross residentially developed acre of land use. For areas where nonresidential use is the predominate type of use comprising greater than 60 percent of the developed land, the average nonresidential density shall be at least a floor area ratio of 1.0 per gross nonresidentially developed acre of land use. If neither residential nor nonresidential uses comprise greater than 60 percent of the developed land, then both the existing residential use and nonresidential use shall meet the appropriate density and intensity criteria prescribed above. The term "gross developed acre" shall include all uses associated with the predominant land use including parking, drainage, open space, landscaping and other support facilities.
2. A specific geographic area, or areas, delineated in the local government comprehensive plan for urban redevelopment pursuant to Section 163.3164(26), F.S. The plan must show that the urban redevelopment area is within an urban infill area which meets the criteria of subparagraphs 9J-5.0055(6)(a)1.a. and b., F.A.C., which is established as a specific geographic area in the plan, or within an existing urban service area pursuant to Section 163.3164(29), F.S., established in the plan as a specific geographic area which does not contain more than 40 percent developable vacant land. The local comprehensive plan shall contain objectives and policies which specify actions and programs to promote urban redevelopment. A designated urban redevelopment area may include a Community Redevelopment Area established pursuant to the Community Redevelopment Act of 1969 when these areas exist within an urban infill area or an Existing Urban Service Area as designated in the local comprehensive plan.
3. A specific geographic area delineated in the local government comprehensive plan for downtown revitalization within the designated central business district pursuant to Section 163.3164(25), F.S. The comprehensive plan shall contain objectives and policies which specify actions and programs to promote downtown revitalization.

(b) To implement the transportation concurrency exception areas, the following requirements must be met:

1. The transportation concurrency exception areas, as designated, must be compatible with and further the various portions and elements of the local comprehensive plan.
2. The size and boundaries of each transportation concurrency exception area must be supported by data and analysis in the local government's plan support document which demonstrate consistency with the requirements of this subsection. A local government should coordinate with the Department of Transportation and the local metropolitan planning organization when designating transportation concurrency exception area boundaries.
3. Transportation concurrency exception areas may transcend jurisdictional boundaries when appropriate and must be designated in each applicable comprehensive plan consistent with the provisions of this subsection.

(c) To implement the transportation concurrency exceptions, a local government should adopt as an amendment to its comprehensive plan, guidelines and/or policies which specify programs to address transportation needs of such areas. The guidelines may incorporate a wide range of strategies including, timing and staging plans, parking control and pricing policies, transportation demand management programs, transportation system management programs availability of public transportation, and utilization of creative financing tools for the provision of transportation services and facilities.

(d) The guidelines and/or policies and programs implementing a transportation concurrency exception area as required in the above paragraph (c), if applicable, must demonstrate by supporting data and analysis, including short and long range traffic analysis, that consideration has been given to the impact of proposed development within the concurrency exception area on the Florida Intrastate Highway System.

(7) **CONCURRENCY EXCEPTION – FOR PROJECTS THAT PROMOTE PUBLIC TRANSPORTATION.** The purpose of this flexible transportation concurrency option is to reduce the adverse impact transportation concurrency may have on the promotion of public transportation including goals and policies of the state comprehensive plan. Local governments may exempt projects that promote public transportation as defined in Section 163.3164(28), F.S., by establishing in the local comprehensive plan, guidelines and/or policies for the granting of such exceptions. Those guidelines must demonstrate by supporting data and analysis, that consideration has been given to the impact of the projects on the Florida Interstate Highway System. The guidelines must establish how a project will qualify as a project that promotes public transportation.

(8) **CONCURRENCY EXCEPTION — FOR PUBLIC TRANSIT FACILITIES.** Public transit facilities, as described in Section 163.3180(4)(b), F.S., shall not be subject to the concurrency requirement.

(9) **PRIVATE CONTRIBUTIONS TO LOCAL GOVERNMENT CAPITAL IMPROVEMENT PLANNING.** In order to exercise the option of issuing a development order or permit pursuant to Section 163.3180(11), F.S., a local government must identify in the comprehensive plan a process for assessing, receiving, and applying a fair share of the cost of providing the transportation facilities necessary to serve the proposed development. A local government comprehensive plan may authorize multi-use developments of regional impact to satisfy the transportation concurrency requirement by payment of a proportionate share contribution consistent with Section 163.3180(12), F.S. The transportation facilities must be included in a financially feasible five-year Capital Improvement Schedule adopted pursuant to Rule 9J-5.016, F.A.C., of this chapter. The assessment shall have a reasonable relationship to the transportation impact that is generated by the proposed development.
Specific Authority 163.3177(9), (10), (11)(e) F.S. Law Implemented 163.3177(3), (6), (8), (9), (10), (11), 163.3180 F.S. History—New 11-22-89, Amended 3-23-94, 3-21-99, 2-25-01.

2005 Growth Management Legislation Summary

Florida’s concurrency law and rules have been amended and refined over the years in an effort to address a variety of issues. The most recent amendments were part of SB 360 - a growth management bill enacted by the legislature in 2005. Among the key features of the 2005 growth management legislation were changes to the concurrency management process. A more “hard-edge” concurrency was encouraged through well-defined financial feasibility requirements for capital improvements schedules (CIS) and tightened timelines for concurrency. In addition, the legislation directed local

governments to enact concurrency management ordinances by December 1, 2006 that allow for “proportionate share” contributions from developers toward meeting transportation concurrency requirements.

The 2005 growth management legislation now requires that a local government’s five-year capital improvements schedule be financially, rather than economically, feasible. Section 163.3164(32), F.S. establishes this definition:

“‘Financial feasibility’ means that sufficient revenues are currently available or will be available from committed funding sources for the first 3 years, or will be available from committed or planned funding sources for years 4 and 5, of a 5-year capital improvement schedule for financing capital improvements, such as ad valorem taxes, bonds, state and federal funds, tax revenues, impact fees, and developer contributions, which are adequate to fund the projected costs of the capital improvements identified in the comprehensive plan necessary to ensure that adopted level-of-service standards are achieved and maintained within the period covered by the 5-year schedule of capital improvements. The requirement that level-of-service standards be achieved and maintained shall not apply if the proportionate-share process set forth in s. 163.3180(12) and (16) is used.”

The definition of financial feasibility makes it clear that if a local government includes capital improvements for transportation to support development in its long-range plan, it must demonstrate the ability to pay for those improvements. Funds for transportation improvements must be committed for the first three years of the capital improvements schedule and committed or planned for the fourth and fifth years. The new legislation also contains a requirement that any long-term concurrency management system (up to 10 or 15 years) be accompanied by a financially feasible capital improvement schedule. This provision makes it clear that although it may be acceptable to address transportation backlogs over an extended period of time, the local government must demonstrate a solid financial plan to make those improvements.

In an effort to tighten concurrency timeframes, the new legislation requires that “transportation facilities needed to serve new development shall be in place or under actual construction within three years after the local government approves a building permit or its functional equivalent that results in traffic generation” (§163.3180(1)(c), F.S.). This timeframe for concurrency is in contrast to the previous legislative requirement that facilities be in place within three years of the issuance of a certificate of occupancy.

Provisions were also included that aim to improve coordination between metropolitan planning organizations (MPOs) and local governments in transportation planning and programming. Local governments are required to include a schedule of capital improvements in the capital improvements element of their comprehensive plan that includes any projects in the MPO TIP (and any privately funded facilities that have been guaranteed in an enforceable agreement) that are relied upon to ensure concurrency and financial feasibility in the 5 year schedule period. In turn, MPO transportation improvement programs (TIP) must be consistent with local government comprehensive plans and specifically include any projects designated for the Transportation Regional Incentive Program (TRIP) that rely on funds through the MPO. These requirements are likely to result in a TIP and FDOT Five-year Work Program that more closely reflects concurrency needs than has historically been the case. In other words, the result may be increased consideration of local government concurrency management priorities in MPO short- and long-range transportation planning.

Another aspect of concurrency “tightening” was a requirement for accounting of de minimis trips—those trips considered to be so minor that they are exempted from concurrency. Previous legislation (s. 163.3180(6), F.S.) already established that “a de minimis impact is an impact that would not affect more than 1 percent of the maximum volume at the adopted level of service of the affected transportation facility as determined by the local government.” Further, the law allowed de minimis trips (not more than 1 percent of the maximum volume) on failing roads provided that the existing and projected traffic volumes on those roads did not exceed 110 percent of the maximum adopted level-of-service (LOS) volume. Unfortunately, many local governments have not kept accurate counts of approved de minimis impacts and where traffic counts are not performed on an annual basis, it has not been possible to determine if the 110 percent provision was exceeded. Chapter 163.3180(6) now requires “...Each local government shall maintain sufficient records to ensure that the 110-percent criterion is not exceeded. Each local government shall submit annually, with its updated capital improvements element, a summary of the de minimis records...”

Concurrency is also tightened through additional requirements for transportation concurrency exception areas (TCEAs), transportation concurrency management areas (TCMAs), and multimodal transportation districts (MMTDs). Local governments are increasingly establishing TCEAs to reduce barriers to infill and redevelopment by allowing development to proceed notwithstanding a failure to meet concurrency. It has been suggested that some local governments use TCEAs, and to a lesser extent MMTDs or TCMAs, to circumvent transportation concurrency. Many communities argue, however, that these options provide a way to encourage alternative transportation modes and counter the need to continually add road capacity, which may destroy the neighborhoods or activity centers served by those roads. To avoid potential abuse of concurrency alternatives, the 2005 growth management legislation now requires that local government comprehensive plans include alternative strategies to support and fund mobility strategies that promote the purpose of the exception and address urban design, land use mix, and network connectivity (s. 163.3180(5)(e), F.S. In response to past concerns about the lack of state action to address growing backlogs, funds were appropriated to address the backlogged transportation facilities. The legislation also appropriated funds to transportation projects for relieving backlogs.

The legislation introduced the Transportation Regional Incentive Program (TRIP) that provides matching funds for regionally significant facilities (s. 339.2819) that are included in regional transportation plans developed within the context of regional transportation areas established by interlocal agreement (s. 339.155(5)) and that are subsequently included in participating local government comprehensive plans. Funds are allocated based on population and motor fuel tax collections. In order to be eligible for TRIP funds, projects must support transportation facilities that serve national, statewide, or regional functions, be included in the capital improvements element, be consistent with the SIS, and have a commitment for local, regional, or private matching funds. Priority will be given to projects that, among other things, provide connectivity to the SIS, support economic development, and are subject to corridor management regulations. The MPOs in Florida have been working to address regional transportation issues through both formal and informal transportation alliances. FDOT has identified one or more regional partners in each of its districts, and TRIP funds have been allocated where eligible projects have been identified. Some local governments may find it difficult to meet the requirement that eligible roads must be in a regional transportation plan and/or meet the 50 percent match requirement of the program. While this program will increase the number of improvements made to regionally significant roads, current funding levels will not have an appreciable impact on transportation funding shortfalls, particularly in small cities and counties due to the established funding allocation methods.

The new legislation also created a mandatory pay and go process called proportionate fair-share mitigation (s. 163.3180(16), F.S.). The law allows developers to “choose to satisfy all transportation

concurrency requirements” under certain circumstances, through fair share contributions of land, money or facilities. It further specifies that applicants for development may not be required to contribute more than their proportionate fair share “regardless of the method of mitigation”. Developers are also eligible for impact fee credits for their contribution “to the extent that all or a portion of the proportionate fair-share mitigation is used to address the same capital infrastructure improvements contemplated by the local impact fee ordinance.”

The FDOT was given a role in concurrency mitigation, as well, particularly as it relates to the Strategic Intermodal System (SIS). Developer proportionate share contributions toward the SIS must meet the approval of FDOT, and not just local governments. Also, before designating a transportation concurrency exception area, the local government must now consult with FDOT as to impacts on the SIS and adopt plans to mitigate those impacts including, if appropriate, the creation of a long term concurrency management system. Similar provisions requiring consultation with FDOT on the SIS were also added to requirements for transportation concurrency management areas and multimodal transportation districts.

Jurisdictions were also encouraged to coordinate with their neighbors on level of service standards and methodologies for concurrency on transportation facilities that traverse multiple jurisdictions. Specifically, the new law requires local governments to “consider compatibility with the roadway facility’s adopted level of service standards in adjacent jurisdictions” and to use a “professionally accepted methodology for measuring impacts on transportation facilities” for concurrency determinations. In addition, counties are encouraged to coordinate with adjacent counties, and local government within a county are encouraged to coordinate, for the purpose of using common methodologies for measuring transportation impacts for concurrency administration.

APPENDIX B: ORANGE COUNTY CONCURRENCY AND IMPACT FEE SURVEY

In 2005, Orange County conducted a survey of transportation concurrency and impact fee practices of county governments in Florida. The survey was designed to assist county staff and the Concurrency Advisory Group in reviewing Orange County's concurrency management system. As part of this study of local best practices, CUTR obtained the surveys and prepared this general summary of responses. Although there were some problems with the survey, such as some overlap across response items, and some inconsistent or incomplete responses, the results do provide insight into county transportation concurrency practices.

Concurrency Management Systems

Of the 67 counties in Florida, 39 responded to the survey, yielding a response rate of 58%. Table B1 provides a breakdown of the population served by the respondents. All but two of the survey respondents said they had adopted some type of concurrency management system (CMS), either by ordinance, land development code, inclusion in the comprehensive plan, or some combination. Most of the concurrency management systems were adopted between 1989 and 1992. Only 17 of the respondents said that they impose transportation concurrency on a countywide basis.

TABLE B1 Population Served by Counties Surveyed

Population	Number of Counties
Less than 25,000	6
25,000 to 50,000	5
50,000 to 100,000	3
100,000 to 150,000	4
150,000 to 250,000	5
250,000 to 500,000	8
500,000 to 1,000,000	6
Greater than 1,000,000	2

TABLE B2 Intent of the County's Concurrency Management System

Rating	1	2	3	4	5
1-Most Important 5-Least Important					
<i>Intent</i>	<i>Number of Respondents</i>				
Control Growth	9	6	7	2	4
Provide Safe and Efficient Transportation System	15	5	6	4	2
Focus Fiscal Expenditures	3	10	12	4	3
Implement Policies in the Comprehensive Plan	10	11	9	1	0
Meet Minimum Compliance with State Law	15	6	3	4	3
Stimulate Development in Designated Areas	1	5	3	7	12
Provide for Infill	1	6	4	4	11
Discourage Sprawl	3	5	6	5	8

Most respondents said that the intent of their CMS was best expressed by the statements “meet minimum compliance with state law” and to “provide a safe and efficient transportation system,” followed by “implementing policies in the comprehensive plan” and to “focus fiscal expenditures.” The statements identified as least important in explaining intent of the concurrency management systems were to “stimulate development in designated areas” and “provide for infill.”

Respondents reviewed an average of 400 concurrency applications per year, with the most applications reviewed by a county being 3,800 and the least reviewed being 0. Overall, it appears that most respondents reviewed between 100 and 200 applications annually. Counties were asked at what stage of development they implement transportation concurrency, with most saying they did so during subdivision approval, platting, and building permitting, respectively.

When asked how concurrency requirements had affected specific development proposals within their jurisdiction, half of the responding counties felt concurrency requirements had delayed projects. However, several respondents felt that concurrency requirements had little effect on development proposals. Other less noted effects included changed proposals and project denials. Only three counties reported development “moratoria” on specific roads due to failure to meet transportation concurrency. Eight of the 39 respondents said they had adopted a level-of-service standard of less than LOS “E.”

Several counties said they had implemented statutory exceptions to concurrency, which are summarized in Table B3. In addition, several counties provided for other exemptions in their concurrency regulations, including exemptions for public/civic use, transportation demand management, affordable housing, and transit-oriented development. The types of exemptions provided by various counties are reflected in the modes of transportation covered by each concurrency management system. An overwhelming majority of concurrency management systems addressed automobiles; whereas, 1 in 5 included transit-oriented development and only 1 in 10 included bicycles and/or pedestrians.

Counties used an assortment of performance standards to measure traffic conditions for concurrency. The most common performance measures included peak hour volumes, roadway level of service, and volume-to-capacity ratios. The least commonly used performance measures were traffic sheds and sub areas.

TABLE B3 Statutory Exemptions to Concurrency

Exemption	Number of Counties with Exemption
Low Impact (De Minimis)	22
Pay-as-you-Go/Proportionate Share	8
Urban Infill & Redevelopment	7
Transportation Concurrency Exception Area	6
Transportation Concurrency Management Area	3
Long-Term Transportation Concurrency Management System (10-year)	3

Counties varied considerably in they defined the traffic impact area for concurrency. Several of the

TABLE B4 Performance Measures for Traffic Concurrency

Performance Measure	Number of Counties
Peak Hour Volumes	32
Roadway LOS	28
Volume/Capacity Ratios	17
Intersection LOS	14
Average Daily Traffic	14
Travel Time	8
Urban Service Area	4
Corridors	4
Traffic Sheds	1
Sub Areas	1

counties adjusted the definition of traffic impact area according to the size and scope of the project. Factors used for adjusting the traffic impact area included the number of trips and land use type (i.e., residential versus non-residential). Another common way to define traffic impact area was by distance, with most defining impact area as between 2-4 miles from the development project. Fewer than 10% of the respondents defined the traffic impact area as being at or below one mile.

Most respondents said they allowed one or more mitigation strategy when a development failed concurrency. The more commonly used mitigation strategies included capacity enhancements (82%),

intersection improvements (76%), and traffic signal improvements (64%). Less commonly used strategies were access improvements (46%) and alternate modes (24%). Three out of four respondents required mitigation to be documented through development agreements, and more than half required mitigation as a condition of development approval.

Intergovernmental Coordination

Overall, respondents did not report significant intergovernmental coordination between their county and other local governments. The most prevalent form of coordination was the sharing of information on transportation impacts of approved developments. Less than half of respondents coordinated on level of service, modeling methods and standards, or said that they account for development outside of their jurisdiction. In addition, less than one in four provided joint facilities or funding.

Despite the low level of reported coordination, half of the respondents said they used at least one mechanism to address the impacts from development along regional or common boundaries. However, the actual mechanism used varied greatly. The most commonly used mechanism, joint project review, was used by less than half of respondents. Other mechanisms noted included joint planning agreements, shared funding, and cumulative impacts.

Backlogged or Constrained Roads

The extent that counties reported experiencing backlogged or constrained roads varied by county and road type. About half of the respondents said that only 5% or fewer roads in their county were constrained or backlogged. About two-thirds said that 10% or fewer roads in their county were constrained or backlogged. However, an overwhelming majority experiencing backlogged or constrained roads reported that 50% or more of these roads were state highways. In addition, any county reporting constrained or backlogged roads on 20% or more of the facilities within their county stated that all of their constrained or backlogged roads were state highways.

Counties said that they used an array of methods to deal with proposed developments on backlogged and constrained roads, such as:

- Collecting proportionate fair share payments and using these contributions to improve adjacent/parallel facilities, to fund studies, conduct intersection improvements, or do signal re-timing or other possible benefits to the system.
- Establishing a max volume-to-capacity ratio (e.g. 1.85) for constrained roads in the unincorporated area and requiring capacity enhancements and operational improvements that will maintain the v/c ratio on the constrained segment.
- Allow development on backlogged roads to exceed the 1989 AADT by 10%, 15% or 20% per our Comp Plan.
- Unless developers can identify mitigation strategies to add additional capacity, development approvals (other than de minimis impacts) are denied once 100% of a road segment's maximum service volume is attained. For constrained segments, only de minimis developments are approved once 110% of the maximum service volume is attained.
- Allowing only for redevelopment.
- Requiring applicants to explore opportunities for improving LOS on the segment, such as signalization, widening, turn lanes, transit, etc.
- Discouraging rezoning or comp plan amendments that would allow for higher intensity uses.

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APPENDIX C: LOCAL CONCURRENCY PRACTICES

Bay County Concurrency Management System (CMS) Summary

Primary Contact

Jason Paananen
 Bay County Planning and Zoning,
 707 Jenks Avenue, Suite B, Panama City, Florida
 Tel: (850) 784-4024
jpaananen@co.bay.fl.us

Background

Bay County, Florida “is located on the Gulf of Mexico in the Panhandle region of Northwest Florida.” The county has a population of nearly 158,000 and encompasses 861 square miles. Chapter 20 Concurrency, of the Bay County Land Development Regulations (LDRs) establishes “the requirements and procedures necessary to implement the concurrency provisions of the Bay County Comprehensive Plan and the Florida Administrative Code.” The transportation concurrency requirements in the LDRs address roads and public transit.

- **Initially adopted:** 2004
- **If and when it has been updated:** No policy updates, but the computerized management system has been undergoing fine-tuning since the system’s inception.
- **How the “state of transportation concurrency” is conveyed to elected officials:** Information is shared with Board of County Commission (BCC) members as it comes up on a project basis. The county will be presenting this report to the BCC and Planning Board at the end of each year as part of the annual update of any supporting data and analysis of the Comprehensive Plan.

System Components

- **Ordinances, manuals, guidelines, comprehensive plan policies:** Bay County LDRs Chapter 20 Concurrency describes “the requirements and procedures necessary to implement” overall concurrency in the county. The transportation element of the comprehensive plan establishes level-of-service standards for roads in the county; this Element is being updated as part of the Evaluation and Appraisal Report (EAR).
- **Tracking system:** The Planning and Zoning Department maintains an Excel spreadsheet with a series of worksheets to monitor development approvals and level of service on state and county roads. A separate “tab” or worksheet is used to track state road segments, county road segments, development orders, intersection level of service, future growth on state roads (through 2030), and future growth on county roads (through 2030). Worksheet entries are appropriately linked to other worksheet locations to automatically transfer data and make necessary calculations. The spreadsheet is manually updated as applications for development orders are reviewed and approved.
- **Geographic Service Area of CMS:** State and county road links are tracked both inside and outside municipal boundaries.

If a county CMS, does it track concurrency for some or all municipalities? No, however, an agreement with Panama City Beach is underway. Although the county does not track concurrency for all municipalities, some municipalities do contact the county if they are impacting a county road. The FDOT permitting office does initiate meetings with the county regarding projects in other municipalities impacting state roads that may also impact county roads.

Is there a TCEA, TCMA, or MMTD within the CMS? Per the comprehensive plan, there are two TCMA's, the Sand Hills Rural Developed Area and the Hathaway Corridor (subject to a long-term CMS). A new bridge has been built and Phase 1 of the Eastbound Flyover is scheduled to be completed by Spring 2006 on the Hathaway Corridor, thereby addressing concurrency issues and restoring an acceptable level of service to the road. Likewise, SR 77, in the Sand Hills Rural Developed Area, an upgrade of the road to 4-lanes will be complete by Spring 2006. The status of these areas will be updated in the EAR of the Comprehensive Plan.

- **Fees:** At this time, the county has no separate application fee for concurrency review. Fees are included in the Development Order application fee of \$600 for most developments; \$665 for subdivisions. Fees will be updated in 2006 and will include a fee for proportionate fair-share mitigation review estimated to be \$575.

Administrative Process

“The Bay County Planning and Zoning Division reviews all developments within unincorporated Bay County (excluding single family homes) for consistency with the” LDRs. Concurrency applications are submitted and processed along with development order applications. All applications must be found “complete” before a concurrency determination is made.

The Planning and Zoning Division prepares the analysis and determines development impacts on roadway segments and intersections for the small to mid-size developments; however, applicants must prepare a transportation study as outlined in the LDRs for developments that:

- impact road segments currently at or within ten percent of the maximum service volume;
 - generate 100 or more peak-hour trips; or,
 - meet any of the thresholds listed as 100 peak-hour trips in Table 1 of the FDOT’s Site Impact Handbook.
- **When concurrency is determined:** Section 2002 of the LDRs states, “A certificate of Concurrency shall be required in conjunction with the issuance of any Development Order. Pursuant to Policy 11.6.3 of the Comprehensive Plan, no development order or permit shall be issued in a manner that will result in a reduction below the adopted levels of service found in the Bay County Comprehensive Plan.” A Final Development Order contains a section entitled, “Certification of Concurrency,” thus certifying the concurrency requirements have been met at the same time.
 - **Different levels of concurrency:** Although the LDRs provide for an Initial Determination of Concurrency resulting in a Conditional Certificate of Concurrency, the staff does not generally employ this mechanism. Applicants are given information informally.
 - **Duration of certificate:** A Certificate of Concurrency is valid until its accompanying Development Order expires. If the Development Order has no expiration date, the Certificate

is valid for six months of the DO issuance date. The Certificate is automatically extended with any DO extensions; however, a new concurrency review is required if a DO is extended more than one year.

- **Conditions for meeting concurrency:** Transportation concurrency will be met if the necessary facilities for the new development are in place, under construction or planned to be constructed per the financially-feasible schedule of capital improvements that includes the first three years of the FDOT adopted five-year work program. The five-year schedule of capital improvements must include both necessary facilities to maintain the adopted level of service standards to serve the new development proposed to be permitted and the necessary facilities required to eliminate those portions of existing deficiencies which are Bay County Priorities.
- **How are de minimis impacts tracked?** The Building Division reviews and approves all single-family homes; however, these trips are tracked in the spreadsheet. All new subdivisions are reviewed by the Planning Department and the trips associated with those approved subdivisions are added to the CMS. In the future, however, the Planning Department and the Building Department will use their new TrackIT software to prepare reports of all single family homes that are issued building permits. These reports will be reviewed in order to add any trips to the CMS that are generated by single family homes platted prior to the implementation of the CMS.
- **Timeframe:** The county must determine the “completeness” of an application within 20 days of receipt. A complete application must be approved or denied, including a concurrency determination, by the Planning Official within 30 days.
- **Describe the coordination between various city/county departments**
The Planning and Zoning Division reviews all developments except single-family homes. Transportation concurrency is reviewed concurrent with development review within the same department.
- **Intergovernmental Coordination for Transportation Impacts**
Little coordination occurs between the county and its municipalities in terms of development review and transportation impacts. The county actually “catches” new development within municipal boundaries when applicants seek access permits to county or state roads.
 - Coordinate LOS standards on facilities crossing jurisdictional boundaries? No.
 - Administrative process for coordination: N/a.
 - Traffic methodology for determining impacts: N/a.

Methodology

- **How are LOS standards established?** Level of Service Standards for roadways are adopted based on the most recent edition of Florida Department of Transportation Level of Service Standards and Guidelines Manual for Planning. “The County shall adopt the LOS standards established by the DOT for facilities on the Florida Intrastate Highway System as defined in § 338.011, F.S.”

In addition, the county established additional LOS standards for two TCMA as following:

<u>TCMA</u>	<u>LOS</u>
Sand Hills Rural Developed Area	C
Hathaway Corridor Long-Term Concurrency Management System	Backlogged

- **How is capacity measured?** Capacity of roadway segments is determined based on adopted level of service and geometric characteristic of the segment. The intersection capacity is determined based on the most recent edition of the Highway Capacity Manual, Special Report 209.
- **Methodology for collecting and updating critical traffic data**

Traffic counts – Updated annually using FDOT traffic counts for state roads, as well as, county roads where available. The county annually performs traffic counts on all other county roads tracked in the CMS. In addition, counts are updated using traffic counts provided in applicant-provided traffic studies.

Planned improvements – Planned improvements are considered as additional capacity if projects are scheduled for construction within the first three years of the financially-feasible schedule of capital improvements, which includes the first three years of the FDOT adopted five-year work program.

Monitoring of development trips – At the time a Development Order is issued, trips are manually entered into the CMS. As developments receive a Certificate of Occupancy and traffic counts are updated, development trips are removed from the CMS. Although DRI traffic is initially reviewed during the DRI application to determine if any deficiencies would occur as a result of the overall project, the trips are added to the system by phase at the time a Development Order is requested.

Section 2007, Allocation of Capacity, of the LDRs provides:

SECTION 2007. Allocation of Capacity. Capacity shall be allocated upon issuance of a development order. The allocation of capacity shall be subject to the following sunset provisions:

1. Capacity approved and assigned to a development order will remain allocated until the development order expires, or until the development receives a Certificate of Occupancy, whichever occurs first. In the instance the development order expires, capacity shall be lost at the expiration of the development order, and a new Certificate of Concurrency must be attained once the development order has expired.
2. Capacity for a Planned Unit Development or a Development of Regional Impact shall remain allocated until such time as established by an enforceable development agreement.

Do you add trips from DRIs (or other developments) approved in adjacent jurisdictions to your CMS? DRI trips from other jurisdictions are added to the CMS during the county's review of a DRI application to see if any deficiencies occur on the transportation system. These trips will not be vested however until that municipality issues a development order.

Because some municipalities do not inform the county of all or some of their development orders, a background traffic factor is added to all counts in traffic impact analyses submitted to the county for the development review process.

- **Traffic Impact Study Methodology**

Applicants must prepare a traffic study for developments that:

- Impact road segments currently at or within ten percent of the maximum service volume;
- Generate 100 or more peak-hour trips; or
- Meet any of the thresholds listed as 100 peak-hour trips in Table 1 of the FDOT’s Site Impact Handbook.

For all other developments, the county determines development impacts on roadway segments and intersections. The ITE Trip Generation Handbook is used for trip generation. Trip Distribution is determined based on known trip attractors, distribution patterns from other TIA’s in the area, and exiting traffic patterns from intersection counts (traffic movement counts) near the project’s location. SYNCHRO is used to analyze intersections. When a traffic study is required, the applicant must attend a pre-application conference with county staff where requirements of the study including the following information are established.

Trip Generation

Trip generation can be determined by use of the current edition of Trip Generation by Institute of Traffic Engineers (ITE), previous studies of comparable sites, or standards adopted by the county. All land uses, density and intensity of developments and trip rates must be identified. Internal capture rates can be used if approved by the county. In addition, the county may require accident data.

Trip Distribution

Trip distribution from the development must be performed according to reasonable industry assumptions and methodologies and must be approved by the county during the application methodology meeting.

Traffic Impact Area

The traffic impact area associated with the development will be according to trip generation characteristics and average trip length of land use. The traffic impact area must be approved by the county at the application meeting.

Existing and Future Background Traffic

The applicant must provide the following existing conditions:

- Existing peak hour traffic volumes and level of services standards for all collectors and arterials within the study area.
- Existing turning movement at the impacted intersection(s) and intersection(s) level of service.

Future roadway traffic is calculated by the following procedure: Existing traffic is multiplied by an annual growth factor provided by the county or developed by the applicant and approved by the county. Trips from major projects, which are approved after traffic counts, are added to the calculated existing traffic. Projections from applicable models can be used.

Analysis procedure

ART-PLAN is used to determine if there is additional capacity on a road segment once it has failed according to the Generalized LOS Tables.

- **Is an operational analysis required? At what stage?** This is determined during the pre-application meeting.
- **Do you have any general issues or concerns regarding your local governments CMS? Would you consider your CMS or any part of it a best practice?** The county has been in the process of fine-tuning the concurrency tracking system since its inception in 2004.

Resource Documents and Correspondence

- Bay County Land Development Regulations, Chapter 20 Concurrency, September 2004.
- Bay County Heading 2010: Charting Our Course, Bay County Comprehensive Plan, May 1990.
- Bay County Transportation Concurrency Main Table, March 2006.
- “Bay County Online,” <http://www.co.bay.fl.us/index.html>. March 2006.
- Telephone conversation with Jason Paananen, March 21, 2006.
- Paananen, Jason. <jpaananen@co.bay.fl.us> “Re: Application Fees?” 23 Mar. 2006. Personal e-mail. (23 Mar. 2006).
- Paananen, Jason. <jpaananen@co.bay.fl.us> “Bay Co TPO Re 06-02_Draft#2AddressingTrafficConcurrency.doc.” 28 Mar. 2006. Personal e-mail. (28 Mar. 2006).
- Paananen, Jason. <jpaananen@co.bay.fl.us> “Re: Summary for Review.” 28 Mar. 2006. Personal e-mail. (28 Mar. 2006).

Broward County Concurrency Management System (CMS) Summary

Primary Contact

Elliot Auerhahn
Broward County Permit Center
115 South Andrews Ave., Ft. Lauderdale, FL 33301
(954) 468-3411
eaerhahn@broward.org

Concurrency districts, defined

Broward County uses two types of concurrency districts: transit-oriented concurrency districts, and standard concurrency districts. Within the Broward County Code, these districts are defined both geographically and conceptually:

Standard Concurrency District. An area where roadway improvements are anticipated to be the dominant form of transportation enhancement.

Transit Oriented Concurrency District. A compact geographic area with an existing network of roads where multiple, viable alternative travel paths or modes are available for common trips.

The distinction is important, because each type of concurrency district carries with it a different set of standards for adequacy determination.

When concurrency is determined

In both transit-oriented and standard concurrency districts, developers are required to obtain a Transportation Concurrency Satisfaction Certificate. This certificate must be obtained from the Broward County Development Management Division prior to applying for a building permit, and is contingent on a determination of adequacy. However, requirements for obtaining the certificate are different for each district type, and are discussed below.

Level of Service requirements

The relevant LOS standards for transit-oriented concurrency districts address transit headways and the establishment of neighborhood transit centers and additional bus routes, and are broken down on the individual district level:

Northeast District:	Achieve headways of 30 minutes or less on 90% of routes.
	Establish at least one neighborhood transit center.
	Establish at least one additional community bus route.
North Central District:	Achieve headways of 30 minutes or less on 90% of routes.
	Establish at least one neighborhood transit center.
	Establish at least one additional community bus route.
	Expand coverage area to 53 percent.
Central District:	Achieve headways of 30 minutes or less on 80% of routes.
	Establish at least one neighborhood transit center.
	Establish at least two additional community bus routes.
Port/Airport District:	Establish at least one additional community bus route.
Eastern Core District:	Achieve headways of 30 minutes or less on 90% of routes.
	Achieve headways of 20 minutes or less on 40% of routes.
	Establish at least one neighborhood transit center.
	Establish at least two additional community bus routes.
Sawgrass District:	Achieve headways of 15 minutes or less on 50% of routes.
	Establish at least one neighborhood transit center.
	Establish at least one additional community bus route.
Southeast District:	Achieve headways of 30 minutes or less on 80% of routes.
	Establish at least one neighborhood transit center.
	Establish at least one additional community bus route.
South Central District:	Achieve headways of 30 minutes or less on 80% of routes.
	Establish at least one neighborhood transit center.
	Establish at least one additional community bus route.
	Expand coverage area to 48 percent.
Overall:	Increase number of bus stop shelters by 30 percent.
	Maintain the maximum service volumes on arterial roadways within each District, as displayed below:

Peak Hour Two Way Maximum Service Volumes

	Eastern Core District	All Other Districts
Two-lane arterials	2485	2555
Four-lane arterials	5267	5442
Six-lane arterials	7910	8190
Eight-lane arterials	10342	10605

Within standard concurrency districts, LOS standards are as follows:

1. *For the purpose of issuing development permits, the peak hour LOS standard for road segments within the Northwest District shall be the Generalized Two-way Peak Hour LOS "D" Volumes for Florida's Urbanized Areas Table in Florida DOT's most current Level of Service Manual.*
2. *For the purpose of issuing development permits, the peak hour LOS standard for road segments within the Southwest District shall be the Generalized Two-way Peak Hour LOS "D" Volumes for Florida's Urbanized Areas Table in Florida DOT's most current Level of Service Manual, with the following exceptions:*

Interstate 75, from 1/2 mile west of Southwest 184 Avenue to Collier County Line - LOS "B"

U.S. 27, from Interstate 75 to Palm Beach County line -- LOS "B"

(Sec. 5-182, Broward County Code)

Conditions for meeting concurrency

The conditions for meeting concurrency depend on the district in which the development is located. For developments located in standard concurrency districts, an adequacy determination must be made. That determination will return one of the following findings:

1. Adequate capacity to accommodate the development exists within the impact area;
2. Adequate capacity within the impact area does not exist, but one of the following conditions applies:
 - An action plan to accommodate the traffic impact has been approved; The necessary improvements to meet the applicable level of service standards are either under construction or under contract, or said improvements have been included in the first two years of the applicable schedule of transportation improvements, or said improvements are covered by an enforceable development agreement and will be available before certificates of occupancy are issued;
 - The development permit will be issued in accordance with an approved Florida Quality Development (FQD) or Development of Regional Impact (DRI) development order;
 - The proposed development is found to have vested rights;
 - De Minimis Exception; or
 - The proposed development is either a public transit capital facility, or an office project that includes either fixed-rail or transit terminals as part of the structure.

or

3. The road impact fees for a building permit application do not account for the impact to the transportation network, and do not satisfy the regional transportation concurrency requirements.

Under the first two findings, a Transportation Concurrency Satisfaction Certificate will be issued.

Broward's concurrency regulations are unusual in that they also require proposed developments to address the adequacy of the remainder of the regional road network. If any road segment of that network

lacks the capacity to accommodate the traffic generated by the development at LOS “D,” the county attempts to determine of adequate capacity would be available upon the completion of transportation improvements in the county’s Long Range Transportation Plan:

If it is determined that such capacity will be available, then the specific improvements necessary to enable the network to reach such capacity shall be identified (hereinafter referred to as "necessary improvements"), and the application shall be granted with an express condition regarding the adequacy of the regional transportation network.

For projects located within a Transit Oriented Concurrency District, a Transportation Concurrency Satisfaction Certificate will be issued under any of the following circumstances:

- a. If a recorded plat on the property in question was approved by the County Commission on or after March 20, 1979, and prior to the effective date of the ordinance;
- b. If the property in question has been the subject of a vested rights finding, with respect to transportation concurrency;
- c. If the building permit application is for property within an approved Development of Regional Impact (DRI) or a Florida Quality Development (FQD) development order;
- d. If the applicant has paid a Transit Concurrency Assessment;
- e. If the application is for work on an existing residential building, and does not increase the overall number of units or change the type of units contained there;
- f. If the application is work on an existing non-residential building, and the number of peak-hour trips will not increase as a result of the project;
- g. If the building permit application is for development that promotes public transportation . . . including transit terminals, transit lines and routes, separate lanes for the exclusive use of public transit services, transit stops (shelters and stations), and office buildings or projects that include fixed-rail or transit terminals as part of the building; or,
- h. The proposed development is a project which promotes public transportation and is located within a Regional Activity Center as described in and defined by the Broward County Comprehensive Plan, and is within an area that contains major public and private postsecondary institutions of higher learning.

Transit Concurrency Assessment

The Transit Concurrency Assessment (TCA) is provided as a vehicle for meeting concurrency requirements in Transit Oriented Concurrency Districts. The county code defines the TCA as follows:

The Transit Concurrency Assessment shall be calculated as the total peak-hour trip generation of the proposed development, multiplied by a constant (for each year) dollar figure for each District, that represents the cost per trip of all the enhancements in that District listed in the County Transit Program, as described in paragraph 5) below. The schedules of trip generation rates and costs per trip for the calculation of this assessment shall be incorporated in the Broward County Administrative Code.

Revenues from these TCAs are to be used to fund enhancements within the County Transit Program (which is to be established by the County Commission) which are located in the district where the proposed development will occur.

Under certain circumstances, a developer may opt not to pay some or all of the Transit Concurrency Assessment, and may instead implement or participate in implementing an alternative transit improvement. This alternative improvement must be intended to enhance transit ridership, and cannot focus predominantly on the occupants or users of the applicant's property. The alternative improvement must be determined to be beneficial to the regional transportation system within the relevant district.

Broward County's Development Management Director is permitted to grant waivers for the requirement of a Transit Concurrency Assessment under certain circumstances, including applications for building permits for "very low income" or "low income" affordable housing projects, applications for permits for construction of public buildings which will directly serve the health and/or safety needs of the public, libraries and public parks.

Duration of concurrency determinations

Findings of adequacy will expire after five years, unless a building permit is issued, and construction on infrastructure (*project water lines, sewer lines, drainage, and the rock base for internal roads*) has begun.

Exceptions

Within standard concurrency districts, the following types of development are exempt from meeting concurrency:

- any renovation to residential structures that do not increase the overall number of units;
- renovations to residential structures that do not change the type of units; and,
- renovations to non-residential buildings that do not result in an increase in gross square footage for any use.

There are no exemptions listed for developments in transit-oriented concurrency districts.

Resource Documents and Correspondence

- Broward County. Code of Ordinances. Chapter 5, Article IX. Building Regulations and Land Use; Florida. Ord. No. 96-22, §§1, 2(Exh. A), adopted Aug. 13, 1996, as amended.
- Broward County. Code of Ordinances. Chapter 27, Pollution Control.
- Broward County Resolutions No. 2005-291, April 26, 2005.

Escambia County Concurrency Management System (CMS) Summary

Primary Contact

Bonita Player
 Transportation Planner
 Tel: (850)595-0272
bonita_player@co.escambia.fl.us

Background

Escambia County, Florida “is located in the extreme Northwestern corner of the State, bordered on the west and north by Alabama, on the east by Santa Rosa County, and on the south by the Gulf of Mexico,” encompassing 661 square miles.

- **Initially adopted:** Originally adopted in 1999 with modifications made in 2001.
- **If and when it has been updated:** The county is in the process of making changes this year to include proportionate fair-share mitigation.
- **How the “state of transportation concurrency” is conveyed to elected officials:** Per the Escambia County *Concurrency Management System* Procedural Manual, “Periodically (at least semi-annually) advise the (Local Planning Agency) LPA of any projected or predicted deficiencies which should be addressed in order to avoid the degradation of established level of service standards on any particular system or facility. This advisory will include all roadway segments whose current capacity has reached 75 percent of available capacity.” This information is then given to the Board of County Commissioners (BCC).

System Components

- **Ordinances, manuals, guidelines, and comprehensive plan policies:** The Escambia County *Concurrency Management System* Procedural Manual is provided to applicants for guidance. “The purpose of the Concurrency Management System Procedures Manual shall be to provide the appropriate technical guidance and delineation of the procedural process that must be followed by staff and the applicant in order to determine that a project is compliant with the concurrency requirements of the comprehensive plan and this Code and to identify administrative requirements and procedures necessary such that the county can be in compliance with the various concurrency requirements mandated by the comprehensive plan.”

Appendix “E” of the Manual contains Traffic Engineering Department Traffic Concurrency Procedures & Impact Analysis Report Standards to be used when a Traffic Impact Analysis Report is required.

- **Tracking system:** The county uses a combination of systems for concurrency. A computer database (Paradox) is used to track development information including whether a project is “pending” or “approved” as well as the number of trips allocated to the project. Transportation concurrency is tracked using an Excel spreadsheet in combination with the information found in the Paradox system. When projects are approved through the Development Review Committee, trips are manually placed in the spreadsheet and subtracted from the available capacity. Every six months, developments are reviewed to identify what certificates of occupancy have been issued for about one year. If new traffic counts have been taken on that facility within the year, the trips

are assumed to be included in the traffic counts and “approved trips” are removed from the spreadsheet.

- **Geographic Service Area of CMS:** The CMS tracks concurrency on state and county roads in both incorporated and unincorporated areas. However, the county does not have a mechanism to determine and allocate trips to roadways from development permitted within city limits.

If a county CMS, does it track concurrency for some or all municipalities? The county does not track concurrency for any municipalities; however, it does monitor concurrency on state and county roads traveling through municipalities.

Is there a TCEA, TCMA, or MMTD within the CMS? How much of the area? The county has two transportation concurrency exception areas; Warrington TCEA and Fairfield Drive TCEA. Warrington TCEA area boundary is coterminous with the Warrington Redevelopment Area boundary approved in 1995. Fairfield Drive TCEA area is coterminous the Englewood-Ebonwood and Palafox Redevelopment Area boundaries and also includes a part of the Brownsville Redevelopment Area.

What is the interface between the areas? Escambia County has not tracked trips between the TCEA’s and the remainder of the CMS because very little development has occurred within the TCEAs until recently. Currently, the county is in process of addressing this issue due to increasing development.

Administrative Process

The Growth Management Department is responsible for executing the processes and procedures of the concurrency management system with all individual departments responsible for providing technical review in their areas. The Engineering Department provides review for transportation concurrency.

The Escambia County *Concurrency Management System* Manual requires that each applicant prepare and submit an “Initial Test for Traffic Concurrency Worksheet” as found in Appendix “D” of the Manual. Since 2003, however, this Initial Test has been prepared by the County Engineering Department staff to avoid errors that may be made by applicants as well as to provide consistent interpretation of trip rates for uses not found in the Trip Generation Manual. As part of this Initial Test, the impact area for developments that are service or commercial in nature is as follows:

New P.M. Peak Hour Trips	Distance for Impacted Roadways
1 - 50	First directly-accessed roadway link
51 - 100	1-mile radius
101 - 500	2-mile radius
501 - 100	3-mile radius
1,001 - 2,000	4-mile radius
2,001 or more	5-mile radius

“For residential developments, trips should be assigned to the roadway network until project related trips equal less than five percent of the adopted level of service (LOS) standard for each impacted roadway segment.”

If the project meets the Initial Concurrency Test (indicating available capacity for the project), the Transportation Planner will complete the review for transportation concurrency “when all other sign-offs

have been obtained for site plan or preliminary plat and final comparisons have been submitted.” The Manual states,

- A determination of concurrency is required as part of the Development Review Committee process. At the time the development project under review has satisfactorily completed the DRC process, and the DRC Route Sheet and revised Plat have been approved and signed off (RED Stamped), the determination for concurrency shall be made and documented accordingly.
- The DRC Route Sheet shall be used to summarize the results of the concurrency analysis for all elements of concurrency. The DRC Route Sheet provides for full accountability and ensures that all elements of concurrency have been considered as part of the total review process.
- A Certificate of Concurrency will be issued and will be filed as an attachment to the associated development order by the Department of Growth Management and provided to the applicant.

The Manual further states, “If the project does not pass the initial test for traffic concurrency, the Applicant shall specify on the worksheet which method outlined in the LDC will be used to maintain the adopted level of service for each impacted roadway. Methods include:

- a. applying applicable trip reduction methods such as internal trip capture rates and/or pass-by trip rates for service or commercial developments;
 - b. conducting a Traffic Impact Analysis Report (TIAR);
 - c. reducing the scope or scale of the proposed project so that demand does not exceed available capacity; or.
 - d. withdrawing the application.”
- **When concurrency is determined:** The new project trips (existing + allocated + new) must not exceed the minimum acceptable level of service volume for all impacted roadways to pass the initial test per Table (Escambia County Land Development Code Article V). Concurrency is determined before the approval of an application for a development order or permit. Section 6.03 of the comprehensive plan states, “No development activity may be approved unless it is found that the development is consistent with this comprehensive plan and that the provision of the facilities enumerated in section 6.01 above, will be available at prescribed levels of service concurrent with the impact of the development on those facilities.”
 - **Different levels of concurrency:** The county only provides one level of concurrency that is issued as an appendix to a development order.
 - **Duration of certificate:** Capacity is allocated to each roadway segment impacted by new development trips during the issuance of a development order. Durations of certificates are as follows for different development types:
 - Preliminary plat (subdivision): Capacity is allocated for a period of four years unless construction plans are submitted to county within two years. If the construction plans are not submitted to county within two years the certificate will expire in two years.
 - Site Plan (Non-residential): Capacity is allocated for a period of 18 months.
 - Planned Unit Development (PUD), phased development, long term projects or DRI: Capacity is allocated for the period established in an enforceable development agreement.
 - **Conditions for meeting concurrency:** “Proposed new development or redevelopment activities can or will be supported and served by infrastructure facilities or services at prescribed levels.” Section 6.04 of the comprehensive plan states:

As a minimum, the concurrency management system will ensure that at least one of the following standards will be met prior to issuance of a development permit or order:

- (1) The necessary facilities and services are in place at the time a development permit is issued; or
- (2) A development permit is issued subject to the condition that the necessary facilities and services will be in place and available to serve the new development at the time of the issuance of a certificate of occupancy;
- (3) The necessary facilities are under construction at the time a permit is issued. Note: This provision only relates to parks and recreation facilities and roads; or
- (4) The necessary facilities and services are the subject of a binding executed contract for the construction of the facilities or the provision of services at the time the development permit is issued. NOTE: This provision only relates to parks and recreation facilities. The LDC will include a requirement that the provision or construction of the facility or service must commence within one year of the issuance of the development order or permit; or
- (5) The necessary facilities and services are guaranteed in an enforceable development agreement. An enforceable development agreement may include, but is not limited to, development agreements pursuant to § 163.3220, F.S. or an agreement or development order issued pursuant to §380, F.S. For sanitary sewer, solid waste, potable water, and drainage facilities, any such agreement will guarantee the necessary facilities and services to be in place and available to serve the new development at the time of the issuance of a certificate of occupancy; or
- (6) The necessary facilities needed to serve new developments are in place or under actual construction no more than three years after the issuance, by the county, of a development order or permit. NOTE: This provision only relates to roads.

- **How are de minimis impacts tracked?** Per ordinance, Escambia County does not track de minimis impacts. De minimis developments are considered to have no impact on Level of Service Standards or on degradation of such standards.
- **Timeframe:** After submission of a complete application, the county has 10 working days to approve, deny or to request additional information.
- **Describe the coordination between various city/county departments**
The land development committee designates different departments for several services and facilities. The departments within the county government have the responsibility for determining if the LOS will be maintained for a new development. These departments may refuse to approve development during issuance of development order or building permit.
- **Intergovernmental Coordination for Transportation Impacts**
 - **Coordinate LOS standards on facilities crossing jurisdictional boundaries:** According to their comprehensive plan, Escambia County will “Coordinate with appropriate state, regional and local agencies and other entities, which have operational and maintenance responsibility for public facilities in Escambia County, to achieve and maintain, adopted level of service standards. When such entity is another unit of local government, the county will enter into an interlocal agreement or other formal agreement which shall describe joint processes for collaborative planning and decision making on population projections, the location and extension of public facilities subject to concurrency, and siting facilities with countywide significance, including locally unwanted land uses.” The county addresses

these issues through the TPO with Santa Rosa County rather than through a specific formal agreement.

- **Administrative process for coordination:** TPO staff.
- **Traffic methodology for determining impacts:** Traffic impacts across jurisdictional boundaries are not tracked at this time.

Methodology

- **How are LOS standards established for CMS?** LOS standards for roadways are established based on the functional classification of the roadway in Chapter 8, Transportation Element of the Comprehensive Plan.

Roadway Functional Classification	Annualized P.M. Peak Hour Level of Service Standard
Florida Intrastate System	[blank]*
Rural Undeveloped Areas	B
All Other Areas	C
Principal Arterial D	D
Minor Arterial D	D
Collector	E

*Note: LOS service standard for “Florida Intrastate System” is blank in comp plan.

- **How is capacity measured?** Road capacity is measured using “2-Way Peak Hour Service Volume based on the 2002 FDOT Quality / Level of Service Handbook, Tables 4-4, 4-5, and 4-6 for Urbanized areas.”
- **Methodology for collecting and updating critical traffic data**

Traffic counts – Per the county’s Traffic Volume and Level of Service Report, traffic counts are conducted annually by either FDOT or the county for most road segments. For county roads where existing traffic volume consumes less than 50% of the available capacity, counts are taken only every two to three years. For impact analysis purposes traffic counts must be no older than one year and conducted on a Tuesday, Wednesday, or Thursday. Adjustments to the traffic counts must be done by using weekly adjustment rates published by FDOT. Updated counts provided by applicants are also updated in the CMS.

Planned improvements – Planned improvements for state maintained roadways are counted as additional capacity if improvements are included the first three years of FDOT’s Adopted Five-year Work Program. Additional capacity may be counted for county-maintained roadways if improvements are included in the first three years of the County CIP. If planned capacity is used to meet transportation concurrency, the appropriate project must be contained in the adopted FDOT work program and/or the County CIP in place at the time of application for development approval.

Monitoring of development trips – The county tracks development trips in the computer database. Development trips are removed from the system during the issuance of a Certificate of Occupancy and considered as existing trips.

Do you add trips from DRIs (or other developments) approved in adjacent jurisdictions to your CMS? No, trips are only added for projects processed through the County’s Development Review Committee.

- **Traffic Impact Study Methodology**

For projects that fail the initial test, the applicant may apply one or more of the following options:

- apply applicable trip reduction methods for service or commercial developments;
- conduct a traffic impact analysis report (TIAR);
- reduce scope or scale of the project;
- withdraw the application;
- identify the roadway facility as part of the TCEA in a designated redevelopment area.

A traffic impact analysis report (TIAR) must be prepared using the following guidelines:

- Analyze the weekday PM peak hour of adjacent street traffic.
- Determine if the level of service standard is met for all impacted roadways.
- The latest edition of the Escambia County Traffic Volume and Level of Service Report shall be used for background traffic.
- General Models may be used for trip distribution and assignment.
- Traffic counts used for analysis shall be no older than one year and originate on a Tuesday, Wednesday, or a Thursday.
- Determine PM peak hour revised service volume (both directions as part of impact analysis).
- Provide a table summarizing the existing volume, allocated volume, project volume (existing + allocated/committed +project), roadways capacities for each impacted roadway segment.
- Planned improvements (and associated capacities) are assumed to be existing in the latest edition of the Escambia County Traffic Volume and Level of Service Report.
- If the TIAR indicates improvements are needed and the applicant agrees to construct the improvements, a mitigation report must be prepared documenting all of the improvements. Development will not be approved if Level of Service Standards are not met and mitigation is not provided.

Trip Generation

Trips generated by a new development can be determined by using data and procedures included in the ITE Trip Generation Manual. Trip rate can be based on similar developments if the necessary sample size and documentation is provided in the Trip Generation Handbook, An ITE Proposed Recommended Practice if approved by county engineer. “For redevelopment sites, trips currently generated by existing development that will be removed may be deducted from total new site trips.”

Trip Distribution

Trips generated by new development can be assigned to links on the roadway system by employment of manual methods, “quick response” methods, or the Florida Standard Urban Transportation Model Structure (FSUTMS) for the Pensacola Urbanized Area. Trip distribution should be illustrated on a map showing impacted road segments and trip distribution as well as in a table format “similar to that of the latest edition of the Escambia County Traffic Volume and Level of Service Report.”

Traffic Impact Area

The distribution and assignment of new trips to roadways segments is required until the impact of new trips is equal to one percent or less of the service volume.

Existing and Future Background Traffic

The Escambia County Engineering Department, Traffic and Development Division prepares a Traffic Volume and Level of Service Report. This Report must be used by the applicant as the source for existing and future background (existing + allocated/committed) traffic. Changes can be made to existing traffic volumes with necessary documentation by approval of the county transportation planner.

Analysis procedure: No specific guidelines for further analysis are provided except that “refinements to volumes may be made if adequately documented/justified to the satisfaction of the Transportation Planner.”

- **Do you have any general issues or concerns regarding your local government’s CMS?** The county is unclear how to work proportionate fair-share mitigation into the CMS, particularly into the tracking system. In addition, the county would like to use only one method for determining the traffic impact area due to fairness concerns.
- **Would you consider your CMS or any part of it a best practice?** The staff feels that the tracking system works very cleanly and makes it easy to account for all of the development trips.

Resource Documents and Correspondence

- Escambia County. Concurrency Management System Procedural Manual, Revision 4. 11/2001.
- Escambia County. Land Development Code Article 5.
- Escambia County. Comprehensive Plan Chapter 6.
- Escambia County. Comprehensive Plan Chapter 8.
- Escambia County. Comprehensive Plan Chapter 14.
- Traffic Engineering. Department Traffic Concurrency Procedures & Impact Analysis Report Standards.
- [Http://www.co.escambia.fl.us/](http://www.co.escambia.fl.us/).
- Telephone conversation with Bonita Player, March 1, 2006.
- Telephone conversation with Bonita Player, April 3, 2006.

Indian River County Concurrency Management System (CMS) Summary

Primary Contact

Sasan Rohani
 Indian County Chief of Long Range Planning,
 Tel: (772) 226-1250
srohani@ircgov.com

Background

Indian River County, Florida is located in the southeast region of Florida bordering the Atlantic Ocean. The county has a population of nearly 125,000 and encompasses approximately 500 square miles.

- **Initially adopted:** 1991
- **If and when it has been updated:** The system has been updated several times since its initial adoption.
- **How the “state of transportation concurrency” is conveyed to elected officials:** No general practice.

System Components

- **Ordinances, manuals, guidelines, comprehensive plan policies:** The county has a number of documents available on its website to assist applicants with concurrency applications including:
 - Indian River County Concurrency Information - General Information Table - this is a simple table providing the following:
 - Type of Concurrency
 - Type of Development Order
 - How Long is Concurrency Good For?
 - Payment of Impact Fees and Capacity Charges Required
 - Is Project Vested for Appropriate Capacities?
 - Are Additional Impact Fees or Capacity Charges Payable When the Rate Increases?
 - Concurrency Determination Application Form
 - Concurrency Determination Network – Project Trip Assignment by Segment
 - Concurrency Acknowledgement Agreements (for those who choose not to apply for an initial or initial/final concurrency determination prior to the time they apply for a building permit to make them aware that there is no guarantee capacity will be available when they need it).
 - Application for Final Concurrency Determination
- http://www.ircgov.com/Departments/Community_Development/Planning_Division/Concurrency_Management.htm
- **Tracking system:** Indian River County uses a computerized database (CDPLUS). Each county department has access to the concurrency management system via their desktop computer. When the Planning Department sets up a project in the system, the appropriate county departments are notified that there is a project to be reviewed. Each person reviewing projects has access to the computer system and enters a “pending” and, eventually, a “complete” review. When all reviews are complete, the Chief of Planning issues the appropriate concurrency certificate.

The county has established a system to monitor the estimated available capacity of each segment. Starting with the segment capacity, existing traffic volume and project traffic volume are subtracted (using peak season, peak hour, and peak directional volumes) as each concurrency certificate is issued to determine available capacity. The “cumulative effect of all single-family permits” is subtracted on a quarterly basis. In addition, traffic analysis zone (TAZ) socioeconomic data is updated regularly as projects are approved. Then the FSUTMS model is run generating a new vested volume for each segment at least every six months.

- **Geographic Service Area of CMS:** Unincorporated county.

If a county CMS, does it track concurrency for some or all municipalities? The county tracks concurrency for the City of Vero Beach other than its own jurisdiction. County roads that run through other municipal jurisdictions of the county are also tracked by Indian River County although there is no mechanism for the municipalities to inform the county of new development or new trips that should be added to the county CMS.

Is there a TCEA, TCMA, or MMTD within the CMS? Indian River County does not have a TCEA, TCMA, or MMTD within the CMS.

- **Fees:** Charges for various services are as follows:
 - Any type of concurrency determination - \$120
 - Single family - \$50
 - Concurrency Determination Appeal - \$200
 - Vested Rights Appeal - \$400.

Administrative Process

The Planning Department coordinates the review of all applications for concurrency determinations to all departments.

- **When concurrency is determined:** “A valid concurrency certificate must be obtained prior to the approval of the following:”
 - Conceptual development order – where the density/intensity of land use will change including comprehensive plan land use amendments, rezoning petitions, conceptual project approvals, and preliminary plats and preliminary PD (planned development) plans.
 - Initial development order – a project approval that allows developer to apply for a building permit including site plan approval, land development permits or permit waivers, or changes that increase the density/intensity of development.
 - Final development order – “authorize construction of a new building, expansion of an existing building, increase in intensity of use, or change of use which requires a new CO (certificate of occupancy). The final development order will be issued as a building permit.”
- **Different levels of concurrency and duration of certificate:** Indian River County issues three types of concurrency certificates:
 - Conditional Concurrency Certificate: Purpose of this certificate is to satisfy the concurrency requirement for conceptual development orders and conceptual approval of initial development orders. This certificate does not guarantee availability of adequate facilities during the time of initial or final development order.

- Initial (or Initial/Final) Concurrency Certificate: This certificate is valid for one year or five years depending on the applicant’s preference. Prior to issuance of this certificate the applicant must pay all impact fees and utility capacity charges. In order to obtain a five year certificate the applicant must sign a waiver of the right to receive a refund of traffic impact fees.
 - Final Concurrency Certificate: This certificate is valid for six months after issuance. If the applicant obtains a building permit during that time period this certificate will not expire as long as the building permit is active.
- **Conditions for meeting concurrency:** “In order for a concurrency determination to be issued, the concurrency review for the subject application must indicate that there is sufficient available capacity in the system for each component of the concurrency management system to maintain the level of service established in the comprehensive plan...If the review of an individual concurrency determination application indicates that the increased demand attributable to the application would decrease the level of service to an unacceptable level for any component, the concurrency determination certificate will not be issued.”
 - **How are de minimis impacts tracked?** The county does not consider any development as de minimis. All project trips are entered into the system at the time a concurrency certificate is issued.
 - **Timeframe:** The director of public works has fifteen days to review the impact study for completeness and make a determination of concurrency.
 - **Describe the coordination between various city/county departments:** Each county department has access to the concurrency management system via their desktop computer. When the Planning Department sets up a project in the system, the appropriate county departments are notified that there is a project to be reviewed. Each person reviewing projects has access to the computer system and enters a “pending” and, eventually, a “complete” review. When all reviews are complete, the Chief of Planning issues the appropriate concurrency certificate.
 - **Intergovernmental Coordination for Transportation Impacts**
 - Coordinate LOS standards on facilities crossing jurisdictional boundaries? Metropolitan Planning Organization (MPO) coordinates with other city and county governments for LOS standards.
 - Administrative process for coordination: N/a.
 - Traffic methodology for determining impacts: N/a.

Methodology

Road capacity is determined “on a segment by segment basis” for each road in the county’s thoroughfare plan. The county has established a system to monitor the estimated available capacity of each segment. Starting with the segment capacity, existing traffic volume and project traffic volume are subtracted (using peak season, peak hour, and peak directional volumes) as each concurrency certificate is issued to determine available capacity. The “cumulative effect of all single-family permits” is subtracted on a quarterly basis. In addition, traffic analysis zone (TAZ) socioeconomic data is updated regularly as projects are approved. Then the FSUTMS model is run generating a new vested volume for each segment at least every six months

- **How are LOS standards established?** Peak hour, peak season, peak direction LOC “C” must be maintained on rural facilities and LOS “D” on urban facilities.
- **How is capacity measured?** Road capacity is determined “on a link by link basis” for each road in the county’s thoroughfare plan. Segment Capacity is “based on either on FDOT’s generalized capacity tables or individual segment capacity studies approved by the public works director pursuant to the criteria specified in Chapter 952, Traffic.”
- **Methodology for collecting and updating critical traffic data**

Traffic counts: Traffic counts are conducted on an annual basis and tracked in a concurrency management database. If a traffic impact study is needed for concurrency purposes, the applicant can use the concurrency management database which includes the most current traffic counts for all current locations. If traffic counts are not in the database, the applicant must perform necessary counts in accordance with the county requirements.

Planned improvements: Additional capacity for a roadway link can be taken into consideration, if any of the following conditions are met:

- At the time the development order or permit is issued, the facility is in place or under construction.
- Transportation facilities will be under construction or in place not more than 2 years after a building permit for the development is issued per the county’s CIE or the FDOT 5-year Work Program.
- Transportation facilities will be under construction or in place not more than 2 years after a building permit for the development is issued via a binding executed agreement between the county and the developer.
- Transportation facilities will be under construction or in place not more than 2 years after a building permit for the development is issued per an enforceable development agreement (§163.3220, F.S or §380, F.S).

Monitoring of development trips: The county tracks the development trips in the computer database. Development trips are removed from the system during the issuance of Certificate of Occupancy and considered as existing trips. The ordinance acknowledges existing the vested rights of developments approved prior to the implementation of the concurrency management system and provides a process for appeal if vested rights are denied.

Available capacity: “Available capacity for each segment is the resulting balance of supply minus demand not including demand for the application under consideration.”

- **Traffic Impact Study Methodology**

Indian River County has three types of traffic impact studies:

- Small project
 - Project generating less than 100 trips daily
- Traffic Impact Statement
 - Projects generating 100 - 499 trips daily and have no impact on any segments which have ten percent or less available capacity.
 - Projects generating 500 - 999 trips daily and have no impact on any segments which have thirty percent or less available capacity and at level of service level “E.”
- Traffic Impact Analysis

- Projects generating 100 - 499 trips daily and impacting segments which have ten percent or less available capacity.
- Projects generating 500 - 999 trips daily and impacting segments which have thirty percent or less available capacity and at level of service level “E.”
- Every project which generates 1000 or more trips daily.

Available capacity for each segment is the resulting balance of supply minus demand not including demand for the application under consideration. Capacity is determined using peak hour, peak season, peak direction measures by segment (see Planned Improvements above):

Trip Generation

The traffic impact study must include a list of all land uses, ITE land use codes, size and/or number of dwelling units. Trip generation rate can be determined by use of following sources:

- Indian River County Trip Rate and Percent New trip Data Table;
- earlier impact study with a similar land use to the new development and approved by the county; and,
- a site specific trip generation study approved by the county and conducted at three separate sites.

“The percent new trips factor represents the percent by which the trips rate is multiplied in order to obtain only those trips that are added to the roadway by new development. Thus, those trips going to a new development that would have been on the roadway anyway and are included in the trip rate must be deducted from the total trips.” Chapter 952 provides acceptable methods for determining the percent new trips.

Trip Distribution

Trip distribution and assignment of a new development must be in compliance with accepted traffic engineering principles which are documented in NCHRP Report 187 “Quick Response Urban Travel Estimation Techniques and Transferable Parameters Guide.” A number of methods are provided in detail in Chapter 952; the chosen method must be reviewed and approved by the director of public works.

Traffic Impact Area

Traffic impact area includes every road segment on which the impact of new development is greater than or equal to five percent of the project trips. Only the directly accessed roadway segment is evaluated for single-family units.

Existing and Future Background Traffic

Background traffic for non-DRI sized projects is considered to be a combination of existing developments that have either initial or final concurrency certificates and developments for which CO’s have been issued but not included in traffic counts.

Analysis procedure

Transportation demand is determined by adding together the peak season, peak hour, and peak direction volume of the following:

1. existing volume;
2. approved projected volume; and,
3. proposed project volume “if the segment is expected to receive 5% or more of the project trips.”

Intersection Analysis - “An intersection analysis must be performed on each major intersection, both signalized and non-signalized, where the project's traffic consumes equal to or greater than

two (2) percent of the FDOT generalized planning capacity level of service C peak hour/peak direction/peak season capacity of the approach link. Intersection analysis of a non-signalized location will include a warrant study performed according to the procedures and specifications identified in the 'Manual on Uniform Traffic Control Devices'."

Road Segment Analysis – "If a roadway segment is operating at or above ninety (90) percent (for projects generating between one hundred (100) and four hundred ninety-nine (499) average daily trips) of the available level of service C peak hour, peak direction FDOT generalized planning capacity with the inclusion of vested development; or at or above seventy (70) percent (for projects generating between five hundred (500) to one thousand (1,000) average daily trips) of available capacity at level of service "E" based on the FDOT generalized level of service tables with the inclusion of prior vested traffic, a transportation analysis must be performed to determine if the actual roadway segment operating characteristics are such that additional capacity is available."

- **Do you have any general issues or concerns regarding your local governments CMS? Would you consider your CMS or any part of it a best practice?** Staff did not feel that the CMS system has any issues or problems. In 2005, the county experienced an issue with capacity due to public opposition to a road programmed in the CIP which was removed due to citizen disagreement with the planned road widening. After some time and consideration, the road was put back in the CIP for widening and will be constructed.

Resource Documents and Correspondence

- Indian River County. Code of Ordinances. Chapter 910: Concurrency Management System; Florida: 1991.
- Indian River County. Code of Ordinances. Chapter 952: Traffic.
- Telephone conversation with Sasan Rohani, February 23, 2006.
- Telephone conversation with Sasan Rohani regarding changes to summary, March 16, 2006.

City of Lakeland Concurrency Management System (CMS) Summary

Primary Contact

Charles Barmby
 Transportation Planner
 (863) 834-6011

Background

The City of Lakeland, Florida, is located in Polk County in the central region of Florida. Lakeland has a population of nearly 91,000 and encompasses 71.4 square miles.

- **Initially adopted:** 2001
- **If and when it has been updated:** No updates.
- **How the “state of transportation concurrency” is conveyed to elected officials:** Information regarding transportation level of service is conveyed to elected officials as part of development review, including requests for Comprehensive Plan and zoning changes.

System Components

- **Ordinances, manuals, guidelines, comprehensive plan policies:** City of Lakeland Ordinance No. 4243, the concurrency management system ordinance, describes the city’s concurrency requirements and process. The concurrency application form is included in the ordinance as an exhibit. The city also has a memorandum available to applicants that includes traffic study methodology requirements. The transportation element of Comprehensive Plan establishes LOS standards for roads and multi-modal transportation system.
- **Tracking system:** The city uses a spreadsheet system to track LOS on roadway segments, which is based on a roadway network database prepared by the Polk Transportation Planning Organization. Different than many basic spreadsheet tracking systems, this vested trips spreadsheet includes each road link on a separate “tab” or worksheet. Each pending or approved development is listed on the worksheet. Trips are only encumbered when the development is approved or vested. Data from the Polk County concurrency management system is used as the base data for this system.
- **Geographic Service Area of CMS:** Track within the city limits and adjacent unincorporated part of Lakeland Planning Area, as defined in the city’s Comprehensive Plan.

If a county CMS, does it track concurrency for some or all municipalities? N/a.

Is there a TCEA, TCMA, or MMTD within the CMS? In their Transportation Element, the city identifies multimodal transportation districts “located within the Urban Transit Service Area,” that “coincide with the service area of the identified fixed-route transit service.”

- **Fees:** The city charges traffic study review fees for transportation concurrency: \$50 for a minor traffic study and \$500 for a major traffic study. Also, additional fees may be required to review large or complex (DRI) projects.

Administrative Process

- **When concurrency is determined:** Concurrency is determined during the application for a development approval. While submitting the application for development approval, the applicant must also include required information (size of development, traffic study and additional information required by Director of Community Development) for concurrency determination. In addition, the applicant can apply for a non-binding concurrency determination. The same information is required to be submitted for non-binding concurrency determination. The capacity cannot be reserved with a non-binding determination of concurrency. A binding Certificate of Concurrency is only provided at the time of site plan approval, the issuance of a building permit or plat approval.
- **Different levels of concurrency:** The city offers a “concurrency determination” that is not binding on the date of an inquiry. A Certificate of Concurrency is “issued by the Community Development Department . . . upon finding that an application for a development approval will not result in the reduction of the level of service standards . . .”
- **Duration of certificate:** The concurrency certificate is valid until the expiration of accompanying final development order. Certificate of concurrency will be valid for 12 months, if the accompanying development order does not have expiration date.
- **Conditions for meeting concurrency:** Per Ord. 4243, “When adequate public facilities meeting the level of service standard are in place at the time a development permit is issued, or a development permit is issued subject to the determination that the necessary facilities will be in place when the impacts of the development occur, as set forth in the Comprehensive Plan.”
- **How are de minimis impacts tracked?** Ord. 4243 defines de minimis development as “A proposed development relating to land use of such low intensity as to have a de minimis effect, if any, upon the level of service standards set forth in the Comprehensive Plan; such development shall be exempt from concurrency review. Development approvals for single-family dwellings shall be deemed de minimis. Any development generating less than One Hundred Twenty (120) average daily trips shall be deemed de minimis for purposes of assessing transportation levels of service.” De minimis trips are not tracked at this time since they usually are short term projects built out quickly and thereby their associated trips are counted in the next annual countywide traffic count exercise funded by the Polk TPO.
- **Timeframe:** The length of time to issue a Certificate of Concurrency depends on a number of factors including the size and complexity of a project/analyses or if a zoning action must be taken before a site plan can be submitted for review.
- **Describe coordination between various city departments (if any, e.g. building permitting):** The Certificate of Concurrency is provided to the Building Inspection Division prior to the issuance of a building permit. The Planning Division will issue a concurrency determination prior to the approval of a subdivision plat by the city’s Planning and Zoning Board. Planning Division staff works closely with the City’s Public Works Department to review traffic study methodology statements and reports and address operational, site circulation or access issues associated with a project. The city now has a Development Review Team, consisting of Community Development, Public Works and other Departments, which meets with applicants to review and comment on development proposals.

- **Intergovernmental Coordination for Transportation Impacts**
 - **Coordinate LOS standards on facilities crossing jurisdictional boundaries?** No formal coordination.
 - **Administrative process for coordination:** Informal.
 - **Traffic methodology for determining impacts:** When a proposed development within the city limits has potential to impact county roads, the city staff invites the county staff to participate in the traffic impact study methodology and review. Similarly, if development is on or impacting a state maintained facility, the city offers the FDOT opportunity to comment.

Methodology

- **How are LOS standards established?** The city adopted LOS “D” for all the roadways within the city.
- **How is capacity measured?** The service capacities of roadways are determined based on adopted level of standards and geometric characteristics of roadway segments. Available capacity of a roadway segment is determined, by subtracting existing and background (vested) traffic from service volume of the roadway segment.
- **Methodology for collecting and updating critical traffic data**

Traffic counts – Traffic counts of road segments within the city are taken by the FDOT and/or Polk County as appropriate on an annual basis. The county updates its complex intranet-based concurrency management system and posts the traffic counts in spreadsheet format on the county’s website.

Planned improvements (when is new capacity assumed for the segment?): New highway capacity is assumed to be “committed” when a capital project is in the first three years of a State or local work program or has been fully funded by a developer via a developer’s agreement.

Monitoring of development trips: Development trips are kept in an Excel spreadsheet/database until the first year of traffic counts collected following project/phase completion.

Do you add trips from DRIs (or other developments) approved in adjacent jurisdictions to your CMS? The city accounts for project trips approved by Polk County, which impact roadways within the city.

- **Traffic Impact Study Methodology**

The city determines the traffic impact study requirements according to the daily trip generation of the project. If a single use project generates less than 120 daily trips, it is exempted from concurrency requirements. The city may require a minor or a major traffic study for a project that generates 120 to 750 trips daily. Projects that generate more than 750 daily trips or are mixed-use development are required to submit a major traffic impact study.

The traffic study methodology must be approved by the Community Development Department. A “Methodology Letter” must be submitted to city office and signed by staff indicating agreement with the methodology. The city will make any applicable information, such as traffic studies of similar developments, available to applicant. A summary of traffic analysis in table format must

be submitted with the traffic study. This table will include the following: “project peak hour, peak direction trips for all analyzed road links, by link # and named segment, showing project impact on each segment in terms of percent of service volume, the adopted LOS standard for the segment, and the actual or resultant (peak hr/peak direction) LOS with the project.”

The traffic study must indicate if the proposed development is located on an existing transit route since the city uses Multi-Modal Level of Service Standards. If the proposed development is on an existing transit route, the analysis must include “the number of the Route, route frequency, the nearest transit stop location, transit amenities at that location per the TPO bus stop inventory, and whether sidewalks are present on one, both or neither sides of the road on which the project is located (condition and width of the sidewalk and segment location).”

Trip Generation

The traffic study must include both daily and PM peak hour trips generated by a development based on the most recent edition of ITE Trip Generation Manual. Although the PM peak hour trip generation rate is used for analysis, AADT traffic is required for general observation of the daily traffic on roadway links. The city can require A.M. Peak, Midday Peak or Weekend analyses, depending on the type and peaking characteristics of a project, as well as particular operational issues that must be addressed on the impacted roadways.

Trip Distribution

Trip distribution is determined by using Polk County Standard Transportation Model (Florida Standard Urban Transportation Modeling Structure (FSTUMS)) for developments which generate 1,000 or more daily trips or are mixed-use. A development that generates less than 1,000 daily trips may require only manual trip distribution analysis; however, the city has the right to require use of the Standard Model for projects of any size.

Traffic Impact Area

Traffic impact area depends on the size and the location of the project. The impact area includes “the directly-accessed segment (adjacent intersections) and “any other segment that could be affected, from a concurrency stand point.” The city typically defines a project impact area as those affected segments where a project consumes 5% of a roadway’s service volume.

Existing and Future Background Traffic

The city requires at least four diagrams to illustrate existing traffic, background traffic (existing + vested traffic), project traffic and total future traffic (existing + background + project). The diagrams must include all impacted road segments and intersections. Existing traffic can be obtained from the spreadsheet updated by Polk County TPO.

Analysis procedure

The traffic study is basically a general LOS analysis of each impacted road segment and intersection. An intersection is considered to be operating below adopted LOS if either the intersection is operating below the adopted standard or if two approaches are operating below adopted LOS although the intersection operates at an acceptable level of service. “Actual signal timings should be used for analysis of current conditions; any changed or optimized timings should only appear as recommendations and shall first be verified for feasibility with City Traffic Operation staff.”

- **Is an operational analysis required? At what stage?**

If impacted segments or intersections are operating under adopted LOS standard or the development consumes five percent or more of service volume of a segment, the city requires a “more detailed segment/intersection analysis” by using Highway Capacity Manual Software or other acceptable software.

Do you have any general issues or concerns regarding your local governments CMS? Would you consider your CMS or any part of it a best practice? No concerns. The system works well based on the size of the city and the number of development applications reviewed.

Resource Documents and Correspondence

- City of Lakeland. Code of Ordinances, Ordinance No. 4243, Concurrency Management, 2001.
- City of Lakeland. 2010 Comprehensive Plan, Transportation Element.
- City of Lakeland. Community Development Department Memorandum. “City of Lakeland Transportation Concurrency Process,” October 2005.
- [Http://www.lakelandgov.net/commdev/planning/transportation.html](http://www.lakelandgov.net/commdev/planning/transportation.html).

Orlando Concurrency Management System (CMS) Summary

Primary Contact

Gus Castro
 City of Orlando
 Transportation Systems Analyst
 (407) 246-3385

Background

- **Initially adopted:** 1991
- **If and when it has been updated:** Updated several times.
- **How the “state of transportation concurrency” is conveyed to elected officials:** The Concurrency Management Official (CMO) prepares a report to “be presented to the Municipal Planning Board and adopted by City Council.” This report is prepared semi-annually (February 1 and September 1) and “evaluates development permitting activity and determines existing conditions with regard to available capacity for the public facilities.”

System Components

- **Ordinances, manuals, guidelines, comprehensive plan policies:** City of Orlando, Code of Ordinances, Chapter 59 Concurrency Management System (CMS) is the primary document guiding concurrency management in the city. This chapter describes concurrency procedures, standards and requirements for the system. Transportation element of Growth Management Plan establishes level of service standards for roadways and other facilities and services addressed by CMS. In addition, the city has a concurrency management application form available to applicants on their website.
- **Tracking system:** The city uses a Trip Allocation Program (TAP) to track LOS conditions on roads. On an annual basis, (January of each year) trips are assigned to each Traffic Performance District (TPD) based on the results of the city’s travel demand model.
- **Geographic Service Area of CMS:**

If a county CMS, does it track concurrency for some or all municipalities? Not applicable.

Is there a TCEA, TCMA, or MMTD within the CMS? The City of Orlando’s transportation concurrency management system monitors available capacity in each of 15 Transportation Performance Districts, (TPDs) three of which are designated as Transportation Management Areas (TMAs). Orlando’s TMA approach served as the impetus for the state of Florida’s TCMA policy articulated in rule 9J5.0057. The city’s Comprehensive Plan Transportation Element includes a map of TCEAs within the city’s jurisdiction.

- **Fees:** The city has two different fee schedules for commercial and residential developments. Single or two unit developments are considered as residential by the city. These developments are charged for \$250 encumbrance letter fee and 5 percent of building permit fee as concurrency surcharge. On the other hand, developments with three units or more are considered as

commercial developments. The fees related to the concurrency process are shown below and in Table 1.

Appeal of Concurrency Management Official (CMO)

Determination	\$100
Encumbrance Letter	\$250
Reservation Administrative Fee	\$1 per trip
Reservation Extension	33% of Transportation Impact Fee + Reservation Administrative Fee

Resolution Fee

If City of Orlando traffic model run is required	\$1,000
If city accepts traffic study supplied by applicant	\$500
If no traffic study or model run is required	\$250
Verification Letter	\$50

Vested Rights Determination

Hearing Fee	\$10,000
New Application Filing Fee	\$1,000
Stipulation Fee	\$2,500

TABLE C1 Reservation Fees

	Reservation Fees		
	Year 1	Year 2	Year 3
Fixed Reservation Certificate Fee Equal To	33% of Impact Fees	67% of Impact Fees	100% of Impact Fees
Flexible Reservation Certificate Fee Equal To	N/A	99% of Impact Fees	150% of Impact Fees
Possible Refund	90 % refund	80 % refund	70 % refund

Administrative Process

The city has a designated Concurrency Management Official (CMO) who is responsible for determinations regarding concurrency and issuing certificates. The administrative process starts with the application for a concurrency determination. The applicant must complete a Concurrency Management Application, which requires information about the project such as size and location. After submission of the application, the CMO performs the concurrency evaluation and either issues an Encumbrance Letter or denies the application with the option of a waiting list. If there is no available capacity at the time of application, the applicant must wait for the capacity to be available with improvements to the system or expiration of previously reserved capacity. The applicant must apply for a Capacity Reservation Certificate before the Encumbrance Letter expires. The Capacity Reservation Certificate can be issued after the reservation fees are paid. The next step after the CRC is the building permit, which must be obtained before the CRC expires. If the CRC expires before the building permit is obtained, the capacity will be available for the applicants in the waiting list on a first come first served basis.

- **When concurrency is determined:** Concurrency is determined prior to issuance of a Concurrency Verification Letter or Concurrency Encumbrance Letter. A Concurrency Encumbrance Letter is required to receive a Capacity Reservation Certificate or a Building Permit.

- **Different levels of concurrency:** City of Orlando issues letters and certificates during different levels of concurrency process. Those documents are described as following:
 - **Concurrency Verification Letter:** This letter is issued if it is requested by an applicant. It is not required for the concurrency process. Basically, it shows availability of capacity for “each public facility at the time letter is issued.” The letter does not guarantee the availability of facilities for any period of time and does not bind the city.
 - **Concurrency Encumbrance Letter:** This letter is issued as a consequence of the concurrency evaluation process. This letter guarantees capacity availability of facilities to the applicant for 90 days. A concurrency reservation certificate must be issued before the expiration date of encumbrance letter.
 - **Concurrency Reservation Certificate:** Certificate of concurrency ensures that the facilities will be available for longer the time period for a project. The applicant must have a valid encumbrance letter and has to pay the impact fees (or some portion depending on duration of certificate) to obtain Concurrency Reservation Certificate.
- **Duration of certificate:** Concurrency Reservation Certificates (CRC) can be issued for a fixed or a flexible time frame. Both flexible and fixed time frame CRCs may be issued for up to three years. The difference between these certificates is utilization of capacities throughout the timeframe that the certificate is valid. A fixed amount of capacity (indicated in the certificate) can be utilized for each year for the fixed time frame CRC, whereas capacity utilization is flexible for the flexible time frame CRCs. The certificates can be extended for both flexible and fixed time CRCs by payment of necessary reservation extension fees.
- **Conditions for meeting concurrency:** Conditions for meeting transportation concurrency depend on the type of district. The condition for the districts in TMAs is 85 or more percent of lane miles within the district must be operating at adopted LOS standards. On the other hand, developments within TPDs are analyzed on available of capacity on link-by-link basis. Impacts of a development should not degrade the adopted LOS standard of any impacted road links within the district to meet transportation concurrency.
- **Timeframe:** The CMO has twenty working days to issue or deny a Concurrency Verification Letter, a Concurrency Encumbrance Letter or a Concurrency Reservation Certificate, respectively.
- **Intergovernmental Coordination for Transportation Impacts**

The city has the following policy related to the transportation in Intergovernmental Element of Growth Management Plan:

“Policy 1.1.1 The development activities within the City of Orlando shall be coordinated with the development plans of Orange County and adjacent local governments. The city shall monitor growth and development in the Orlando urban area for impact on the City's Level of Service (LOS) standards by monitoring the implementation of comprehensive plans of adjacent local governments and by review of development proposals to the end that:

- a. the City's Level of Service Standards shall not be negatively impacted;
- b. the transportation system affected by the proposed activity will have sufficient current and projected capacity to handle the travel demand generated by the increased intensity;

- c. development shall be concentrated to minimize sprawl; and,
- d. the development proposal will minimize disruption to the existing community and natural environment.”

Methodology

- **How are LOS standards established?** The city established a LOS standard for each major road link within city’s jurisdiction. The list of road links and LOS standards are included under Roads Level of Service subchapter of Concurrency Management Code (Chapter 59 of Code of Ordinances). LOS assessment is performed based on the 1985 Highway Capacity Manual Procedures. In addition, the city allows 15 percent degradation of average travel speed on road links with LOS “F”.

How is capacity measured? The city establishes six capacity banks for implementation of the CMS, these are: the available capacity bank, the permitted capacity bank, the encumbered capacity bank, the reserved capacity bank, vested capacity bank, and the committed capacity bank. Capacity can be transferred between these banks during different phases of concurrency process. As an example, the available capacity is transferred to encumbered capacity after issuance of an Encumbrance Letter and encumbered capacity is transferred to reserved capacity after issuance of Concurrency Reservation Certificate (CRC).

- **Methodology for collecting and updating critical traffic data**

The city monitors LOS standards through “semi-annual update of City’s Travel Demand Model which will add data reflecting development permits issued and trip allocation encumbrances. In addition, the travel demand model is recalibrated annually with support of other local and state agencies. For recalibration of the model, the necessary data related to traffic, socioeconomic characteristics, accidents, road characteristics, transit ridership, and pedestrian movements, are obtained.

Planned improvements:

Planned improvements in CIE and Growth Management Plan of the city are included as an additional capacity. Also, additional capacity can be considered if one of the following conditions is met:

- “Necessary improvements are in place when impacts of developments occur.”
- “Necessary improvements are under construction at the time a development permit is issued.”
- “Necessary improvements are guaranteed in an enforceable development agreement ensuring that the necessary improvements shall be completed within three years of issuance of the permit.”

Monitoring of development trips: In February every of year the city adopts new TAP numbers according to the Travel Demand Model. Capacity banks are also adjusted according to the TAP numbers. Developments trips are taken into consideration when capacity banks are adjusted and Travel Demand Model is revalidated.

- **Traffic Impact Study Methodology**

The city does not require a traffic study from applicants for any application for concurrency, all the concurrency process is carried out by CMO of the city. Transportation Planning Department

of the city “maintains and updates models consistent with the Florida Transportation Urban Transportation Modeling Structure (FSUTMS).”

Traffic performance is analyzed on the internal roadway network of each district. Performance districts were drawn based on the following criteria:

- boundaries do not cross transportation impact fee benefit area boundaries;
- major activity centers are contained within single districts;
- no traffic analysis zone was divided;
- boundaries generally follow geographic features, limited access facilities, or lightly traveled streets, but generally do not follow arterial or collector roads; and,
- districts generally are aligned along major commuting or traffic circulation patterns.

Current and future operating characteristics of individual roadway segments on all major thoroughfares were calculated in a three-step process. First, a travel demand model was used to estimate travel on the network and to calculate roadway capacity according to an internal speed/capacity table. FDOT’s Generalized Tables were used in the second iteration to calculate performance. Finally, FDOT’s “ART-ALL2” model was used to calculate in more detail the levels of service on state signalized intersections deemed critical for the city’s preservation of overall mobility.

Compliance with LOS standards is monitored based on the road segment LOS and the Trip Allocation Program. The concept is to limit development by allocating average daily trips annually by traffic zone to ensure a predictable LOS on individual roadway segments. The Trip Allocation Program performs a five-year annual trip allocation, based on 1995 land use projections in the Future Land Use Element (i.e., undeveloped land within the city and county by traffic analysis zone). If a roadway is a boundary between two Traffic Performance Districts, then half of its entire inventory is assigned to each adjacent district.

If annexation occurs, trip increases are transferred from the county to the city based upon the new proportion of vacant land found within the traffic zone. When redevelopment occurs, the new project receives a credit for the trips removed due to demolition for concurrency determinations.

An areawide transportation model is run annually using data related to traffic, socioeconomic characteristics, accidents, road characteristics, transit ridership, and pedestrian movement. A semi-annual model is also run using new development data. This model allocates average daily trip ends by traffic zone, according to a trip allocation program, and reflects growth permitted since the previous run, plus trips reserved. It is revalidated annually based on most recent traffic count data.

Orlando’s concurrency management system for TPDs evaluates development proposals against the proportion of trips allocated and available to that TPD, in accordance with the following thresholds:

Threshold 1: Capacity is available and development may be approved. Less than 50 percent of the trips for the calendar year have been allocated within the TPD.

Threshold 2: Capacity is becoming limited. More than 50 percent, but less than 90 percent, of the trips for the calendar year have been allocated. Adequate trips exits in or adjacent to areas in the proposed development. (Trips may be transferred from adjacent areas within the district.)

Threshold 3: Development approval must be deferred until needed capital improvements are complete or new trip allocation becomes available. More than 90 percent of the trips but less than 100 percent have been allocated. Insufficient capacity available in or adjacent to the proposed development. District is approaching capacity ahead of schedule and additional modeling is required to determine concurrency.

If a road segment in the performance district is deemed deficient, then the impacted area of the deficient roadway is designated a Transportation Primary Impact Area. Although none have yet been designated, preliminary procedures for determining the impact area have been established. Transportation Primary Impact Areas are defined as those in the region that contribute to traffic on that roadway and are identified using select roadway analysis. The trip allocation for the contributing and receiving zones within the city is then adjusted downward, based on the city's proportionate share of the impact on the deficient roadway (i.e., the proportion of trips generated from within the city versus those from outside the city). This "fair share" approach to transportation concurrency reflects the regional nature of transportation systems and recognizes the need to address both ends of the traffic congestion problem. Development would not be permitted within a transportation primary impact area if it would cause that road segment to be degraded below the adopted LOS standard.

In the three Transportation Management Areas, an areawide performance approach to maintaining LOS is applied. System performance is measured based on the percentage of lane miles meeting designated LOS standards, that is, 85 percent of lane miles achieve their LOS standard, then a development moratorium is declared in that TMA. Concurrency determinations in TMAs are made as follows:

- Sum total lane miles of the major thoroughfare network.
- Sum lane miles meeting LOS standards.
- Calculate the percent lane miles meeting LOS standards.
- Verify that the district meets the (85 percent) performance criteria.

Resource Documents and Correspondence

- City of Orlando. Codes Chapter 59, Concurrency Management.
- City of Orlando. Growth Management Plan, Transportation Element, January 2006.
- City of Orlando. Concurrency Management Application Form.

City of Ormond Beach Concurrency Management System (CMS) Summary

Primary Contact

City of Ormond Beach Planning Department
 Tel: (386) 676-3238
ruger@ormondbeach.org

Background

City of Ormond Beach Florida, is located in Volusia County is which in middle eastern region of Florida bordering the Atlantic Ocean. The city has a population of nearly 38,000 and encompasses 25.7 square miles.

The city's Concurrency Management System addresses concurrency for parks and recreation, potable water, solid waste, stormwater management, traffic circulation, and wastewater treatment. The system consists of three primary components:

- Inventory of existing public facilities
 - Concurrency assessment
 - Schedule of Improvements
- **Initially adopted:** The city of Ormond Beach adopted its CMS in 1991 (Code's effective date January 1, 1992)
 - **If and when it has been updated:** Last update to the concurrency management system of the city was in 2003 (Code's effective date is January 14, 2004).
 - **How the "state of transportation concurrency" is conveyed to elected officials:** The Planning Department of the city reports to the City Commission on November 1st of each year. The report includes deficiencies on facilities and impact of deficiencies on approval of Development orders. In addition, the planning department recommends a schedule of necessary improvements.

System Components

- **Ordinances, manuals, guidelines, comprehensive plan policies:**
 City of Ormond Beach Land Development Code Chapter 1 Article V includes the necessary information regarding the procedures and methodology of city concurrency system. Transportation Element of 2010 Comprehensive Plan of the city establishes level of service standards for the roadways within the city.
- **Tracking system:** Annual report prepared by the Planning Department serves as a tracking system for the city.
- **Geographic Service Area of CMS:** City limits.

If a county CMS, does it track concurrency for some or all municipalities?

Is there a TCEA, TCMA, or MMTD within the CMS? Not a county CMS

- **Fees:**

General Inquiries	None
Non-Binding Letters	One hundred ten dollars (\$110)
Certificates of Reservation / Certificates of Concurrency - Within development order fee schedule	

Administrative Process

The Planning Department of the city coordinates the concurrency determination process with other departments of the city and Volusia County for all applications. The department gathers the evaluations of various departments into a report which includes existing conditions of facilities, impacts of the new development and recommendations for the concurrency determination. The report is submitted to the Chief Building Official, Site Plan Review Committee, Planning Board, Development Review Board and City Commission, as appropriate.

- **When concurrency is determined:** The concurrency is determined during the approval process of a final site plan or final subdivision plan to ensure the capacity of facilities are concurrent with the impacts of developments.
- **Different levels of concurrency:** Upon applicant's request, Planning Department of the city issues a letter which states the current availability of the facilities included in CMS. The letter does not bind the city for availability of the facilities during application for concurrency.
- **Duration of certificate:** Durations of Certificates of concurrency for the city are as following:
 - Site Plan Approvals: One year from the date of sign-off approval.
 - Special Exceptions: One year from the date of approval by the City Commission.
 - Preliminary Plats: Eighteen months from the date of approval by the City Commission.
 - Final Plats: Eighteen months from the date of approval by the City Commission if final plat is not recorded. If the final plat is recorded but development permit is not issued the certificate expires in two years from the date of recording. Time period for expiration of certificates approved prior to the code, begins with the effective date (January 1, 1992) of the code
 - Subdivision Construction Permits: One year from the date of issuance.
 - Planned Developments: Two years from the date of approval by the City Commission.
 - Building Permits: The certificate is valid until the accompanying building permit expires.
 - Developments of Regional Impact (DRI): The durations of certificates which are approved either before or after the effective date of code are stated in development orders.
- **Conditions for meeting concurrency:** The condition for meeting concurrency is, "The Concurrency Management System will be available concurrent with the impacts of new development at the adopted level".
- **Describe the coordination between various city/county departments**
The planning department of the city is responsible for coordination of the departments of the city and other agencies for concurrency review. In addition, the planning department collects all the evaluation results from various departments and reports to the Chief Building Official, SPRC, Planning Board, Development Review Board, and City Commission.

Methodology

- **How are LOS standards established?** The Level of Service (LOS) standards for the city roadways are adopted based on The East Central Florida Comprehensive Regional Policy Plan (ECFCRPP) and Florida Department of Transportation (FDOT) recommendations. LOS D is adopted for urban fringe area, urban residential areas and outlying business districts, and LOS E is for central business districts. Also, the city accepts lower LOS standards for backlogged and constrained roadways.
- **How is capacity measured?** Existing capacities of roadway segments are determined based on Florida Highway Capacity Manual or any other source by approval of Planning Director. The capacities reserved and projected for approved but unbuilt developments is subtracted from available capacities and impacts of the improvements in the current fiscal year is added to the available capacities when available capacities of roadway segments are determined.
- **Methodology for collecting and updating critical traffic data**

Traffic counts: Traffic counts are updated on an annual basis on November 1st of each year for the report prepared by the Planning Department. These counts might be taken by the Florida Department of Transportation, Volusia County, or The city of Ormond Beach. The applicant must provide the traffic counts for the roads which are not monitored regularly.

Planned improvements: The impact of improvements roadway network by the city, Volusia County, Florida Department of Transportation, other public agencies, or any approved developments have agreements with the city are included during the review process if these improvements planned to be made in the current fiscal year of review of the application.

- **Traffic Impact Study Methodology**

All new developments within the city which generate more than 1000 average daily trips are required to submit traffic impact studies. The traffic study must be performed using the Florida Standard Urban Transportation Modeling System (FSUTMS). A mitigation report must be prepared, if the results of the traffic study and the travel time/speed study indicates that a roadway link operates below adopted level of service standards after the impacts of the new development. Acceptable improvement methods are listed in CMS code of the city.

Trip Generation and Distribution

Trip generation based on the most recent edition of ITE Trip Generation Manual. FSUTMS model is used for trip distribution.

Traffic Impact Area

Traffic impact area is determined based on the Table the city included in Concurrency Management System (Land Development Code, Chapter 1, Article V). The table includes the review distances for different land uses and development sizes. Traffic impact area can be expanded according to the engineering standards if the development is located in one mile of a road operating below the adopted level service standards, designated Scenic or Canopy roadway, or school site. Also, if the development's sole access is on a designated evacuation route, the impact area can be expanded. The study area must include the primary roads classified as Principal Arterial, Minor Arterial, Major Collector and Minor Collector.

Existing and Future Background Traffic

Traffic counts taken by public agencies before November 1st of each year are used for existing traffic conditions. Future background traffic is combination of reserved and projected traffic from the developments that are approved but not built.

Analysis procedure

The traffic study is performed for every roadway link included in traffic impact area. The study determines the impacts of new development and changes in levels of the service on roadway links.

- **Is an operational analysis required? At what stage?** If the model indicates that a roadway link operates below the adopted level of service standard, the applicant or the city (at applicant's expense) can perform a travel time/speed study to verify or replace the level of service indicated by the model.

Resource Documents and Correspondence

- City of Ormond Beach. Land Development Code, Chapter 1, Article V Concurrency Management, October 2003.
- City of Ormond Beach. 2010 Comprehensive Plan, Transportation Element, April 2004.

Sarasota County Concurrency Management System (CMS) Summary

Primary Contact

Clarke Davis
General Manager
Planning, Public Works
1001 Sarasota Center Blvd, Sarasota, Florida;
Tel: (941) 861-0922
cbdavis@scgov.net

Background

Sarasota County, Florida is located on the Gulf of Mexico in southwest Florida. The county has a population of nearly 360,000 and encompasses 572 square miles. Sarasota County Concurrency Management System (CMS) Regulations establish a uniform methodology for traffic level of service determination. Exhibit A – Traffic Impact Study Criteria and Methodology is part of the transportation concurrency regulation and sets forth the detailed methodology and procedures for conducting a traffic impact study within Sarasota County.

- **Initially adopted:** The Board of County Commissioners adopted the Sarasota County Concurrency Management System (CMS) Regulations on October 3, 1989 (Ordinance No. 89-103).
- **If and when it has been updated:** On July 14, 1998, the Board of County Commissioners established a uniform methodology for traffic level of service determination and provided an effective date (Resolution No. 98-169). Exhibit A – Traffic Impact Study Criteria and Methodology was made as part of the transportation concurrency regulations. On May 11, 1999, procedural changes were made related to DRI projects meeting specific criteria and to the stormwater concurrency regulations. The Sarasota County Concurrency Management System Regulations were amended and restated in Ordinance No. 99-033. The regulations were amended in 2004 to allow fully funded road projects in the first three years of the county's adopted five-year Capital Improvement Program to be considered as available facility capacity for economic development meeting certain criteria (Ordinance No. 2004-084).
- **How the “state of transportation concurrency” is conveyed to elected officials:** The Board of County Commissioners receives the Annual Sarasota County Generalized Level of Service Analysis every year for updating the traffic concurrency status on all roadway segments within the county.

System Components

- **Ordinances, manuals, guidelines, comprehensive plan policies:** The concurrency management system is comprised of several documents, including Ordinance No. 89-103, Resolution No. 98-169, Exhibit A – Traffic Impact Study Criteria and Methodology in Resolution No. 98-169, Ordinance No. 99-033, Ordinance No. 2004-084 and the Sarasota County Comprehensive Plan.
- **Tracking system:** Currently, Sarasota County uses an Excel spreadsheet entitled “Annual Sarasota County Generalized Level of Service Analysis”, to track LOS on a link by link basis throughout the county based on the latest link traffic counts. At present, they do not have a system to track LOS by link for transportation concurrency based on traffic counts plus vested

trips. However, the county has contracted with CUTR to develop a computer program (Sarasota County Traffic Concurrency Database) to track development trips and associated CMS link LOS throughout the county.

- **Geographic Service Area of CMS:** State and county road links are tracked within the unincorporated area that is under the jurisdiction of Sarasota County. It does not include the city of Sarasota, City of Venice and City of North Port.

If a county CMS, does it track concurrency for some or all municipalities? No.

Is there a TCEA, TCMA, or MMTD within the CMS? No.

- **Fees:** Transportation concurrency may be reviewed at different stages of the development process. The final transportation concurrency determination is made during the construction plan review. There is no specific fee for the concurrency determination per se. Rather, it is part of development plan review. The base fee for plan review ranges from \$1,500 for Subdivision Construction plans to \$4,000 for Concurrent Commercial Plan review. The actual plan review fee is dependent on development types, size and review process and is specified in the fee calculation sheets, which are available on the Sarasota County website <http://www.co.sarasota.fl.us>.

Administrative Process

Concurrency is evaluated during the evaluation of development order applications. All applications must be found “complete” before a concurrency determination is made. If developments are required to submit a traffic impact analysis to make a transportation concurrency determination (see Traffic Impact Study Methodology below), the applicant must prepare and submit to the Sarasota County Public Works Business Center (Department) a proposed formal methodology consistent with the General Methodology section of the county’s Traffic Impact Study Criteria and Methodology.

The Department must provide written sufficiency comments on the proposed impact study methodology within seven (7) working days. When a detailed methodology acceptable to the Department has been established, the applicant may initiate the analysis.

The applicant must collect and submit for Department review any traffic data and factors that are specific to the project and its impact area. These may include segment and intersection turning movement counts, growth and count factors, other development traffic, and project traffic distribution. Upon receipt of the specific traffic data, the Department must provide written sufficiency comments within seven (7) working days. When a set of data has been established, and accepted by the Department, the applicant may initial the detailed analysis. During the analysis process, the applicant may submit an interim report for Department review.

The Department must provide written comments on the impact study report within seven (7) working days. Upon finding a report sufficient for formal review, the Department must also provide a concurrency determination within 15-20 working days depending upon the nature of the development request.

- **When concurrency is determined:** The concurrency determination is made at each request for a development order. Typically, the earliest determination is at the time of development of regional impact review or a zoning change, and the latest a finding can be made is at land development construction plan submittal and the building permit application.

- **Different levels of concurrency:** Transportation concurrency is reviewed at each stage of a development process. Although the status of transportation concurrency can be maintained if no major changes occur, the trips generated from a development are considered reserved for concurrency only at the time of construction plan approval. The project trips continue to be reserved after approval of the construction plan, and for as long as the project is under construction.
- **Duration of certificate:** Sarasota County does not issue concurrency certificates. A land development construction plan approval is a "final development order" and can reserve trips for the time the development order is valid. Generally, construction authorization allows two years for construction activity to commence, and once construction has begun the project trips may be reserved for the duration of the project. Therefore, multi-phase developments could be vested for several years, as long as there is continuous construction activity onsite.
- **Conditions for meeting concurrency:** Thoroughfare roads carrying project traffic equal to five percent or more of the maximum service volume at LOS C must be found to have available facility capacity, including the existing capacity and the added capacity from planned improvements (refer to the Methodology section for details) under existing-plus-reserved-plus-project traffic conditions.
- **How are de minimis impacts tracked?** Sarasota County adopted a policy that points directly to §163.3180(6), F.S. for de minimis impacts; however, the county has not adopted regulations to implement this policy, and no system is in place to track de minimis trips.
- **Timeframe:** Staff has seven (7) working days to review sufficiency, and 15 to 20 working days to review a traffic impact study and determine whether the development meets transportation concurrency.
- **Describe the coordination between various city/county departments**
The Land Development Service division of the Development Service Business Center coordinates with various county departments on development review. Transportation Planning in the Public Works Business Center mainly reviews transportation concurrency and provides recommendations to Land Development Services. There is close coordination between these two divisions on plan review, traffic impact analysis and traffic concurrency determinations.
- **Intergovernmental coordination on transportation impacts**
Little coordination occurs between the county and its municipalities in terms of development review and transportation impacts.
 - Coordination on LOS standards on facilities crossing jurisdictional boundaries: Sarasota and Manatee Counties coordinate and establish a common roadway LOS D for the University Parkway which is a boundary between the two counties. There is no formal coordination with jurisdictions other than Manatee County on LOS standards.
 - Administrative process for coordination: Agencies share development and traffic information on an informal basis. Local governments who feel any adjacent local government should be involved may call and request this.
 - Traffic methodology for determining impacts: Sarasota County does not determine traffic impacts generated by other jurisdictions. However, the traffic impacts from other

jurisdictions are treated as growth in the area, and will be included in the traffic impact studies for developments within Sarasota County's jurisdiction.

Methodology

- **How are LOS standards established?** The LOS standards on roadway segments were established by comprehensive plan policy based on the characteristics of roadways and abutting development. Sarasota County adopts and maintains a level of service (LOS) standard of "C" peak-hour, based on a 100th hour design criteria, for all county maintained arterials and collectors, except for those roadways that have been designated as either constrained or backlogged facilities. The county applies the adopted FDOT standard for State maintained roadways. For most urban and suburban roads, the standard is LOS D, and for rural State roads and the interstate, the standard is LOS B or C.
- **How is capacity measured?** The county uses the methods of the Transportation Research Board's *Highway Capacity Manual* (HCM). The county has developed generalized level of service tables based on the HCM with service volumes that rely on segment lengths, number of lanes, and speed limits.
- **Methodology for collecting and updating critical traffic data**

Traffic counts – Traffic counts are updated annually using FDOT traffic counts for state roads, as well as, county traffic counts for county roads. The county performs traffic counts on county maintained thoroughfare roadway segments annually.

Planned improvements – Planned improvements include those transportation projects that are planned, scheduled and constructed based on the Sarasota County Capital Improvement Program (CIP) and FDOT Work Program. According to county regulations, the added capacity from a roadway or intersection improvement under construction or in the first year of the CIP can be considered "in place." Improvement projects shown in the second or third year of the CIP can also be considered as having capacity in place if a target economic development is located in the designated Major Employment Center (MEC) shown on the county land use map. In some specific development agreements, the added capacity for the improvement project shown in the fourth and fifth year of the CIP can be considered in place.

Monitoring of development trips – Development trips are tracked through spreadsheets only on the Bee Ridge corridor and Jacaranda corridor. In the rest of the county, the development trips are not particularly tracked. The development trips from other approved developments considered in the traffic impact study for a new development are based on available traffic impact studies of approved developments in that area. Sarasota County is in the process of developing a computer program (Sarasota County Traffic Concurrency Database) to track development trips and associated link LOS throughout the county to allow "real time" monitoring of development trips.

Do you add trips from DRIs (or other developments) approved in adjacent jurisdictions to your CMS? No. However, extra jurisdictional traffic must be included in the traffic impact analyses for proposed developments within Sarasota County.

- **Traffic Impact Study Methodology**

Developments that have one or more of the following traffic characteristics are required to submit a traffic impact analysis to make a transportation concurrency determination:

- The project is projected to have a total PM peak hour trip generation of 100 or more trip ends.
- The project has a connection to a collector or arterial roadway, either directly or via a network of local or private streets, that is operating below its adopted level of service (LOS) according to a generalized LOS analysis of “existing plus final development order” traffic conditions.
- The project has a connection to a constrained or backlogged facility, either directly or via a network of local or private streets.

For all other developments, the county determines development impacts on roadway segments and intersections. The ITE Trip Generation Handbook is used for trip generation. Trip Distribution is based on FSUTMS run. HCS is used to analyze arterial and intersections. When a traffic study is required, the applicant must attend a pre-application conference with county staff where requirements of the study including the following information are established.

Trip Generation

Trip generation can be determined by use of the current edition of ITE’s Trip Generation handbook, previous studies of comparable sites, or standards adopted by the county. All land uses, density and intensity of developments and trip rates must be identified. Internal capture rates can be used if approved by the county. In addition, the county may require accident data.

Trip Distribution

Project traffic is typically assigned to the road network using the Florida Standard Urban Transportation Model Structure (FSUTMS) software in conjunction with the most current socio-economic and network data sets maintained by Sarasota/Manatee Metropolitan Planning Organization. The network and socio-economic data may require modification prior to being found suitable for a specific project.

Traffic Impact Area

If the assigned project trips on a roadway segment consume at least 5% of its adopted LOS C maximum service volume, then the segment is considered to be significantly impacted by the development and must be included in the traffic impact area for detailed concurrency analysis. The county also requires that the thoroughfare(s) the project accesses via driveway and local road connections be included in the significant impact area.

Existing and Future Background Traffic

Existing traffic conditions must be established by use of road segment counts and intersection turning movement counts not more than one year old at the time the detailed methodology is established. For a traffic impact study, the consultant needs to provide all required intersection turning movement counts within its traffic impact area. Future background traffic must include approved (reserved) trips and proper traffic growth on the studied roadways.

Analysis Procedure

A generalized LOS analysis of all roads in the impact area for each necessary analysis scenario must be conducted. For any significantly impacted segment found to be operating below its adopted LOS according to the generalized LOS analysis or for any backlogged or constrained facility, a detailed analysis must be provided using Highway Capacity Software (HCS) intersection analysis for the intersections at each end of the road segment, and HCS arterial roadway analysis for road segment. Three scenarios must be analyzed for the development under consideration: (1) Existing plus vested traffic conditions, (2) Existing plus vested plus project traffic conditions, and 3) for an analysis for rezoning petitions and special exceptions, an existing condition traffic analysis is required. An operational analysis including queue length analysis is generally required.

- **Do you have any general issues or concerns regarding your local governments CMS? Would you consider your CMS or any part of it a best practice?**

The limited coordination with other jurisdictions is a concern. County staff would prefer more coordination so that projects in adjacent jurisdictions account for their impacts that meet the significance test of one (or both) jurisdictions. Shared facilities should have the same LOS standard, but the procedures used throughout Florida are similar enough that good intergovernmental coordination to ensure there is an accounting of extrajurisdictional impacts would be sufficient.

Resource Documents and Correspondence

- Sarasota County Land Development Regulations, Chapter 94, Article VII, Concurrency Management, May 11, 1999.
- Sarasota County Land Development Regulations, Chapter 94, Article VIII, Development Agreements, October 12, 2004.
- Sarasota County Resolutions No. 98-169, July 15, 1998.
- Davis, Clarke <cbdavis@scgov.net> Re: Latest Sarasota County Traffic Concurrency Ordinance and Related Documents.” 30 Jan. 2006, Personal e-mail (1/30/2006).
- Telephone conversation with Mr. Clarke Davis, February 3, 2006.
- Brownman, Isaac. <ibrownman@scgov.net> “Re: Duration for Certificate of Transportation Concurrency and de minimis Impacts Tracking.” 8 Feb 2006, Personal e-mail (2/8/2006).
- Davis, Clarke <cbdavis@scgov.net> Re: Summary of Concurrency Management System (CMS) for Sarasota County.” 9 Feb. 2006, Personal e-mail (2/9/2006).
- Davis, Clarke <cbdavis@scgov.net> Re: Revised Summary of Concurrency Management System (CMS) for Sarasota County.” 26 March. 2006, Personal e-mail (3/26/2006).

St. Johns County Concurrency Management System (CMS) Summary

Primary Contact

Bill Hartmann, Transportation Planning Manager (904)209-0613; bhartmann@co.st-johns.fl.us;
 Jan Trantham, Transportation Specialist; jtrantham@co.st-johns.fl.us
 Planning Division Phone: (904) 209 0609
 Email: plancon@co.st-johns.fl.us or plan@co.st-johns.fl.us

Background

St. Johns County, Florida is located in the northeast region of Florida bordering the Atlantic Ocean. The county has a population of nearly 153,000 and encompasses approximately 600 square miles.

- **Initially adopted:** in 1991 by Ordinance 1991-7.
- **If and when it has been updated:** The last update was in 2004.
- **How the “state of transportation concurrency” is conveyed to elected officials:** Information is not conveyed to the elected officials on any regular basis, only in connection with specific projects. The county’s Transportation Analysis Spreadsheet (TAS) is always available online.

System Components

- **Ordinances, manuals, guidelines, and comprehensive plan policies:** The St. Johns County Development Review Manual, dated April 26 2005, “is intended to help users of the Land Development Code (LDC) understand the review and decision making processes outlined in the LDC. The manual includes information on application submittal requirements and review procedures for each review process.” Section 3.0 addresses concurrency and includes an “Application for Concurrency Determination” as well as an “Application for Concurrency Modification.”

Objective H.1.5 of the 2015 EAR Based Comprehensive Plan Amendment dated May 2000 states, “The County shall maintain a Concurrency Management System (“CMS”) as part of the County’s land development regulations which shall ensure that the impacts resulting from the County’s issuance of development orders or development permits shall not result in a reduction in a level of service for affected public facilities below the applicable level of service standards established in Policy H.1.2.1 of this Plan.” Policy H.1.2.1 establishes peak hour level of service standards for all roadway segments within the major roadway network and specifies constrained and backlogged facilities. LOS standards related to mass transit are limited to the provision of transportation disadvantaged services.

- **Tracking system (computer program, spreadsheet, other?):** The county maintains a Transportation Analysis Spreadsheet (TAS) which is available to applicants on the county’s web page. This is an Excel spreadsheet that is manually updated with newly approved project traffic on the 2nd and 4th Thursday of each month after the Concurrency Review Committee Meetings. Additionally, the TAS is updated with new traffic counts every year. When new traffic counts are received, the trips from those projects built before the new traffic counts were taken are released from the concurrency system. One staff member is responsible for updating the information in the TAS. Since December 2004, the county has been tracking developments using an automated concurrency review system, an all web based – intranet system called WATS (Web-based Application Tracking System). This computer system

began in 2000 with an application review system linking together all related applications. Information needed for concurrency tracking is now automatically updated in the concurrency tracking system; such as approved construction plans, plats, building permits. The system also enables data to be made available to the public over the Internet. At some point, applicants will be able to submit applications on-line. The review system also includes an imaging system and all submitted documents are scanned into the system for easy access. The application review system is also integrated with the county's GIS system. At some point, the county may incorporate the TAS into the system to enable automatic tracking rather than using Excel. The system was written/developed by in-house programmers enabling modification/updates, etc. as needed.

- **Geographic Service Area of CMS:** There are four municipalities in the county – St. Augustine, St. Augustine Beach, Hastings, and Marineland (a portion of). The county is in the process of negotiating an agreement with St. Augustine Beach to track concurrency within the city.

If a county CMS, does it track concurrency for some or all municipalities? Not at this time.

Is there a TCEA, TCMA, or MMTD within the CMS? No.

- **Fees:** Small Project (<4 Peak Hour Trips) - No Fee
Minor Project (4-29.9 Peak Hour Trips) - \$250.00
Minor Project reviewed in conjunction with
Other development review application - No Fee
Major Project (30+ Peak Hour Trips) - \$840.00
Modification - \$125.00

Administrative Process

All transportation concurrency applications are received in the Transportation/Concurrency Section of the Planning Division where they are scanned in and reviewed electronically. The system requires project trips to be entered manually into the system after required permits are received. Specific review processes are provided for projects requiring a rezoning or a comprehensive plan amendment.

Only projects considered “minor” or “major” must apply for a transportation concurrency determination. Projects are considered “small,” “minor” or “major” according to a table provided in the Development Review Manual. Small projects as well as single-family dwelling units and duplexes not within larger developments are considered de minimis and are exempt from transportation concurrency review.

- Small Projects: Generate less than four average weekday peak hour trips - negligible impact.
- Minor Projects: Generate four to 30 trips average weekday peak hour – Minor Traffic Review required.
- Major Projects: Generate more than 30 average weekday peak hour trips - Land Development Traffic Assessment (LDTA) required.

A minor project Application for Concurrency Determination is generally submitted and reviewed along with the development review application; however, it can be submitted directly to the Transportation Planning Section if no development review application is being submitted. The

Minor Traffic Review is actually prepared by county staff. If capacity is available, a Final Certificate of Concurrency is issued; if not, the applicant is given the opportunity to enter into a Development Agreement to provide the necessary capacity.

A major project Application for Concurrency Determination must include a Land Development Traffic Assessment (LDTA) and is subject to a mandatory pre-application conference. When the Application is complete and sufficient and if adequate capacity exists for the project, the project is scheduled for the first available Concurrency Review Committee (CRC) meeting. The CRC, which meets twice every month, determines whether to issue a Final Certificate of Concurrency, a Final Certificate of Concurrency with Conditions, or a Denial Determination. If adequate capacity is not available, then the applicant is given the opportunity to enter into a Development Agreement to provide the necessary capacity.

- **When concurrency is determined:** An Application for Concurrency Determination can be submitted anytime during the development review process, but concurrency must be determined and a Final Certificate of Concurrency must be obtained prior to approval of a Final Development Permit or rezoning.
- **Different levels of concurrency:** An Informational Concurrency Determination can be obtained by payment of a processing fee to determine available capacity for the specific project; however, it does not guarantee that the adequate facilities will be available at the time Development Permit Application is made. A Final Concurrency Certificate must be obtained prior to approval of a Final Development Permit.
- **Duration of certificate:** A Final Concurrency Certificate is valid for two years (including two years for each phase of a multi-phase project) after the issuance date. During that time, if the applicant obtains construction plan approval, final subdivision plat approval, or a building permit, then the certificate is valid as long as those documents are valid. In addition, the certificate can be extended three years if the applicant pays the impact fees and signs a waiver of refund for the impact fees prior to the expiration of the Final Concurrency Certificate. A multi-phase project cannot be extended more than ten years under any circumstances.
- **Conditions for meeting concurrency:** Sec. 11.03.01 of the LDC states, “No Final Development Permits shall be approved until the County Administrator has issued a Final Certificate of Concurrency finding that adequate facilities are or will be available at Adopted Levels of Service concurrent with the impact of the Project; or a Final Certificate of Concurrency approving the Project with conditions.”
- **How are de minimis impacts tracked? Do you prepare a de minimis trip report?** Exempt development traffic is tracked in the Transportation Analysis Spreadsheet (TAS). No report is prepared.
- **Timeframe:** County staff has five working days for completeness review of an application; subsequently, the departments have 15 working days to review the application for sufficiency. Staff must make a concurrency determination for minor projects within 10 working days of receipt of recommendations from the evaluating departments. For major projects, the staff recommendation must be scheduled for the next Concurrency Review Committee (CRC) meeting.

- **Describe the coordination between various city/county departments**
The Planning Division receives and distributes all Applications for Concurrency Determination to the evaluating departments. The findings are coordinated resulting in a Concurrency Report. Transportation concurrency is determined by the Transportation Specialist with assistance from the Transportation Planning Manager as needed. Each approval level has slightly different review requirements:
 - Small Projects – Review and approve
 - Minor Projects – Review and approve with recommendations
 - Major Projects – Review and compile a report with the recommendations of the evaluating departments for review and approval by the Concurrency Review Committee.

- **Intergovernmental Coordination for Transportation Impacts**
 - **Coordinate LOS standards on facilities crossing jurisdictional boundaries?** The county has an interlocal agreement with St. Augustine Beach requiring coordination for concurrency review. They also assist the City of Hastings on an informal basis. As a matter of courtesy, local government staff keeps each other informed of development activity. Jacksonville allows LOS “E” on all of its roads in contrast to the St. Johns County approach.
 - **Administrative process for coordination:** None.
 - **Traffic methodology for determining impacts:** None.

Methodology

- **How LOS standards are established for CMS?** LOS is established in the comprehensive plan as amended by the EAR. Florida Intrastate Highway System – FDOT minimum acceptable LOS standards.
The established LOS for all other roads is based on the FDOT LOS tables with appropriate adjustment factors.

- All Other Roadways:	
- Rural Area	C
- Transitioning Urbanized Area, Urban Area, or Community	D
- Urbanized Area	D

Some exceptions to specific road segments are provided allowing LOS “E” in some locations. On roadways identified as constrained, level-of-service must be maintained (110% of adopted LOS within the urbanized area and 105% of adopted LOS outside the urbanized area). U.S. 1 South is one exception where LOS “E” is the minimum acceptable LOS and a new service volume has been established by special link studies.

- **How is capacity measured?** Per the Transportation Analysis Spreadsheet (TAS), available capacities of roadway segments are calculated by subtracting the existing traffic (adjusted by growth factor) and future background traffic (exempt development traffic + approved concurrency traffic) from the capacity of the roadway segment.

- **Methodology for collecting and updating critical traffic data**

Part 11.04.02 of the LDC establishes a Concurrency Information Base that includes “an inventory of existing land uses and project land uses, based upon Final Development Permit approvals.” As part of this effort, the county maintains and updates the following transportation-related data on a periodic basis:

- Traffic count data
- P.M. peak hour trip rate and percent new trips data table
- Development size data
- Roadway characteristic inventory
- Transportation Analysis Spreadsheet
- Major road network map
- Traffic impact study file

Traffic counts: The county updates the traffic count data from new traffic counts and traffic counts from approved traffic impact analyses on an annual basis. A growth factor is applied to account for traffic generated outside the county; “k” factors are applied to determine peak hour volume.

Planned improvements: “If a Development Permit is issued subject to the conditions that the necessary facilities and services to serve the new development are scheduled to be in place or under Construction not more than three (3) years after the issuance of a Certificate of Occupancy or its functional equivalent as provided in the county's Five Year Schedule of Capital Improvements. The Schedule of Capital Improvements may recognize and include transportation Projects included in the first three (3) years of the applicable, adopted Florida Department of Transportation Five Year Work Program. The Capital Improvements Element must include the following policies:

- The estimated date of commencement of actual Construction and the estimated date of Project completion.
- A provision that a plan amendment is required to eliminate, defer, or delay Construction of any road or mass transit facility or service which is needed to maintain the adopted Level of Service standard and which is listed in the Five Year Schedule of Capital Improvements.”

Monitoring of development trips: The county tracks new development trips using the WATS automated concurrency system to determine when to add trips to or remove trips from the Transportation Analysis Spreadsheet (TAS).

The county has also developed a method to address trips from exempt developments (those that were approved prior to adoption of concurrency regulations in SJC (prior to 3/1/1991)). Because there are no traffic studies for these developments and no development schedule, the county has developed a formula to account for the trips these developments may add to the transportation system. This number is shown as “Exempt Development Traffic” in the TAS and is updated annually. The formula is: $\text{New Peak Hour Traffic} \times \text{Annual Growth Rate} = \text{“Exempt Development Traffic.”}$ For example, if the 2005 Peak Hour Traffic is 261 and the annual growth rate for the segment is .012, then the Exempt Development Traffic is $261 \times .012 = 3$. Basically, this is adding an additional year of traffic to each segment to account for exempt development trips.

Do you add trips from DRIs (or other developments) approved in adjacent jurisdictions to your CMS? DRI’s are considered to meet concurrency through the “pipelining” provision of §163.3180(12) F.S. Regardless of what link received funding through the “pipelining”

provision, trips are added to the TAS as each phase is submitted for a Development Permit. Even if a segment link is at or over capacity, the trips are allowed because the DRI has “met concurrency.”

Policies addressing this issue include:

“The County shall review the County Comprehensive Plan, Plan amendments, Developments of Regional Impacts (DRIs), and development plans for relationships and impacts on the comprehensive plans of the adjacent local governments: Duval, Flagler, Clay and Putnam Counties, and the municipalities of Hastings, St. Augustine, St. Augustine Beach and require notification of affected jurisdictions of proposed development.”

“St. Johns County shall request adjacent local governments to submit Comprehensive Plan amendments, proposed annexations, land use changes, DRIs, and development plans for review for relationships and impacts on St. Johns County. In addition, the County shall encourage the establishment of interlocal agreements between local governments to share information, to notify the County of proposed development, and to address planning issues by December 2001.”

- **Traffic Impact Study Methodology**

Guidelines for completing traffic impact studies are located in Appendix A of the St. Johns County Land Development Code, St. Johns County Traffic Impact Study Methodology and Procedures. Type of traffic impact studies include:

- *Small Project Review*: Generate less than four average weekday peak hour trips - negligible impact.
- *Minor Traffic Review*: Required for developments generating four to 30 trips average weekday peak hour.
- *Land Development Assessment (LTDA)*: Required for developments generating more than 30 average weekday peak hour trips.

The LTDA must “identify Development traffic volumes on each impacted segment, identify those segments on which the adopted Level of Service cannot be maintained, include link and intersection analysis, and recommend potential solutions for those segments and intersections on which the adopted Level of Service is not being met.”

Trip Generation

Traffic impact studies submitted to the county should include project land uses, the applicable ITE land use code(s), building sizes and/or number of dwelling units. Internal capture techniques may be used for certain types and sizes of mixed developments. The following sources may be used for calculating trip generation and internal capture rates:

- St. Johns County PM Peak Hour Trip Rate and Percent New Trips Data Table
- trip generation rate from a previously approved St. Johns County traffic impact study of a similar land use;
- the most recent version of the ITE Trip Generation Handbook and ITE Trip Generation Informational Report as approved for use by the county; and,
- a site specific trip generation study of the same type or similar land use approved by the county at the pre-application conference.

Trip Distribution

Trip distribution and assignment of a new development must be in compliance with accepted traffic engineering principles which are documented in NCHRP Report 187 “Quick Response Urban Travel Estimation Techniques and Transferable Parameters Guide.” For traffic distribution and assignment, a gravity model can be used. In addition, the county has a list of previously approved studies that are made available to the applicant. Traffic distribution and assignment can be based on a previously approved study of a similar land use.

Traffic Impact Area

The traffic impact area includes all the roadway segments that are impacted by new development traffic at a level of one percent or more of the maximum service volume of the adopted LOS, up to a four mile radius from the boundaries of the project area. The impact area may be expanded to include the next major intersections and/or additional segments at the county’s request.

Existing and Future Background Traffic

Per the Traffic Impact Study and Methodology Procedures, “St. Johns County maintains traffic count data on all segments of the Major Road Network. New traffic counts as well as traffic count data from approved traffic impact analyses will be used to update the traffic counts in the concurrency management database on an annual basis.”

Analysis Procedure

Within an LDTA, a segment analysis is required if the segment’s maximum service volume will be exceeded with the addition of the new development trips to determine if additional capacity is available on the segment based on operational characteristics of the segment. In addition, a segment capacity analysis and a travel study can be performed to review signal spacing and timing, and to determine the operating speed and matching level of service, respectively. Methodology may include Highway Capacity Software, ART_TAB, ART_PLAN, Transyt-7F, Passer II, Traf_Netsim, or a study to determine operating speeds.

An Intersection Analysis is required for major signalized and unsignalized intersections where one or more legs of the intersection impacted by the new development are over 90% of the maximum service volume of the adopted LOS standard. For intersections where two roads with different LOS standards intersect and intersection analysis is required, the lower LOS standard is considered as the intersection LOS standard. The intersection analysis methodology is based on the Highway Capacity Manual, Transportation Research Board Special Report 209 or a methodology approved by the county. The applicant must recommend and commit to improvements if the intersection is below acceptable LOS standards.

- **Do you have any general issues or concerns regarding your local governments CMS?**

Staff has concerns regarding the current lack of intergovernmental coordination with the municipalities within St. Johns County as well as the neighboring local governments that will become more and more important as development continues in our county as well as the surrounding counties.

- **Would you consider your CMS or any part of it a best practice?** Staff likes the automated tracking system. In particular, the staff appreciates that the system has been developed in-house and, as a result, the system can be updated quickly in response to any needed changes.

Resource Documents and Correspondence

- St. Johns County, Land Development Code Article XI , April 6, 2004.
- St. Johns County, Traffic Impact Study Methodology and Procedures, July 29, 1999.
- St. Johns County, Development Review Manual, Section 3.0 Concurrency, Revised April 26, 2005.
- St. Johns County, 2015 EAR Based Comprehensive Plan Amendment, May 2000.
- Telephone conversation with Bill Hartmann and Jan Trantham, March 21, 2005.
- Trantham, Jan. <htrantham> “RE: Revised summary.” 03 Apr. 2006. Personal e-mail. (03 Apr. 2006).
- Telephone conversation with Jan Trantham, April 4, 2006.

City of Tallahassee Concurrency Management System (CMS) Summary

Primary Contact

Timothy Allen
Concurrency Analyst
Growth Management Department
408 North Adams Street
Tallahassee, FL 32301
Tel: (850) 891-7115
allent@talgov.com

Background

The City of Tallahassee is the capital of Florida and the county seat of Leon County. As of 2004, the city's population recorded by the U.S. Census Bureau was 156,512, while the Tallahassee metro is estimated at 255,500. Encompassing 98.2 square miles, Tallahassee is a regional center for trade and agriculture.

- **Initially adopted:** Tallahassee adopted its concurrency management system by ordinance on September 26, 1990 (Ordinance No. 90-O-0080AA).
- **If and when it has been updated:** There have been two recent significant updates to City of Tallahassee's CMS. In December 2005, Item f: Capacity Constrained Roadway Segments was added into Section 4.1.1 of the Concurrency Management System Policy and Procedures Manual, which offers an optional LOS standard of "LOS E plus 50%". This standard may be applied in calculating the concurrency capacity for constrained roadway segments if certain criteria are met. In addition, Section 6.4.5 Transportation Mitigation and Pro-Rata Share Option was added into the manual, which provides a method to determine proportionate share contributions toward impacted segments that are not in the Primary Transportation Impact Network (PTIN), and on which concurrency traffic standards are not met. (The PTIN is comprised of all segments of concurrency roadway network that are located within, or are contiguous to, the applicable radius shown in Appendix B-2 in the Concurrency Management System Policy and Procedures Manual. The center of the radius is the point at which the project access will connect to the external roadway system. In instances where there are multiple project access points, all areas within the applicable radii that correspond to these access points must be incorporated into the PTIN). Generally speaking, it is a "pay and go" policy for significantly impacted segments located outside of the PTIN of a proposed development project.
- **How the "state of transportation concurrency" is conveyed to elected officials:**
A concurrency Street Inventory/Status Report is sent to city commissioners upon request.

System Components

- **Ordinances, manuals, guidelines, and comprehensive plan policies:** Concurrency is addressed in the Tallahassee – Leon County Comprehensive Plan, City of Tallahassee Growth Management's Concurrency Management System Policy and Procedure Manual, and City of Tallahassee Concurrency Ordinance No. 90-O-0080AA. The Concurrency Management System Policy and Procedures Manual defines the concurrency requirements of

the comprehensive plan, and outlines the requirements and procedures that must be followed by applicants for new development in order to satisfy concurrency. It also outlines the procedures to be followed by staff to maintain the Concurrent Management System (CMS).

- **Tracking system:** The City of Tallahassee maintains a concurrency Street Inventory/Status Report, which is a spreadsheet that includes a tabulation of the available capacity of each segment based on the adopted LOS standard for each segment. The report is constantly updated to frequently reflect the most recent conditions. The spreadsheet tracks PM peak hour directional volume, estimated future demand change, available capacity, maximum number of trips which can be added to meet concurrency, proposed improvement, date for funding for improvement, laneage information at intersection, percentage of turning movement count at intersection and other information.
- **Geographic Service Area of CMS:** State and county concurrency roadway segments are tracked within the jurisdiction of City of Tallahassee.

If a county CMS, does it track concurrency for some or all municipalities? The City of Tallahassee and Leon County have a similar concurrency tracking system and share data regarding proposed development projects. In addition, depending on the size and location of a proposed project, the city will participate in the review of a proposed project in the county and vice-versa. To date, when recommendations are made for improvements in the adjacent jurisdiction, the developers make the improvements. Because there is no formal agreement, staff is concerned that there may be a point when a developer may not agree to make a requested improvement.

Is there a TCEA, TCMA, or MMTD within the CMS? There is a TCEA in the downtown area as well as in areas surrounding Florida State University (FSU) campus. There are no TCMA or MMTD within CMS. The City of Tallahassee tracks the development trips between TCEA and the area outside the TCEA in the Street Inventory/Status Report.

- **Fees:** The concurrency fee for the City of Tallahassee (COT) is shown in the COT website <http://www.talgov.com/growth/feesched.cfm> as follows:

Commercial	\$173 1st 1,000 Sq. Ft. + \$36/Add 1,000 Sq. Ft.
Residential	\$225 1st DU + \$20/Add DU
<p>Footnotes:</p> <ol style="list-style-type: none"> 1. Historic properties are exempt from all Concurrency permit fees, as indicated in the Growth Management departmental database or with approved documentation from Historic Preservation Board. 2. All requests for review or performance of a transportation analysis will be required to pay the appropriate fee above. If the analysis remains unchanged, the applicant may apply this fee to the final submittal. These reviews will be done after all formal applications are reviewed. 3. Refunds may be made with the approval of the LUES Administrator or the Director of Growth Management. Refund authority will be limited to 1) those fees when a review has not commenced, 2) an over payment, or 3) a payment made in error as the result of an action by LUES staff. A \$25 administrative charge will be assessed for refunds covered under 1) or 2). 	

Administrative Process

The City of Tallahassee Concurrency Management Division reviews transportation concurrency for all developments within the jurisdiction of the City of Tallahassee based on the policy and procedures presented in its latest version of the Concurrency Management System Policy and Procedures Manual. Upon final notice of Development Order approval, the Concurrency Management Division will conduct a final concurrency review based on the approved project parameters, ensure the approval of the Development Agreement, if any, unencumber the project demand and update the concurrency Street Inventory/Status Report to reflect a permitted project demand, issue Certificate of Concurrency or Conditional Certificate of Concurrency, and calculate the impact fees applicable to the project and collect the same.

- **When concurrency is determined:**
For most developments, a concurrency determination review is required after a Certificate of Land Use Compliance has been obtained for the proposed project and prior to, or simultaneous with the submittal of a site plan.
- **Different levels of concurrency:** A preliminary concurrency assessment must be made within eight calendar days after receiving complete and sufficient application. If a preliminary review indicates that the project meets the concurrency requirements a "Preliminary" Certificate of Concurrency is issued on the project. This "Preliminary" Certificate of Concurrency is good for 28 calendar days and enables the applicant to proceed with an application for development approval. A final concurrency review is conducted after final land use approval is received. If a project has been determined to meet the concurrency requirements, a "Final" Certificate of Concurrency will be issued to the applicant and capacity will be reserved for the project. The "Final" Certificate of Concurrency allows an environmental permit application to be accepted and a building permit application to be accepted.
- **Duration of certificate:** By applying for and receiving a Certificate of Concurrency, an applicant may reserve capacity for up to two years prior to receiving a Final Development Order, provided all impact fees and other infrastructure cost required for the development are paid up front. A "Final" Certificate of Concurrency is valid for the term of the Development Order (site plan, plat or permit) associated with the Certificate, or two (2) years from date of issuance if no term is specified. A request can be made to extend both the Development Order and the Certificate of Concurrency up to six months unless development has not commenced or another applicant is waiting for the capacity.
- **Conditions for meeting concurrency:**
A "concurrency review" is performed to determine if there is adequate capacity in each of the impacted transportation facilities to accommodate the impact of the existing population, vested and exempt development projects, previously permitted development projects and the proposed new development project at or above the adopted LOS. For limited access, arterial and collector roadways, the capacity must be available or the necessary improvements under contract for construction within three (3) years of the issuance of the final Development Order.

If all impacted facilities have adequate capacity, then a "Certificate of Concurrency" may be issued. If one or more of the impacted facilities do not have adequate available capacity, but improvements are scheduled that will provide the necessary capacity to eliminate any existing

deficiencies and accommodate the proposed new development project, then a "Conditional Certificate of Concurrency" may be issued. The "Conditional Certificate of Concurrency" and related Development Order will be conditioned on the issuance of the contract for construction of the improvement or its completion. If there is not adequate capacity available on one (1) or more of the concurrency facilities and no improvements are scheduled, one of the following may occur:

- a) The applicant may reduce the size of the development project such that capacity will be adequate, or
- b) The city and the applicant may reach an agreement on methods to eliminate the deficiencies prior to the development project's impact. In this case a "Conditional Certificate of Concurrency" may be issued, pursuant to a binding development agreement.

If adequate capacity is not available and no improvements are scheduled, and no agreement can be reached on methods to eliminate the deficiencies, a "Certificate of Concurrency" and the related Development Order will be denied. An appeal may be filed with the Director of the Growth Management Department within 15 calendar days after denial of a Certificate of Concurrency.

- **How are de minimis impacts tracked?** The City of Tallahassee has “significant thresholds” used to determine when mitigation will be required. Project impacts that are less than the applicable significance thresholds are included (“tracked”) along with all other trips in determining available capacity. However, the City of Tallahassee generally does not require a concurrency review for developments that are projected to generate five PM peak hour trips or less. Therefore, the trips associated with these minimal impact developments are not tracked.
- **Timeframe:** Staff makes a preliminary assessment regarding concurrency based on the submitted application within eight calendar days from the submission date of a complete and sufficient application. If the preliminary review indicates that the project meets the concurrency requirements, a “Preliminary” Certificate of Concurrency will be issued on the project. The review time varies after the preliminary assessment of transportation concurrency.
- **Describe the coordination between various city/county departments**
The Concurrency Review Committee (CRC) is a committee made up of technical staff from departments or agencies responsible for the various concurrency facilities. The City of Tallahassee and Leon County Public Works staff coordinate on traffic signal timing information. There is a joint city/county Planning Department that developed a coordinated strategy for determining impact area, exception area, changing LOS standards and road improvements.
- **Intergovernmental Coordination for Transportation Impacts**
The City of Tallahassee and Leon County coordinate the traffic impact analysis for developments near the city/county boundary.
 - Coordinate LOS standards on facilities crossing jurisdictional boundaries: The City of Tallahassee and Leon County have the same LOS standards in the Urban Service Area (USA).

- Administrative process for coordination: The City of Tallahassee and Leon County have an informal agreement to share information.
- Traffic methodology for determining impacts: The City of Tallahassee and Leon County have very similar methodologies for determining impacts. They have similar CMS policy and procedures manuals. The difference is mainly on the radii used for PTIN determinations.

Methodology

- **How are LOS standards established?**

The LOS standards on roadway segments are established in the comprehensive plan primarily based on the roadway types (such as interstate, arterial and collector) and, at times, the roadway location (i.e., whether or not it is in area where development incentives are desirable). The LOS standards on some roadway (such as FIHS) are mandated by FDOT requirements.

- **How is capacity measured?** The City of Tallahassee developed a computer program called MAXVOL that utilizes estimated green times, percentage of exclusive turns at signalized intersections as well as other factors to compute the capacity for each transportation concurrency roadway segment. The method used for the capacity computation is similar to FDOT ARTPLAN, which implements the planning methodology addressed in the Highway Capacity Manual (HCM).

- **Methodology for collecting and updating critical traffic data**

Traffic counts: The Public Works Department performs traffic counts for each regulated segment annually, and conducts intersection turning movement counts once every three years throughout the county.

Planned improvements: The planned improvements include projects that are scheduled for construction within the first three years of the City of Tallahassee's Capital Improvement Program (CIP) and FDOT Work Program.

Monitoring of development trips: The City of Tallahassee uses a spreadsheet to record the approved trips of developments on all regulated roadway segments. Trips are tentatively reserved and encumbered in the Concurrency Management System when a development is active in the application process. If application deficiencies are not corrected and the application is not declared sufficient within 28 calendar days, Concurrency Management staff will unencumber the tentatively reserved project demand and make the facility capacity available to other applicants.

Do you add trips from DRIs (or other developments) approved in adjacent jurisdictions to your CMS? Extra jurisdictional traffic from DRI and major developments approved in the Leon County near the county and city boundary is included in the traffic impact analyses, and the computed future demand changes from QRS II software are added into the Street Inventory/Status Report. Therefore, the Street Inventory/Status Report is constantly updated.

- **Traffic Impact Study Methodology**

For small projects whose total driveway vehicle trips generated during the PM peak hour are estimated to be 100 or less, a traffic analysis may either be conducted by concurrency management staff (based on the project parameters provided by the applicant), or may be provided by the applicant. For large projects, including all projects not classified as small, a traffic impact analysis, prepared by a qualified professional, is required.

Trip Generation

PM peak hour trip generation and directional split for project traffic must be estimated using the equations (typically used) and rate addressed in the latest edition of the Institute of Transportation Engineers (*ITE Trip Generation Manual*). It also accepts survey or study results if a specific land use is not included (or there is limited data) in the *ITE Trip Generation Manual*.

Trip Distribution

Project trip distribution and assignment are based on Quick Response System (QRS) software in conjunction with the most current traffic analysis zone (TAZ), socio-economic and network data.

Traffic Impact Area

A significant impact is deemed to occur on a critically deficient roadway segment when the PM peak hour vehicle trips from a proposed development project are projected to consume 1% or more of the directional service volume (at the adopted LOS) of a roadway segment. A critical deficient roadway segment means the PM peak hour directional volume on the roadway segment exceeds the directional service volume (at the adopted LOS) based on existing traffic counts, OR the total (future) PM peak hour directional volume on the roadway segment will exceed 120% of the directional service volume (at the adopted LOS) based on projected traffic demands. For all other roadway segments, a significant impact is deemed to occur when the PM peak hour vehicle trips from a proposed development project are projected to consume 5% or more of the directional service volume (at the adopted LOS) of a roadway segment.

Existing and Future Background Traffic

Existing traffic conditions are estimated using the latest available road segment and turning movement counts. Determination of future traffic volumes incorporates the use of the city's RQS traffic forecasting model to assign trips associated with approved (unbuilt) development projects to future roadway network.

Analysis Procedure

Trips estimated to result from a proposed development project are input into the QRS forecasting model (select zone) to obtain a project trip assignment. The trips assigned to each segment are then compared to the significance threshold in order to determine if concurrency standards have been met. Typically staff or the applicant will conduct a QRS run based on future traffic conditions. This requires the use of the "Future Conditions" QRS model that incorporates TAZ centroids with both existing and approved (unbuilt) trips, as well as a road system with "committed" improvements.

Generally, an operational analysis is not required for transportation concurrency analysis. However, in some cases when disputes occur, Synchro will be performed for more detailed operational analysis. SYNCHRO will be used for intersection analysis if a more detailed intersection is needed.

- **Do you have any general issues or concerns regarding your local governments CMS? Would you consider your CMS or any part of it a best practice?**

Opportunities for system improvement include 1) more opportunities to allow fair share for developments to mitigate transportation impacts; 2) a formal agreement between the City of Tallahassee and Leon County regarding transportation concurrency issues; 3) consideration of both directions, not just peak hour direction for transportation concurrency determinations on impacted roadway segments; and, 4) include AM peak hour traffic analysis if necessary in the CMS.

The concurrency management system used by the City of Tallahassee is well evolved. Although the system is known for being somewhat data intensive, it is generally perceived that its technical implementation of concurrency is a good example for other municipalities to follow if they desire to accurately track and assess development traffic impacts, not knowing what else is out there, it is difficult to say whether it is “Best Practice” or not.

Resource Documents and Correspondence

- City of Tallahassee. Ordinance No. 90-O-0080AA. Chapter 4 Concurrency Management. September 26, 1990.
- Tallahassee-Leon County. Comprehensive Plan. Chapter II – Transportation. Goals, Objectives and Policies. Revised on December 29, 2005.
- Tallahassee. Leon County. Comprehensive Plan. Summary of Planning Trends and Issues. Draft-December 31, 1996.
- City of Tallahassee. Concurrency Management System Policy and Procedures Manual. November 15, 2004, Revised February 23, 2006.
- Leon County. Concurrency Management Policy and Procedures Manual. Revised on September 16, 2005.
- Telephone interview with Timothy Allen on March 14, 2006.
- Revision of summary by Timothy Allen received on March 30, 2006.

APPENDIX D: CITY OF ROCKVILLE, MARYLAND

Comprehensive Transportation Review Methodology

Source: City of Rockville. Comprehensive Transportation Review (CTR) Methodology. City of Rockville, Maryland, September 2004.

<http://www.rockvillemd.gov/residents/traffic/pdf/CTR10042004.pdf>

Contact: Katherine Kelly
 Transportation Planner - Department of Public Works
 240-314-8527
 kkelly@rockvillemd.gov, www.rockvillemd.gov

The City of Rockville, Maryland enacted a Comprehensive Transportation Review (CTR) Methodology in September 2004 to evaluate the impacts of new development on the transportation system. This methodology requires applicants to conduct an off-site analysis of all transportation modes.

The transportation issues facing Rockville are comparable to those of many Florida communities. Rockville is located in the Washington DC metropolitan area and is characterized by lower density suburban style development. Given the regional context, the city experiences a significant amount of through traffic on its major thoroughfares. The transportation plan describes the city as follows:

“The suburban nature of many areas in Rockville makes people dependent on the automobile. Residential neighborhoods are separated from commercial areas. Cul-de-sacs and dead end streets divide uses that are physically proximate. Some neighborhoods have no sidewalk or walkway system. There is competition between the automobile and pedestrians at intersections. All of these factors force many residents to disregard walking as a viable means of transportation.”

As a result, Rockville is moving away from mitigation measures related primarily to providing additional roadway capacity through physical improvements and is encouraging mitigation for alternative modes (e.g., ridesharing programs, shuttles to transit stations, installation of pedestrian and bicycle facilities, etc.). Applicants may also be obligated to contribute toward the improvement of offsite transportation and safety facilities to help address identified safety hazards for all modes. As stated in the City Transportation Plan,

“Providing safe, direct pedestrian routes between residential areas and activity centers can help reduce the number of day-to-day vehicle trips. These connections can be created or improved by installing sidewalks, adding paths to link cul-de-sacs and dead end streets, installing pedestrian signals and crosswalks, or by constructing pedestrian bridges over busy roadways. Treatments, such as lighting, landscaped buffer areas and other streetscape improvements, can heighten safety and make pedestrian facilities more attractive for users.”

Of particular interest is the city’s methodology for determining mitigation for alternative modes and corresponding “trip” credits. Under the methodology, developments that generate 30 or more total peak hour site trips must conduct an off-site analysis for all transportation modes, as they are deemed to have a measurable traffic impact (see TABLE D1). Smaller developments must evaluate on-site multimodal access and circulation needs.

Off-site analyses include an assessment of major intersections that are impacted by the development and non-auto facilities that lead to the development. The goal of the off-site analyses is to “ensure that the site can be accessed safely and efficiently through various modes and that adequate transportation facilities are in place to support the subject development without detriment to the overall transportation system.”

Below is a summary of components of the CTR:

- *Component A—Introduction and Existing Conditions:* Project description.
- *Component B—Site Access & Circulation:* Analysis of internal circulation, entrance configurations, vehicular access and other relevant access and on-site features; the Proposed Site Access and Circulation Transportation Statement; and the Proposed Conditions Site Plan.
- *Component C—Automobile Traffic Analysis (Off-Site):* Analysis of auto traffic using the technical guidelines for traffic analysis in the traffic study area.
- *Component D—Non-Auto Off-Site Analysis:* Analysis of access to the development from activity centers via alternative modes of transportation using the guidelines for creating an inventory of pedestrian, bicycle, and transit facilities in the non-auto study area and for analyzing intersection safety ratings for these modes of transportation.
- *Component E—Summary, Mitigation, and Credits:* Summary of the report findings and impacts; recommended mitigation plans.

TABLE D1 Completion of TR Components

Completion of TR Components*	
Total Peak Hour Site Trips*	Required TR Components
Less than 30	Component A - Introduction Component B - Site Access and Circulation Component E - Summary, Mitigation and Credits
30 or more	All Components Required

* Peak hour site trips are calculated using the trip generation rates referenced in Section IIIC5.

* Note: Not all types of development applications are subject to CTR standards. Refer to Table 1 to determine types of development applications that must comply with CTR standards.

Non-Auto On-Site Analysis

The non-auto *on-site* analysis must address availability of sidewalks and bicycle facilities on the site frontage and in some cases through the site. Bicycle facilities are those identified in the Bicycle Master Plan. Transit facilities are based on projected daily ridership (existing ridership data plus additional ridership projected from the new development).

Non-Auto Off-Site Analysis

The non-auto *off-site* analysis must address access to the development from activity centers via alternative modes of transportation. Activity centers are defined as “areas with destinations such as schools, shopping, recreational facilities, and other points of attraction.” Under the guidelines, developers must conduct an inventory of pedestrian, bicycle, and transit facilities in the non-auto study area along routes to activity centers within a certain radii of the site, and evaluate intersection safety ratings for these modes of transportation.

Activity center routes to evaluate are determined in coordination with city staff based on “land uses surrounding the access route, volume of activity, and priority of the city to attract persons to the activity center(s).” The extent of the non-auto study area is based on trip generation and a radii based on city analysis of walk sheds to non-auto facilities and national studies of how far individuals will

travel to use non-auto facilities (TABLE D2). The city also designated transit oriented areas (TOAs) where “viable non-auto options exist within 7/10ths of a mile accessible walking distance” from existing and programmed transit stations and major access routes to transit facilities. TOAs provide for lower LOS thresholds than non-TOAs given the viability of multi-modal options.

TABLE D2 Non-Auto Study Areas

Non-Auto Study Areas						
New	30-350		351-500		500+	
Minimum Activity Center Routes Evaluated	1		2		3	
Accessibility to Activity Centers	.25 mile radius	.35 mile radius	.35 mile radius	.45 mile radius	.45 mile radius	.50 mile radius
TOA Designation	TOA	Non-TOA	TOA	Non-TOA	TOA	Non-TOA

Note: The radii of a study area can be expanded up to .5 mile for developments in TOAs when considering installation of transit facilities. For example, if installation of bus facilities is planned within a TOA, the radii of the study area can be as large as .5 mile for all developments regardless of peak hour site trips generated.

Selected sidewalks and bicycle facilities within the non-auto study area must be evaluated for connectivity from the site to activity centers. The City of Rockville’s “Synthesis of Pedestrian Policies” manual is used to guide improvements to pedestrian facilities. Determinations of deficiency for bicycle facilities are based on bicycle level of service (BLOS) standards established by the city based on the “levels of comfort” that riders feel on designated facilities. BLOS is calculated based on volume of directional traffic, speed limit, lane width, pavement surface, percentage of heavy vehicles, and other roadway and sidewalk characteristics and conditions.

The city’s goal for the bikeway network is to maintain a Bicycle LOS (BLOS) of “C.” This is accomplished primarily by providing facilities that connect and are accessible. Routes are determined by staff, based on the City’s Bicycle Master Plan.⁹ All bicycle facilities in the City’s Bikeway Master Plan that lie within the non-auto study area, including shared roadways, signed-shared roadways, bike lanes, shared-use paths, or widened sidewalks, must be identified in the inventory.

The transit inventory along activity center routes must include the location of bus routes, frequency of service, hours of operation, existing daily ridership levels, and bus stops and amenities (concrete pad, bench, bus shelter and connectivity to the sidewalk network) at existing and programmed bus stops. The transit inventory must also include lighting features (overhead streetlights) at transit stops and nearby parking areas, as well as availability (posting) of schedules or realtime transit information.

Another interesting feature of the methodology is the requirement for each applicant to conduct an intersection safety analysis for all modes. The intersections to be rated for safety are determined in the scoping meeting, when the non-auto study area is being identified. Each intersection is evaluated and given a rating that ranges from poor to excellent, based on a table of safety rating indicators. Applicants must also determine if intersection crossing times are adequate based on city standards. For example, if the flashing walk time is less than the length of the lanes divided by four, then crossing time is deemed inadequate.

⁹ City of Rockville. *Rockville Bikeway Master Plan Update*. As adopted April 2004. Rockville Maryland. <<http://www.rockvillemd.gov/masterplan/bikeway/index.html>>.

Summary of Development Application Issues and Impacts

Upon completion of the required multimodal analysis, applicants must summarize all issues and impacts related to site access and circulation, automobile traffic, non-auto facilities and intersection safety. All impacts must be noted in a chart listing impacts on the left and intended mitigating actions on the right.

Mitigation

Trip credits for mitigation are applied against new peak hour site trips before any other trip credits or reductions (apart from pass-by reduction) are applied for the development application. No additional credit will be applied if modal split is used in traffic analyses. Mitigation plans must be approved by the Traffic & Transportation Division and may consist of:

- Implementation of, or monetary contribution towards, proximate physical roadway modifications that increase auto capacity sufficiently to bring LOS to acceptable levels;
- Implementation of, or monetary contribution towards, physical non-auto improvements that appropriately address project-specific impacts through an alternative means; and,
- Participation in the City's TDM Program or alternative TDM program.

TABLE D3 summarizes types of mitigation an applicant can consider and maximum credits.

TABLE D3 Types of Mitigation and Credits

Types of Mitigation and Credits*		
Mitigation	Maximum Credits Allowed	
	TOA	Non-TOA
Off-site mitigations to roadway network that a developer offers to implement. Goal is to lessen the impact from trips generated by the development.	Variable credit, depending on improvement	
Off-site mitigations to non-auto facilities that a developer offers to implement.	15% of trips	10% of trips
Implementation of a Transportation Demand Management program.	15% of trips	10% of trips
* Note: On-site mitigations (per minimum standards) for access, circulation, pedestrian, bicycle and transit facilities are required and therefore are not eligible for mitigation credits.		

The maximum total amount of trip reductions and credits per development application are outlined in Table D4 of the CTR. These are 30% of new peak hour site trips generated in a TOA and 20% of new peak hour site trips generated in a non-TOA, after pass-by trip reduction is applied and before any other trip reduction or credit is applied. Trips are credited against the total trip generation for the site and not at specific intersections and credits differ within and outside of the TOA. However, mitigation will be targeted toward intersections that are impacted by the new development. Drive-through facilities are not eligible for modal split reductions, mixed use reductions, or trip credits but may be eligible for other trip reductions.

TABLE D4 Maximum Potential Trip Reductions and Credits

Maximum Potential Trip Reductions and Credits		
Type of Trip Reduction or Credit	Maximum Credits Allowed	
	TOA	Non-TOA
Modal split reduction	15%	N/A
Mixed-use development reduction	10%	5%
Non-auto improvements credits	15%	10%
TDM credit	15%	10%
Combined trip reductions and credits ceiling	30%	20%

Applicants are encouraged to mitigate transportation impacts by providing non-auto improvements and modifications to the transportation system. Applicants may receive trip credits only for non-auto improvements approved by the Traffic & Transportation Division that are *beyond* minimum

requirements or that are not already required on site. Trip credits are applied as mitigation according to the rates outlined in Table D5 and may include a combination of facilities, given that certain facilities and programs are more effective in reducing trips than others. Mitigation involving transit facilities must be done in coordination with the Department of Public Works and the regional transit agency, taking into account the effects such facilities may have on operational costs and transit planning.

TABLE D5 Maximum Trip Credit Rates for Non-Auto Facilities

Maximum Trip Credit Rates for Non-Auto Facilities						
New Peak Hour Site Trips Generated	30-100		101-200		More than 200	
	TOA	Non-TOA	TOA	Non-TOA	TOA	Non-TOA
Facility ¹	Credit per facility					
Shared bicycle/ped. Path at least 8' wide, 130' long	4	3	5	4	6	5
Sidewalk at least 4' wide, 130' long ²	3	2	4	3	5	4
Bicycle lane at least 4' wide, 130' long ^{2,3,4}	3	2	4	3	5	4
Indoor shower for bike commuters	3	2	4	3	5	4
Curb extension at intersection ⁵	1	1	1	1	1	1
Bike locker (holds 2 bikes)	2	1	3	2	3	2
Bike rack (>5 bike slots)	2	1	3	2	3	2
Concrete pad at bus stop ⁶	2	1	2	1	2	1
Bus bench ⁶	2	1	3	2	4	3
Bus shelters ⁶	5	3	6	4	7	5
Bus pull-off ⁷	2	1	3	2	3	2
Multimodal Transit Center ⁹						
Enclosed (indoor)	N/A	N/A	25	20	30	20
Covered (outdoor)	N/A	N/A	20	15	25	15
Transit information kiosk ¹⁰	10	10	15	10	20	10
Transit information board ¹¹						
Real-time	7	7	12	12	17	17
Static	1	1	2	2	2	2

¹ "Per facility" refers to the number of credits granted per installation of one facility of the indicated type. Credits are applied above and beyond minimum N/A requirements for adequate public facilities or what is otherwise required on-site.

² When a sidewalk or bike facilities installed is not an exact multiple of 130' long, remaining fractions will be pro-rated.

³ Facilities must link to existing or programmed portions of the bicycle network in the Bicycle Master Plan. Total width, length and location will be determined by the Traffic & Transportation Division at time of development approval, based on development type and size.

⁴ Bicycle lanes that require street lane widening will be credited the same amount as shared bicycle/pedestrian paths.

⁵ This facility must decrease the distance pedestrians must travel to cross a street.

⁶ Other than those required in the non-auto study area. Concrete pads must be installed before a bench or shelter is installed. Locations based on ridership numbers and by determination of the Traffic & Transportation Division.

⁷ Bus pull-offs are not desirable along roads classified as arterial due to speed and volume of traffic. Installation of pull-offs will be determined by the Traffic & Transportation Division and in coordination with Montgomery County Department of Public Works & Transportation.

⁸ Subsidization of a bus stop, portion of a bus route, or extension of service where service is scheduled to be eliminated by Montgomery County Department of Public Works & Transportation due to low ridership or other factors.

⁹ A facility that is a dedicated space for transit information with a public waiting area. Commercial lobbies do not qualify. Must include no less than 1 seat for a transit resource person and no less than 5 seats in the public waiting area. Must be within .7 mile (3696 feet) of at least two bus stops and/or Metro stations.

¹⁰ A facility with transit information and a resource person but no public waiting area.

¹¹ A facility that includes maps and schedules (when possible) of transit services.

The city also has a transportation demand management (TDM) program and TDM Policy, which aim to reduce single-occupancy auto (SOV) trips and implement demand management throughout the city. In a TOA, a maximum of 15% trip credit may be applied for a developer's implementation of a TDM program (see CTR Appendix L for qualifying activities) and participation in the City's TDM Program. Development in non-TOAs may be eligible for a maximum of 10% TDM trip credit. TDM trip credit is summarized in TABLE D6.

TABLE D6 TDM Trip Credit

TDM Trip Credit	
TOA Designation	Maximum Credit Amount*
TOA	15%
Non-TOA	10%

*Applied to new peak hour trips before any other trip credits or reductions, apart from pass-by reduction, are applied for the development application.

The city received a Transportation Community Services Program grant (TCSP) from the Federal Highway Administration to assess accessibility to the Town Center. The planning effort will evaluate the accessibility of the Town Center from all portions of Rockville, for existing conditions, the next five years, and through the Master Plan buildout of the area. The analysis will identify strengths and weaknesses in pedestrian, bicycle, transit, automobile, and truck access to the Town Center. Upon completion of the baseline analysis, the project will prioritize implementation of improvements using a Geographic Information Systems (GIS) model and a series of public participation and coordination activities. The findings will be fed into the master planning process.

The CTR methodology was developed as a precursor to adoption of a new adequate public facilities ordinance. Staff indicated that the program is so new, there has not been experience with it. The trip credit amounts were developed based on a review of what other communities are doing (e.g., Orlando, Portland, Montgomery County), as well as based on observations and experiences with multimodal development and mode split in the past.

Issues faced in program development include the need for proactive coordination with the county and adjacent jurisdictions. An issue that arose was how best to achieve a continuous multimodal network where an abutting jurisdiction does not have similar requirements. The challenge of developing a coherent multimodal network on a site-by site basis was another issue that arose. Staff indicated that there is some benefit to both a facility based, as well as a policy based approach. The facility based approach is straightforward in that credits can be readily provided for developments that contribute toward development of the facility. The policy based approach, which is administered site-by-site, can then address the more micro issues of site network layout and continuity with adjacent sites.