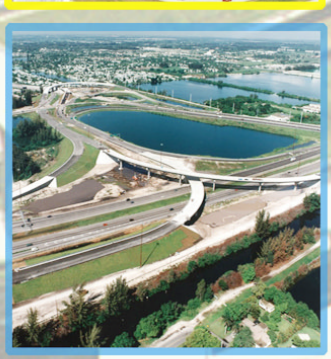
Back To Browse Documents

HOME

January 2003

Policy Resource Documents for

The Interchange Handbook



State of Florida
Department of Transportation
Statewide District Interchange
Review Committee
www11.myflorida.com/planning

to Table of Contents

PRD-1. FEDERAL HIGHWAY ADMINISTRATION REQUIREMENTS AND GUIDELINES

1.1 ADDITIONAL INTERCHANGES ON THE INTERSTATE SYSTEM

The Interstate System is designed to provided the highest level of services in terms of safety and mobility. Adequate access control to Interstate facilities is critical to maintaining the Interstate System. Therefore, new or revised access points to the Interstate System will be considered for FHWA approval only if the following policy criteria is met. Federal Register, dated February 11, 1998, Doc. 98-3460.

1. **Existing system is incapable of accommodating the traffic...**
   The proposal must demonstrate that the existing interchanges and/or local roads and streets in the corridor can neither provide the necessary access nor be improved to satisfactorily accommodate the design year traffic demands while at the same time providing the access intended by the proposal.

   Intent - The intent of this policy is to require the Applicant to demonstrate an access point is needed for regional traffic needs and not only to solve local system or developer needs or problems. The Interstate facility should not be allowed to become part of the local circulation system, but should be maintained as the main regional and interstate highway as intended.

2. **All reasonable alternatives to a new interchange have been considered...**
   All reasonable alternatives for design options, location and transportation system management type improvements such as ramp metering, mass transit and High Occupancy Vehicle (HOV) facilities have been assessed and provided for if currently justified or provisions are included for accommodating such facilities if a future need is identified.

   Intent - The intent of this policy is to assure all reasonable alternatives, including improvements to existing local roads and streets in lieu of new access, have been fully considered. Detailed design is not expected in most instances, especially in rural areas. Generally, sufficient information on recommended interchange configuration necessary for an operational analysis, including expected number of lanes and weaving distances, is the only required design detail. However, in some cases (especially in urban areas), it may be necessary to provide more detailed design information to assure the Interstate facility with the new access point will work as intended.

- POLICY RESOURCE DOCUMENTS -

FEDERAL HIGHWAY ADMINISTRATION REQUIREMENTS
AND GUIDELINES (dated June 2002) .....PRD 1-1

FDOT RULES, POLICIES AND PROCEDURES (dated June 2002) .....PRD 2-1

INTERCHANGE MODIFICATIONS
REQUIRING AN IMR (dated June 2002).....PRD 3-1

CONSISTENCY WITH MASTER PLANS (dated June 2002) .....PRD 4-1

CONSISTENCY WITH THE STATEWIDE
FIHS PLAN (dated June 2002).....PRD 5-1

RELATIONSHIP TO THE PD&E PROCESS (dated June 2002).....PRD 6-1

JUSTIFICATION REQUIREMENTS APPLICABILITY .....PRD 7-1

3. Proposal does not adversely impact the freeway...

The proposed access point does not have a significant adverse impact on the safety and operation of the interstate facility based on an analysis of current and future traffic. The operational analysis for existing conditions shall particularly in urbanized areas, include an analysis of sections of interstate to and including at least the first adjacent existing or proposed interchange on either side. Crossroads and other roads and streets shall be included in the analysis to the extent necessary to assure their ability to collect and distribute traffic to and from the interchange with new or revised access point.

Intent - The purpose of this policy is to assure that sufficient operational analyses are made to determine the impact on the Interstate operation from the new or modified access. Preferably, the analysis should be extended as far along the mainline and include as many existing interchanges as is necessary to establish the extent and scope of the impacts. This could be critical in urban areas with many relatively closely spaced interchanges.

Sufficient analysis of the crossroad and even some of the parallel facilities, as appropriate, must be made to assure that if the new access is approved, the local roads are adequate to handle the new traffic loads. A 20-year design period should be used. This policy clearly indicates significant impacts should be the analysis focus. The Interstate section analyzed shall extend at least to the next interchange in each direction and beyond, if necessary.

4. A full interchange at a public road is provided...

The proposed access connects to a public road only and will provide for all traffic movements. Less than "full interchanges" for special purpose access for transit vehicles for HOVs or into park and ride lots may be considered on a case-by-case basis. The proposed access will be designed to meet or exceed current standards for federal-aid projects on the interstate system.

Intent - The FHWA intent is that all interchanges should provide for all movements except in the most extreme circumstances. However, it is recognized that circumstances may exist when initial construction of only part of an interchange might be appropriate. Where such circumstances exist, commitments, possibly even purchase of necessary right-of-way during the initial project stage for future completion, must be made. Special purpose access for special use/HOVs, for transit vehicles, or into park-and-ride lots should be treated as special cases and the movements to be provided decided on a case-by-case basis.

5. **Transportation Plans**: FHWA policy states: *"The proposal considers and is consistent with local and regional land use and transportation plans. Prior to final approval, all requests for new or revised access must be consistent with the metropolitan and or statewide transportation plan, as appropriate, the applicable provisions of 23 CFR part 450 and transportation conformity requirements of 40 CFR parts 51 and 93."*

   The request must include a discussion as to how the current proposal fits into the transportation plan for the area and, if it is to be a future addition to the current plan, how it may affect the current plan (i.e. air quality conformity). Although requests for engineering and operational approval of access may be made prior to being included in transportation plans, final approval cannot be given if the project is not included in the appropriate plan (i.e. approval by MPO in the Long Range Plan). Such coordination should be made as part of the normal project development process.

6. **Comprehensive Interstate Network Study:** FHWA policy states: *"In areas where the potential exists for future multiple interchange additions, all requests for new or revised access are supported by a comprehensive Interstate network study with recommendations that address all proposed and desired access within the context of a long-term plan."*

   Intent - The intent of this requirement is to cause sufficient review and coordination so as not to have piece-meal consideration of added access and to avoid future conflict as much as possible with other proposed access points. It is usually best to consider all proposed changes in access for an area at the same time. If a new or revised interchange is being proposed and another new or revised adjacent interchange is being planned and programmed, then both changes should be analyzed together. The expectation here is that any proposal is considered in view of currently known plans for transportation facilities and/or land use planning and is especially important when several new interchanges are anticipated.

7. **Coordination with Transportation System Improvements:** *The request for a new or revised access generated by new or expanded development demonstrates appropriate coordination between the development and transportation system improvements.*

   Intent - The intent of this requirement is to assure the highway facilities are developed in an orderly and coordinated manner to serve the public. Therefore, where private development is clearly the driving force behind the need for added access, it is only reasonable FDOT, FHWA and the Applicant work closely together to develop the access to achieve mutual benefits with minimal adverse impact on the

Interstate travelers. Staged construction could be used where extensive private development is not expected to be completed for several years.

The Applicant might be required to have certain parts of the local circulation system ready before ramps can be constructed or opened to traffic. In some heavily congested areas, the Applicant might be required to provide ride sharing incentives or even assist in providing transit facilities. The intent is to accomplish all possible coordination.

Coordination or cooperation would be very appropriate where a Applicant has agreed to fund or perhaps even construct access at the same time FDOT is either planning or is already in the process of improving that particular section of the interstate route. It is only reasonable that the two activities be coordinated and compatibility assured.

8. Request needs to consider planning and environmental constraints...

The request for new or revised interchange contains information relative to the planning requirements and the status of the environmental processing of the proposal.

Intent - The intent of this policy is to ensure the proposed action does not have any environmental fatal flaws that would require significant changes in the concept during subsequent phases of project development. Final approval from FHWA will only be granted after the NEPA process is completed. Development of final plans and right-of-way acquisition may not proceed until approval of the environmental document.

1.2 FHWA POLICY APPLICATION

These policies are applicable to new or revised access points to existing interstate facilities regardless of original construction funding or the funding for the new access points. This includes routes incorporated under the provisions of 23 United States Code (USC) 139(a) or 139(b). It does not include toll roads incorporated into the Interstate System under the provisions of 23 USC 129(b) except sections on which federal funds have been expended.

Generally, revised access is considered to be a change in the interchange configuration even though the number of actual points of access may not change. For example, a diamond interchange configuration has four access points. Replacing one of the direct ramps of a diamond interchange with a loop, or changing a cloverleaf interchange into a fully directional interchange is considered as revised access for the purpose of applying these policies. Each entrance or exit point including “locked gate” access to the mainline is considered to be an access point.

All FHWA approvals for added or revised access are conditional upon FDOT complying with all applicable federal rules and regulations. The FHWA approval constitutes a federal action, and as such, requires NEPA procedures be followed. The NEPA procedures will be accomplished as part of the normal project development process and as an access approval condition.

1.3 FHWA POLICY IMPLEMENTATION

The FHWA Division Office will ensure all requests for new or revised access submitted by FDOT for FHWA consideration contain sufficient information to allow the FHWA to independently evaluate the request and ensure all pertinent factors and alternatives have been appropriately considered.

The level of approval for a proposal varies with the type of proposal and the area type. **Table 2.1** defines the types of proposals that can be approved at the FHWA Florida Division Office and those that must be approved at the FHWA Headquarters in Washington D.C.

Table 2.1 Deligation of Authority for Approval of Access Requests on Interstate Highways - Modified for Clarity by the FHWA Florida Division

Proposed Type of Access	Retained by HQ/Federal Highway Administrator	Delicated to Division Administrator
New Interchange at Interstate-to-Interstate or Interstate-to-Interstate-type facility	✖	
Major Interchange Modification at Interstate-to-Interstate or Interstate-to-Interstate-type facility	✖	
New Interstate Partial Interchange of New Interstate Ramps To/From Continuous Frontage Roads that Create a Partial Interchange	✖	
New Interstate-to-Crossroad Interchange within TMA	✖	
New Interstate-to-Crossroad Interchange outside TMA		✖
Modifications of Existing Interstate-to-Crossroad Interchange (Including TMA's)		✖
Completion of Basic Movements at Partial Interstate Interchanges		✖
Locked Gate Access to Interstate		✖
Abandonment of Interstate Ramps or Interchanges		✖

Interstate Type facility - limitied access, grade-seperated facilility not designated as interstate

TMA - transportation Management Area as defined in 23 USC 134(i). For purposes of this deligation of authority, TMA includes only the urbanized portion as defined by the Bureau of the Census.

Modified July 2001

PRD-2. FLORIDA STATUTES, FDOT RULES, POLICIES AND PROCEDURES

2.1 FLORIDA STATUTES

Several State of Florida Statutes relate to FDOT management of the State Highway System (SHS) to protect the public health, safety, welfare and functional integrity including specific provisions for regulating access to these facilities. Requests for new or modified interchanges must meet the requirements of these statutes in the Interchange Proposal process.

Florida Statute Requirements

- **Departmental Powers and Duties - §334.044, F.S. -** defines general powers and duties of the FDOT to manage the State Highway System.

- **Access Regulation to State Highway System; Legislative Findings, Policies and Purpose - §335.181, F.S. -** defines policies and requirements for the regulation of access to the State Highway System; mandates access standards and a classification system.

- **Florida Intrastate Highway System Plan - §338.001, F.S. -** authorizes the FDOT to plan and develop the Florida Intrastate Highway System Plan, the primary purpose of which is for high speed interstate and intrastate travel movements.

- **Authority to Establish and Regulate Limited-Access Facilities - §338.01, F.S. -** authorizes transportation and expressway authorities of the state, counties, and municipalities to provide and regulate limited access facilities for public use.

To meet the intent of these state statutes and, FDOT provides specific direction for the development of Interchange Proposals through rules, policies, procedures. This direction is provided to ensure statewide consistency in the technical analysis, documentation and review processes.

2.2 FDOT RULES

Several rules provide the specific requirements for the implementation of the Florida Statutes relating to the process of considering and approving interchange proposals to limited-access facilities.

FDOT Rule Requirements

- **Statewide Minimum Level of Service Standards for the State Highway System - Rule Chapter 14-94 -** establishes statewide minimum level of service standards to be used in the planning and operation of the State Highway System.

- **State Highway System Connection Permits, Administrative Process - Rule Chapter 14-96 -** adopted to implement the State Highway System

FDOT Rule Requirements

Access Management Act for the regulation and control of vehicular access and connection points providing direct ingress to, and egress from, the State Highway System, and other transportation facilities under the Department's jurisdiction.

- **State Highway System Access Management Classification System and Standards - Rule Chapter 14-97 -** adopts an access classification system and standards to implement the State Highway System Access Management Act of 1988 for the regulation and control of vehicular ingress to, and egress from, the State Highway System. This includes interchange spacing standards and other criteria for medians and driveways adjacent to the interchange.

FDOT Policy Requirements

2.3 FDOT POLICIES

The FDOT has implemented several policies to control the operations on the highways and maintain their high standard of service. These policies include the following.

- **Policy Statement 000-525-015: Approval of New or Modified Interchange to Limited-Access Facilities**
  This policy requires FDOT to minimize the addition of new interchanges to existing limited-access facilities to maximize the operation and safety of FIHS and Interstate transportation movements.

- **Policy Statement 000-625-001: Environmental Policy**
  This policy requires the FDOT to provide quality engineering in an environmentally sound manner in the planning, location, design, construction, and maintenance of transportation facilities.

- **Policy Statement 000-725-010: Major Urban Corridor Studies**
  This policy requires FDOT to evaluate the need for public transportation systems (facilities) in all studies of major urban transportation corridors involving limited-access facilities.

2.4 FDOT PROCEDURES

Reference is made in this section to various procedures that must be considered, as appropriate, in the preparation of an Interchange Proposal. It is the Applicant's responsibility to obtain the most current documentation.

FDOT Procedure Requirements

- **Topic No.: 525-010-025: Metropolitan Planning Organization Administrative Manual**
  Chapter 3 of this procedure defines the four basic area types and the process to determine their respective boundaries. These area types are utilized in the Interchange Proposal process for interchange spacing requirements and LOS calculations.

Back To TOC Next Page

FDOT Procedure Requirements,

- **Topic No.: 525-030-120: Project Traffic Forecasting**
  This procedure specifies acceptable techniques for the development of design traffic to be used in the operational analysis of Interchange Proposals. The selection of the most appropriate analysis method(s) must be coordinated with the FDOT before conducting the study (see **Technical Resource Document 10**). Input from the FDOT District Offices and the SPO will be necessary to assure compliance with the required procedures.

- **Topic No.: 525-030-160: Interchange Justification**
  This procedure defines the process to be followed for approval of a new interchange. The procedure for the Approval of a New Interchange to Limited-Access Facilities is discussed in detail in **Section 2** of the Interchange Handbook.

- **Topic No.: 525-030-250: Development of the Florida Intrastate Highway System**
  This procedure addresses the responsibilities of the various offices within FDOT to develop and implement the FIHS. It also defines the requirements for coordination with the local government and Metropolitan Planning Office transportation planning process. Interchange Proposals should be consistent with the FIHS, the Master Plan and the Action Plan for the effected facilities.

- **Topic No.: 525-030-255: Intrastate Highway System Program Development**
  This procedure identifies the process and roles and responsibilities for the development of the FIHS program.

- **Topic No.: 650-000-01: Project Development and Environment Manual**
  This manual specifies the PD&E requirements to secure project location approval. The manual identifies analysis and documentation requirements for interchange justification and appropriate cross-references to the interchange justification process.

PRD-3. INTERCHANGE MODIFICATIONS REQUIRING AN IMR

Need for IMR determined with Approval Authority

The need for an Interchange Modification Report (IMR) to modify an existing or approved but not yet built interchange must be determined jointly by the District Office and FHWA for the Interstate Highway System and by the District for other FIHS limited access facilities.

Where it is determined an IMR is not needed, there may be specific operational analysis that must be performed and documented. Such analysis will be to ensure the modification will allow the interchange to operate better and more safely and that the modification will not adversely impact the mainline or adjacent interchanges. The documentation may be in the form of an Interchange Operational Analysis Report (IOAR) to be approved by FHWA for the Intrastate Highway System and by the District for other FIHS limited access facilities, or a traffic study as determined by the appropriate parties.

IMR normally required

An IMR will normally be required for the following types of interchange modifications:

- The total number of entrance and exit points from an individual interchange or from a series of interchanges connected through a collector/distributor (C/D) system connecting to the mainline is changed.
- The number of entrance or exit points remains the same but the location/configuration of one or more points changes significantly (i.e., changing a loop ramp to a leg of a diamond).
- The on-ramp segment laneage is increased at the ramp termini with the mainline (for example, going from single lane to two lanes on a ramp).

IMR not normally required

An IMR will not normally be required for the following types of interchange modifications (however, an IOAR may be required):

- modifications of the limited access right-of-way not affecting the interchange are made,
- increasing the off-ramp segment laneage at the termini with the mainline,
- modifications of the ramp termini at the crossroad to accommodate crossroad improvements. This includes such improvements as the installation of traffic control devices and the addition of dual left-turn lanes from the crossroad to the ramp,

- minor adjustment of an existing ramp terminal on the mainline for safety or operational purposes, as long as such adjustments do not adversely affect merge, diverge or weaving operations with adjacent interchanges,
- increasing the laneage of ramp segments, provided the merge to the existing number of lanes occurs sufficiently far away from the original existing point of entry on the mainline,
- modification of the ramp at the crossroad termini (dual left or right turn lanes, conversion of free flow right turn to stop, etc.),

IMR not normally required

- extending an existing on-ramp into an auxiliary lane ending at the next adjacent down stream interchange,
- the addition of ramp metering to on-ramps as part of a freeway management system,
- replacement of an interchange “in kind” to accommodate mainline widening will not normally require an IMR. However, where a System Interchange Modification Report (SIMR) (several interchange modifications packaged as a single document) is being developed, existing interchanges not being modified and interchanges being replaced “in kind” within the area of influence of the “packaged” modifications will have to be incorporated in the IMR analysis for proposed modifications, and
- access between separated special use/HOV lanes previously approved in a Master Plan or other more recent evaluations approved by FDOT.

Back To TOC Next Page

PRD-4. CONSISTENCY WITH MASTER PLANS OVERVIEW

A Master Plan, prepared with extensive analysis and public input to meet federal Major Investment Study (MIS) requirements, describes the proposed future multimodal transportation development in the corridor. The Master Plan would normally contain all existing interchanges approved but not constructed interchanges and planned interchanges from MPO or other local government plans. The development of Interchange Proposals and PD&E studies are the next step in the implementation of Master Plan recommendation. As such they will normally be consistent with the Master Plan and will be based on factors, analysis and concepts contained in the current Master Plan. Where an Interchange Proposal is not consistent with the current Master Plan, extensive new analysis must be performed to show the affect of the proposal on the current Master Plan.

The Master Plan is the primary document guiding all Interstate and other FIHS limited-access highway planning and design.

4.1 INTERCHANGE PROPOSAL RELATIONSHIP TO THE MASTER PLAN

The level of effort required in the development of an Interchange Proposal is dependent on its consistency within the adopted Master Plan. The following scenarios describe the appropriate processes that would normally be followed.

The level of analysis and documentation required is based on consistency with the Master Plan.

4.1.1 Interchange Proposal Conforms to Existing Master Plan

Where the current Master Plan specifically contains the Interchange Proposal being requested, much of the analysis of the needs and impacts has been done as part of the current Master Plan and can be directly used in the Interchange Proposal if no major refinements are proposed. Where minor modifications to the current Master Plan concept are proposed (not affecting the design concept or ramp laneage) the DIRC will determine if additional analysis and documentation is required.

Proposal conforms to Master Plan.

4.1.2 Interchange Proposal Not Consistent with Existing Master Plan

Three potential scenarios exist. The DIRC should examine each proposal on an individual basis and determine if the proposal should be allowed to advance through the process. The three scenarios and suggested approaches are as follows:

Proposal does not conform to Master Plan.

- **New Interchange Proposal not conflicting with existing, approved, but not built or planned interchanges (contained in MPO or local government transportation plan).** In this case, the proposal would be developed, analyzed and documented for an approval decision through the normal process.

Proposal does not conform to Master Plan.

- **New Interchange Proposal conflicting with or having an anticipated impact on an existing, approved, but not built or planned interchange.** In this case, the DIRC should examine the need for both interchanges and determine which better serves the public interest and the function of the limited access facility. If both are needed, the DIRC should investigate how the interchanges can be interconnected to minimize operational and safety problems.

- **Interchange Modification Proposal inconsistent with or not contained in the Master Plan**. In this case the DIRC should determine the reason and need for the proposed modification and determine the impact of the the operation of the mainline and adjacent interchanges. Normally, the need for a modification would be based on one or more of the following:

- a significant increase in the traffic using the interchange,
- a significant change in the characteristics of the traffic (local vs. regional or traffic composition),
- a significant change in the directional flow of the traffic, and
- a significant change in the access requirements for new development in the interchange area.

Where the Interchange Proposal is inconsistent with the current Master Plan, extensive new analysis on the needs and impacts of the proposal must be developed. Approval to move beyond the Preliminary IJR/IMR phase should only be given after a determination regarding the new/modified Interchange Proposal impacts on the current Master Plan operation and integrity.

Master Plan out of date.

4.1.3 Interchange Proposal When Master Plan is Out of Date

Normally, a Master Plan can be considered out of date when:

- the design year for the Master Plan is ten years or less from the current year and there is no further Master Plan implementation through PD&E or other studies, or
- there are significant current or projected land use or network changes from those used in the Master Plan.

In this case, the DIRC must determine if the interchange concept in the Master Plan is still valid. The DIRC should consider the following processes to be followed based on the Master Plan's status.

- *Master Plan Concept Valid, Proposal Consistent* - The Applicant should reanalyze the impact of the traffic and interchange on the Master Plan based on the Interchange Proposal opening, interim and design years

Back To TOC Next Page

using the most current information available. If the analysis shows the concept is still valid the Applicant would normally be allowed to proceed following the process in **Section 4.1.1** - Interchange Proposal Conforms to Existing Master Plan.

- *Master Plan Concept Valid, Proposal Inconsistent* - The Applicant would normally be required to follow the process in **Section 4.1.2** for Interchange Proposal not Consistent with Existing Master Plan.
- *Master Plan Concept Invalid, Proposal Consistent or Inconsistent* - The Applicant would normally be required to follow the process in **Section 4.1.2** for Interchange Proposal not Consistent with Existing Master Plan.

See *Master Plan Modifications* in **Section 4.3** of this document for further detail.

4.1.4 Interchange Proposal During Master Plan Development

Master Plan under development.

If a limited-access facility has a Master Plan under development or update, proposals for new/modified interchanges should normally not be initiated or accepted until the Master Plan is complete. Exceptions will include Interchange Proposals where:

- there is an immediate operational or safety need;
- the new/modified interchange is programmed before the opening year of the Master Plan; and
- recommended by the DIRC and agreed to by the District Secretary.

In all cases, Interchange Proposals must be considered and integrated into the Master Plan effort.

4.1.5 Interchange Proposal When No Master Plan Exists

No Master Plan.

The specific scope of work to be performed will be agreed to during the Study Design Development between the Applicant, DIRC, SPO and FHWA. The proposal must be consistent with FDOT policies and standards. The specific Interchange Proposal analysis and documentation is defined in the Study Design Development (See **Sections 1.2.2** and **2.1** of the Interchange Handbook).

4.2 DETERMINATION OF NEED FOR MASTER PLAN MODIFICATION

When a Master Plan exists and the Interchange Proposal is not contained in it or is not consistent with it, the District will give special consideration to the Interchange Proposal impacts on the operation and integrity of the Master Plan. Normally, where concurrence is given to proceed to the for an approval decision for an Interchange Proposal not consistent with the Master Plan, the Plan must be amended or updated prior to approval of the Interchange Proposal. At the DIRC

discretion, the Final Interchange Proposal document can serve as the Master Plan update if additional Master Plan modifications are not necessary.

The DIRC shall determine Master Plan need and update requirements.

The DIRC will identify specific areas of concern and the area of influence to be addressed in the Master Plan modification. Where Master Plan modifications are minor and localized to a small area of influence, the existing Master Plan should be amended within the area of influence. Where the impacts on the Master Plan are extensive, and far reaching beyond the interchange proposal area, an entire Master Plan update may be required. The DIRC, in cooperation with the SPO, will determine if a Master Plan update is needed and will direct how the amendment or update will be performed, i.e., either as part of the regular Master Plan update schedule, as part of the Interchange Proposal process or as part of an PD&E study. Where a Master Plan for an interstate highway is to be modified, FDOT approval and FHWA concurrence should precede the approval of the Interchange proposal.

Timing of Master Plan Update

4.3 MASTER PLAN MODIFICATIONS

Normally, a Master Plan update would not be required for an Interchange Proposal. However, if it is determined that an update is needed based on the proposal, the DIRC will determine during the Study Design Development whether the Master Plan update must precede the development of the Interchange Proposal or whether the update can be concurrent with the Interchange Proposal. A determination will also be made as to which party will prepare the update. Additional issues, such as schedule, funding and advanced right-of-way acquisition, should also be addressed during the Study Design Development.

Master Plan update documentation levels

A Master Plan modification can either be an amendment where only a small part of the plan is affected by the proposal or an update where the proposal has a major effect on the entire plan. The modification can be a separate report or included in the PD&E study. In some cases, IJR or IMR could serve as the Master Plan Modification Report. The DIRC, in cooperation with the SPO will determine the level of analysis, the documentation/review process to be followed in the Master Plan modification and will give the approval for the Applicant to move to the FIJR/FIMR phase where the Applicant will concurrently prepare the Master Plan amendment. The DIRC will also determine the need, the extent and the timing for any Master Plan modifications with respect to the Interchange Proposal process.

PRD-5. CONSISTENCY WITH THE STATEWIDE FIHS PLAN

The FIHS Modal Plan is prepared by the Department to document the needs for the FIHS for a 20-year planning horizon and to identify projects that are currently contained in the Department's Work Program and Cost-Feasible Plan. The FIHS Modal Plan ensures that all needs identified on a statewide basis are the result of system analysis that ensure the improvements would support the service of intrastate and interstate movements (See **Figure 5.1**).

Proposal must be in FIHS Plan.

Interchange proposals, where the Department is the applicant, must be contained within the FIHS Modal Plan prior to seeking final approval of the proposal.

Development Driven Proposals Requirements

Proposals from development driven or local government applicants (including expressway authorities) would generally fall under one of four scenarios:

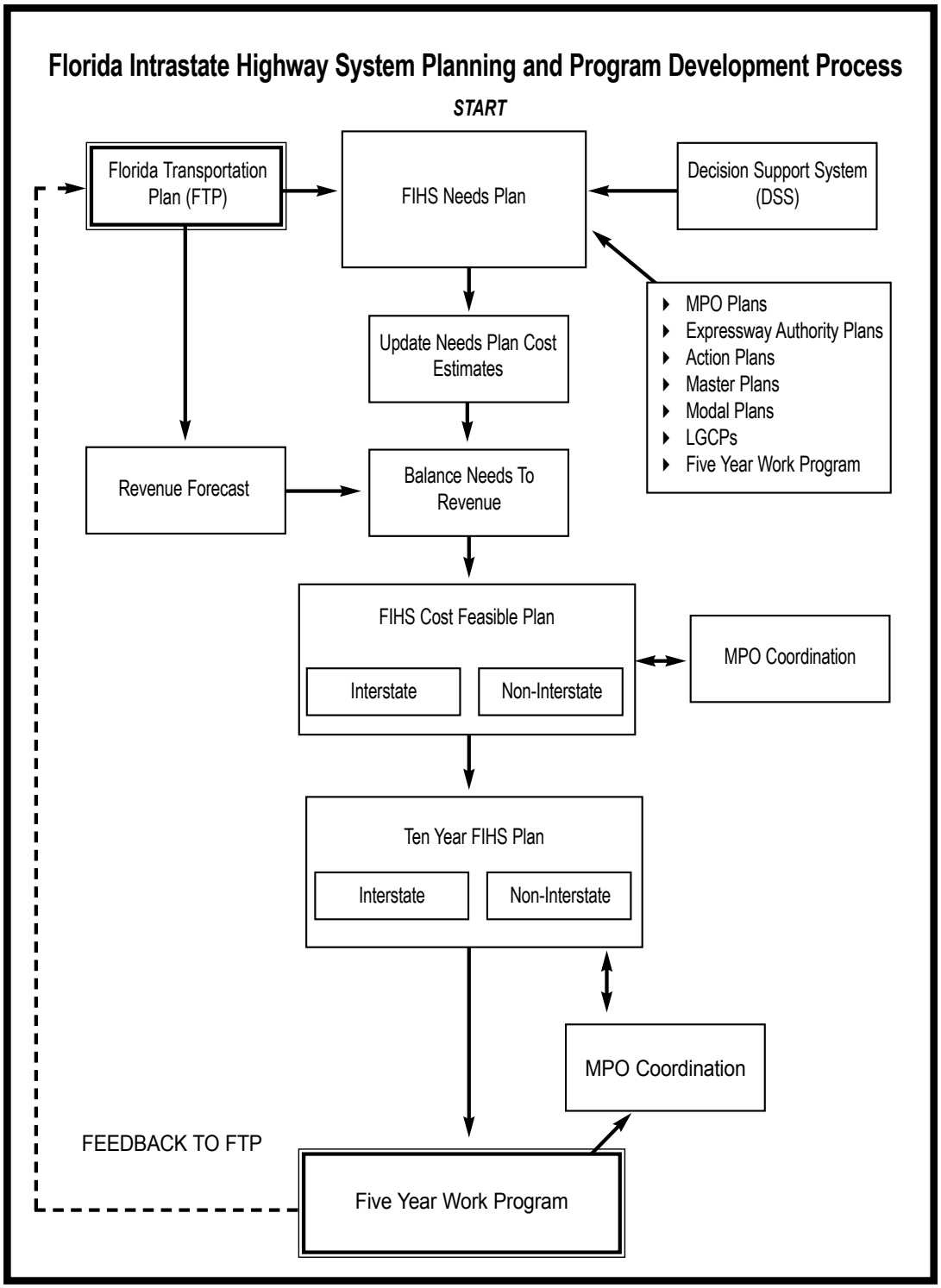
- Those contained in the FIHS Plan as a result of a Master Plan or other needs analysis;
- Those not contained in the FIHS Plan, but where a clear need is shown in the PIJR/PIMR;
- Those not contained in the FIHS Plan, but contained in an MPO or local government transportation plan;
- Those not contained in the FIHS Plan and where no need has been shown.

With the first scenario, the DIRC should consider the impact of private/local government funded project on the priority, projected construction year and the impact of other facility construction in the project vicinity.

Interchange need must be justified before adding to FIHS.

With the remaining scenarios, the applicant must clearly justify the need for the interchange proposal to the Department and the approval authority. When the need is clearly shown, the DIRC shall allow the applicant to proceed in the process toward an approval decision. After the need is clearly shown the proposal may be officially added to the FIHS Plan at the recommendation

Figure 5.1



Back
To TOC
Next Page

of the DIRC and FIHS coordinator with a provision linking it to the agreed to developer(s)/local government funding. If there is a change in the funding agreement, the Department may elect to remove the Interchange from the FIHS Plan.

- NOTES -

PRD-6. RELATIONSHIP TO THE PD&E PROCESS

6.1 INTERCHANGE PROPOSALS FOR EXISTING FIHS LIMITED ACCESS FACILITIES

An Interchange Proposal must be developed by the applicant and approved by the approval authority even if the interchange is contained in an approved Master Plan or PD&E study. For Interchange Proposals on the Interstate Highway System, both the Interchange Proposal approval and NEPA approval are required.

6.1.1 Interchange Proposals Consistent with an Adopted Master Plan

Where the Interchange Proposal is consistent with the current Master Plan, the PD&E phase can either precede or be developed concurrently with the Interchange Proposal at the DIRC's discretion.

Continued public involvement including the mandatory PD&E public hearing will be required to secure FHWA location and design concept acceptance. However, the PD&E process would not normally continue to the public hearing and subsequent activities on Interstate facilities until the Final IJR/IMR is approved.

The PD&E Public Hearing would normally not occur until after final IJR/IMR approval.

The technical analysis prepared for the Interchange Proposal must be consistent with and incorporated into the Preliminary Engineering Report (PER). Both reports (Interchange Proposal and PER) are normally prepared as "stand alone" documents. The approved alternate in both the Interchange Proposal and PD&E study must be consistent. Where the Interchange Proposal precedes the PD&E study, the PD&E study should consider, at a minimum, the approved alternative in the Interchange Proposal.

The preferred alternative brought forward to public hearing should be the approved Interchange Proposal alternative. If a different alternative is brought forward or if the public hearing results in a change to the interchange concept, the Interchange Proposal may have to be modified. The DIRC, in cooperation with the Approval Authority, shall determine the need for such a modification prior to submittal of the PD&E study for final approval (see **Section 6.4**).

6.1.2 Interchange Proposals Not Consistent with an Adopted Master Plan

Where the proposal for a new interchange is not consistent with the current Master Plan, a higher degree of uncertainty of its approval exists. In such circumstances, it is recommended that the Interchange Proposal approval precede the initiation of the PD&E study. Where, for production

purposes, it is essential that the documents be prepared concurrently, the DIRC should examine the risks and make a recommendation for the District Secretary's approval.

6.2 INTERCHANGES FOR NEW FIHS LIMITED-ACCESS FACILITIES

Planning and Preliminary Engineering for Interchange on new FIHS Limited Access Facilities should be reviewed by DIRC.

Interchanges for new FIHS limited-access facilities should be reviewed by the DIRC during the planning and preliminary engineering phases for operational performance, safety and compliance with FDOT interchange spacing standards. Interchange spacing should meet FDOT standards to the maximum extent possible; however, the spacing of existing highway facilities may preclude exact conformance. Preference should be given to interchanges on new limited-access facilities as follows:

- with other FIHS or local expressway limited-access facilities
- with any facilities on the National Highway System that are not on the FIHS
- with other SHS facilities
- with major local roads as needed for system continuity and connectivity

If an interchange does not meet the FDOT spacing standards and causes a mainline or adjacent interchange operational or safety problem, the DIRC should work with the Applicant to resolve the problem through mitigation, removal of the interchange from the proposal or not adding the new facility to the FIHS.

6.3 PD&E STUDY ENCOMPASSING MULTIPLE INTERCHANGES

Multiple Interchange Proposals can be combined into a single report.

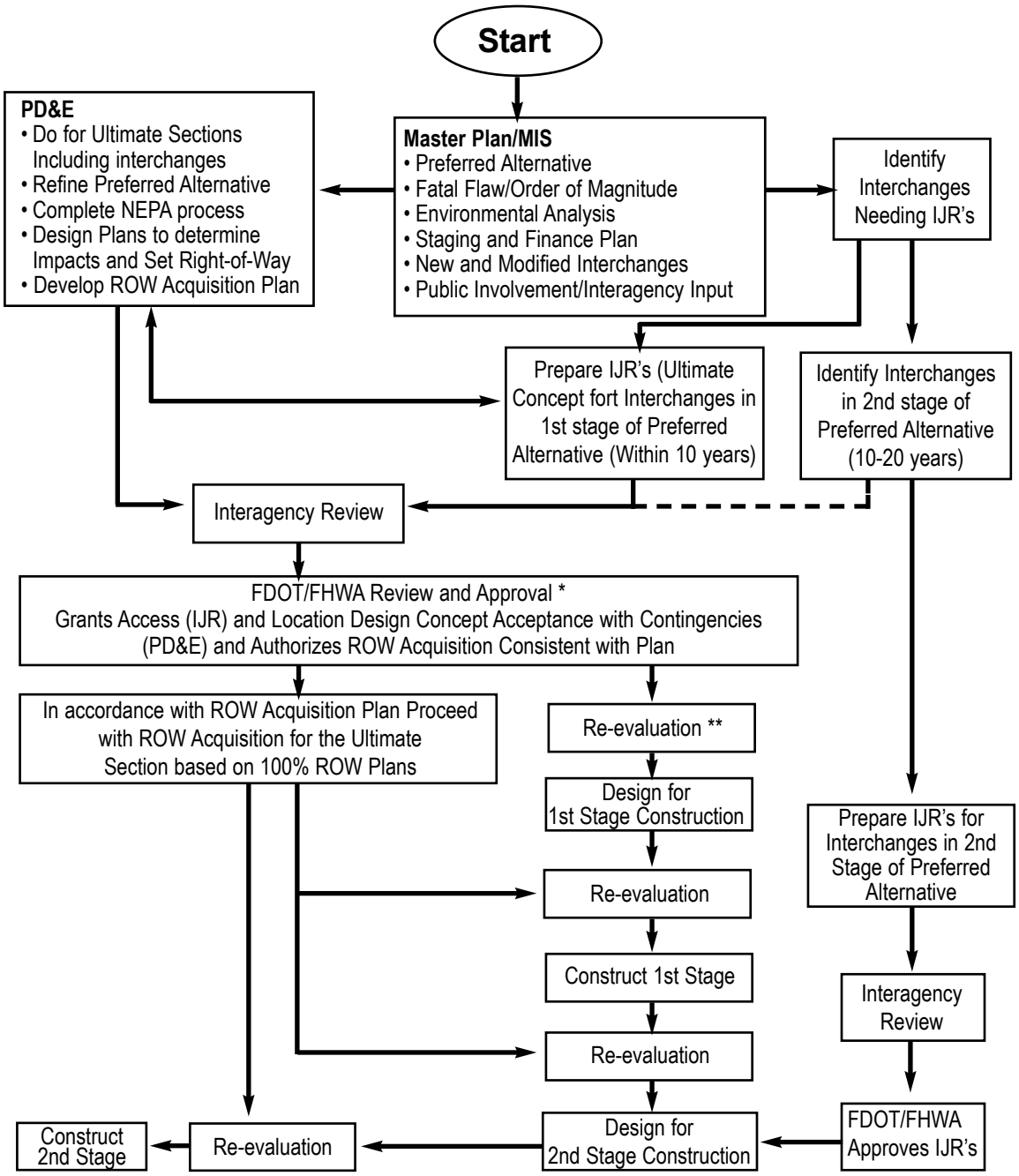
The following summarizes the relationship between the Interchange Proposal process, the Master Plan process and the advanced right-of-way acquisition process where the PD&E Study encompasses one or more interchanges (see **Figure 6.1**). Where an Interchange Proposal or a PD&E study encompasses multiple interchanges, the Interchange Proposal can be combined into a Systems Interchange Modification Report (SIMR) or it may be done as individual documents depending on specific circumstances.

The DIRC shall make an initial determination regarding the relationship between the PD&E study and the required Interchange Proposal for review and concurrence by the Systems Planning Office (SPO) and FHWA.

- The PD&E study analysis should start with the Master Plan and be consistent with the approved Interchange Proposal. The PD&E Study can serve to update, refine and supersede the Master Plan. In such cases, the PD&E Study will in effect replace the Master Plan for the corridor when completed and adopted.

Back To TOC Next Page

FIGURE 6.1 Relationship Between Master Plans, IJR/IMRs, PD&E and Right of Way Acquisitions



* FDOT approves state facility proposals and FHWA approves interstate facility proposals. FDOT approval of interstate facility proposal required before submittal to FHWA. FHWA review not required for state facility proposals, but FHWA concurrency may be requested for federal-aided state facility proposals.

** IJR/IMR re-evaluation is required (1) if LDA is more than one year old, (2) two years between IMR approval and PD&E phase, and (3) deviation to a DRI where involved.

- The PD&E study can be for the ultimate section or for selected segments of the Master Plan length including all proposed new interchanges and/or modifications to existing interchanges.
  Only Interchange Proposals to be built within the first stage of the Master Plan (normally over the next ten years) need to be developed prior to or concurrent with the PD&E study. Any proposed phasing or staging of the new/modified interchange must be included in both the Interchange Proposal and PD&E study.

- All Interchange Proposals anticipated to be constructed in the first ten years are normally approved by the FHWA and the FDOT prior to the PD&E public hearing. The anticipated ultimate design concept of all interchanges must be shown in the PD&E study and be presented at a public hearing.

- Level of design sufficient to identify and address environmental impacts for PD&E purposes can be authorized by FHWA. This level of design may also be sufficient to determine right of way requirements for the mainline and first stage interchange areas.

- Where advanced right-of-way acquisition approval is issued for a second stage interchange (to be constructed over the last ten years of the Master Plan), the development of the Interchange Proposal and sufficient final design would need to be done with first stage Interchange Proposals. The need for and development of the Interchange Proposal should be coordinated and concurred with by FHWA and should only be undertaken when there was design certainty.

- Advanced right-of-way acquisition for the second stage interchange must be on a voluntary basis and would normally be where the entire or majority of the parcel is clearly needed based on the proposed interchange configuration.

- The Interchange Proposal and PD&E processes coordination are also defined in Part 1,Chapter 9 of the PD&E Manual. This coordination does not replace any Interchange Proposal requirements defined in this Handbook. The normal PD&E scope of work will have to be expanded to meet interchange justification approval requirements.

PD&E and Proposal must be consistent.

6.4 DIRC RESPONSIBILITIES IN THE IMR/PD&E PROCESS

The DIRC will determine the scheduling and coordination between the Interchange Proposal development and PD&E studies (concurrent or sequential) to include whether the documentation will be a single report, separate reports or the IMR as a pull-out section of the PD&E Report. The DIRC (with SPO and FHWA) will agree to other issues such as:

- logical termini,
- area of influence,
- analysis years (opening, interim and design),
- public hearing timing with respect to Interchange Proposal approval (Interchange Proposal approval is normally required before a hearing),
- alternatives, and
- analysis and documentation requirements.

6.5 INTERCHANGE CONFIGURATION MODIFICATION DURING THE PD&E STUDY

Proposals modified in PD&E may require an IMR.

An IMR may also be required where the PD&E phase results in a significant change to the original interchange concept approved in an IJR or IMR. In such cases, a new IMR may be required and may be developed and approved prior to the PD&E public hearing being held. The DIRC shall consult with the Approval Authority on the need for an IMR prior to the initiation of any work.

6.6 APPROVED INTERCHANGE PROPOSAL RE-EVALUATION

Proposals may have to be re-evaluated.

An approved Interchange Proposal must be re-evaluated (separately from required NEPA re-evaluation) if additional project activity is not initiated within two years of the Interchange Proposal approval (See **Section 2.11** of the Interchange Handbook). In such cases, the re-evaluation could be an initial phase of the PD&E study or it may be an independent study preceding the PD&E study. If the re-evaluation indicates a need for an Interchange Proposal or for a modification of an approved Interchange Proposal, this must be accomplished and approved prior to the PD&E public hearing.

PRD-7. JUSTIFICATION REQUIREMENTS APPLICABILITY

The applicability of the interchange justification requirements and the role and responsibility of the DIRC varies depending on the type of limited-access facility (FIHS/non-FIHS, interstate/non-interstate), the jurisdiction responsible for the facility (FDOT, local government, or expressway authority), and the classification of the intersecting roadway.
General applicability guidelines are as follows:

- **Existing FIHS Limited-Access Facilities**

All requests for a new interchange, or a modification to an existing or approved but not yet constructed interchange on FIHS limited-access facilities must be analyzed, documented, reviewed, and processed for approval by FDOT and FHWA as appropriate. An Interchange Proposal (IJR,IMR) is normally required even if the proposed interchange is contained in an approved Master Plan or PD&E study for the facility. The specific analysis and documentation requirements of the proposal shall be agreed to by the DIRC and Approval Authority.

An Interchange Proposal is normally required even if the proposed interchange is contained in an approved Master Plan or PD&E study for the facility.

- **New FIHS Limited-Access Facilities**

An Interchange Proposal is not required for new interchanges that are analyzed and approved as part of a PD&E study for new FIHS limited-access facilities except where the proposed new or modified interchange is with an existing FIHS limited-access facility. New interchanges included in the approved PD&E study, but not included in the initial construction of the facility, must be re-evaluated prior to their construction. Any additional new interchanges or modifications of existing interchanges that were not part of the original PD&E approval are subject to the Interchange Proposal requirements of this Handbook.

Proposals not needed for new FIHS Limited Access Facilities.

Interchanges for new limited-access FIHS facilities should be reviewed by the DIRC during the planning and preliminary engineering phases for operational performance, safety, and compliance with FDOT interchange spacing standards. Interchange spacing should meet FDOT standards to the maximum extent possible; however, the spacing of existing highway facilities may preclude exact conformance. Preference should be given to interchanges on new limited-access facilities as follows:

- with other FIHS or local expressway limited-access facilities,
- with any facilities on the National Highway System that are not on the FIHS,
- with other SHS facilities,
- with major local roads as needed for system continuity and connectivity.

If an interchange does not meet the FDOT spacing standards and the spacing causes either a mainline or adjacent interchange operational or

safety problem that would appear to preclude the facility from meeting the intent and standards of the FIHS, the DIRC should work with the project development authority to resolve the problem through mitigation, removal of the interchange from the proposal or not adding the new facility to the FIHS.

Proposals not needed for non-limited access facilities.

- **Non-FIHS Limited-Access Facilities on the State Highway System**

The development and approval of an Interchange Proposal for new or modified interchanges to limited-access facilities not on the FIHS is not required by FDOT policy or this procedure. However, the development of an Interchange Proposal or other appropriate analysis may be requested at the DIRC's discretion because of local issues or circumstances or because of potential impacts to the FIHS or other SHS facilities.

DIRC responsibilities for Expressway Authorized projects.

- **FIHS Facilities Under Local Expressway Authority Jurisdiction**

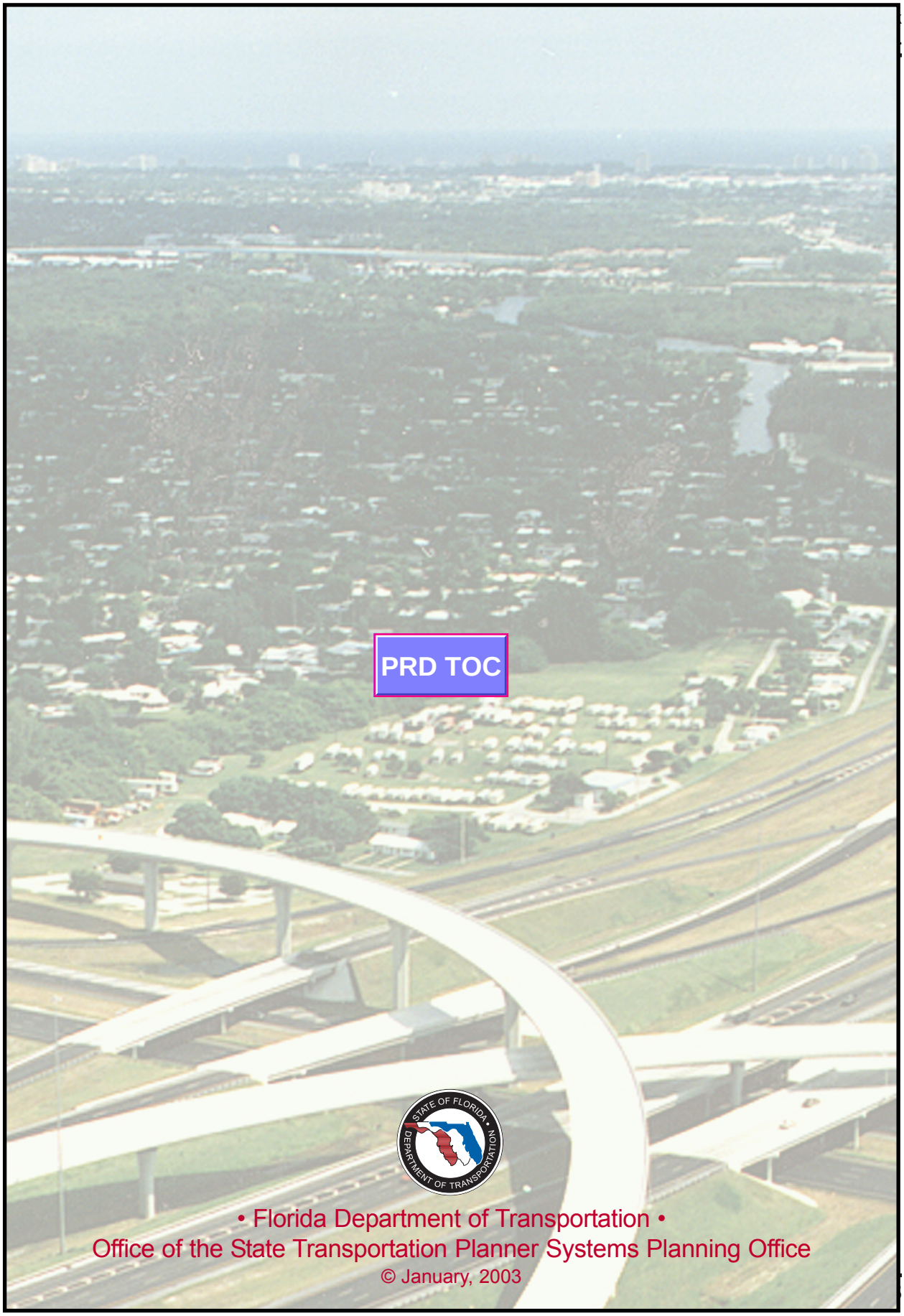
Certain FIHS limited-access facilities are under a local expressway authority jurisdiction. In such cases, the DIRC should work in cooperation with the expressway authority in the development of an Interchange Proposal or an appropriate Interchange Operational Analysis Report. An Interchange Proposal, to be approved by FHWA, is required where the new or modified access is with the Interstate Highway System. An Interchange Proposal may be required by the Department where the new or modified access is with another FIHS limited-access facility. Where the proposed new or modified access is with a controlled-access FIHS facility or another SHS facility, the DIRC should determine the need for an Interchange Proposal and work in cooperation with the expressway authority to ensure that the proper level of analysis and documentation is developed to determine the impacts on the FIHS/SHS facility.

When the proposed new or modified access is with a local road, the DIRC should determine whether new or modified access will have a significant impact on an existing or proposed interchange with an existing FIHS/SHS facility. Where it appears there will be a significant impact, the FDOT should work in a cooperative manner with the expressway authority to analyze and document the impacts and to ensure adequate mitigation is developed and agreed upon.

Operational analysis needed for HOV Slip Ramps.

- **HOV/Mainline Slip Ramps**

The addition of "slip ramps" between physically separated special use/HOV lanes and general use lanes on limited-access facilities does not normally require the development of an IJR or IMR; however, such ramps must be analyzed from both an operational and safety perspective and be documented in an IOAR, a special traffic study, or as part of a PD&E study. The specific analysis and documentation requirements will be determined by the DIRC in cooperation with the approval authority.



PRD TOC

• Florida Department of Transportation •

Office of the State Transportation Planner Systems Planning Office

© January, 2003