### FDM 100 Introduction

### Section 100

ID 304 Added name of the specific document on the Design-Build website to assist in finding RFP Boilerplate documents.

### FDM 102 Glossary of Terms

### Section 102.1

ID 328 Added hyperlink to MUTCD.

### Section 102.2

- ID 455 Updated reference from 300 series to 900 series for definition of production date.
- ID 346 Removed "curbed" from definition of a bicycle lane for consistency with FDM 223.

### FDM 103 Standard Forms

### Section all

ID 412 Replaced MUTCD Part VI with MUTCD Part 6

### Section Form 110

ID 435 Updated Form 110 to allow Engineer of Record, instead of District Design Engineer, to certify use of proprietary products

#### Section Form 122-A

ID 357 Enlarged "Description" field to facilitate text entry at request of the districts. Change retroactive to 2024 FDM.

#### Section Form 122-B

ID 358 Removed extraneous words from title.

### Section Form 240

ID 329 Changed MUTCD reference from Roman numeral to Arabic numerals for consistency with MUTCD.

## FDM 110 Initial Engineering Design Process

Section 110.4.1

ID 434 Changed use of FDM Form 110 from "must" to "may."

## FDM 111 Final Engineering Design Process

Section 111.4.2

ID 318 Updates "Program Management Office" to "Specifications Office" per FDOT reorganization.

### FDM 120 Design Submittals

### Section 120.2.3

ID 360 Added bullet for establishing the type of traffic railing barrier on bridges and walls

ID 363 Clarified that typical sections are not included at bridge culverts.

### Section 120.2.3.1

ID 361 Clarified that the Structures Engineer is concurring with the Bridge Design Typical Section.

#### Section 120.2.3.2

ID 362 Clarified requirements for typical section concurrence by District Structures Design Engineer.

#### Section Exhibit 120-3

ID 365 Revised Exhibit 120-3 to be consistent with Structures Design Guide dimensioning conventions.

## FDM 121 Bridge Project Development

**Section** 121.18

ID 374 Added cell towers to list of Category 1 Structures

Section 121.7, 121.9.8

ID 367 Removed word "reproducible" to align text with electronic plans production terminology.

Section 121.9.9

ID 369 Added requirement to show width between webs and web slope for steel box girders.

## FDM 122 Design Exceptions and Design Variations

Section 122.5.9

ID 377 Revised language for vertical clearance documentation.

Section Table 122.7.1

ID 379 Item pending review by technical expert.

## FDM 124 QA/QC Management Plan

Section 124.2.1

ID 311 Added description of role and responsibilities of the QA Manager.

### FDM 125 Quality Assurance

Section 125.3

ID 343 Updated name of Production Support Office to Forecasting and Trends Office.

## FDM 126 Lane Repurposing Projects

**Section 126.1** 

ID 288 Revised chapter to address requirements of 334.61 F.S. Traffic Lane Repurposing.

Section 126.2

ID 293 Revised chapter to address requirements of 334.61 F.S. Traffic Lane Repurposing.

ID 286 Adds requirement for network traffic analysis per management direction.

### FDM 127 Community Aesthetic Features

Section 127.2

ID 413 Changed MUTCD "Part 1, Chapter 1A.13" to just "Chapter 1C".

### FDM 128 Federal Aid Project Certification

Section 128.3 (9) (10)

ID 313 Updated FDOT Responsibilities to reflect new requirements for upload to PSEE and revised criteria for Authorization to Advertise.

## FDM 130 Signing and Sealing Documents

**Section 130.2** 

ID 482 Remove references to Large Format.

Section 130.2.2 (2)

ID 314 Updated criteria for manually signed and sealed documents to require District PS&E Engineer/Manager Approval

### FDM 131 Plans Processing

Section 131.4

ID 330 Removed outdated reference to "Reissued" PS&E Package

Section 131.5

ID 331 Added criteria for approval by District Secretary and Chief Engineer for withdrawing or moving to a later letting after advertisement.

Section 131.all

ID 315 Updated name of Program Management Office to Specifications Office throughout.

### FDM 132 PS&E Submittal Package Revisions

Section 132.1.1

ID 332 Revised Figure 132.2.1 to replace "CO-FinalPlans" with "CO-JOBLOCK"

Section 132.2

ID 333 Added example of how to show revisions to components.

Section 132.4

ID 334 Added Contracts Administration to access request for AASHTOWARE.

Section 132.5.1

ID 335 Raises threshold of major change cost from \$50,000 to \$500,000.

Section 132.all

ID 326 Updated office name from "Program Management" to "Specifications" throughout.

## FDM 152 Shop Drawing Submittals

Section 152.5.4

ID 295 Required that submittals architectural structures must be made by a registered architect.

## FDM 201 Design Controls

### Section 201.5.1

ID 338 Clarified distinction and purpose of Target Speed versus Design Speed and how to use each when determining a Design Speed.

## FDM 202 Speed Management

### Section 202.3

ID 340 Revised speed management strategies table to include Speed Range categories and minimum design speeds.

### Section 202.3.8

ID 400 Added new criteria for raised crosswalks to create Type I and Type II options.

### Section all

ID 399 Where appropriate, replaced "Target Speed" with "Design Speed" to provide consistency with revised criteria in FDM 201.

### FDM 210 Arterials and Collectors

### **Section 210.11**

ID 302 Clarified eye height and object height for minimum stopping sight distances.

#### Section 210.2.4.2

ID 180 Modified language to more clearly identify hydroplaning risk and method of analysis.

### Section 210.3.3

ID 316 Clarified that a design variation is not required on RRR projects where the addition of a hardened centerline would require movement or reconstruction of curb ramps.

#### Section 210.4

ID 347 Item pending review by technical expert.

#### Section 210.4.1

ID 525 Item on hold pending opinion from FHWA on new MUTCD language.

#### Section Table 210.2.1

ID 282 Added a note for RRR projects to allow 11-foot lanes to remain in C3 context classifications with 50 mph design speeds, and revised table to align lane widths more accurately with allowed design speeds in each context classification.

### FDM 211 Limited Access Facilities

Section 211.1

ID 414 Updated references to match latest MUTCD.

**Section 211.10** 

ID 294 Added discussion on stopping sight distance similar to material in FDM 210.

**Section 211.2.3** 

ID 176 Modified language to more clearly identify hydroplaning risk and method of analysis.

Section 211.3.3

ID 443 Replaced "buffer lane" with "contiguous lane" to be consistent with latest MUTCD.

Section Table 211.4.1

ID 380 Clarified requirements for 12 foot shoulders on Florida's Turnpike mainline sections.

### FDM 212 Intersections

Section 212.11.1

ID 213 Updated Table 212.11.1 values and equations as needed to meet current criteria for lane widths and lateral offsets.

Section 212.11.6.1

ID 336 Clarifies where the Clear Sight Window Concept can be used to place street trees.

Section 212.2.1, 212.2.3

ID 415 Updated references to MUTCD to be consistent with latest MUTCD.

## FDM 213 Modern Roundabouts (Fastest Path Tools)

Section 213

ID 425 Replaced R6-4 arrow sign with One Way sign per new MUTCD requirements.

**Section 213.10** 

ID 428 Deleted reference to Interim Approval, based on new MUTCD.

### FDM 214 Driveways

Section 214.1

ID 527 Updated reference to Multimodal Access Management Guidebook.

## FDM 215 Roadside Safety

Section 215.2.2

ID 325 Clarified requirements for lateral offset in Very Low Speed context classifications

### FDM 216 Earthwork

Section 216.3

ID 521 Change this reference to the FDM chapter number for Cross Sections sheets from 905 to 925.

ID 454 Revised for better consistency with the current method for calculating earthwork as defined in Section 216.5 (Earthwork Quantities)

### FDM 220 Railroads

Section all

ID 416 Updated references MUTCD tables and parts to match latest version of the MUTCD.

### FDM 221 Utilities

Section

ID 423 Item pending review by technical expert.

### FDM 222 Pedestrian Facilities

### Section 222.2

ID 299 Clarified requirements for curb ramp design at crossings.

#### **Section 222.2.2**

- ID 436 Clarified where to use standard versus high emphasis crosswalk markings
- ID 327 Clarified conditions where sidewalk is required on flush shoulder roadways

### Section 222.2.3.2

ID 298 Added requirement to coordinate with the DSE and DSA to determine if illumination is needed to address safety concerns at existing midblock crosswalks.

### Section all

ID 417 Changed "Manual on Uniform Traffic Control Devices" to "MUTCD" throughout; updated hyperlink to MUTCD website.

## FDM 223 Bicycle Facilities

### Section 223.1

ID 430 Item pending review by technical expert.

#### Section 223.2

- ID 324 Updated images to show a bike lane connecting to another bike facility (shared use path) instead of a sidewalk
- 101 Added bicycle lane extensions as an allowable use of green colored pavement markings (and refer to MUTCD) to reflect allowable use of green as well as reflect the terminology that is consistent with MUTCD.

### Section 223.2.1.3

ID 350 Removed criteria on keyhole lane with separated bicycle lane to provide consistency with MUTCD Version 11.

#### Section 223.2.1.4

ID 441 Removed language and updated last sentence of 223.2.1.4 to reflect the change in the tracking process.

### Section 223.2.1.5

- ID 396 Removed referenced to Interim Approvals that have been superseded by MUTCD 11th Edition.
- ID 429 Added a language referencing the MUTCD given the removal of the language referring to the IA.

### Section 223.2.2

ID 433 Removed criteria on marking of shoulders as bike lanes, per MUTCD NPA 623.

#### Section 223.2.4.1

ID 305 Added channelizing curb as a form of separation at 35 mph or less.

#### Section 223.3

ID 439 Removed restriction on SLM in RTOL to be consistent with MUTCD 11th Edition.

ID 351 Referred to MUTCD 9E.02 for application of SLM in RTOL.

### Section 223.3.1.4

ID 407 Removed references to Interim Approvals that have been replaced by MUTCD 11th edition.

### FDM 224 Shared Use Paths

### Section 224.1

ID 406 Updated reference to FDM 223.2.5.2 for criteria on conflict points.

#### **Section 224.14**

ID 418 Updated reference to MUTCD sign dimension table to be consistent with latest MUTCD.

### Section 224.8

ID 440 Clarified that the minimum clearance referenced to FDM 260.6 is for the bridge structure itself

### FDM 226 Patterned Pavement and Architectural Pavers

#### Section 226

ID 300 Summary Comment: Eliminated outdated references to PROWAG and ADAAG.

#### Section 226.3

ID 283 Reorganized Chapter 226 to emphasize that "Architectural Pavers are prohibited within the traveled way on the State Highway System"

### FDM 230 Signing and Pavement Marking

### Section 230.2.2; 230.4

ID 419 Revised references to MUTCD tables to be consistent with latest MUTCD.

#### Section 230.3.1.3

ID 524 Item on hold pending opinion from FHWA on new MUTCD language.

## FDM 231 Lighting

## Section 231.2

- ID 402 Clarified requirements for matching new lighting CCT to existing lighting CCT when small numbers of luminaires are replaced.
- ID 401 Clarified calculations required for Veiling Luminance Ratio.
- ID 403 Added criteria to address lighting requirements for ramp crosswalks and channelized right turn crosswalks.
- ID 307 Increased design tolerance to 30% as requested by industry.
- ID 353 Clarified that values in Table 231.2.1 are initial values.

### Section 231.3

ID 308 Reduced required decimal precision in the calculation as requested by industry

### Section 231.3.2.1

- ID 461 Clarified when "New or Reconstruction" lighting values are used as compared to when "Intersection Lighting Retrofit" or "Isolated Lighting" values are used.
- ID 404 Deleted outdated method for vertical illumination check

### Section 231.3.2.1.1,

231.3.7

ID 383 Added requirement to evaluate new and existing structures in accordance with FDM 261.

### Section 231.3.7

ID 405 Added requirement to replace shielding as well, when replacing luminaires.

## FDM 233 Intelligent Transportation Systems (ITS)

### Section 233.11.1

ID 420 Updated reference to MUTCD Section 2L to MUTCD Chapter 2L to be consistent with latest MUTCD.

### Section 233.12.3

ID 475 Updated the Connected Vehicle Infrastructure section 233.12.3 to reflect the current status of the statewide practice and consistency with the National Guidance and requirements.

## FDM 240 Transportation Management Plan

### Section 240.1.1

ID 421 Replaced Roman numeral VI with Arabic numeral 6 as part of MUTCD update.

### Section 240.2.1.1

ID 474 Added requirements for items to be included in a Design Variation to omit ESU evacuation requirements.

#### Section 240.2.1.9

ID 453 Added reference to Pedestrian Escort Operation.

#### Section 240.2.2.15

ID 384 Clarified that bridges have a substructure rather than a foundation.

### FDM 260 Bridge Structures

### Section 260.2.2

ID 312 Revised to align 260.2.2 with criteria in 224.4.1 for needed horizontal clearance in width on Shared Use Paths.

### Section 260.4

ID 387 Allows DSDE to approve deck slope-breaks on a case by case basis.

### Section Fig 260.1.1

ID 385 Updated Figure to include 3 lane ramps

### Section Fig 260.1.2

ID 386 Updated figure to replace 3-bullet railing with 2-bullet railing.

### FDM 264 Noise Walls and Perimeter Walls

### Section multiple

ID 437 Replaced "noise wall" with "noise barrier" and revised criteria for analysis and cost determination.

### FDM 273 Landscape Maintenance Guide

#### Section 273.3

ID 483 Removed reference(s) to standard and/or large-format plan sheets.

### FDM 900 Production of NexGenPlans

#### Section 900.3

ID 484 Removed all references to standard and large-format plan sheet sizes.

## FDM 901 Sequence of Plans Preparation

### Section 901.2

- ID 510 Removed references to large and standard format plan sheet sizes. Revised the order of the Roadway Plans sheets to match the order shown in Chapter 910 and to add the Roadway Cross Sections back into the Roadway Plan Set as it was in the 300 Series.
- ID 485 Deleted all references to standard and large-format plan sheet sizes.

### Section 901.3.3

- ID 321 Item pending review by technical expert.
- ID 397 Added requirement to complete all TSP reviews and enter them into ERC

### FDM 902 Estimated Quantities Report

### Section 902 blue box

ID 449 Replaced "summary box" with "summary table" to provide consistency with latest Basis of Estimates Manual

#### Section 902.2

ID 341 Updates Signature Page Information to indicate each component EOR has developed estimated quantities appropriately.

## FDM 904 Landscape Opportunity Plan

#### Section 904.3

ID 487 Deleted all references to standard and large-format plan sheet sizes.

### FDM 905 RoadwayCross Sections

### Section 905.1

ID 488 Removed the portions of Chapter 905 that described the Cross Sections sheets as not being part of the Contract Plans Set, removed references to standard and large-format plan sheet sizes.

### Section 905-1

ID 511 Remove reference to Large Format.

### Section All

ID 522 FDM Chapter name changed from 905 to 925.

## FDM 906 Bridge Hydraulic Recommendations Sheet

#### Section 906.1

ID 489 Removed references to standard and/or large-format plan sheet sizes.

#### Section 906.4

ID 284 Revised to replace the "google maps hyperlink" with the "Project Location URL"....which is also referenced in Chapter 910 for the Key Sheet

#### **Section 906.5**

ID 446 Added vertical datum and sea level rise on BHRS.

### FDM 910 Key Sheet and Signature Sheet

#### Section 910.1

ID 491 Removed reference to Large Format. Added the Roadway Cross Sections back into the list of Roadway Plans sheets in 910.2.6.

#### Section all

ID 296 Revised throughout to indicate that requirements applicable to all Key Sheets (the Lead Component and all other components). Also made minor changes to capitalization and for plain language.

## FDM 911 Model Management Sheet

Section 911.1

ID 492 Removed reference to standard and large-format plan sheet sizes.

### FDM 912 Project Control

Section 912.2

ID 493 Removed references to standard and large-format plan sheet sizes.

## FDM 913 Typical Sections

#### Section

ID 442 Added requirements for obtaining and including the Smoothness Class on the Typical Sections for high-speed non-LA roadways.

### Section 913

ID 113 Item pending review by technical expert.

#### Section 913.1

ID 494 Removed reference to standard plan sheet size.

#### **Section 913.3**

ID 432 Removed "Posted Speed" from Traffic Data block of Exhibit 913-3 to be consistent with FDM 913.3.

### FDM 914 General Notes

#### Section 914.1

ID 478 Added column for "Email, if provided" to Exhibit 914-1.

ID 526 RID 526: Removed reference to 11"x17" plan sheet size.

## FDM 915 Roadway Plan-Profile Sheet

### Section 915.1

- ID 495 Removed references to standard and large-format plan sheet sizes and removed references to labeling at 2,500-foot intervals.
- ID 344 Added requirement for showing all high-water elevations that affect base clearance and roadway grades from former section 312.3.
- ID 513 Changed the scale for this sheet back to 1" = 400', like it was before large-format, which is also more appropriate for fitting an entire interchange onto one sheet.

### Section 915-1

ID 514 Remove reference to Large Format.

## FDM 916 Drainage Structures Sheet

#### Section

ID 466 Item pending review by technical expert.

#### Section 916.1

ID 496 Remove reference to Large Format.

### Section 916-1

ID 515 Remove reference to Large Format.

### FDM 917 Stormwater Facilities

### **Section 917.1**

ID 497 Remove reference to Large Format.

### FDM 918 Drainage Map

#### Section 918.1

ID 498 Remove reference to Large Format.

### FDM 919 Lateral Ditches Sheets

Section 919.1

ID 523 Removed references to standard and large format plan sheet sizes, since the Lateral Ditch sheet is different/separate from the Drainage Structures sheets, which are on hold at this time.

## FDM 920 Soil Survey and Core Boring Data

Section 920.2

ID 499 Removed reference to standard format plan sheet size.

Section 920.3

ID 520 Change this reference to the FDM chapter number for Cross Sections sheets from 905 to 925.

## FDM 921 Temporary Traffic Control Plan

Section multiple

ID 500 Removed references to standard and large format plan sheet sizes.

### FDM 922 Miscellaneous Structures

Section 922.1

ID 501 Removed reference to standard format plan sheet size.

Section 922.5

ID 393 Reformatted three-sided culvert plan and elevation view instructions for consistency.

### FDM 923 Utility Adjustments

Section 923.1

ID 516 Added a sentence to addresses the scale of the sheet, for consistency with removal of large format plans.

Section multiple

ID 502 Removed references to standard and large-format plan sheet sizes.

## FDM 924 Selective Clearing and Grubbing

### Section 924.2

ID 503 Removed references to standard and large-format plan sheet sizes.

## FDM 940 Signing and Pavement Marking Plans

### Section 940.2

ID 323 Revise Section 940.2 to clarify the S&PM Plans Key Sheet and Signature Sheet are to be the exact same as those of the Roadway Plans, and that the S&PM Plans should be assembled in a specific order.

### Section 940.6

ID 408 Added requirement to show chord diameter and ctr-to-ctr distance between chords on Overhead Sign Cross Section Sheets.

### Section multiple

ID 504 Removed references to standard and large format plan sheet sizes.

## FDM 941 Signalization Plans

#### Section 941.2

ID 476 Revised Section 941.2 to clarify the Signalization Plans Key Sheet and Signature Sheet are to be the exact same as those of the Roadway Plans, and that the Signalization Plans should be assembled in the order shown.

#### Section 941.4.1

ID 309 Clarifies "signalization" instead of "lighting" as required information and made a minor language edit.

### Section multiple

ID 505 Removed references to standard and large format plan sheet sizes.

## FDM 942 Intelligent Transportation Systems (ITS) Plans

### Section 942.2

ID 477 Revised Section 942.2 to clarify the ITS Plans Key Sheet and Signature Sheet are to be the exact same as those of the Roadway Plans, and that the ITS Plans should be assembled in the order shown.

### Section 942.6

ID 519 Change this reference to the FDM chapter number for Cross Sections sheets from 905 to 925.

### Section multiple

ID 506 Removed references to standard and large format plan sheet sizes.

### FDM 943 Lighting Plans

### Section 943.2

ID 479 Revised Section 943.2 to clarify the Lighting Plans Key Sheet and Signature Sheet are to be the exact same as those of the Roadway Plans, and that the Lighting Plans should be assembled in the order shown.

### Section multiple

ID 507 Removed references to standard and large format plan sheet sizes.

### FDM 944 Landscape Plans

#### Section 944.2

ID 480 Revised Section 944.2 to clarify the Landscape Plans Key Sheet and Signature Sheet are to be the exact same as those of the Roadway Plans, and that the Landscape Plans should be assembled in the order shown.

### Section multiple

ID 508 Removed references to standard and large format plan sheet sizes.

## FDM 948 Utility Work by Highway Contractor (UWHC) Plans

### Section 948.2

ID 481 Revised Section 948.2 to clarify the UWHC Plans Key Sheet and Signature Sheet are to be the exact same as those of the Roadway Plans, and that the UWHC Plans should be assembled in the order shown.

### Section 948.5

ID 518 Change this reference to the FDM chapter number for Cross Sections sheets from 905 to 925.

### Section multiple

ID 509 Removed references to standard and large format plan sheet sizes.