

# Guidelines for Coordination Between the North Carolina Department of Transportation and the North Carolina Turnpike Authority During the Preliminary Engineering and Environmental Study Process

July 28, 2006

Approved for NCDOT by: Deborah Barbour Date: 7-28-06

Deborah Barbour, PE  
Director of Preconstruction, NCDOT

Approved for NCTA by: [Signature] Date: 7.28.06

Steven D. DeWitt, PE  
Chief Engineer, NCTA



# Guidelines for Coordination Between the North Carolina Department of Transportation and the North Carolina Turnpike Authority During the Preliminary Engineering and Environmental Study Process

## General Guidelines:

1. For purposes of this document, the North Carolina Turnpike Authority (NCTA) includes the direct staff of the NCTA as well as the General Engineering Consultant (GEC) and GEC subconsultants.
2. Candidate Turnpike Projects will follow state and Federal guidelines, policies, and procedures. The National Environmental Policy Act will be followed in the development of the environmental documents, the American Association of State Highway Transportation Officials policy will be followed within the project design, and the project will be developed to minimize impacts to the extent practicable to the natural and human environment.
3. Candidate Turnpike Projects will be included in the NCDOT TIP.
4. Candidate Turnpike Projects in Metropolitan Planning Organization (MPO) areas will be included on the MPO's long-range transportation plan, MPO Transportation Improvement Program (MTIP) and will be part of the area's conformity analysis. The NCTA will coordinate with the appropriate MPO to ensure these projects are included on the Long Range Transportation Plan (LRTP), included in the area's air quality conformity analysis, and that the design concept/scope (number of lanes, interchange locations, horizon year, etc.) proposed for the project is consistent with the LRTP and the air quality conformity analysis.
5. The NCTA Chief Engineer will provide a letter to the NCDOT Director of Preconstruction at the time projects are requested to transition from the NCDOT to the NCTA.
6. NCDOT Preconstruction Branches will review the NCTA work products for basic conformance to NCDOT guidelines at identified points as described later in this document and provide comments on NCTA work products.
7. Private engineering firms selected for preconstruction activities will be prequalified by NCDOT in their respective disciplines for services that they are rendering for the NCTA. The complexity of the design and the firm's experience will be taken into account in the firm's selection.
8. The NCTA will conduct an in-depth review of all private engineering firms' draft work products. The NCTA's comments will be provided to the private engineering firms for incorporation into the draft work products. The NCTA will review the revised draft work products to ensure their comments are incorporated prior to transmitting the

work products to NCDOT for review. The NCDOT Preconstruction Branches review will be on a cursory basis only.

9. NCDOT Preconstruction Branches will be informed/ invited to meetings for the Candidate Turnpike Projects including project scoping meetings, citizens informational workshops, public hearings, hearing map reviews, post hearing meetings, field inspections, etc. The NCTA will notify the NCDOT contacts listed later in the report of project meetings.
10. NCDOT Preconstruction Branches' reviews of private engineering firms' draft work products will be completed within two weeks after receiving the draft work products, except for the review of the preliminary Draft and Final EISs. The review time for the preliminary Draft and Final EISs is three weeks. Review periods may be extended if mutually agreed upon by the NCTA and NCDOT. If more than one product is submitted at a time, additional review time may also be required.
11. The NCTA will incorporate the NCDOT access management guidelines in order to protect the operation of interchanges and freeways.
12. The connections to and work along NCDOT State Highway System roadways necessitated by NCTA projects will be reviewed by NCDOT and will require a signed encroachment agreement by NCDOT.
13. Request for information from NCDOT or for NCDOT review will be made from the NCTA staff as identified in the project specific agreements.
14. The designated NCDOT contacts that will coordinate the NCTA requests are as follows:
  - Deborah Hutchings: Transportation Planning Branch
  - Staff Engineer: Project Development & Environmental Analysis Branch
  - DeWayne Sykes: Highway Design Branch exclusive of the Structure Design Unit
  - Lonnie Brooks: Structure Design Unit
  - Lori Cove: Traffic Engineering and Safety Systems Branch
  - Neal Strickland: Right of Way Branch
15. Review work and preliminary engineering work performed by NCDOT on a NCTA project will be charged to the NCTA project. NCTA should make a request in writing to the NCDOT Director of Preconstruction if there is a desire for NCDOT to perform engineering work on a NCTA project.

### **Coordination by Branch or Unit**

#### **Transportation Planning Branch (TPB)**

1. The Transportation Planning Branch will review the scope of work for traffic forecasts and provide comments.
2. The Transportation Planning Branch will review the draft and final traffic forecasts and provide comments on forecast with respect to consistency with other forecasts in

the area, any concerns that may arise, and for conformance with typical TPB procedures.

#### Project Development and Environmental Analysis Branch (PDEA)

1. The NCTA will provide the PDEA Branch with 15 copies of the following documents for Candidate Turnpike Projects for review and comment or for NCDOT records (final approved documents).
  - The Preliminary Draft EIS
  - The Draft EIS
  - The Preliminary Final EIS
  - The Final EIS
  - The Draft EA
  - The EA
  - The Draft FONSI
  - The FONSI

At the time a document is ready for Federal Highway Administration (FHWA) signature, the NCTA will coordinate with NCDOT and FHWA for document approval.

2. The NCTA will provide the PDEA Branch with two copies of the signed ROD.
3. The NCTA will provide the PDEA Branch with draft and final copies of all applicable technical memoranda. The NCTA will allow the PDEA Branch two weeks to provide comments on the draft technical memoranda. Comments received from the PDEA Branch, will be considered in the final reports. PDEA will be provided with a written summary of the disposition of their comments. In the event that the NCTA does not receive comments within the agreed upon review time, the reports will be finalized and copies of the final technical memoranda will be provided to the PDEA Branch.
4. Both the NCDOT and NCTA will sign the Environmental Assessment, the Finding of No Significant Impact, the Draft Environmental Impact Statement and the Final Environmental Impact Statement for all Candidate Turnpike Projects where federal funding is used for preconstruction activities. NCDOT will be provided a letter from either the NCTA attorney or the law firm representing the NCTA stating that the NEPA document has been reviewed and is legally sufficient.
5. The NCTA will provide the PDEA Branch with electronic copies of the advertisements for all public meetings. The PDEA Branch will submit the advertisements to the appropriate local newspapers.
6. The NCTA will conduct all public hearings.
7. The PDEA Branch will provide a GIS mailing list once during the project life.

#### Highway Design Branch - Geotechnical Engineering Unit

1. The NCTA will perform a geotechnical and geoenvironmental assessment of the project study area including project alternatives and provide preliminary geotechnical

and geoenvironmental recommendations during the preliminary engineering and environmental study process.

2. The Geotechnical Engineering Unit will be provided the opportunity to conduct the geotechnical and geoenvironmental assessment work and to prepare the preliminary geotechnical and geoenvironmental recommendations. Any work that the Geotechnical Engineering Unit elects to perform will be delivered on the schedules established by the NCTA. If the Geotechnical Engineering Unit elects to provide the assessment work and later determines it cannot meet the schedules established by the NCTA, the Geotechnical Engineering Unit will notify the NCTA of their inability to meet the schedule within a timeframe that allows the NCTA to conduct the work and maintain the original project schedule.
3. The Geotechnical Engineering Unit will review scopes of work for all geotechnical and geoenvironmental activities that the Unit elects not to perform.
4. The NCTA will provide draft and final copies of geotechnical and geoenvironmental submittals provided by private engineering firms. The NCTA will allow the Geotechnical Engineering Unit two weeks to provide comments on the draft submittal. The NCTA will consider the Geotechnical Engineering Unit's comments in the final submittal. If the Geotechnical Engineering Unit's comments on the draft submittal are not received in the scheduled review time, then the NCTA will present the final submittal to the Geotechnical Engineering Unit.

#### Highway Design Branch – Photogrammetry Unit

1. The Photogrammetry Unit will fly all Candidate Turnpike Projects and will own the film.
2. The NCTA will provide an electronic copy of the mapping products for the Candidate Turnpike Projects to the Photogrammetry Unit.
3. The Photogrammetry Unit will review the scope of work for private consulting firms providing photogrammetric products for the Candidate Turnpike Projects.
4. The Photogrammetry Unit will be provided the opportunity to provide the mapping products for the Candidate Turnpike Products. Any mapping products that the Photogrammetry Unit elects to provide for the Candidate Turnpike Products, which may include contact prints, scans, GPS/IMU data and enlargements for field classification, will be delivered on the schedules established by the NCTA for the projects. If the Photogrammetry Unit elects to provide the mapping, and later determines that it cannot meet the schedules established by the NCTA, the Photogrammetry Unit will notify the NCTA of their inability to meet the schedule within a timeframe that allows the NCTA to conduct the work and maintain the original project schedule.
5. The NCTA will perform all photogrammetry work products to NCDOT standards and specifications.

### Highway Design Branch – Location and Surveys Unit

1. The Location and Surveys Unit will be provided the opportunity to conduct the panel and ground control work. Any panel and ground control work that the Location and Surveys Unit elects to provide for Candidate Turnpike Projects will be delivered on the schedules established by the NCTA for the projects. If the Location and Surveys Unit elects to provide the panel and ground control work, and later determines that it cannot meet the schedules established by the NCTA, the Location and Surveys Unit will notify the NCTA of their inability to meet the schedule within a timeframe that allows the NCTA to conduct the work and maintain the original project schedule.
2. The Location and Surveys Unit will review the scope of work for all survey activities that the Unit elects not to conduct.
3. The NCTA will perform all Location & Survey work products to NCDOT standards and specifications.
4. The Location and Surveys Unit will verify coordinates for Candidate Turnpike Projects.
5. The NCTA will be responsible for staking all rights of way, including any revisions.
6. The NCTA surveyor will make any necessary revisions to property line locations (additions, subdivisions, recombinations, etc.) to reflect the most up to date information.
7. The Location and Surveys Unit will be provided the opportunity to review all control sheet information on plans for Candidate Turnpike Projects prior to recordation.
8. The NCTA will provide the Location and Surveys Unit electronic copies of all the surveys and plans for Candidate Turnpike Projects.

### Highway Design Branch – Roadway Design Unit

1. The NCTA will provide the Roadway Design Unit copies of the draft design criteria and proposed typical sections for Candidate Turnpike Projects for review and comment. The proposed preliminary pavement design will also be included within the typical section information. The Roadway Design Unit will relay the preliminary pavement design information to the Pavement Management Unit for review.
2. The NCTA will provide the Roadway Design Unit copies of the functional designs for Candidate Turnpike Projects for review and comment. The NCTA will also supply traffic diagrams or traffic technical memoranda information to the Roadway Design Unit for this review.
3. The NCTA will provide the Roadway Design Unit copies of the preliminary designs for Candidate Turnpike Projects for review and comment. The NCTA will also supply traffic diagrams or traffic technical memoranda information to the Roadway Design Unit for this review.

4. The NCTA will provide the Roadway Design Unit 3 copies of the following documents for Candidate Turnpike Projects for review and comment or for NCDOT records (final approved documents). The Roadway Design Unit will provide the documents to the Hydraulics Unit and the Structure Design Unit for review and comment.
  - The Preliminary Draft EIS
  - The Draft EIS
  - The Preliminary Final EIS
  - The Final EIS
  - The Draft EA
  - The EA
  - The Draft FONSI
  - The FONSI
  - The ROD

#### Highway Design Branch – Hydraulics Unit

1. The NCTA will provide the Hydraulics Unit with draft and final copies of the Hydraulics Technical Memoranda. The NCTA will allow the Hydraulics Unit two weeks to provide comments on the draft technical memoranda. Comments from the Hydraulics Unit will be considered in the final reports. In the event that the NCTA does not receive comments within the agreed upon review time, the reports will be finalized and copies of the final technical memoranda will be provided to the Hydraulics Unit. The Hydraulics Unit will also review the bridge length requirements needed for hydraulic conveyance and supporting calculations.

#### Traffic Engineering and Safety Systems Branch

1. The NCTA will provide the Traffic Engineering Branch with preliminary interchange designs and intersection designs that are in proximity to the interchanges on Candidate Turnpike Projects for review and comments.
2. The NCTA will provide the Traffic Engineering Branch with draft and final copies of the Traffic Technical Memoranda. The NCTA will allow the Traffic Engineering Branch two weeks to provide comments on the draft technical memoranda. Comments from the Traffic Engineering Branch will be considered in the final reports. In the event that the NCTA does not receive comments within the agreed upon review time, the reports will be finalized and copies of the final technical memoranda will be provided to the Traffic Engineering Branch.
3. The Traffic Engineering Branch will provide crash data for Candidate Turnpike Projects.
4. The NCTA will provide the Traffic Engineering Branch with copies of any traffic signal warrants for Candidate Turnpike Projects for review and comments.
5. The NCTA will furnish copies of the functional and preliminary designs to the Traffic Engineering Branch for review and comments.

Right of Way Branch

1. The Right of Way Branch will process settlement payments to the property owners.
2. The NCTA will negotiate and purchase rights of way for all NCTA projects.

Other

1. These guidelines may be modified from time to time as agreed to by the NCTA and the NCDOT in writing.
2. The NCTA will record highway plans for Turnpike Projects.
3. Project review points will be developed cooperatively between NCDOT and NCTA for coordination within the final engineering, construction, and maintenance phases of the NCTA projects.