

**PROCEDURES FOR USING PROPRIETARY ITEMS ON  
NORTH CAROLINA DEPARTMENT OF TRANSPORTATION PROJECTS GOVERNED BY  
CFR Title 23 Highways – §635.411 OR NC GENERAL STATUTES – §133-3**

August 2015

North Carolina Department of Transportation (NCDOT) and the Federal Highway Administration (FHWA) encourage competition in project lettings. To further assure that the NCDOT, Municipalities and Counties using *federal or state funds*, comply with the appropriate regulations, this information and process is being brought to your attention. **These requirements apply to any entity advertising projects through NCDOT, using Federal or State Funds governed by CFR Title 23 Highways – §635.411 or NC General Statutes – §133-3.** The purpose of these statutes is to mandate and encourage free and open competition on public contracts.

Engineers have an inherent duty to use generic products instead of simply specifying proprietary products. If proprietary items are used, procedures within this document must be followed. Using the procedures shown herein is time consuming, limits competition and does not guarantee that the proprietary product will be approved for use on a project funded by the FHWA or by NCDOT or a combination of funds from these sources.

The links below are valuable sources of information on proprietary items using state and federal funds; the information *has not been repeated* in this document.

Construction Program Guide:

<http://www.fhwa.dot.gov/construction/cqit/propriet.cfm>

Questions and Answers Regarding Title 23 CFR 635.411:

<http://www.fhwa.dot.gov/programadmin/contracts/011106qa.cfm>

Federal Memorandum on Guidance on Patented and Proprietary Product Approvals:

<http://www.fhwa.dot.gov/programadmin/contracts/011106.cfm>

Code of Federal Regulation (CFR 635.411):

<http://www.gpo.gov/fdsys/pkg/CFR-2014-title23-vol1/pdf/CFR-2014-title23-vol1-sec635-411.pdf>

State General Statute §133-3:

[http://www.ncga.state.nc.us/EnactedLegislation/Statutes/PDF/BySection/Chapter\\_133/GS\\_133-3.pdf](http://www.ncga.state.nc.us/EnactedLegislation/Statutes/PDF/BySection/Chapter_133/GS_133-3.pdf)

There are only four ways that a proprietary item can be incorporated into a project with the aforementioned *federal or state funding*. One of the four conditions and procedures represented in this document must be used to *request approval* for use of a proprietary item. Should a proprietary item be approved for use, the State Value Management Engineer ([valuemanagementunit@ncdot.gov](mailto:valuemanagementunit@ncdot.gov) or 919-707-4810) and the State Contract Officer (919-707-6900) shall be notified so this information can be tracked and published on the Product Evaluation Program website, <https://connect.ncdot.gov/resources/Products/Pages/default.aspx>.

**1. COMPETITIVE BIDDING:**

The proprietary product is obtained through competitive bidding with other suitable proprietary and non-proprietary products available. Efforts must be made to find or write a generic Specification that will not eliminate all but one product. In other words, do not make the generic Specification so specific that it will allow only one product. If generic Specifications are not available or are too complicated to write, list at least 3 like proprietary items and the term “*or approved equal.*” Approved equal means that a product not listed may be used if it has the same properties and it meets the Engineer's approval. Depending on the product, the Engineer may request input from the design unit most familiar with the product and from the Materials and Tests Unit before giving approval. (Example: Sign Sheeting would be reviewed by the Signing Unit and Materials and Tests Unit.) Approval obtained for use is for the one project only.

**Example language:** *Use Item A, Item B, Item C or an approved equal.* Show the same information for each product, such as the website and telephone number. To avoid favoritism, list items in alphabetical order.

**Caution:** Approval of a specific proprietary item on one project is not a blanket approval that can be used any time or any location without further approval. These steps must be taken for *each proprietary item, in each project, each time used.*

**2. ESSENTIAL FOR SYNCHRONIZATION with existing highway facilities or A UNIQUE PRODUCT FOR WHICH THERE IS “NO EQUALLY SUITABLE ALTERNATE”:**

An effort must be made to find interchangeable, compatible generic products to work with the existing product. If there are none available, the requester must prove there is *no equally suitable alternate.* Justification should consist of function, aesthetics, logistics or a combination, through engineering judgment, economic considerations, product availability and compatibility as to why no other product would work. *Each proprietary item must be addressed separately.*

**a. Outside NCDOT:** The entity requesting the item must have the City Engineer or their Consultant (whoever seals the plans) develop the justification and sign and submit the letter of request at least 3-6 months prior to project letting. The letter with the justification must be submitted to the appropriate NCDOT Division Engineer or Director, requesting the use of this product. The NCDOT approving authority will send written approval or denial within 30 days of receipt of the request. This documentation will be added to the permanent project files.

**b. Within NCDOT:** The entity within NCDOT must use generic products if possible. If it is not possible, the NCDOT unit must supply justification as to why generic products cannot be used. At least 3-6 months prior to project letting, a letter with the justification must be signed by the Unit Head, Division Engineer or Director and kept with the permanent project files. These records must be readily available in case of a request or an audit.

**Example:** Adding traffic signal equipment to an existing traffic signal system requiring specific (proprietary) product compatibility.

**Caution:** If the product is contested by a vendor, or the project is reviewed by FHWA-NC or audited by an outside auditor and finds there is another product available that could be used in lieu of the requested product, and the justification is not sufficient, the certifying entity runs the risk of losing federal funds for that part of the project.

**3. RESEARCH, TEST OR EXPERIMENTAL project:  
(This option is not available outside of NCDOT)**

If a NCDOT manager, supervisor or designer feels strongly enough that a proprietary item has more favorable characteristics than any other product available for their project, that entity may develop a *proposal* and *workplan* with experimental testing, control sections, and justification, for application to the NCDOT Research and Development Manager (Telephone: 919.508.1790). There is an example application which could serve as a guide for developing a proposal and workplan in the appendix of this document. The package must be submitted at least 12–18 months prior to letting. This is not a process to be entered into frivolously as a great deal of time, effort and costs are expended by the NCDOT Research and Development Unit when developing a research, test or experimental project. After review of the submitted proposal and workplan, the NCDOT Research and Development Manager will send their written decision to the applicant to approve or deny the proprietary product as a test project. Approval or denial will be made solely by the Office of Research and Development. Submit copy of approval letter from Research and Development Unit with the project submission for letting.

Review this information before submitting a request for a federally funded experimental project. <http://www.fhwa.dot.gov/programadmin/contracts/expermnt.cfm>

**4. PUBLIC INTEREST FINDING:**

If a NCDOT manager, supervisor or designer, City or Municipality feels there is no other product that would work as well as a proprietary item, that entity must justify that this item is the most acceptable choice of product by developing a Public Interest Finding (PIF) request. The request shall include why this product is the only product that would serve the need, and how it is superior to all other products. Supporting material should include engineering judgment and economic considerations, product availability and compatibility, logistical concerns and considerations unique to the product. It could include credible research from other states, if applicable. It cannot be based on opinion.

**a. Outside NCDOT:** After preparing the Public Interest Finding request, submit to the appropriate design unit, and the Materials and Tests Unit within NCDOT for their review and input. After input has been received, reviewed and incorporated into the PIF, send the package with a letter signed by the City Manager, City Engineer or Consultant that sealed the plans, to the Division Engineer at least 12-24 months prior to the anticipated letting of the project. The Division Engineer will return the approval or denial in writing to the requestor within 90 days of receipt of the request. The requestor must provide a copy of the approval letter upon request to

any entity providing any funding for the project. A copy of the PIF and all backup data must be kept as part of the permanent project files.

- b. Within NCDOT:** Initially, the applicant must contact the NCDOT Research and Development Manager (Telephone: 919.508.1790) to determine if this product has been used previously in any area of the State as a research/test/experimental product. If it is verified in writing by the Research and Development Manager that it has not been used in an NCDOT project, proceed with the following:

After preparing the Public Interest Finding request, submit to the appropriate design unit, and the Materials and Tests Unit within NCDOT for their review and input. After input has been received, reviewed and incorporated into the PIF, send the package with a letter signed by the Division Engineer or Unit Head that sealed the plans, to the State Highway Administrator at least 12-24 months prior to the anticipated letting of the project. The State Highway Administrator will return the approval or denial in writing to the requestor within 90 days. The requestor must send the approval letter to the State Contract Officer when the project is submitted for letting. A copy of the PIF and all backup data will become part of the permanent project files.

**Caution:** The approval for use of a proprietary item based on a public interest finding is incredibly rare.

## **PRODUCT EVALUATION PROGRAM**

The [Product Evaluation Program \(PEP\)](#) is a valuable service offered by NCDOT to assist vendors when submitting their unique products for consideration for use on NCDOT projects. The NCDOT designer may work with the PEP Engineer to have a specific product evaluated and *possibly* used in a test site on their project. When the evaluating and testing period is complete, and *if* the proprietary item is approved for use, the same conditions apply for its use as any other proprietary item. For more information on Product Evaluation Program, contact the Product Evaluation Program Engineer at 919.707.4808 or [productevaluation@ncdot.gov](mailto:productevaluation@ncdot.gov). If the product is used through the PEP, submit a copy of the PEP transmittal letter to State Contract Officer, when the plans and Special Provisions are submitted for bid letting.





#### **A. FHWA/NCDOT STEWARDSHIP AND OVERSIGHT AGREEMENT**

Under the current FHWA/NCDOT Stewardship and Oversight Agreement, the approval authority for those projects where oversight is delegated rests with the NCDOT. The Unit Head, Division Engineer, Director or the highest ranking official over the unit, branch, department, or division will be responsible for those approvals in lieu of the FHWA. Any such decision is subject to review by the FHWA-NC office, NCDOT Administration or by federal or state auditors.

#### **B. NCDOT STATE FUNDED PROJECT ACCOUNTABILITY**

The approval authority will be the Unit Head, Division Engineer, Director or the highest ranking official over the unit, branch, department, or division, and will be responsible for the approvals. Any such decision is subject to review by the NCDOT administration or by state auditors.

#### **C. FEDERAL PROPRIETARY PRODUCTS LAW**

**This regulation became effective for all Federal-aid highway construction projects on February 1, 2006 and draws its authority from 23 U.S.C. 112, which requires the competitive bidding of Federal aid highway construction contracts.**



North Carolina Department of Transportation

**E. PROPRIETARY ITEMS ON FEDERALLY FUNDED AND STATE FUNDED PROJECTS OVERVIEW**

Type	Time Required	Approval Level	Documentation Required	Special Instructions	Caution
Generic	None	None	Standard Specifications, Project Special Provisions	May require certifications as specified in Article 106-3 of the <i>Standard Specifications</i>	None, most preferred method
Proprietary Items	1 hour to 1 week	State Contract Office State Contract Officer	Copy of data on at least 3 similar proprietary items or products	Write as <i>Item A, Item B, Item C or Approved Equal</i>	Approval is project-specific and site-specific. If an approved equal is submitted in lieu of listed items, the Engineer will determine if the submission is an <i>approved equal</i> .
Essential for Synchronization or No Equally Suitable Alternate	3-6 months prior to letting	Division Engineer	Letter of Justification signed by Designer or City Engineer (whoever seals the plans) <i>AND</i> the Division Engineer	A copy of the justification letter will become part of the permanent project file.	If contested by a vendor, or audited and another product could be used, the entity runs the risk of losing funding for that product.
Research/Test/Experimental Project (NCDOT only)	12-18 months prior to letting	FHWA-NCDOT Authority granted to NCDOT under Stewardship and Oversight Agreement Research and Development Manager	Proposal and workplan, submitted to the Office of Research and Development, with signed verification from the Designer or Consultant that sealed the plans <i>AND</i> the Division Engineer.	A copy of the Proposal and Workplan, w/documentation will become part of the permanent project file.	Will not be approved if there is an on-going NCDOT research project or there has been an NCDOT research project on this product. Proposal and workplan must be fully justified with engineering judgment, statistics and credible research from other states or entities; approval or denial of research project is made solely by the Office of Research and Development.



**PROPRIETARY ITEMS ON FEDERALLY FUNDED AND STATE FUNDED PROJECTS  
OVERVIEW (continued)**

Type	Time Required	Approval Level	Documentation Required	Special Instructions	Caution
<b>Public Interest</b>	12-24 months prior to letting	FHWA-NCDOT Authority granted to NCDOT under Stewardship and Oversight Agreement  Chief Engineer	Public Interest Finding, including justification, verification letter from NCDOT Research and Development, comments from affected unit and Materials and Tests Unit, signed verification from the City Engineer or Consultant that sealed the plans <i>AND</i> the Division Engineer, Unit Head or Director.	A copy of the PIF package will become part of the permanent project file.	This is an incredibly rare approval; if denied, and used anyway, federal and state funding will be lost for that portion of the project
<b>Product Evaluation Program</b>	Varies	NCDOT Technical Working Group, PEP Engineer	Product is evaluated and decision is made by a Technical Working Group.	Product is submitted by the vendor or manufacturer	If product is approved for use, it may be added to an approved list or qualified list. Products on an approved or qualified list must be shown as 3 items and approved equal.



NORTH CAROLINA DEPARTMENT OF TRANSPORTATION

**F. CALL FOR NEW RESEARCH IDEA**

Your Name:

DATE:

Branch / Unit:

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TITLE of your Research Idea:

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Background:

What is the Specific Problem or Issue?

List Research Objectives and Tasks:

What Would be the Product[s] of the Research?

*(Note: Progress reports and the Final report are **NOT** considered a "product," but "deliverables.")*

How Will You or Others Use the Product[s]?

How Will the Product Benefit the Department?

*(e.g., increase operational efficiency, decrease costs, enhance safety, etc. Indicate short term and/or long term benefit)*

Other Comments:

Approval (Division official or Unit Head)

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Print Name

Signature

Title

**Please FAX, Mail, or email to: Neil Mastin, PE, Research and Development Unit**

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Raleigh, NC 27699-1549

FAX: (919) 715-0137  
Phone: (919) 508-1790  
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