

# Pender County Planning and Community Development

## Planning Division

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## AGENDA

### Pender County Planning Board Work Session

Tuesday, December 1, 2015 6:00 p.m.

Pender County Hampstead Annex Meeting Room 102  
15060 US HWY 17 N., Hampstead North Carolina

**Call to Order:** Chairman Williams

**Roll Call:** Chairman Williams

Pender County Planning Board Members:

Williams: \_\_ McClammy: \_\_ Baker: \_\_ Edens: \_\_ Fullerton: \_\_ Marshburn: \_\_ Nalee: \_\_

**1. Adoption of the Agenda:**

**2. Adoption of the Minutes: (Planning Board Meeting on November 4, 2015)**

**3. Public Comment:**

**4. Items for Discussion**

- i. Collector Street Plan:
- ii. Comprehensive Land Use Plan:
- iii. Cul De Sac Radius:

**5. Adjournment:**

*\*Items not covered during Work Session may be heard under "Discussion Items" during the regular Board meeting.*

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## MEMORANDUM

To: Pender County Planning Board

From: Planning Staff

Date: December 1, 2015

RE: Collector Street Plan and Comprehensive Plan Updates

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Staff will continue to provide you with an update at each Planning Board meeting regarding the Collector Street Plan and Comprehensive Land Use Plan update process. Below is a summary of the status of each plan update since our last discussion.

### **Pender County Collector Street Plan**

Planning Staff continues to work in coordination with the Wilmington MPO and Stantec on the Collector Street Plan update. The Collector Street Plan Steering Committee has met twice previously (August 13, 2015 and October 1, 2015). Additionally, a stakeholder meeting was held on October 1, 2015 to garner public input from citizens at Heidi Trask High School. On October 26, 2015 Staff presented an update to the Board of County Commissioners on the project.

At this time the Steering Committee has reviewed; an existing conditions chapter, environmental features of the study area and initial survey results. The consultant conducted a ground truthing exercise where they did field work to determine suitability for proposed collector roadways.

The Steering Committee will meet on December 3, 2015 at 3PM to review;

1. Survey results

The collector street plan survey is located at [www.pendercollector.com](http://www.pendercollector.com) and continues to be available for more input. The consultant has been sharing the preliminary results with the Steering Committee.

2. Proposed collector street plan network

The draft collector street plan network was designed using the intensity of development (that the particular zoning district would support) coupled with spacing standards between streets in combination with environmental features and proposed new developments. If possible new collectors are designed to avoid environmentally sensitive areas such as wetlands to extents practical, while still providing level of service to improve the roadway network in Pender County.

3. Cross sections for future collector roadways

The cross sections are a plan for specific design standards within an identified public collector roadway. This includes elements such as sidewalks, multi-use paths, bike lanes and lane width.

#### 4. Further the discussion on policies

Planning Staff continues to work with Stantec towards the drafting of the Collector Street Plan with input from both the Steering Committee and citizens.

#### **Comprehensive Land Use Plan**

Planning Staff continues to work on preliminary planning and information inventory in preparation for a consultant beginning work on the Comprehensive Land Use Plan. This information includes:

- Definition of small area plan boundaries
- Existing plan inventory
- Goals and policies matrix
- Existing land use survey

Interviews were held on October 14, 2015 and November 13, 2015. Representatives from the Planning Board, as well as, Staff were actively involved in interviews and selection of the consultant. At this time, Pender County is working on a contract and scope of agreed upon work with Stantec, who is anticipated to begin work once these documents can be finalized and the Board of Commissioners approves the contract. It is anticipated that this will be up for approval on the Board's January agenda.

On August 17, 2015 Planning Staff learned that Pender County has been selected to receive \$10,000 in Partners for Green Growth funding from NC Wildlife Resources Commission (NCWRC) to use towards incorporation of conservation methods into the update of the Comprehensive Land Use Plan. Staff will work with NCWRC to develop and gain approval on a contract funding agreement, at this time NCWRC is still developing a contract with Pender County. A brief summary of the Partners for Green Growth funding is as follows:

- The purpose is to fund land use planning projects that address conservation of priority wildlife habitats. Our proposal is to use funding to develop and incorporate a conservation component into the Comprehensive Land Use Plan (in conjunction with the Plan update).
- The funding amount is \$10,000.
- Invited full applications are due September 10 (non-competitive).
- 50% non-federal in-kind match is required. Our proposal is to calculate match using:
  - Staff time calculated at approximately \$20.00 per hour: \$2,500 (125 hours) for existing conditions inventory, site visits, conservation data analysis, coordination with consultant and NC Wildlife Resources Commission for integration of final conservation product within Comp Plan
  - 7.5 percent of County payment to consultant (total contract will be \$100,000): \$7,500 for conservation data analysis and conservation policy recommendation for inclusion into Comprehensive Land Use Plan
- Work must be completed within a year.
- Funds will be distributed as reimbursement (by September 16, 2016).
- Pender County is eligible for 40 hours of technical assistance from NC Wildlife Resources Commission as part of the funding.

Planning Staff appreciates your input throughout the process for these plan updates.

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## MEMORANDUM

To: Pender County Planning Board

From: Planning Staff

Date: December 1, 2015

RE: Cul-de-sac Radius

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Staff has prepared and will be presenting to you information on cul-de-sac radius and turn around requirements on public and private roadways. Planning Board previously discussed presenting potential cul-de-sac radius amendments on June 3, 2014 and the Board had previously concluded that the Pender County Unified Development Ordinance requirements met the needs of the community as written and if a larger cul-de-sac radius was deemed necessary during the Pender County Technical Review process then each should be evaluated on a case-by-case basis.

The Pender County Unified Development Ordinance Section 7.5.1 F specifies:

*Permanent dead end streets (cul-de-sacs) or temporary dead end (stub) streets shall be no longer than 1,000 ft. unless it is demonstrated by the developer that the configuration of the property prevents its development without longer streets to provide access to the lots and common area to be subdivided. Temporary dead end or stub streets shall provide turn around capabilities to meet NCDOT requirements. The Cul-de-sac end shall be a bulb type with minimum radii as follows: Curb & Gutter Section: RW = 45', Pavement = 37' to gutter edge, Shoulder Section: RW = 50', Pavement = 35'.*

There are however, inherent conditions that are specific to each development which may necessitate a larger cul-de-sac than NCDOT requirements and Pender County Unified Development Ordinance minimum requirements. Conditions that may require a larger cul-de-sac could be school bus accessibility and fire apparatus accessibility. According to Pender County Schools, buses are required to stop per quarter mile and may not need to utilize each cul-de-sac in a development; some cul-de-sacs may need to be larger to accommodate the school buses. Additionally, Pender County Emergency Management staff indicated that fire trucks and emergency vehicles may require additional area to turn around above and beyond the NCDOT minimum requirements.

In such situations, during the Technical Review process Emergency Management staff is encouraged to work with the applicant to properly service the development. Any and all turn around or cul-de-sac is subject to NCDOT requirements and approvals. In many instances a forty (40) foot cul-de-sac has been requested by the Pender County School System and Fire Marshal during the Pender County Technical Review meetings. Although this is a request from the Pender County Fire Marshal, the application of the

forty (40) foot cul-de-sac is currently not enforceable through Planning Staff. Only the thirty-five (35) foot cul-de-sac Per Section 7.5.1 F would be enforceable by Pender County. Clarity in recent months during Pender County Technical Review has been requested concerning cul-de-sac radius requirements.

Staff met with the Fire Marshal and Deputy Fire Marshal on October 27, 2015, to discuss further changes that may be applied to the Pender County Unified Development Ordinance to provide clarity to applicants and Technical Review Committee members. It is Staff's recommendation that the Pender County Unified Development Ordinance text be modified to allow for specific evaluation of each cul-de-sac and greater clarity for the applicant while meeting the needs of Pender County Schools and Emergency Management.

Distinguishing between specific lengths could help clarify the regulations. Suggested amendments for the Pender County Unified Development Ordinance Section 7.5.1 F includes distinguishing varying lengths of a permanent dead end street to then require a larger bulb for Emergency Management and school bus turn around. The length of a cul-de-sac will be measured from the last point of alternative connected access.

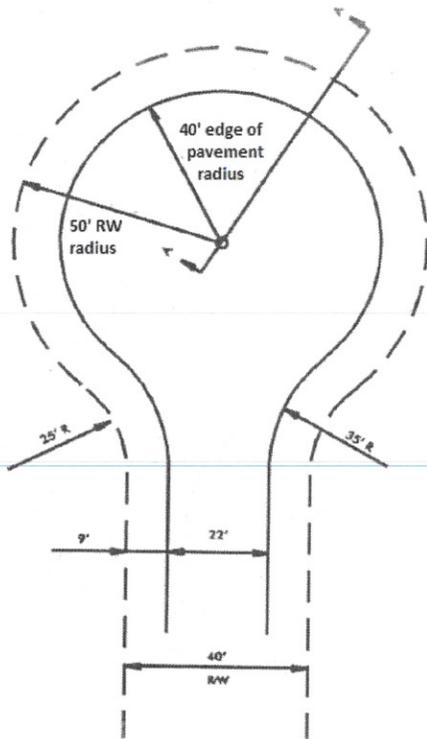
**Table 1**

	<b>Total Length</b>	<b>Edge of Pavement Radius</b>	<b>Right of Way with curb and gutter</b>	<b>Right of Way without curb and gutter</b>
<b>Short Cul-de-sac</b>	500 ft. or less	35 ft.	45 ft.	50 ft.
<b>Long Cul-de-sac</b>	501 ft. to 1,000 ft.	40 ft.	50 ft.	55 ft.

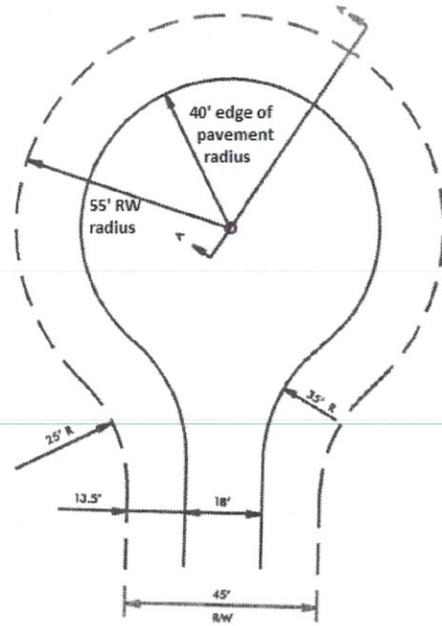
*Figures 1 and 2* are visual representations of short and long cul-de-sac radii. Through researching cul-de-sac radii, it may be appropriate to also include a NCDOT hammerhead design or other alternative designs as an approved turn around to allow applicants an option to deviate from a traditional bulb design. This can be seen in *Figure 3*. Staff will include the graphics of these designs as part of a Unified Development Ordinance amendment to clarify for both Technical Review Committee and applicants alike.



Figure 2: Long Cul-de-sac

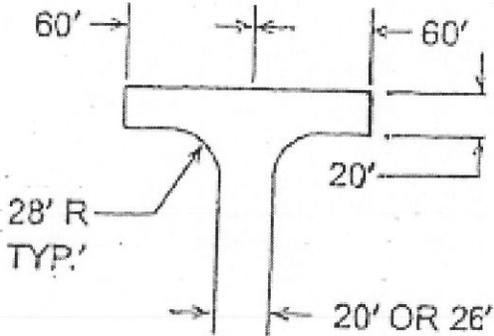


Symmetrical Cul-de-sac  
with curb and gutter



Symmetrical Cul-de-sac  
without curb and gutter

Figure 3: Alternative Design



120' Hammerhead