

FEASIBILITY STUDY

Fayetteville
Camden Rd. (SR 1003)
From Hope Mills Rd. (NC 59) to Owen Dr. (SR 1007)
Cumberland County
U-2810

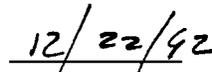
Prepared by
Program Development Branch
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I. GENERAL DESCRIPTION

This preliminary study describes proposed improvements to Camden Road (SR 1003) in Fayetteville. It is proposed to widen Camden Road from Hope Mills Road (NC 59) to Owen Drive (SR 1007), a distance of approximately 4.2 miles. In order to improve the existing horizontal alignment, part of the improvements are on new location. Please see Figure 1 for the project location. A five lane curb and gutter cross section (64 feet wide from face to face of curbs) is recommended on a 100 foot wide right of way for the entire length. The bridge over Little Rockfish Creek (Bridge No.102), the bridge over Duckhead Creek (Bridge No.120), and the bridge over the CSX Railroad (Bridge No.194) are to be replaced.

The total estimated cost including construction and right of way is \$14,000,000. It is estimated there will be 47 residences and no businesses relocated due to this project.

This study is the initial step in the planning and design process for this project and is not the product of exhaustive environmental or design investigations. The purpose of the study is to describe the problem, recommend a treatment including costs, and identify potential problem areas that require consideration in the planning and design phases.

II. NEED FOR PROJECT

The purpose of this project is to improve the traffic carrying capacity and accident experience of Camden Road. The project was requested by the City of Fayetteville.

Camden Road is designated a Major Thoroughfare on the Fayetteville Urban Thoroughfare Plan. Within the study limits it is classified an Urban Minor Arterial in the North Carolina Statewide Functional Classification System. Development on Camden Road is primarily light to medium density residential from Hope Mills Road to Owen Drive with some commercial development at major intersections.

Existing Camden Road is a two way, two lane, road. The pavement width is generally 26 feet wide and there are 6 foot wide grass shoulders. The intersections with Hope Mills Road, SR 1344, and Owen Drive are controlled with traffic signals. At Hope Mills Road, the north leg of Camden Road has been widened to provide an exclusive left turn lane. At Owen Drive, the south leg of Camden Road has been widened to provide an exclusive left turn lane, an exclusive thru lane, and an exclusive right turn lane.

Bridge number 102 over Little Rockfish Creek has a clear deck width of 24 feet, a length of 145 feet, and a Sufficiency Rating of 29.3 out of a possible 100 points. A Sufficiency Rating of less than 50 points indicates replacement is warranted. Bridge number 120 over Duckhead Creek has a clear deck width of 24 feet, a length of 32 feet, and a 49.9 Sufficiency Rating. Bridge number 194 over the CSX Railroad has a clear deck width of 24 feet, a length of 145 feet, and a Sufficiency Rating of 12.

Owen Drive is a 6 lane paved road with curb and gutter. Hope Mills Road is generally a 2 lane paved road that has been widened at the Camden Road intersection to provide a left turn lane onto Camden Road. There is a project programed to widen Hope Mills Road to a multilane section (TIP No.U-2308).

The Average Daily Traffic (ADT) on Camden Road, between Hope Mills Road and Owen Drive for the years 1992 and 2012 are estimated to be approximately 7,500 vehicles per day (vpd) and 14,800 vpd respectively.

Camden Road is currently operating at a Level of Service (LOS) D based on the 1992 peak traffic hour, and by the year 2012 (the design year) will be operating at LOS E. With the proposed improvements, a LOS B will be attained based on 1992 traffic volumes and LOS B will prevail through the 2012 design year.

During the period from August 1, 1989 through July 31, 1992 there were 181 accidents reported on Camden Road. This resulted in an accident rate of 503 accidents per 100 million vehicle miles (Acc/100 MVM), compared to a statewide average of 295.0 Acc/100 MVM for all urban secondary routes during 1991. There were two fatal accidents reported during the period, and 97 accidents resulted in non-fatal injuries. The most prevalent accident types were angle (26 %), rear end (23%), ran off road (20%), and left turn accidents (18%). The wider cross section with center turn lane proposed for Camden Road will reduce the potential for these type accidents.

III. RECOMMENDATIONS

It is proposed to widen Camden Road from Hope Mills Road to Owen Drive, a distance of approximately 4.2 miles. Please see Figure 1 for the project location. A five lane curb and gutter cross section (64 feet wide from face to face of curbs) is recommended on a 100 foot wide right of way for the entire length.

The bridge over Little Rockfish Creek (Bridge No.102), the bridge over Duckhead Creek (Bridge No.120), and the bridge over the CSX Railroad (Bridge No.194) are to be replaced.

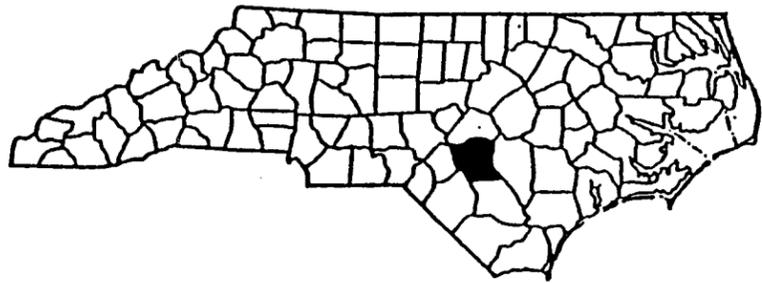
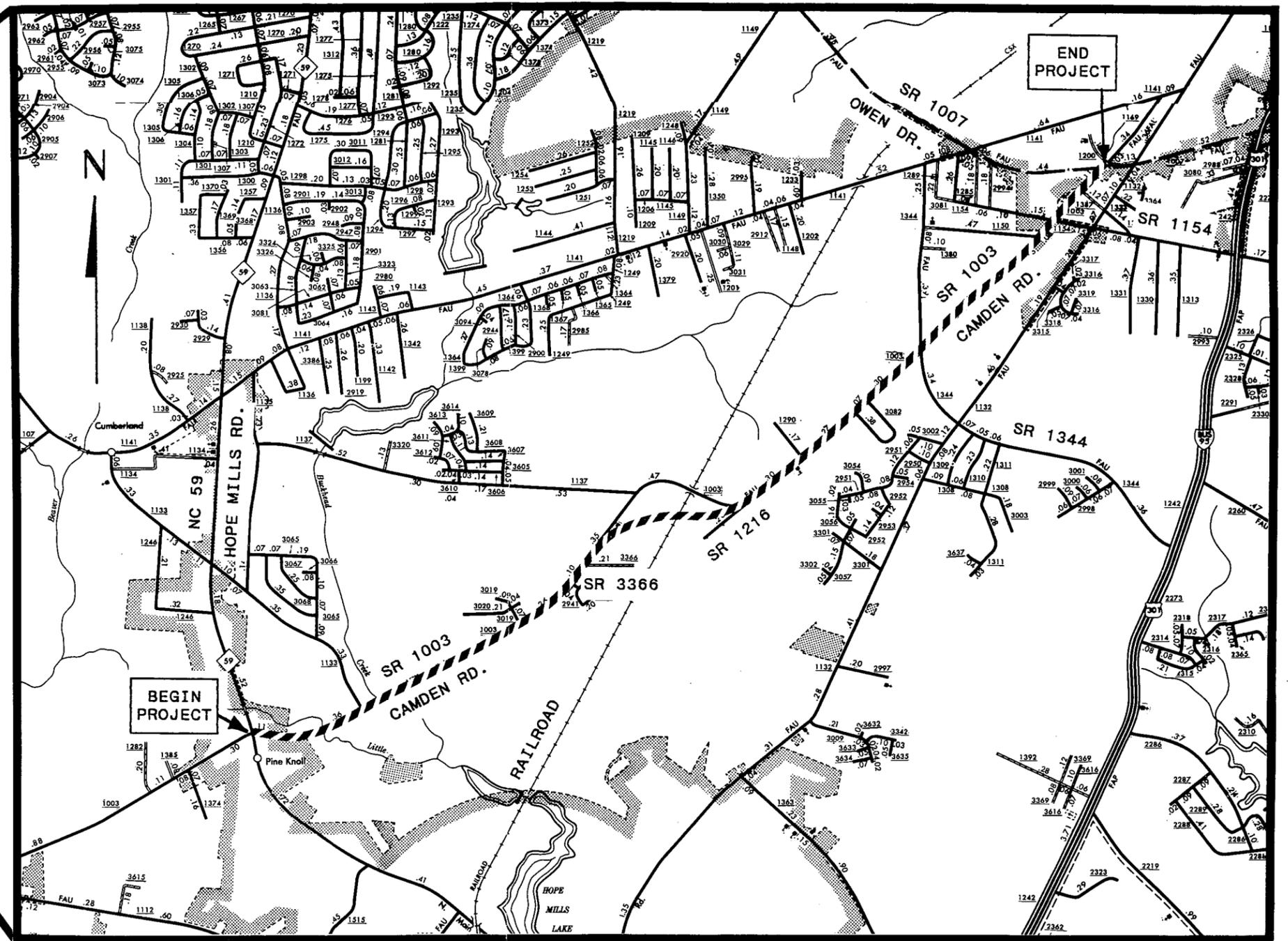
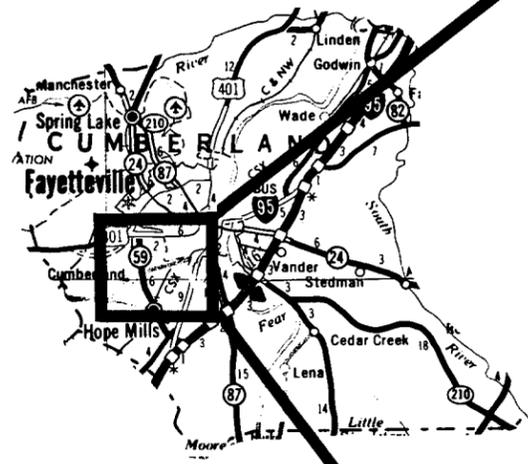
To minimize the amount of additional right of way it is recommended that west of SR 3366 the widening and right of way acquisition be done on the north side of Camden Road (except at the NC 59 intersection where the convenience store on the north side of Camden Road should be avoided), and east of SR 1216 the widening and right of way acquisition be done generally symmetrically to the existing centerline of Camden Road. Between these segments, and in order to improve the horizontal alignment, the widening and right of way taking will be on new location.

It is estimated there will be 47 residences and no businesses relocated due to this project. The total estimated cost including construction and right of way is \$14,000,000 as follows:

Construction	\$ 8,000,000
Right of Way	6,000,000
Total Cost	14,000,000

V. OTHER COMMENTS

An environmental screening was not conducted for this study.



FEASIBILITY STUDIES UNIT
FIGURE 1. LOCATION MAP
SR 1003 (CAMDEN ROAD)
FROM NC 59
TO SR 1007 (OWEN DRIVE)
CUMBERLAND COUNTY
U-2810 DIV.6 FIGURE 1