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STATE OF NORTH CAROLINA
DEPARTMENT OF TRANSPORTATION

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GOVERNOR

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E. NORRIS TOLSON
SECRETARY

MEMO TO: Roadway Design Project Engineers
FROM: John Alford, PE *John Alford*
Assistant State Roadway Design Engineer
DATE: October 14, 1998
SUBJECT: Structure Recommendations

For consistency in structure recommendations within the Roadway Design Unit, please follow these guidelines;

SUPERELEVATION

- For rooftop sections, show the Super as NC, not .02.
- Show Lt. or Rt. beside superelevated values (.08 Lt.).

BRIDGE SHOULDERS

- Dimension the bridge rail offset according to the values needed for design. This should be the bridge policy value, the offset required for horizontal sight distance, or the width of the approach paved shoulder, whichever is the control value. When you know a bridge is going to be a cored slab bridge do not compute the number of slabs and add any excess width to the shoulders. Structure Design will do this automatically and notify us so we can adjust our guardrail accordingly.

MAINTENANCE OF TRAFFIC

- If traffic is going to be maintained by phased structure construction, include a phase sketch in the structure recommendations.
- If traffic is to be maintained with an on site detour and the detour does not show up in the structure recommendation package, place a note on the appropriate sheet. "Traffic is to be maintained with an on site detour."
- If traffic is to be maintained with an off site or local road detour, place a note on the appropriate sheet. "Traffic is to be maintained with an off site detour."



Roadway Design Project Engineers
October 14, 1998
Page 2

We have been advised by Structure Design that some squads are lengthening culverts beyond the clear recovery zone to eliminate guardrail. The longer culvert costs can easily exceed the cost to provide guardrail and the end of the culvert, though beyond the clear recovery zone, is still unprotected. If you propose to do this please discuss with Debbie or myself.

Please contact me or Debbie Barbour if you have any questions regarding this information.

JEA

cc: Tom Shearin, PE
Debbie Barbour, PE
Bill Rogers, PE

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