MINUTES OF AGC-DOT JOINT BRIDGE SUBCOMMITTEE MEETING
(Approved December 10, 2025)

The AGC-DOT Joint Bridge Subcommittee met on June 11, 2025. Those in attendance were:

David Snoke	State Structures Engineer (Co-Chairman)
Victor Barbour	Carolinas AGC – Highway Division Director (Co-Chairman)
Aaron Earwood	State Bridge Construction Engineer
Liam Shannon	Assistant State Construction Engineer – Eastern
Aaron Griffith*	Construction Unit – Bridge Construction Engineer – Western
Tyler Rogers*	Construction Unit – Bridge Construction Engineer – Western
Patrick Cheeves	Construction Unit – Bridge Construction Engineer – Eastern
Michelle Gaddy*	Construction Unit – State Construction Operations Engineer
Khayden Carpenter-Crawford*	Construction Unit - Intern
Tom Santee	Assistant State Geotechnical Engineer – Eastern Region
Scott Hidden	Geotechnical Unit – Support Services Supervisor
Gichuru Muchane	Assistant State Structures Engineer
James Bolden, Jr.	Structures Management Unit – Project Engineer
Nicholas Pierce	Structures Management Unit – Project Engineer
Asa Godfrey	Structures Management Unit – EDS Team Leader
Eskedar Bayissa	Structures Management Unit – Engineer
Mark Newman	NHM Constructors, LLC
Larry Cagle	Thompson-Arthur-APAC
Erick Frazier	S. T. Wooten Corporation
Adam Holcomb*	Dane Construction, Inc.
Justin Carter*	Sanford Contractors
Caleb Ellis	Fred Smith Company

* Joined Via Microsoft Teams

During the review of the February 12th, 2025, meeting minutes, the following items were discussed:

1. *RR Flagger*
   Mr. Shannon notified the group there has been an effort to revise the flagging agreement but it is difficult to create a standard agreement that would apply to all the different entities involved. He stated they have worked with Division 9 on a trial project to address this flagging issue.

   Action Item:
   Mr. Shannon to discuss with Mr. Skeens the implementation of the revised flagging agreement in the trial project and develop a draft agreement document to share with the committee.

2. *Hurricane Helene Bridge Update*
   Mr. Earwood provided an update on the Progressive Design-Build process. 57 bridges have been included in various bid packages. There are 15 additional bridges identified in Division 13 to be replaced through emergency express design-build projects.

There was no update from the contractors on the construction progress of these awarded projects. Some contractors mentioned they will begin work on their awarded projects around September. There were no stated issues with getting producers on schedule.

The minutes of the February 12, 2025, meeting were approved.

The following items of new business were discussed:

1. *Pedestrian Culverts*

   One contractor mentioned a project where the culvert had small cracks on the ceiling and walls that were leaking. In addition to the cracking, the interior concrete finishing was not as smooth as desired. Mr. Barbour suggested creating additional requirements for pedestrian culverts, such as waterproofing membranes and interior concrete finishes. A contractor suggested NCDOT provide a Project Special Provision/Standard Specification to include waterproofing membrane on the outside of the culvert before backfilling.

   Mr. Earwood mentioned that NCDOT has the same requirements for all ordinary concrete finishes but doesn't emphasize the finish requirements on hydraulic culverts in comparison to pedestrian culverts. He noted an additional Class I or Class II surface finish could be required for pedestrian culverts, but he didn't think this would be necessary for this application. Mr. Frazier mentioned that the industry doesn't typically provide an enhanced concrete finish on culverts and if it is desired for pedestrian culverts, it would be helpful to have that noted on the plans. Mr. Cagle mentioned they have used a coating on the interior of pedestrian culverts to provide a uniform surface.

   Mr. Earwood suggested looking for an upcoming pedestrian culvert project to perform a trial of an exterior waterproofing membrane to see how it performs. He also suggested eliminating the weep drains and instead, install a drainpipe along the fill face of the culvert wall and drain out the ends of the culvert at the wing walls.

   A contractor noted there are different expectations on what the finish of the interior pedestrian culvert is required depending on where the culvert is located and who is inspecting the work. He stated it would be helpful to have a Project Special Provision with uniform language and expectations of the concrete surface finish.

   Action Item:
   Construction Unit and Structures Management to discuss internally the practice and if a Project Special Provision is needed to address this issue.

2. *Buy America Changes*

   Mr. Barbour provided some updates to the Build America Buy America Act, which will be implemented in two phases as follows:

   - Phase 1: Contracts obligated on or after October 1, 2025 (September Letting)
     - Final assembly of all manufactured products permanently incorporated into Federal-aid highway projects must occur in the United States.

- Phase 2: Contracts obligated on or after October 1, 2026
    - Final assembly of all manufactured products permanently incorporated into Federal-aid highway projects must occur in the United States.

  AND
    - The cost of U.S.-produced components in manufactured products must be greater than 55% of the total cost of all components.

It was mentioned that this will most likely not have a large impact on bridges, but there may be a greater impact on utilities and other parts of projects.

The Construction Unit and M&T are providing the State Contract Officer, Ron Davenport, guidance for the September lettings. It was noted that failure to meet the requirements could impact entire project fundings, even if utility work, etc. is being funded by a municipality.

Action Item:
None

3. *Post Tensioning Cored Slabs*

Mr. Earwood reminded everyone of the new transverse post tensioning specification for cored slabs, which requires 50% tensioning prior to grouting the shear keys. He added that one contractor reached out stating they were following the new specification and having issues with the shear key grout cracking. They had expressed concern that the initial 50% tensioning did not sufficiently pull the slabs together. It was presumed that after the shear keys were grouted, and the remaining tensioning applied, the slabs rotated slightly and caused the grout to crack. He asked the group if this was a widespread problem seen by other contractors. He proposed updating the specification to require the strands tensioned to 75% of the final tension load prior to grouting as opposed to the current 50% tension requirement. This increase in post tensioning prior to grouting may help bring the slabs together more prior to grouting and eliminate the rotation during final tensioning.

Mr. Cagle inquired about why the specification was updated to tension to 50%, grout, then tension to 100%. Mr. Earwood stated that by breaking up the sequence of tensioning, the grout would be in compression in its final state. This compression would result in better performance and load transfer between individual units. Mr. Frazier voiced concerns that the grout cracking in the exterior unit shear keys could be due to the all the post tensioning force being concentrated on the exterior unit once the grout is in place.

Lastly, Mr. Earwood notified the committee that NCDOT is working to update the specification to require a 1" diameter sleeve be placed in the post-tensioning duct to make it easier on the Bridge Maintenance crews to replace post tensioning strands in the case of future failure.

Action Item:
The Construction Unit will develop a special provision to update the *Standard Specifications* and keep monitoring the post-tensioning process on projects to see if changing the tensioning force requirement prior to grouting is appropriate.

4. *P-Joint Availability Update*

Mr. Earwood mentioned that Watson-Bowman has notified NCDOT that they have a new mill online and can provide the P-joint header rails with no issues. Mr. Porter added that DS Brown has also found a new mill to produce their rails.

Mr. Holcomb requested clarification on current P-joint rail availability. Mr. Porter and Mr. Earwood clarified that both producers have stated to NCDOT that they are able to supply the P-joint header rail.

Action Item:
None

5. *Bridge Decks-Best Practices*

Mr. Griffith mentioned that NCDOT best-practices for bridge deck construction are not being utilized resulting in shrinkage cracks and other defects. The specifications require the concrete to be covered with wet burlap prior to initial set, but NCDOT promotes covering as soon as possible to eliminate the change of early age plastic shrinkage cracks occurring. There have been instances where contractors are rushing to complete the deck pour and fail to cover the deck in time leading to an increase in shrinkage cracks. Mr. Griffith reminded everyone that burlap marks in the concrete due to early covering is preferred over shrinkage cracks.

Mr. Earwood mentioned there have been issues with uneven deck surfaces in the hand finished areas where the screed cannot reach, causing water to collect in the gutterlines, or poor ride quality when staged construction is required. He reminded the contractors to ensure they have a long enough straight edge for the finishers to check with so that the superelevation established by the screed can be projected all the way to the barrier rail.

Action Item:
None

6. *Curing of Barrier Walls*

Mr. Cheeves mentioned that NCDOT is seeing issues with cracking and swirl marks on barrier rails due to uneven curing. He noted that curing compound should have pink dye for inspectors to be able to see where it has been applied as opposed to a clear coat. An even and full coverage is required by the specifications to ensure proper curing. This is rarely done properly and needs attention by the industry.

Action Item:
None

7. *Other*

Mr. Frazier mentioned they are having issues with approach slabs and wanted to know why NCDOT moved away from the pavement notch on approach slabs. Mr. Earwood mentioned that past pavement notch details provided a thin layer of asphalt above the approach slab and have historically had issues with this thin layer of asphalt. The Construction Unit has been discussing this issue internally and working with the idea of returning to the pavement notch detail and modify the depth of the pavement notch to address problems occurring in the past.

He mentioned that Mr. Rogers recently modified a standard approach slab to include the pavement notch with a 5" overlay on a project in Division 14. This same detail has been used on several projects in Fayetteville and Greenville. Mr. Earwood did not recommend using this detail on integral end bent bridges.

Mr. Earwood has previously shared a possible detail of an integral end bent approach slab to allow for the approach slab to be connected to the backwall and allow the backwall to move without moving the approach slab. The Construction Unit is still looking for a trial project with low ADT to try out this new integral approach slab detail.

Action Item:
SMU and Construction discuss changing the details for approach slabs on non-integral bridges to include the pavement notch.

Contractors should reach out to Aaron Earwood if they believe they have a good project for a trial of the new Integral End Bent Approach slab detail.

**** Upcoming 2025 Meeting Dates:** August 13th (Cancelled)
October 8th (Cancelled)
December 10th