Minutes GPTQ Bridge Sub-committee Meeting

February 3, 2021 + 10:00 am- 12:00 pm + MS Teams

Committee Members:

Donn Digamon - GDOT (GDOT Co-Chairman)
Greg Grant - RS&H (Co-Chairman)
Joshua Orton - Brasfield & Gorrie
George Manning - Michael Baker
Brian Adams - Heath & Lineback (HL)

Opening

Greg opened with welcoming the group.

Introductions

Each member introduced themselves and gave some background regarding their experience.

About the Committee

Greg gave some background on the committee's prior accomplishments and explained the use of Task Forces

- Previous accomplishments
 - Bridge Design Manual
 - o Bridge Detailing Manual
 - o Guide
- Use of Task Forces

Task Force Updates:

CONSPAN Task Force – Jin Liu, GSP (Lead): Kevin Schwartz, GDOT

- Document submitted, in editing at GDOT
 - \circ $\;$ Donn commented that this document needed to be published.

<u>RCPIER Task Force</u> – George Manning, Michael Baker (Lead): Jennifer Tait, GDOT

- Document submitted, in editing at GDOT
 - o Donn commented that this document needed to be published

ABC Task Force - Tim Dow, GSP (Lead): Dexter Whaley, GDOT

- No Updates, concept phase done, testing on current projects underway.
 - George discussed the direction of this Task Force in developing tools to determine whether ABC was a viable option for a project (including flow charts and other items to consider)

Arunava (Arun) Saha – WSP USA
James Aiken – CHA Consulting
Jennifer Napier, VHB
Steve Gaston - GDOT
Lyn Clements – GDOT

• Greg to reach out to this Task Force to get an update

Previous Meeting Topics:

Greg ran through the following list of items from the prior Agenda

- Minimum number of Piles in Pile Footings.
 - 4 or 5 pile system
 - A discussion about the reason for this issue (large 4 pile footings with difficult to support column dowels)
 - The introduction of a fifth pile created uplift issues.
 - \circ Josh and Brian agreed to investigate this issue and offer potential guidance
- Expansion Joint Calculations
 - LRFD using 1.2 multiplier
 - This is a carry over item about the use of the multiplier
 - item to be removed from further discussion.
 - Changing from Evozote to Silicaflex
 - Discussion that the current bridge Manual does not address this change
 - o Donn said the Bridge office would handle a revision
- PSC Beam Shop Drawings.
 - Draped vs debonding
 - Donn said that GDOT had received redesigns for girders that removed draping and replaced with debonding. GDOT will accept this and that Bridge Manual direction for this is coming.
 - A few comments were made about camber and the likelihood that beams come out flatter than the predicted camber.
 - 6" maximum haunch is becoming a design detailing issue with longer concrete beams now more commonplace.
 - Greg said that the Department could gather camber at the plant that would be helpful to the designers.
- Lighting Conduit Details.
 - No details for routing conduit
 - Discussion about the need for a detail in the cell library
 - No action item on this
- Substructure BFR Loads.
 - If it changes by 5% total load to a pile, redo BFI
 - A discussion about the interconnectivity of Bridge Design and Geotechnical Engineering as a result of LRFD and the need to submit revised loads to the Geotech if the total load to the pile changes by 5%.
 - \circ No action item on this.
- Longitudinal Joints Under Traffic
 - Topic for discussion, bicycles and motorcycles
 - Discussion about the dangers to bicyclist and motorcyclist because of a

longitudinal joint.

- Discussion included the need from time to time to have these joints , including excessive width or geometry.
- \circ $\;$ There are not common details for protecting these users from this joint
- Greg will provide detail used on a recent project.
- Open Bridge Implementation.
 - No date yet, Roadway group implementing it already
 - Donn said that there would still be 2D plans and the 3D model would be a supplement.
- Collision Loads for Drilled Shaft Foundations
 - Limits of loading at the interface of column and caisson
 - Need help with this one
- GDOT Bridge FFPR Waiver Letters
 - What are the conditions to request this?
 - Need help with this one

New Business

The following items were not discussed and will be added to the April Agenda

Ideas for future work

- Use of the PGSuper program for GDOT Projects
- Understanding of Internal GDOT Mathcad Programs
- Bridge Jacking Guidelines

Action Items:

- Donn to check on the status of publication for the Conspan and RCPier Task force documents
- Greg to reach out to the ABC Task Force to get an update
- Josh and Brian agreed to investigate the Minimum Number of Pile issue and offer potential guidance
- Donn said the Bridge office would handle a revision to the Bridge Design Manual for the switch from Evazote to Silicaflex
- Greg will provide detail used on a recent project for longitudinal joint.
- Greg to send out a new meeting request to avoid conflicting with spring break

Next meeting is April 7, 2021

Josh alerted the group that this date is spring break for some counties, the group appeared open to rescheduling the meeting to avoid the conflict