

Delaware Department of Transportation

QUESTIONS AND ANSWERS

T201207101.01

BR 1-159 ON JAMES STREET OVER CHRISTINA RIVER, NEW CASTLE COUNTY

Monday, February 01, 2016

Q #	Question	Answer
15	Will night shift work be permitted on the project should it be deemed necessary to meet the contract schedule?	Yes, night work will be permitted. Contractor will be required to comply with local noise ordinances or obtain necessary waivers.

Friday, January 29, 2016

14	Environmental Compliance (Sheet 69) Note 2B. Fisheries restrict in water work from March 15 to June 30 (inclusive), the current schedule has the General Contractor essentially beginning work in December 2016 (after utility relocation time suspension). This would mean that it would be very likely that the drilled shaft work would not be finished by March 15th. Is Drilled Shaft work off of barges going to be held to this fisheries restriction? If so, the Department needs to reconsider the timing and/or Calendar Days for this project to work around this restriction.	The timing developed for the project anticipated constructing the Pier 1 cofferdam and Piers 2 and 3 drilled shafts immediately after utility relocation. This work should be completed before the 3/15 Fisheries restriction. The drilled shafts for Pier 1, Pier 4 and Abutment A and B, which are not in the water, would then be constructed. Removal of the cofferdam at Pier 1 must occur outside the restriction as well, although it can remain in place during the restriction. DelDOT may consider construction of the technique shaft during the utility relocation period, provided the operation does not get in the way of the utility companies moving their lines. The Contractor will have to propose this as part of the Drilled Shaft submittals.
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Monday, January 25, 2016

13	Drilled shaft specification (618529) under Materials Section C indicates the permanent structural casing shall conform to ASTM A36 or ASTM A252 Grade 2. Within the same specifications under Construction Methods section L indicates the tolerances of the casing are to be in accordance with API standards. The tolerances required under API standards are much more stringent (0.25") for out of roundness requirements versus ASTM which allows for 1% of the outside casing diameter (49" OD = 0.49" allowable tolerance). Please confirm whether API tolerances are required as this represents a significant premium for the material.	Tolerances outlined within the ASTM specs will be accepted for this project.
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Q #	Question	Answer
12	Plan sheet 60 of 91 provide an elevation of the existing bridge for limit of demolition. Please advise if existing bridge plans are available for this structure.	Archive Plans from the original construction (1 sheet) and the rehabilitation in the mid 1980's, as well as shop drawings from the rehab contract, are being made available for informational purposes only.
11	In review of Plan Sheet 59 – Aluminum Pedestrian Handrail Details – there is both a 3’-6” and 4’-6” rail height shown and denoted as “Pedestrian Railing” and “ Alternate Railing” respectively. Assuming these are both paid under Item 606003 what are the location(s) and quantity breakdown for each rail height?	The full-height pedestrian rail should be detailed to a height of 4’-0” adjacent to the sidewalk as shown on sheet 20. Payment under 606003 is correct. The other railing on the bridge is the handrail that goes on top of the concrete barrier between the sidewalk and roadway, the details for which are on Sheet 57. Payment for the handrail is under 606002.
10	Plan Sheet 55 Notes section says that slip forming of parapets is not permitted. We have been made aware that a few current DeIDOT projects that had this note in the plans at bid time are now being allowed to slip form bridge parapet if an shrinkage reducing admixture (such as Prevent C) is added to the mix. Would the Department consider allowing this same procedure for this project?	The Department will not consider allowing slip-forming of parapets for this project.
9	Per Bridge Sheet 22 of 91 (25) bundled #8 bars are required for the drilled shaft vertical steel. In lieu of the bundled bars would (25) #11 bars be permitted (not bundled) which would provide for easier cage splicing if required due to the lengths of the cages (over 115’). The (25) # 11 bars provide an equivalent steel area to the base design of bundled #8 bars	Unbundled #11 bars would be acceptable. The contractor would need to submit detailed information to the Department for review and approval of the proposed revision before starting work or ordering material. There would be no additional payment by the Department for the proposed revision.
8	Bridge sheet 23 of 91 detail section A-A shows (16) #8 vertical bars. Should this detail show (25) #8 vertical bars in order to be consistent with the plan detail on bridge sheet 22 of 91?	Section A-A on Sheet 23 of 91 should show 25 bundled #8 vertical bars to be consistent with the plan view on Sheet 22 of 91. There should be no difference between the column cross section and the drilled shaft cross section, with the exception of the permanent casing. The column, which extends above the top of the permanent casing up to the pier cap, will also be paid as a drilled shaft. This will be clarified in Addendum 4.

Q #	Question	Answer
7	Is the permanent casing for the drilled shaft required for structural capacity? If so, in lieu of utilizing 48" diameter permanent casing for the full length of the shaft (over 100' lengths), can we install the permanent casing in shorter sections using 54" diameter casing (for the upper section) and 48" diameter casing (for the lower section that would be overlapped with the 54" casing by a few feet).	The Department will be open to consider using a 54" casing for the upper section and a 48" casing for the lower section of the drilled shaft. The contractor would need to submit detailed information to the Department for review and approval of the proposed revision before starting work or ordering material. There would be no additional payment by the Department for the proposed revision.
6	The Drilled Shaft Specifications (618529 Page 95) indicate that removal of over-poured (or non-sound) concrete down to sound concrete is required prior to CSL Testing. Typically, concrete is over-poured to a few feet above design top of concrete elevation to ensure sound concrete is present at the required top elevation. CSL Testing is normally performed prior to removal of the non-sound concrete as the presence of the over-poured concrete does not affect the test results.	CSL Testing is done to determine the integrity of the concrete below the design top of concrete elevation. The test can be done prior to removing the over-poured concrete, provided that the over-poured concrete is a minimum of 2 feet above the design top of concrete elevation.
5	Can the permanent casing be terminated at the top of weathered rock (approximately 20' to 30' higher than the top of rock elevation) or must the casing extend all the way to core-able rock (i.e. bedrock)?	The casing must extend all the way down to sound bedrock.
4	The bid quantity for the permanent casing is 2581 LF or 31 LF greater than the shaft quantity. Should the bid quantity match the 48" drilled shaft quantity of 2530 LF or is the additional 31 LF an allowance?	<p>The quantity of 2581 LF for permanent casing is correct. This quantity includes 99 LF of permanent casing for the technique shaft. The quantity of drilled shaft at 2530 LF is also correct. The technique shaft quantity is measured separately at 101 LF. Please note that the bottom 2 feet of drilled shaft or technique shaft is not cased.</p> <p>The quantity of 2581 LF for permanent casing is correct. This quantity includes 99 LF of permanent casing for the technique shaft. The quantity of drilled shaft should be 2697 LF, which includes the pier columns above the permanent casing. The technique shaft quantity is measured separately at 101 LF. Please note that the bottom 2 feet of drilled shaft or technique shaft is not cased. The drilled shaft quantity will be updated via Addendum 4.</p>
3	Bridge Plan Sheet 19 references boring JS-11. However, the boring log has not been provided. Please provide this if available.	This boring was taken to establish rock location. The handwritten log is being made available for your information.

Q #	Question	Answer
2	Rock core samples were taken for borings JS-8 and JS-9. Are they still available for inspection? If so please provide information on how we may schedule to inspect the cores	Unfortunately the rocks cores have been discarded. Photos of the cores are being made available for your information.

Monday, January 11, 2016

1	Please advise if a geotechnical report will be provided in addition to the boring included on the plans.	The Foundation Report will be uploaded to the bid website for informational purposes.
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