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February 8, 2011

American Construction Co., Inc.  
1501 Taylor Way  
Tacoma, WA 98421-4100

Contract 8078, I-5, Columbia River Bridge  
Temporary Pile Test Program  
WA 0.3 to OR MP 308.0  
State Project  
Serial Letter No. 12

RE: Response to Request for Information No. 5

Gentlemen:

This letter is in response to Request for Information No. 5 received February 7, 2011, which stated the following:

*I noticed on Friday (2/4) that the water level on the river is only between 6.5' and 5'. This translates to EL +11.8' and EL +10.3' (NAVD88 datum). This is quite a bit lower than the "high river level" of EL +21.2' (as shown on Plan Sheet ND1).*

*Attached is a chart that shows water level on the river last week. You need to add 5.28' to each value to convert to NAVD88 datum.*

*Conclusion: There will not be enough water depth (assuming mudline elevations of EL -21' and -25' are correct) to use all 7 bubble rings (unconfined system). Looks like only a total of 5 or 6 bubble rings will be needed.*

*Furthermore, fewer bubble rings mean fewer compressors are required to supply the system. Three (3) 1600-cfm compressors will be enough to provide air for up to 6 bubble rings ( $1600\text{cfm} \times 3 = 4,800\text{cfm}$  or 800cfm minimum per bubble ring).*

Your conclusion is correct that fewer bubble rings are required the lower the river level is. Plan sheet ND1 provided an elevation at high river level, approximate elevation at mudline and requires a maximum bubble ring spacing of 7 feet, which would result in a maximum of seven bubble rings required.

American Construction Co., Inc.  
February 8, 2011  
Page 2

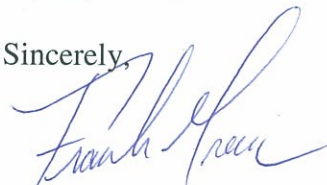
In order to determine the number of bubble rings required, you will need to verify the mudline elevation, determine the river level at the time piles are driven, and space bubble rings a maximum of 7 feet.

We will require delivery of seven bubble rings even if the current river level only requires the use of five bubble rings to complete the pile driving on this contract.

Your statement that fewer bubble rings will result in fewer compressors appears reasonable. Pages 98 and 99 of the Contract Special Provisions require the Contractor to design the bubble curtain system to supply air in sufficient volume and pressure to meet the contract requirements.

If there are any questions, please contact this office at (360) 816-2208.

Sincerely,

A handwritten signature in blue ink, appearing to read "Frank Green".

Frank Green, P.E.  
CRC Structures Engineering Manager

KAD:np

cc: Document Control  
M. Degenhart  
N. Peppers