

STATE OF CALIFORNIA	Job Stamp	7-day Const. Calendar	Day No. 547
DEPARTMENT OF TRANSPORTATION	SFOBB SAS	Project Work Day No.	Day No. 757
Form HC-10A (Rev. 6/80)	04-0120F4	Date	6/12/2008

Weather: Clear and warm

Inspectors Hours	Start	0600	Stop	1730
Shift Hours	Start	0630	Stop	1700

ASSISTANT STRUCTURE REP. **JASON WILCOX**  
 CONTRACTOR – **ABFJV**

		HOURS - ITEM NO.											
EQUIPMENT AND/OR LABOR:		REGULAR	OVERTIME								IDLE OR DOWN	REMARKS	
Equip. #	NO. MEN											DESCRIPTION (Of Equipment or Labor)	Name

REC'D 08 SEP 04 10:06:33

**Description of Operation:**

We were told by ABF all week that Traylor planned to be pile driving at the South Tower D driving frame today. As of the end of the day yesterday the start time was to be around 10:00am. We were also told that Traylor was going to have a representative from Smith-Emery on site to perform the testing of the bolts. On sheet 100-02 of the design drawings, in the Structural Steel portion it says "Bolts for structural steel shall conform to ASTM A490 and the AISC specification for structural steel joints using ASTM A325 or A490 bolts, June 30, 2004, and shall be uncoated (black). Bolts shall be pretensioned." In the AISC specification under "Pre-Installation Verification, Calibrated Wrench Method, Manual Torque Wrench Calibration Procedure for Long Bolts: 1) Take three bolts of each diameter, length, grade, and production lot, with three nuts of each diameter, grade, and production lot, and three washers of each diameter and production lot, as they will be assembled in the field. Each set is called a "fastener assembly." I was told by Glenn Wooldridge of Smith-Emery that he planned on testing each lot of the bolts, but he was going to test the 4 lots of nuts in no discernible order. For example, with a 5" bolt, he would test the nuts from Lot A, then while testing the 5.5" bolts, he would use the nuts from Lot B, and so on to get a sample. I informed him the black and white words in the specifications elude to the fact that he would have to test every combination of nut, bolt, and washer. I then left the site and had Gina Rizzardo stay there to observe the operation for now. While at the ABF office, going over the monthly estimate, I ran into Bill O'Sullivan and we spoke about the estimate and the bolting procedure. The estimate will be discussed later. As for the bolting, we spoke at length about what was submitted, accepted, and what is realistic. Bill said that by their contract with Traylor, they only had to purchase 2-3% more bolts than is required to assemble the driving frames. In order to test every combination of nuts and bolts and washers there would have to be 12

lots of bolts, 4 lots of nuts, and 2 lots of washers. To comply with the specification, three nuts, three bolts, and three washers make up one "fastener assemblies." This would mean 36 bolts, times 4 different lots of nuts, times 2 different washer combinations, or 288 "fastener assemblies." Bill suggested a reduced amount of fastener assemblies, as long as their designer accepts it. This was agreeable as long as we get some documentation from ABF saying that their designer approves this method. Gina Rizzardo will have the results from the Skidmore-Wilhelm test. In short though, the bolts tested were snug tightened and turned approximately one-half turn as called for in the specifications. All but one of the results were above the minimum called for in the AISC Steel Manual. The contractor's representative was there to witness this and accepted it.

The monthly estimate was due today, for the end of the fiscal year it had to be turned in earlier than normal. Art Pannu performed his estimate review for temporary towers A, B, and C and I performed the estimate for towers D, F, and G. For my portion of the estimate the contractor charged for work on Towers F and G dolphin piles, of which there has been no field work done. I asked Brandon Yee, ABF representative for estimates, to explain. He explained that the 7.07% he was asking for in this months estimate was based on the following. To date Traylor has charged ABF a total of 26.1% of the contract money owed to them. For ABF, to date they have charged Caltrans 19.4% of what Traylor has been sub-contracted to do. To bring ABF up to a similar status with Caltrans, they charged 7.07% for this estimate, bringing there statur with us to a similar 26.1%. This alone made some sense, however, the dolphin piles being driven did not make sense. Brandon did not know about what was going on in the field so he directed me to Bill O'Sullivan. While taking to Bill about the bolting procedure issues, he called a representative from Traylor and found out that Traylor has been making the concrete fender system, but in their current contract with Traylor there is no category for the concrete fenders. This is because in the initial contract, Traylor was going to use dolphin piles to protect the driving frame and tower system. Since the beginning of work, it was agreed to do away with the dolphin piles and use the concrete fenders to add weight to the system in order to help prevent uplift during a seismic event. In order to get paid for the work Traylor has performed, they wanted to charge under the F & G dolphin category and credit it back later. I agreed that Traylor needed to be paid for work performed, and Bill agreed to make sure that this category gets credited back once another category has been created for the fenders.

The first of the Tower D piles, pile D 1-1, was driven today. Initially it was going to be driven around 10:00am, but that got pushed back to 11:00am, then to 1:00pm, then to 2:00pm. At about 2:30pm the first pile was lifted off the pile barge and placed into the Southwest corner pile sleeve, position D111 on the plan sheets. The crane let the pile come to rest under its own weight and the lifting device was removed from the pile and placed on the deck of the pile barge. Taking a reading from the top of the top ring of the driving frames pile sleeve gave us 23.75m. This means that the pile extends 23.75m below the top of the pile sleeve. This pile sleeve is at an elevation of +6.5m, meaning that the pile tip is at  $-23.75m + 6.5m = -17.25m$ . The APE 600 vibratory hammer was then hooked up and the pile was vibrated down so the reading on the top of the pile sleeve read 27.0m. This means that the pile tip was left at  $-27.0m + 6.5m = -21.5m$ . At this time the crew left the job site and went home. Driving with the Delmag D100-13 diesel hammer will be done tomorrow.

The Western Gull continues to inhabit the nest on the Southwest corner of the T1 footing and the eggs are still intact.

OVERTIME: Arriving early and documenting the days operations and conversations meant accruing 3 hours of overtime.

Inspector:

Jason Wilcox



Transportation Engineer (D)/Asst. Structure Rep.