

**DEPARTMENT OF TRANSPORTATION**

DIVISION OF ENGINEERING SERVICES

Office of Structural Materials

Quality Assurance and Source Inspection



Bay Area Branch  
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Contract #: 04-0120F4Cty: SF/Ala Rte: 80 PM: 13.2/13.9File #: 69.28**WELDING INSPECTION REPORT****Resident Engineer:** Siegenthaler, Peter**Address:** 333 Burma Road**City:** Oakland, CA 94607**Report No:** WIR-016953**Date Inspected:** 17-Sep-2010**Project Name:** SAS Superstructure**OSM Arrival Time:** 1900**Prime Contractor:** American Bridge/Fluor Enterprises, a JV**OSM Departure Time:** 700**Contractor:** Zhenhua Port Machinery Company, Ltd (ZPMC), Changxing Island **Location:** Shanghai, China**CWI Name:** See below**CWI Present:** Yes No**Inspected CWI report:** Yes No N/A**Rod Oven in Use:** Yes No N/A**Electrode to specification:** Yes No N/A**Weld Procedures Followed:** Yes No N/A**Qualified Welders:** Yes No N/A**Verified Joint Fit-up:** Yes No N/A**Approved Drawings:** Yes No N/A**Approved WPS:** Yes No N/A**Delayed / Cancelled:** Yes No N/A**Bridge No:** 34-0006**Component:** Tower and OBG Components**Summary of Items Observed:**

On this date Caltrans OSM Quality Assurance Inspector (QA Inspector) George Goulet was present during the times noted above for observations relative to the work being performed.

Bay 10

This QA Inspector randomly observed the following work in progress in Bay 10:

SMAW repair welding of weld joint SSD1-TL5-1B-F-20 located on PCMK south tower, lift 5, internal connection plates. Welder was identified as 057258. QC was identified as ZPMC CWI Ye Yong Jun (QC1). Assisting QC1 at this location and appearing to be monitoring the welding and recording data was ZPMC CWI Li Jun (QCA1), who was not a CWI. Welding variables recorded by QCA1 appeared to comply with WPS-485-SMAW-3G(3F)-repair as listed on ZPMC Repair Report T-CWR685. Also listed on the report was a reference to NDT Report 7787-UT-3185R3 and notations stating "over 2 times repair" and a minimum preheat and interpass temperature of 200°C.

SMAW repair welding of weld joint NSD1-TL5-3B-F-10A located on PCMK south tower, lift 5, internal connection plates. Welder was identified as 052493. QC was identified as QC1. Assisting QC1 at this location and appearing to be monitoring the welding and recording data was QCA1, who was not a CWI. Welding variables recorded by QCA1 appeared to comply with WPS-485-SMAW-3G(3F)-repair as listed on a ZPMC Repair Report with no T-WR number as presented to this QA Inspector by QCA1.

Heavy Dock

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# WELDING INSPECTION REPORT

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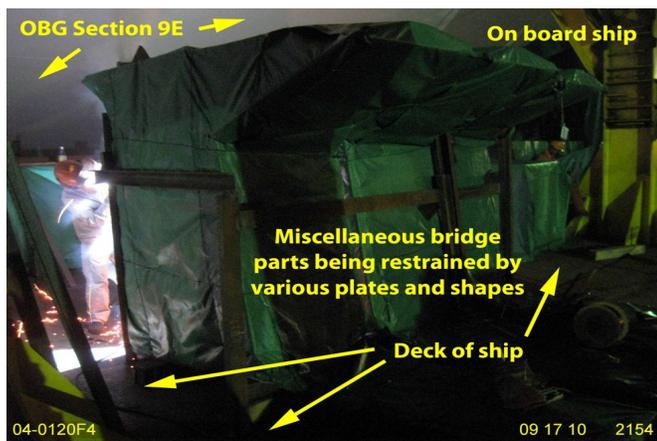
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This QA Inspector randomly observed the following work being performed on the Heavy Dock:

No apparent welding related work was being performed on the Heavy Dock. All 4 towers' lift 3 were connected and positioned vertically on a base pedestal at end of the Heavy Dock. East, south, and north towers, lift 4 were positioned on top of east, south, and north towers, lift 3, respectively, on the Heavy Dock, near the end where the ship was moored. All 4 towers' lift 2 were positioned horizontally on the deck of the ship at the end of the Heavy Dock. OBG9W was positioned on top of OBG 9E on the deck of the ship. CB11 and CB12 were also positioned on the deck of the the ship. West tower, lift 4 was positioned horizontally on the deck of the dock near the ship.

On board the ship, ZPMC workers were welding various hold-down plates and shapes to the ship, restraining miscellaneous bridge parts wrapped in tarps. See photo below.

Unless otherwise noted, all work observed on this date appeared to generally comply with applicable contract documents.



### Summary of Conversations:

No significant conversations.

### Comments

This report is for the purpose of determining conformance with the contract documents and is not for the purpose of making repair or fit for purpose recommendations. Should you require recommendations concerning repairs or remedial efforts please contact Micheal Ng, 159-2184-5703, who represents the Office of Structural Materials for your project.

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<b>Inspected By:</b>	Goulet, George	Quality Assurance Inspector
<b>Reviewed By:</b>	Clifford, William	QA Reviewer

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