

**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:** Pursell, Gary**Address:** 333 Burma Road**City:** Oakland, CA 94607**Report No:** WIR-001178**Date Inspected:** 04-Jan-2008**Project Name:** SAS Superstructure**OSM Arrival Time:** 630**Prime Contractor:** American Bridge/Fluor Enterprises, a JV**OSM Departure Time:** 1530**Contractor:** Zhenhua Port Machinery Company, Ltd (ZPMC), Changxing Island **Location:** Changxing Island

<b>CWI Name:</b>	Sha Zhi			<b>CWI Present:</b>	Yes	No	
<b>Inspected CWI report:</b>	Yes	No	N/A	<b>Rod Oven in Use:</b>	Yes	No	N/A
<b>Electrode to specification:</b>	Yes	No	N/A	<b>Weld Procedures Followed:</b>	Yes	No	N/A
<b>Qualified Welders:</b>	Yes	No	N/A	<b>Verified Joint Fit-up:</b>	Yes	No	N/A
<b>Approved Drawings:</b>	Yes	No	N/A	<b>Approved WPS:</b>	Yes	No	N/A
				<b>Delayed / Cancelled:</b>	Yes	No	N/A
<b>Bridge No:</b>	34-0006			<b>Component:</b>	Caltrans Mock-up		

**Summary of Items Observed:**

Caltrans Quality Assurance (QA) Inspector, Larry Viars was present to observe welding operations of the 77.00, 89.00, 114.00 meter mock-up, for the San Francisco Oakland Bay Self Anchored Suspension Bridge, at Zhenhua Port Machinery Company (ZPMC) facility on Changxing Island.

Caltrans QA Inspector Viars observed ZPMC personnel grinding base metal repair of Mock-up 114.00 lower shaft C to D weld # 2B. An Incident Report had been issued the previous day for length, depth and base metal excavation of 30 mm. When Weld repair report WR060 was viewed it was noted that ZPMC Engineer Wu Zheng Fen issued the Weld repair report and the report was not approved. The base metal repair had numerous areas of underfill in the repair area. Mr. Mike Williams with American Bridge Flour (ABF) stated that ABF informed ZPMC to cease welding operations of this joint the previous day. Mr. Williams put a hold on welding operations until this issue could be resolved. See the attached photo of the above mentioned weld joint.

Caltrans QA Inspector Viars observed ZPMC welder Mr. Wang Zhonghua performing Shielded Metal Arc Welding (SMAW) of 89.00 Mock-up Strut MA 26 with the following welding parameters recorded, amperage 183, voltage 23.2 (ZPMC), travel speed 105.

Caltrans QA Inspector Viars observed ZPMC welder Mr. Guo Dengyun performing shielded metal arc welding of Mock-up 77.00 longitudinal stiffener to diaphragm weld SA104 3A, 4A, 9A and 10A.

Caltrans QA Inspector Viars observed welding operations of 77.00, 89.00 and 114.00 mock-ups.

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# WELDING INSPECTION REPORT

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## Summary of Conversations:

As identified within the contents of this report.

## 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 Mazen Wahbeh, (818) 292-0659, who represents the Office of Structural Materials for your project.

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<b>Inspected By:</b>	Viars,Larry	Quality Assurance Inspector
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<b>Reviewed By:</b>	Cuellar,Robert	QA Reviewer
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