

**DEPARTMENT OF TRANSPORTATION**

DIVISION OF ENGINEERING SERVICES

Office of Structural Materials

Quality Assurance and Source Inspection



Bay Area Branch  
690 Walnut Ave. St. 150  
Vallejo, CA 94592-1133  
(707) 649-5453  
(707) 649-5493

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-008927**Date Inspected:** 11-Sep-2009**Project Name:** SAS Superstructure**OSM Arrival Time:** 645**Prime Contractor:** American Bridge/Fluor Enterprises, a JV**OSM Departure Time:** 1845**Contractor:** Zhenhua Port Machinery Company, Ltd (ZPMC), Changxing Island **Location:** Shanghai, China**CWI Name:** Xu Xian Ping**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:** OBG Components**Summary of Items Observed:**

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

**BAY 1****Ultrasonic Testing**

This QA inspector performed UT of approximately 10% of the area previously tested and accepted by ZPMC Quality Control personnel. This QA Inspector generated an UT report for this date. The members are identified as OBG Components. The weld designations reviewed are as follows:

1. FB205 – 013 – 035
2. FB205 – 014 – 035
3. FB205 – 015 – 035
4. FB205 – 016 – 035

This QA Inspector observed the following work in progress:

FCAW process welding of weld joint #001 located on Counter Weight CW002B – PP014. Welder is identified as 251246. ZPMC QC is identified as Tian Lei. The welding variables recorded by QC appeared to comply with the WPS – B – T – 2232 – Tc – U4b – F – 1.

FCAW process welding of weld joint #002 located on Counter Weight CW002B – PP094. Welder is identified as

---

# WELDING INSPECTION REPORT

( Continued Page 2 of 4 )

---

216872. ZPMC QC is identified as Tian Lei. The welding variables recorded by QC appeared to comply with the WPS – B – T – 2232 – Tc – U4b – F – 1.

FCAW process welding of weld joint #003 located on Counter Weight CW002B – PP102. Welder is identified as 059450. ZPMC QC is identified as Tian Lei. The welding variables recorded by QC appeared to comply with the WPS – B – T – 2232 – Tc – U4b – F – 1.

FCAW process welding of weld joint #001 located on Counter Weight CW002B – PP098. Welder is identified as 054460. ZPMC QC is identified as Tian Lei. The welding variables recorded by QC appeared to comply with the WPS – B – T – 2232 – Tc – U4b – F – 1.

## BAY 2

This QA Inspector observed the following work in progress:

FCAW process welding of weld joint #064 located on Floor Beam FB3024 – 001. Welder is identified as 062438. ZPMC QC is identified as Zhang Hai Feng. The welding variables recorded by QC appeared to comply with the WPS – B – T – 2132 – 3.

FCAW process welding of weld joint #028 located on Floor Beam FB3013 – 002. Welder is identified as 045203. ZPMC QC is identified as Yang Qing Feng. The welding variables recorded by QC appeared to comply with the WPS – B – T – 2133.

FCAW process welding of weld joint #040 located on Floor Beam FB3024 – 001. Welder is identified as 062438. ZPMC QC is identified as Yang Qing Feng. The welding variables recorded by QC appeared to comply with the WPS – B – T – 2233 – Tc – U4b – F.

FCAW process welding of weld joint #026 located on Floor Beam FB3013 – 002. Welder is identified as 045203. ZPMC QC is identified as Zhang Hai Feng. The welding variables recorded by QC appeared to comply with the WPS – B – T – 2132 – 3.

## BAY 5

### Magnetic Particle Testing

This QA inspector performed MT of approximately 15% of the area previously tested and accepted by ZPMC Quality Control personnel. This QA Inspector generated an MT report for this date. The members are identified as OBG Components. The weld designations reviewed are as follows:

1. TR7A – PP8.5 – 001; 002
2. TR8A – PP8.5 – 001; 002

The green tag issued for above two members is 009781

This QA Inspector observed the following work in progress:

FCAW process welding of weld joint #005 located on Traveler Rail Bracket TR5C – PP077. Welder is identified as 215185. ZPMC QC is identified as Xu Hong Min. The welding variables recorded by QC appeared to comply with the WPS – B – T – 2233 – Tc – U4c – F.

---

---

## WELDING INSPECTION REPORT

( Continued Page 3 of 4 )

---

---

FCAW process welding of weld joint #001 located on Traveler Rail 11TR1 – 008. Welder is identified as 215689. ZPMC QC is identified as Xu Hong Min. The welding variables recorded by QC appeared to comply with the WPS – B – T – 2231 – B – U2 – F.

FCAW process welding of weld joint #007 located on Traveler Rail Bracket TR1D – PP093. Welder is identified as 215185. ZPMC QC is identified as Xu Hong Min. The welding variables recorded by QC appeared to comply with the WPS – B – T – 2233 – Tc – U4c – F.

FCAW process welding of weld joint #002 located on Traveler Rail 11TR4 – 002. Welder is identified as 217805. ZPMC QC is identified as Xu Hong Min. The welding variables recorded by QC appeared to comply with the WPS – B – T – 2231 – B – U2 – F.

FCAW process welding of weld joint #002 located on Bike Path BK001 – 023. Welder is identified as 205390. ZPMC QC is identified as Zheng Zhi Wei. The welding variables recorded by QC appeared to comply with the WPS – B – T – 2231 – B – U4c – F – 1.

FCAW process welding of weld joint #002 located on Bike Path BK001 – 022. Welder is identified as 215250. ZPMC QC is identified as Zheng Zhi Wei. The welding variables recorded by QC appeared to comply with the WPS – B – T – 2231 – B – U4c – F – 1.

FCAW process welding of weld joint #003 located on Bike Path BK001 – 030. Welder is identified as 058174. ZPMC QC is identified as Zheng Zhi Wei. The welding variables recorded by QC appeared to comply with the WPS – B – T – 2231 – B – U4c – F – 1.

FCAW process welding of weld joint #001 located on Bike Path BK001 – 027. Welder is identified as 053742. ZPMC QC is identified as Zheng Zhi Wei. The welding variables recorded by QC appeared to comply with the WPS – B – T – 2231 – B – U4c – F – 1.

BAY 6

Cross Beam - 8

This QA Inspector observed the following work in progress:

FCAW process welding of weld joint #088 located on Cross Beam CB202G – 018. Welder is identified as 222396. ZPMC QC is identified as Liu Chuan Gang. The welding variables recorded by QC appeared to comply with the WPS – B – T – 2233 – Tc – U4c – F.

FCAW process welding of weld joint #039 located on Cross Beam CB202G – 020. Welder is identified as 048625. ZPMC QC is identified as Liu Chuan Gang. The welding variables recorded by QC appeared to comply with the WPS – B – T – 2233 – Tc – U4c – F.

FCAW process welding of weld joint #039 located on Floor Beam FB204 – 018. Welder is identified as 222396.

---

---

## WELDING INSPECTION REPORT

( Continued Page 4 of 4 )

---

---

ZPMC QC is identified as Liu Chuan Gang. The welding variables recorded by QC appeared to comply with the WPS – B – T – 2233 – Tc – U4c – F.

Cross Beam - 9

This QA Inspector observed the following work in progress:

FCAW process welding of weld joint #142 located on Cross Beam CB202G – 024. Welder is identified as 220688.

ZPMC QC is identified as Meng Lin Nan. The welding variables recorded by QC appeared to comply with the WPS – B – T – 2132.

FCAW process welding of weld joint #058 located on Floor Beam FB204 – 024. Welder is identified as 220688.

ZPMC QC is identified as Meng Lin Nan. The welding variables recorded by QC appeared to comply with the WPS – B – T – 2232 – B – U2 – F – 1.

BAY 7

This QA Inspector observed the following work in progress:

Fabrication of Cable tray supports below bridge girder type-2 of Lift – 1.

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

**Summary of Conversations:**

No Relevant 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 Eric Tsang - 15000422372, who represents the Office of Structural Materials for your project.

---

<b>Inspected By:</b>	Kumar,Sandeep	Quality Assurance Inspector
----------------------	---------------	-----------------------------

---

<b>Reviewed By:</b>	Prue,Erik	QA Reviewer
---------------------	-----------	-------------