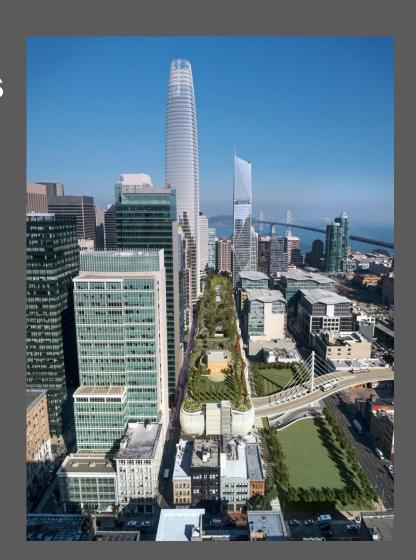


## TRANSBAY TRANSIT CENTER

### **TG07.3 Miscellaneous Metals**

Pre-Bid Question and Answer Session Webcor/Obayashi Joint Venture Office 175 Beale St. San Francisco, CA 2:00PM September 10, 2014

Please sign in!





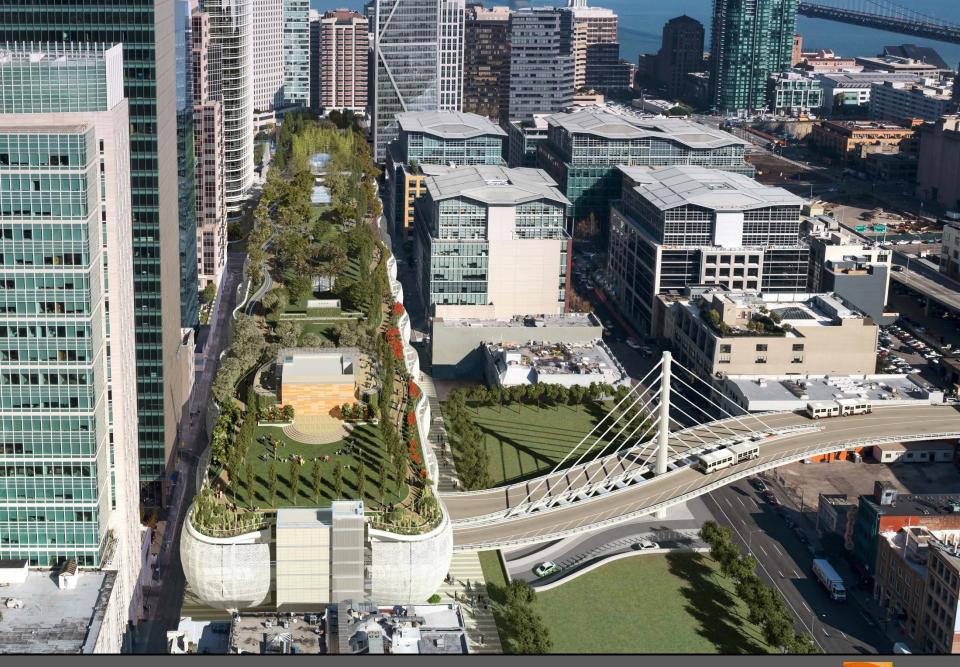
**TG07.3 Miscellaneous Metals** 

### **Project General Information**

- Client: Transbay Joint Powers Authority (TJPA)
- General Contractor: Webcor/Obayashi Joint Venture
- Architect: Pelli Clarke Pelli Architects / Adamson Associates

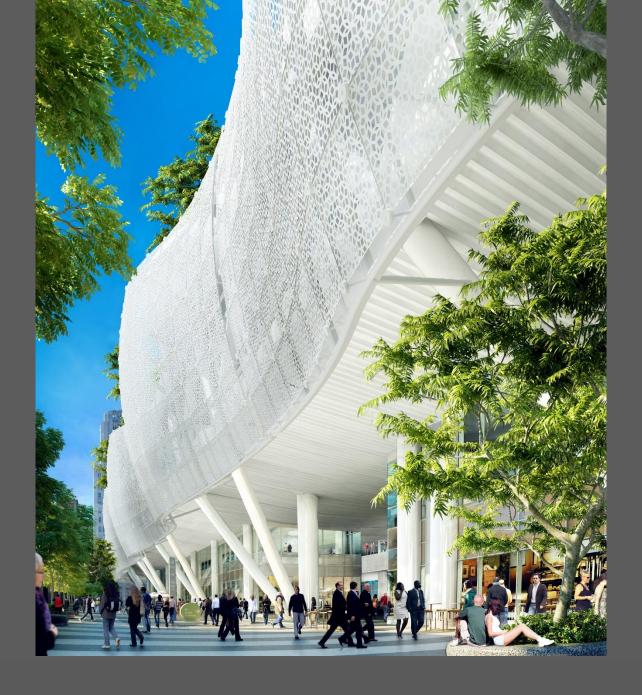




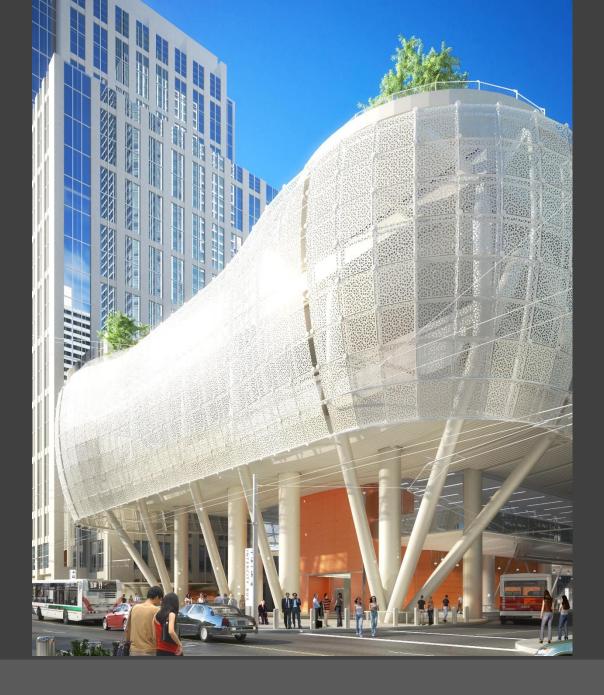








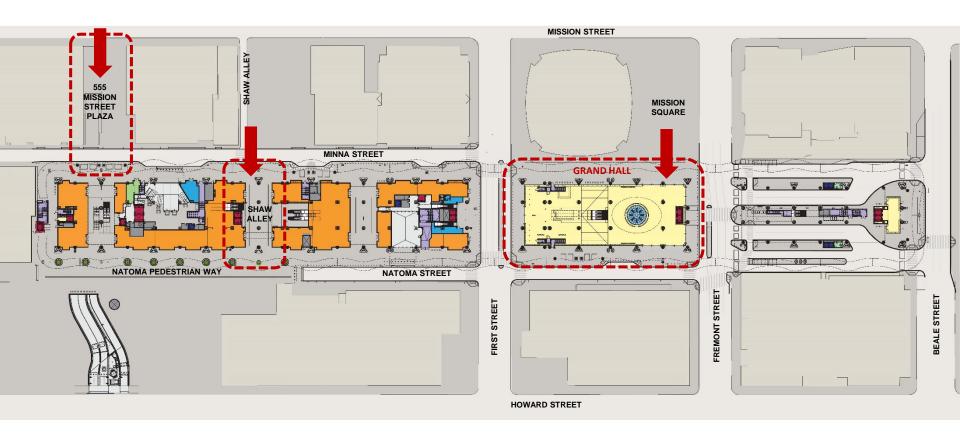


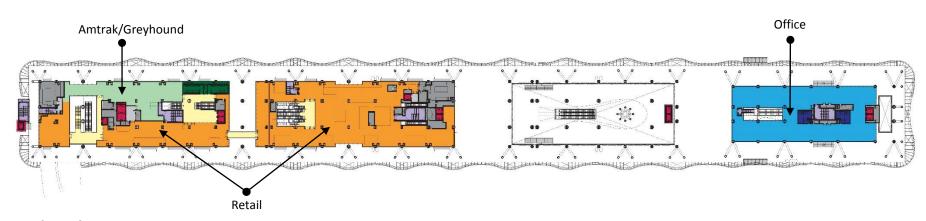




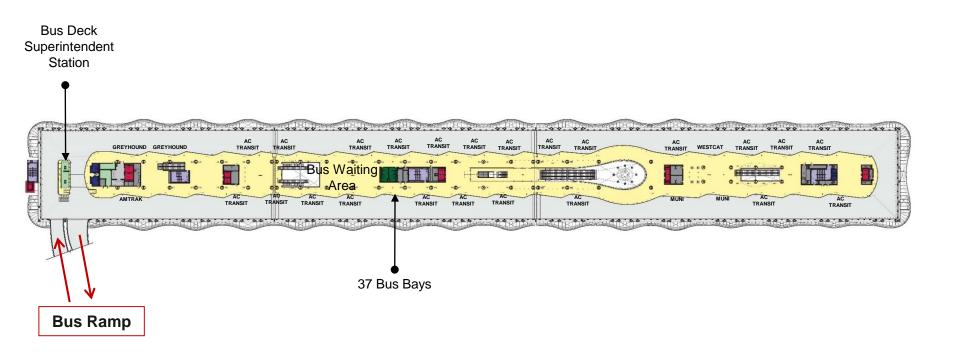


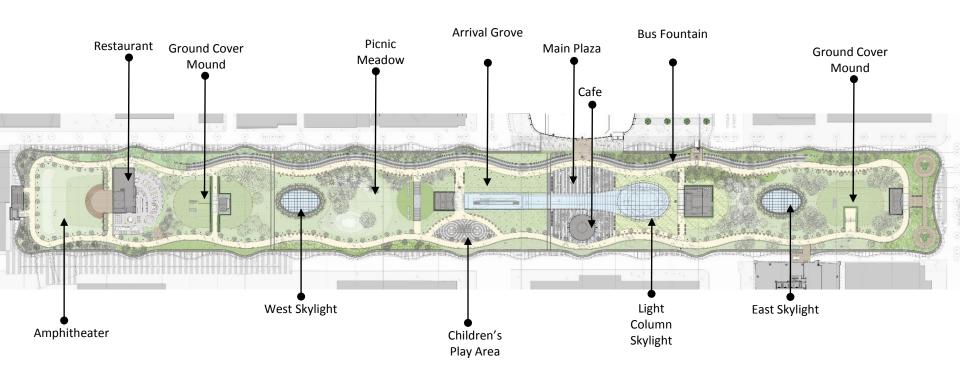






**Second Level** 



















**TG07.3 Miscellaneous Metals** 

### **Scope Summary Review**

- Furnish and install all:
  - Pit covers and associated frames
  - Catch basin covers and associated frames
  - Sump covers and associated frames
- All rails (including those marked as "Temporary", and all others) including all infill panels, toe guards, supports, sleeves, and all other integral pieces except as specifically excluded.
- All wire mesh fences, chain link fences and associate work.
- All metal wall plate and protective plating (including plate directly over studs, over drywall, CMU, column covers not integral to panelized wall systems, and all others) unless specifically excluded.



**TG07.3 Miscellaneous Metals** 

### **Scope Summary Review**

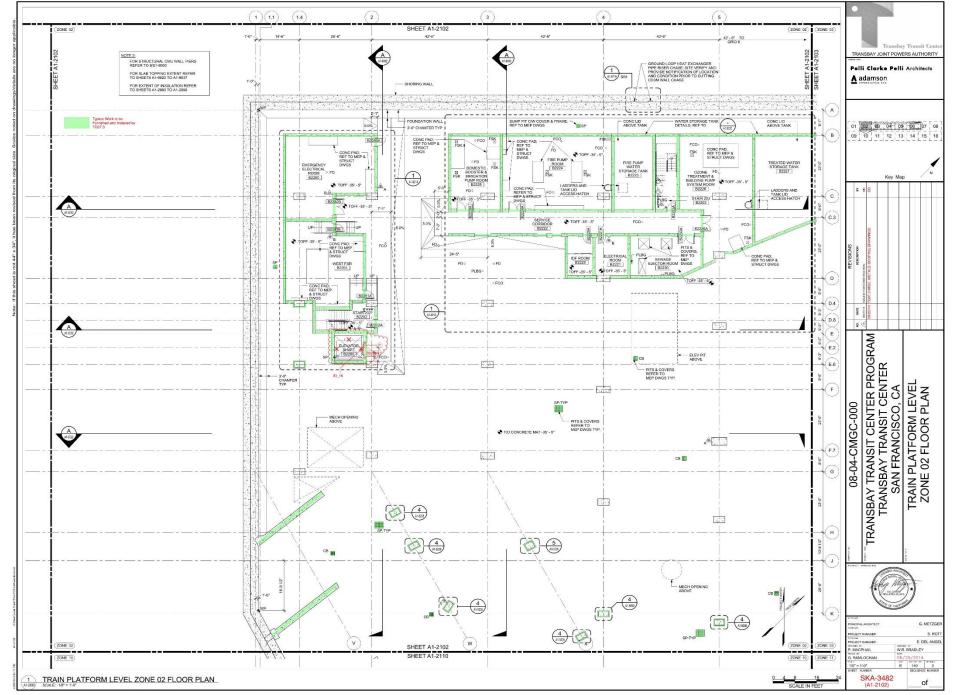
- All vanity support steel framing.
- All overhead catenary system (OCS) support as indicated on scoping drawings A1-8550 and A1-8551.
- All steel plate welded to columns and covered with waterproofing.
- Assume 30 tons of structural steel to be furnished and installed at elevator openings, and for escalator support as directed by Webcor/Obayashi Joint Venture.
- All steel plate within built-up floor/concrete slabs and waterproofing assemblies (see 1 4/A1-8713 and 5/A1-9317 for examples).
- All steel framing, metal deck, and grating for Fan Room Exhaust Shafts. (see 1 & 2/A1-8715)

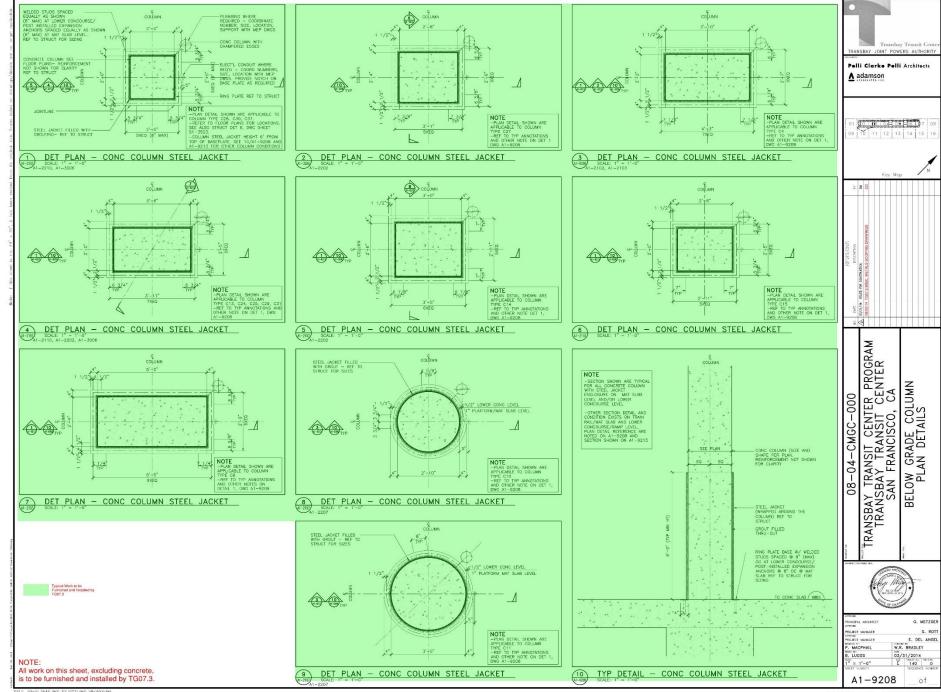


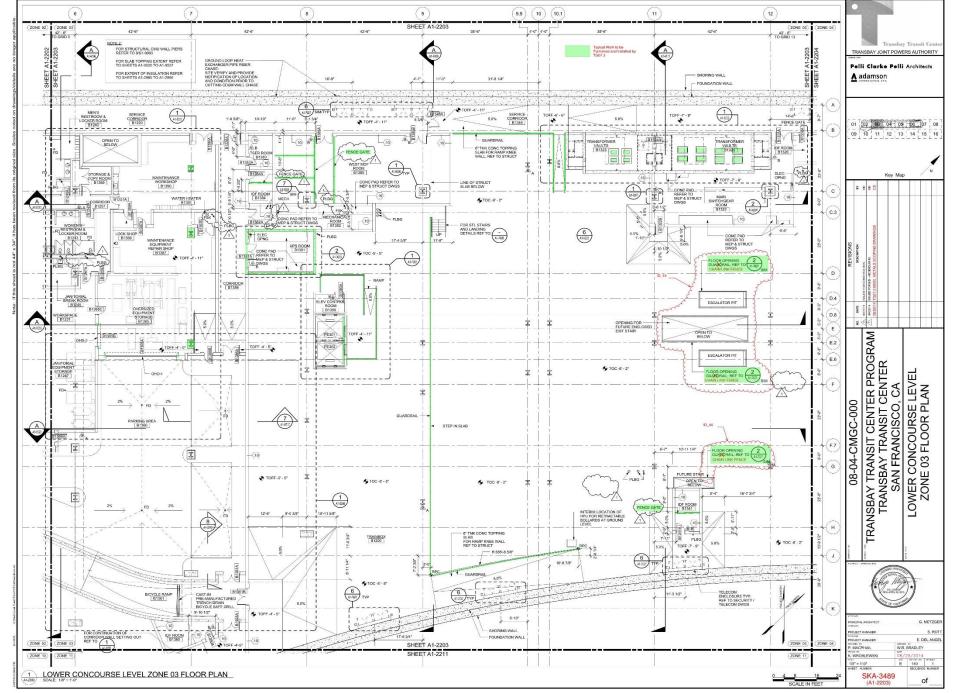
**TG07.3 Miscellaneous Metals** 

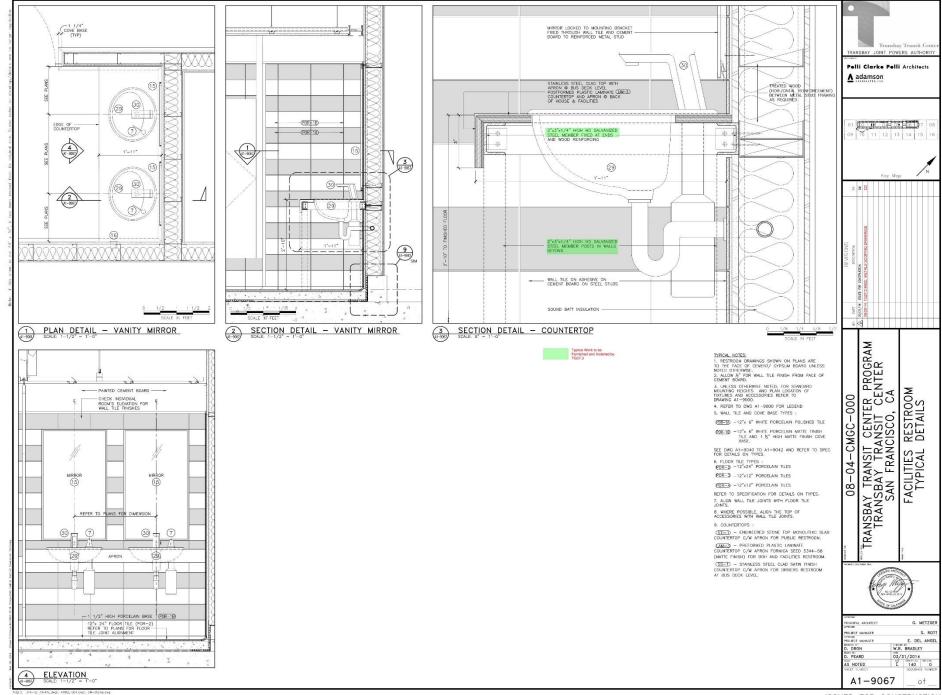
### **Scope Summary Review**

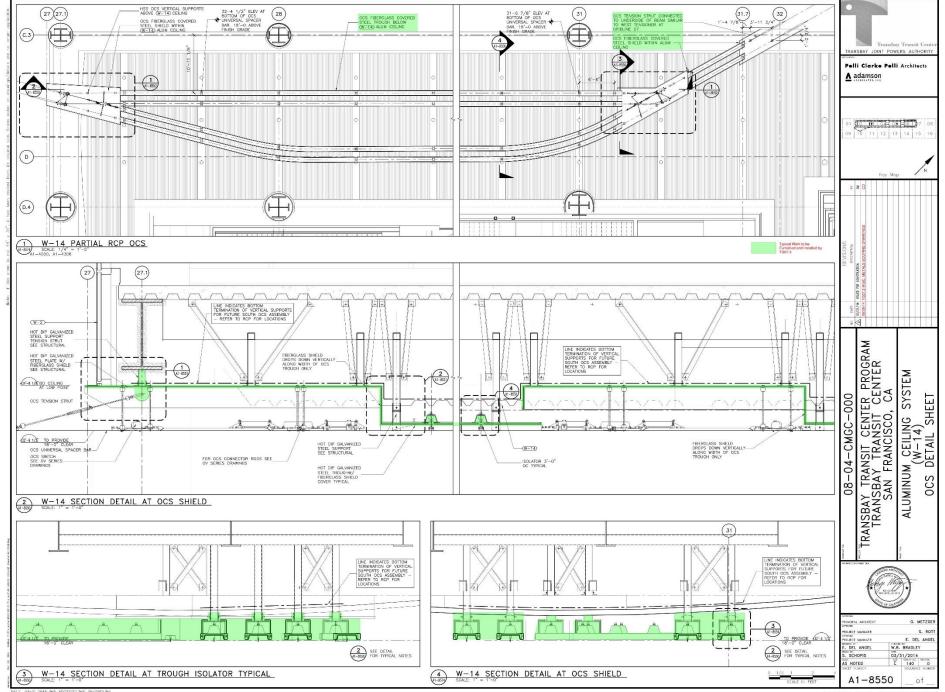
- All metal deck support as required on 12/S1-5003 for openings shown on architectural drawings, but not on structural drawings. Include the cutting of the metal deck, under deck support, and metal deck edge closure plate.
- All cast node partial cylindrical elements and closure elements (see 3/A1-8690 and 3/A1-8692 for examples). \*Pay special attention to make cylindrical/closure element finishes (including the welds) match the adjacent surfaces/finishes after installation as required by the contract documents.
- All scanning for items furnished and installed as a part of this Trade Package which is shown to be post-installed anchors within the contract documents.
- Furnish and install all structural steel, miscellaneous metal, and metal deck as described in Specification Section 01 10 30/APE Schedule of Alternates E.1.2 as part of the Total Base Bid Price.

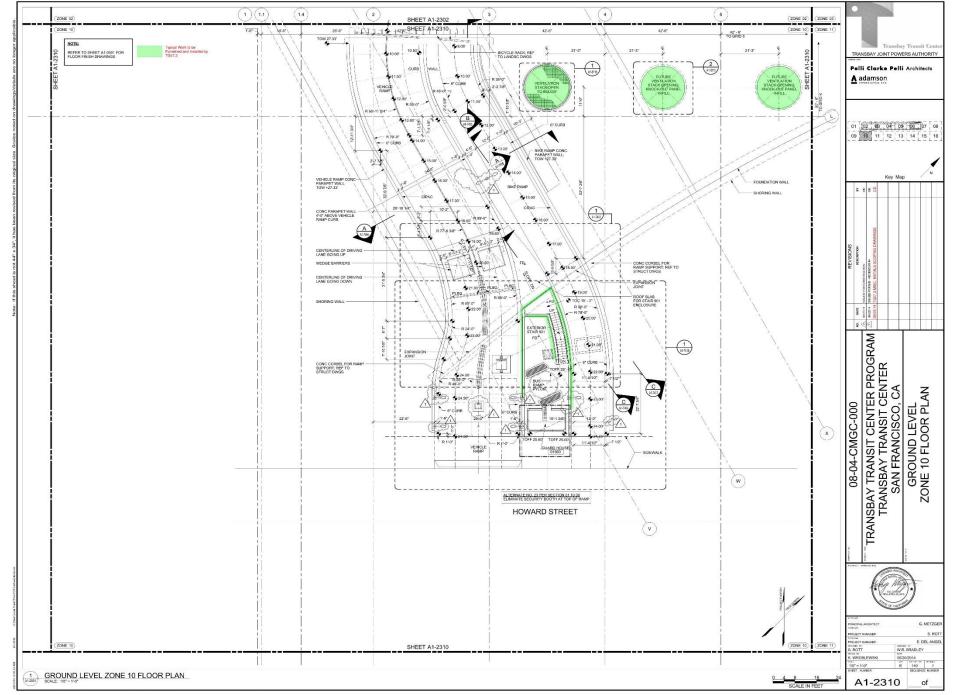


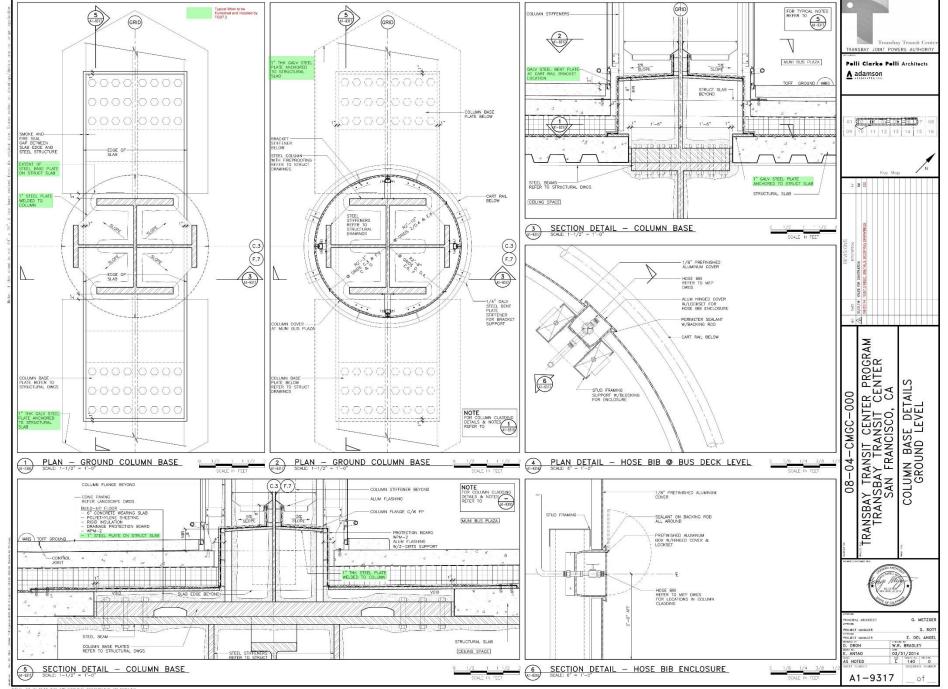


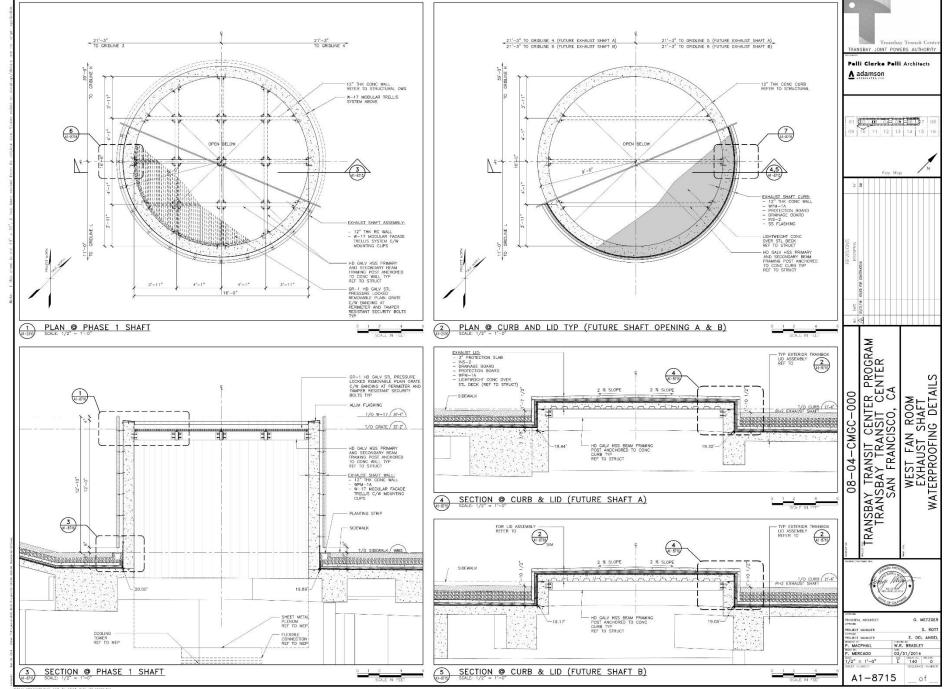


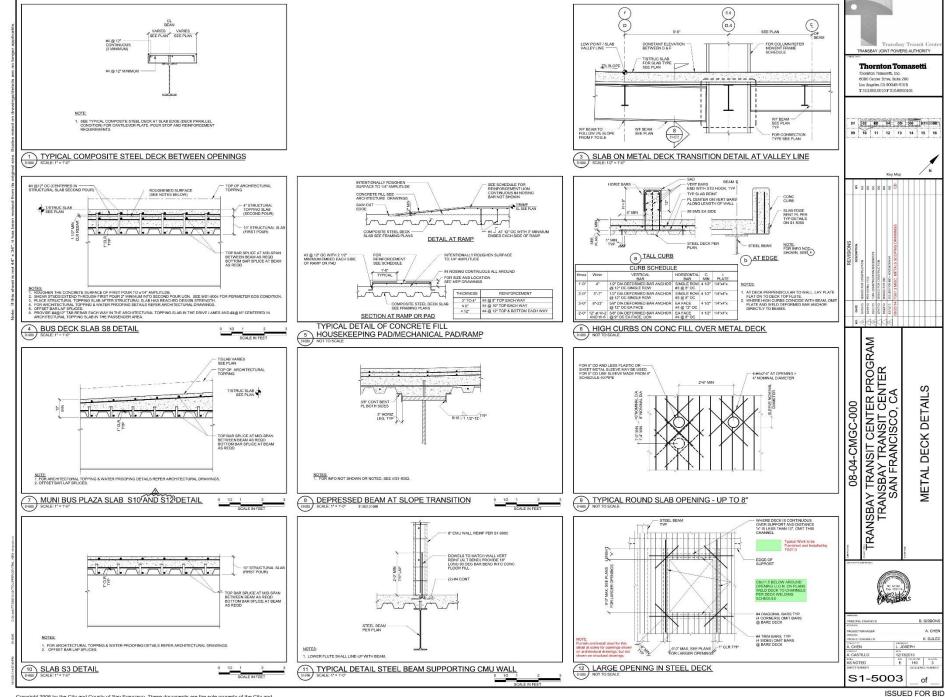


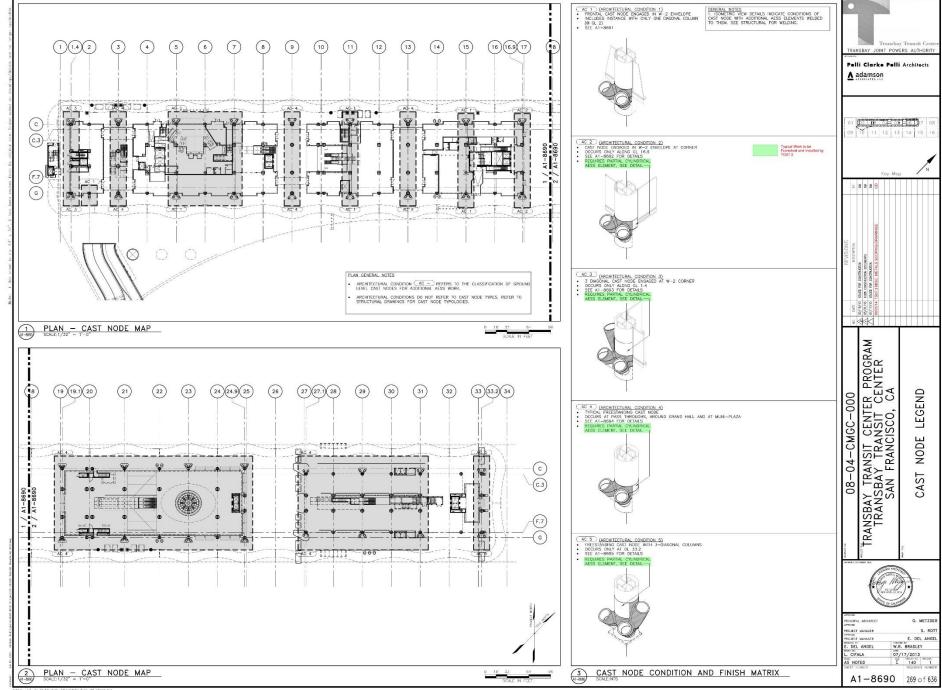


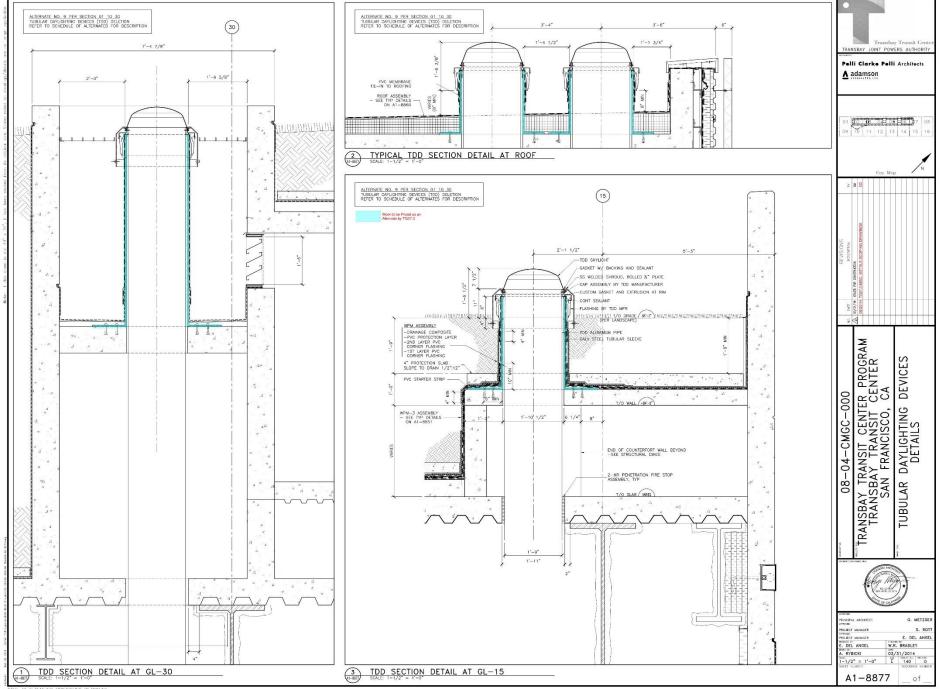












### **GENERAL NOTES** SPECIAL INSPECTIONS THE FOLLOWING WORK REQUIRES TESTS AND/OR INSPECTIONS. FOR SPECIFIC REQUIREMENTS, SEE SPECIFICATIONS. INSPECTIONS SHALL BE WADE IN ACCORDANCE WITH CRE. 1704, 1707 AND 1708. EINFORCING STEEL, PRESTRESSING STEEL RODS & ANCHOR RODS REBATION OF THE PROJECT OF THE PROJE S1-2 ALL TESTS AND INSPECTIONS SHALL BE PERFORMED BY A SPECIAL INSPECTOR PER CBC SECTIONS 1704, 1707, AND 1705. THE SPECIAL INSPECTOR SHALL BE EMPLOYED BY TARA, BUT NOT BY THE CONTRACTOR OR ANY OTHER PERSON RESPONSIBLE FOR THE WORK. THE SPECIAL INSPECTOR SHALL BE A QUALIFIED (LICENSED) PERSON WHO SHAL DEMONSTRATE COMPETENCE TO THE SATISFACTION OF THE BUILDING OFFICIAL. FOR INSPECTION OF THE PARTICULAR TYPE OF CONSTRUCTION OR OPERATION REQUIRING SPECIAL INSPECTION. PER THE 2007 SAN FRANCISCO BUILDING CODE, THE FOLLOWING ITEMS IN THE TABLE BELOW SHALL BE TESTED AND INSPECTED BY A DEPUTY INSPECTOR. CONTRACTORS RESPONSIBLE FOR THE CONSTRUCTION OF A WIND OR SEISMIC FORCE RESISTING SYSTEM/COMPONENT LISTED IN THE "STATEMENT OF SPECIAL INSPECTION" SHALL SUMMER A WRITTEN STATEMENT OF RESPONSIBILITY TO THE BUILDING INSPECTOR AND THE COWNER PRIOR TO THE COMMERCEMENT OF WORK ON SUCH SYSTEM OR COMPONENT FOR GOS SECTION 1706.1. LIST OF SPECIAL INSPECTIONS: YES NO NA CONCRETE DURING THE TAKING OF TEST SPECIMENS PLACING OF REINFORCED CONCRETE B. BOLT INSTALLED IN CONCRETE x REINFORCING STEEL: DURING PLACING OF REINFORCING, PRE-STRESSED STEEL B. SAMPLE AND TEST BAR STEEL & POST-TENSION RODS DURING PREPARATION AND TAKING OF PRISM OR TEST SPECIMENS PLACING OF ALL MASONRY UNITS, REINFORCEMENT, GROUTING AND MASONRY PRISM TEST STRUCTURAL STEEL: MILL REPORTS AND IDENTIFICATION OF STEEL (AFFIDAVIT OF COMPLIANCE) SAMPLING AND TESTING OF SPECIMENS WELDING: ALL STRUCTURAL WELDING (INCLUDES DECKING AND WELDED STUDS ULTRASONIC TESTING OF FULL PENETRATION WELD CONNECTIONS AT MOMENT FRAMES, BRACED FRAMES, BEAM SPLICES, AND FIELD WELD STRUCTURAL LIGHT GAGE METAL FRAME WELDING D. REINFORCING STEEL WELDING PER CBC 1704A.4.2 HIGH STRENGTH BOLT A325SC & A490SC (TENSION VERIFICATION) HIGH STRENGTH BOLT A325N & A490N (SNUG CONTACT OF PLYS) EXPANSION/ADHESIVE ANCHORS IN CONCRETE OR MASONRY INSTALLATION AND TESTING A. TEST CYLINDERS AND INSPECTIONS

### **GENERAL NOTES** TABLE 1704.3 REQUIRED VERIFICATION AND INSPECTION OF STEEL CONSTRUCTION A. IDENTIFICATION MARKINGS TO CONFORM TO ASTM STANDARDS SPECIFIED IN THE APPROVED APPLICABLE ASTM MATERIA SPECIFICATION CONSTRUCTION DOCUMENTS SC 360, SECTION MANUFACTURER'S CERTIFICATE OF COMPLIANCE REQUIRED. ECTION OF HIGH-STRENGTH BEARING-TYPE CONNECTIONS AISC 360, SECTION M2.5 1704.3.3 B. SEPECHICAL CONNECTIONS. MATERIAL VERIFICATION OF STRUCTURAL STEEL: A. IDENTIFICATION MARKINGS TO CONFORM TO ASTM STANDARDS SPECIFED IN THE APPROVED CONSTRUCTION DOCUMENTS. 1708.4 B. MANUFACTURER'S CERTIFIED MILL TEST REPORTS. MATERIAL VERIFICATION OF WELD FILLER ITERIALS: IDENTIFICATION MARKINGS TO CONFORM TO AWS SPECIFICATION IN THE APPROVED CONSTRUCTION DOCUMENTS. MANUFACTURER'S CERTIFICATE OF COMPLIANCE REQUIRED. AISC 360, SECTION A3.5 COMPLETE AND PARTIAL PENETRATION GROOVE WELDS. AWS D1.1, AWS D1.8 (FOR SEISMIC FRAME) MULTIPASS FILLET WELDS 1704.3.1 SINGLE-PASS FILLET WELDS > 5/ INGLE-PASS FILLET WELDS ≤ 5/16\* FLOOR AND ROOF DECK WELDS. AWS D1.3 FORCING STEEL VERIFICATION OF WELDABILITY OF REINFORCING STEEL OTHER THAN ASTM A 706. × ASTM A 706. REINFORCING STEEL-RESISTING FLEXURAL AND AXIAL FORCES IN FOUNDATION WALL, MOMENT FRAMES, AND BOUNDARY ELEMENTS OF REINFORCED CONCRETE SHEAR WALLS AND SHEAR REINFORCEMENT. HEAR REINFORCEMEN 4) OTHER REINFORCING STEEL CTION OF STEEL FRAME JOIN

DETAILS SUCH AS BRACING AND

C. APPLICATION OF JOINT DETAILS AT EACH CONNECTION.

MEMBER LOCATIONS

### REQUIRED VERIFICATION AND INSPECTION OF CONCRETE CONSTRUCTION

	VERIFICATION AND INSPECTION	CONTINUOUS	PERIODIC	REFERENCED STANDARD (A)	IBC REFERENCE
	INSPECTION OF REINFORCING STEEL AND PLACEMENT.	-	х	ACI 318: 3.5, 7.1-7.7	1913.4
	INSPECTION OF REINFORCING STEEL WELDING IN ACCORDANCE WITH TABLE 1704.3, ITEM 5B.	-	=1	AWS D1.4, ACI 318: 3.5.2	=
	INSPECT BOLTS TO BE INSTALLED IN CONCRETE PRIOR TO AND DURING PLACEMENT OF CONCRETE.	×	=1	=	1911.5
	VERIFYING USE OF REQUIRED DESIGN MIX.	1=1	×	ACI 318: Ch. 4, 5.2-5.4	1904.2.2, 1913.2 & .3
	AT THE TIME FRESH CONCRETE IS SAMPLED TO FABRICATE SPECIMENS FOR STRENGTH TESTS, PERFORM SLUMP AND AIR CONTENT TESTS, AND DETERMINE THE TEMPERATURE OF THE CONCRETE.	×	27	ASTM C 172, ASTM C 31, ACI 318: 5.6, 5.8	1913.10
	INSPECTION OF CONCRETE PLACEMENT FOR PROPER APPLICATION TECHNIQUES.	×	=	ACI 318: 5.9, 5.10	1913.6, 1913.7, 1913.8
	INSPECTION FOR MAINTENANCE OF SPECIFIED CURING TEMPERATURE AND TECHNIQUES.	-	х	ACI 318: 5.11-5.13	1913.9
i.	VERIFICATION OF IN-SITU CONCRETE STRENGTH, PRIOR TO REMOVAL OF SHORES AND FORMS FROM BEAMS AND STRUCTURAL SLASS.	-	×	ACI 318: 6.2	-
į.	INSPECT FORMWORK FOR SHAPE, LOCATION AND DIMENSIONS OF THE CONCRETE MEMBER BEING FORMED.	-	х	ACI 318: 6.1.1	-

(A) WHERE APPLICABLE, SEE ALSO SECTION 1707.1, SPECIAL INSPECTION FOR SEISMIC RESISTANCE.

### **GENERAL NOTES**

### AC ARCHITECTURAL CLADDING

TYPICAL DETAILS INDICATE GENERAL CRITERIA FOR ASSUMED CONNECTIONS OF ARCHITECTURAL CLADDING TO BASE BUILDING STRUCTURE. PROVIDE DESIGNS ARCHITECTURAL CLADDING TO BASE BUILDING STRUCTURE. PROVIDE DESIGNA THAT MEET INDICATED CRITERIA AND CONFORM TO LISTED CODES AND STANDARDS. REFER TO SUBMITTALS SECTION IN THESE GENERAL NOTES FOR ADDITIONAL REQUIREMENTS.

### PA POST-INSTALLED ANCHORS

- POST INSTALLED ANCHORS INCLUDE EXPANSION ANCHORS, SCREW ANCHORS PA.1 EPOXY ANCHORS/DOWELS, AND POWDER-ACTUATED FASTENERS
- INSTALL POST-INSTALLED ANCHORS IN ACCORDANCE WITH THE APPLICABLE ICC-ES REPORT AND THE MANUFACTURER'S RECOMMENDATIONS.
- PA-3 USE SCANNING EQUIPMENT OR OTHER MEANS TO LOCATE AND AVOID CUTTING OR NG REINFORCING BARS. SER APPROVAL IS REQUIRED PRIOR TO CUTTING OR DAMAGING REINFORCING.
- PA-4 SPECIAL INSPECTION IS REQUIRED FOR ALL POST-INSTALLED ANCHOR INSTALLATIONS, UON.
- FIELD TESTING OF POST-INSTALLED ANCHORS IS REQUIRED, UON, TEST INSTALLED ANCHORS IN ACCORDANCE WITH THE FOLLOWING:

  - TEST 160% OF ANCHORS AT ALL STRUCTURAL APPLICATIONS, UON. TEST 50% OF ANCHORS AT ALL NON-STRUCTURAL APPLICATIONS (BUCH AS EQUIPMENT ANCHORAGE), UON. TEST 10% OF ANCHORS AT SILL PLATE BOLTING APPLICATIONS, UON. TEST 10% OF ANCHORS AT SILL PLATE BOLTING APPLICATIONS. UON. TEAT ANCHOR FALLS TESTING, TEST ALL ANCHORS OF THE SAME TYPE NOT
- IF ANY MICHOR FAILS TESTING, TEST ALL AND-DIGS OF THE SAME TYPE NOT PREVIOUGHT TESTED UNITE, DIC CONSECUTIVE AND CHEER SHEET, SEE FIELD TESTS SHALL BE EITHER TENSION TESTS OF TORQUE TESTS. AS FIELD TESTS SHALL BE EITHER TENSION TESTS OF TORQUE TESTS. AS TESSION TESTS. APPLY TEST CLOSED TO AND-CHEER SHEET PREMOVING THE NUT IF POSSIBLE. IF NOT, REMOVE BUT AND INSTALL A THERADED COUPLER TO THE SAME THE SHEET SHEET
- ANCHOL BEIND TESTED, PROVIDED THE ANCHOR IS NOT RESTRIKED FROM WHITDRIMAND BY THE FIXTURES TO BE ACCEPTABLE. ANCHORS SHALL HAVE WITHOUT ATT IT IS NO ACCEPTABLE. ANCHORS SHALL HAVE BEIND THE THE ACCEPTABLE THE THE ACCEPTABLE THE ACCEPTABLE THE RESTRICT THE ACCEPTABLE THE RESTRICT THE ACCEPTABLE THE RESTRICT THE ACCEPTABLE TO THE ACCEPTABLE TO BE ACCEPTABLE TO THE AUTOLITY OF THE AUTOLITY OF THE AUTOLITY OF THE ACCEPTABLE TO BE A

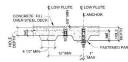
1704.3.2

A. EXPANSION ANCHORS SHALL BE ONE OF THE FOLLOWING, UON CARBON STEEL HILTI KWIK BOLT TZ

ANCHOR EMBEDMENT AND FIELD TEST VALUES ARE AS FOLLOWS, UON



### CONCRETE SLAB



### UNDERSIDE OF CONCRETE FILL OVER STEEL DECK

HILTI		BOLT TZ I	N NORMAL- RETE
ANCHOR DIAMETER	Hef	MINIMUM HOLE DEPTH	TORQUE TEST VALUE (FT-LBS)
3/8"	2"	2-5/8"	25
1/2"	3-5/8"	4"	40
5/8*	4"	4-3/4"	60
3/4"	4-3/4"	5-3/4"	110

HILTI KWIK BOLT TZ IN CONCRETE COMPOSITE DECK INSTALL FROM UNDERSIDE OF DECK CENTER ON LOW FLUTE MINIMUM HOLE DEPTH Hef' VALUE (FT-LBS) 3-5/8"

### HILTI KWIK BOLT INSTALLED INTO TOPSIDE OF 3-1/4 LIGHTWEIGHT CONCRETE ON DECK ANCHOR Hef MINIMUM HOLE DEPTH

		STRONG-E	
ANCHOR DIAMETER	Hef	MINIMUM HOLE DEPTH	TORQUE TEST VALUE (FT-LBS)
3/8"	2-1/2"	3*	30
1/2"	3-3/8"	4-1/8*	60
5/8"	4-1/2"	5-3/8*	90
3/4"	5"	6"	150

		NG-BOLT 2 IN INSTALL FRO	CONCRETE OM UNDERSIDE
OF DE	CK - CI	ENTER ON LC	W FLUTE
ANCHOR DIAMETER	Hef	MINIMUM HOLE DEPTH	TORQUE TEST VALUE (FT-LBS)
3/8*	3"	3-1/2"	30
1/2*	4"	4-3/4"	60

5/8\* 4" 4-7/8" 90

### **GENERAL NOTES**

SIMPSON STRONG-BOLT 2 INSTALLED INTO TOPSIDE OF 3-1/4" LIGHTWEIGHT CONCRETE ON DECK ANCHOR Hof MINIMUM TORQUE TEST HOLE DEPTH VALUE (FT-LBS)

- C. Hat IS MEASURED FROM FACE OF CONCRETE SUBSTRATE TO THE TEETH ON THE
- EXPANSION ELEMENT:
  CONTRACTOR SHALL PROVIDE ANCHORS WITH SUFFICIENT TOTAL LENGTH FOR
  THE SPECIFIED EMBEDMENT LENGTH, THONNESS OF FASTENED PART, WASHER
- ANCHOR MAY BE OFFSET 1" MAX FROM CENTER OF LOW FLUTE WHEN INSTALLED FROM UNDERSIDE OF DECK.

### PA-7 FIELD DRILLED EXPANSION ANCHORS IN MASONRY:

A. EXPANSION ANCHORS SHALL BE ONE OF THE FOLLOWING, UON: CARBON STEEL HILTI KWIK BOLT 3 MASONRY ANCHOR (ICC-ES REPORT ESR-1385)

SIMPSON STRONG-TIE WEDGE-ALL ANCHOR (ICC-ES REPORT ESR-1396)

B. ANCHOR EMBEDMENT AND FIELD TEST VALUES ARE AS FOLLOWS:

ANCHOR DIAMETER	EMBEDMENT DEPTH	TORQUE TEST VALUES (FT-LBS)
3/8"	2-1/2"	15
1/2"	3-1/2"	25
5/8"	4"	65
3.4"	4-3/8"	120

SIMPSO	N WEDGE-A	LL IN MASONRY
ANCHOR DIAMETER	EMBEDMENT DEPTH	TORQUE TEST VALUES (FT-LBS)
3/6"	2-5/8*	30
1/2"	3-1/2*	35
5/8"	4-3/8"	55
3/4"	5-14*	120

C. HOLES SHALL BE DRILLED TO A DEPTH ALLOWING FOR PROPER EMBEDMENT. FOLLOW MANUFACTURER'S INSTRUCTIONS.

### PA-8 SCREW ANCHORS

- A SCREW ANCHORS SHALL BE ONE OF THE FOLLOWING, UON: SIMPSON TITEN HD (ICC-ES REPORT ESR-2713)
- HILTI KWIK HUS-EZ (ICC-ES REPORT ESR-3027)
- B. ANCHOR EMBEDMENT AND FIELD TEST VALUES ARE AS FOLLOWS, HON-

	CONCRETE	(3000 PSI MIN)
ANCHOR DIAMETER	EMBEDMENT	TENSION TEST VALUE (LBS)
3/8"	2-1/2"	1200
1/2"	3-1/4"	2973
3/4"	5-1/2"	5895

HILTI		Z IN NORMAL WEIGHT : (3000 PSI MIN)
ANCHOR DIAMETER	EMBEDMENT	TENSION TEST VALUE (LBS)
1/4"	2-1/2"	1133
3/6"	2-1/2"	2093
1/2"	3"	2620
5/8"	3-1/4"	3049
3/4"	4"	4118

### PA-9 EPOXY ANCHORS AND DOWELS

- A. EPOXY SHALL BE ONE OF THE FOLLOWING, UON HILTI HY-150 MAX-SD (ICC-ES REPORT ESR-5013) HILTI HIT-RE 500-SD (ICC-ES REPORT ESR-2322) SIMPSON SET-XP (ICC-ES REPORT ESR-2508)
- SIMPSUM SELAY (IUCES NETWORL SENEZOR)

  R. RODS GEMEDOED IN BEDNY SHALL BE CARRON STEEL THREADED ROOS PER THE EPONY MANUFACTURERS ICC ES REPORT.
  RIEINPORTION STEEL BARS MEMEDOED IN EPONY SHALL BE ASTM A615, GRADE 60, UON.

		TENSIO	ON TEST VAL	UE (LBS)
REBAR SIZE	EMBEDMENT (IN)	HILTI HY-150 MAX-SD	HILTI HIT-RE 500-SD	SIMPSON SET-XP
#3	3	1420	2050	
#4	4	2760	3640	5840
#5	5	4640	5750	7440
#6	6	7180	8150	9520
#7	7	9860	10140	9550
#8	8	12970	12380	13830

	CONCRET	TE (3000 F	PSI MIN)	
THREADED		TENSI	ON TEST VAL	UE (LBS)
DIAMETER (IN)	EMBEDMENT (IN)	HILTI HY-150 MAX-SD	HILTI HIT-RE 500-8D	SIMPSON SET-XP
3/8	3	1420	2030	3650
1/2	4	2760	3060	5540
5/8	5	4640	5770	7440
3/4	6	7180	8150	9520
7/8	7	9860	10200	9550
- 1	8	12970	12310	13830



**Thornton Tomasetti** 

Los Angeles CA 90045-5318 T 310,666,0010 F 310,668,010

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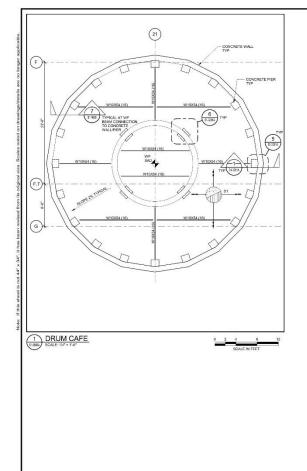
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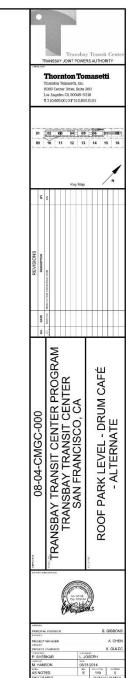
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**TG07.3 Miscellaneous Metals** 

**Questions?** 



**TG07.3 Miscellaneous Metals** 

### IFB Package Timeline

Bid Package Issued:	August 20, 2014
Pre-Bid Conference:	September 10, 2014 (2:00 p.m.)
Qualifications Due (for non-qualified):	September 17, 2014 (2:00 p.m.)
Notification of Qualification (for non-prequalified):	September 24, 2014
Questions/Clarifications (QBD) Due:	October 8, 2014 (2:00 p.m.)
Pre-Bid Request for Substitution:	October 1, 2014 (2:00 p.m.)
Value Engineering (VE) Proposals Due:	October 8, 2014 (2:00 p.m.)
VE Proposals Review:	October 9, 2014 – October 22, 2014
Bid Package Due:	October 22, 2014 (2:00 p.m.)
Public Bid Opening:	October 22, 2014 (2:00 p.m.)
Protest Period:	October 22, 2014 (2:00 p.m.) –
	October 29, 2014 (2:00 p.m.)
Notification of Intention to Award Contract	November 2014
TJPA Board Vote to Approve the Contract Award:	November 13, 2014



**TG07.3 Miscellaneous Metals** 

### **Obtaining Contract Documents**

- TJPA Website
  - List of all Exhibits
  - Non Disclosure Agreement (NDA)
- Plan Room (ARC)
  - Non-SSI
  - SSI
- Box.com
  - SSI (Managed by TJPA)
  - Supplemental Documents (Managed by Webcor-Obayashi Joint Venture)



### **TG07.3 Miscellaneous Metals**

# Request for Information P1-0001 to P1-0443

Pay close attention to the following RFIs:

RFI No.	Subject
P1-0300	Design Requirements for Galvanized Metal Plate per Detail 3/A1-8894
P1-0065	Steel Plate Supporting Concrete Topping Slab
P1-0066	Escalator Pit at Shaw Alley
P1-0070	Steel Flashing at Column
P1-0071	Layout for Guardrail
P1-0072	C-Channel Support in Mech Shaft 01424
P1-0134	Embeds for Superintendent Station
P1-0134.1	Required Detailing for Superintendent's Station Concrete Platform
P1-0201.1	Fastening Requirements for 1/8" Thick SS Bent Metal Plates
P1-0206	Galv. Metal Plate at Fireproofed Beam
P1-0206.1	Design Requirements for Galvanized Metal Plate per Detail 3/A1-8897
P1-0208	Alum. Checker Plate
P1-0210	Galvanized Plate Detail
P1-0212	Hot dipped galvanized Plates
P1-0245	Information on Steel Plates for Utility Pads
P1-0248	Information on Checker Plate on Loading Dock CMU Walls
P1-0250	Reference for Corner Guards
P1-0254	Corner Guard Specification Details
P1-0279	Details for Threaded Insert Drainage
P1-0286	Specification for Chain Linked Fences
P1-0290	Painted Galvanized Flashing per ASI 119 and Specification Section 07 62 00 2.3 A
P1-0292	Grout Placement Beneath Drain Hole at Rail Embed
P1-0315	Structural Information on OCS Trough Support
P1-0315.1	Design Requirements for OCS Trough Support
P1-0316	SFMTA Design & Construction Documents for Muni Bus Plaza Ceiling & OCS System
P1-0317	OV Series Sheets for OCS System
P1-0319	AESS Category for Light Columns
P1-0363	Walk-Off Mats at Ground Level
P1-0387	Corner Guards Dimension Details per ASI 123



**TG07.3 Miscellaneous Metals** 

### Redline Markups

The redline marked up drawings and narratives included with the ASI documents are designed to relay specific scopes of work that are modified to reflect scope changes. Redline markups in ASI drawings are only to be used to indicate scope modifications. These scope modifications are to be applied to the current set of drawings and specifications.



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## **Pre-Bid Substitution Request**

#### 00 04 41 - PRE-BID REQUEST FOR SUBSTITUTION

During the bidding period, a proposed change by a bidder of a product, equipment, or service required by the Contract Documents is considered a pre-bid request for substitution. A pre-bid request for substitution will be considered as part of the questions on bid documents (QBD) process. Refer to the CM/GC's Bid Manual for QBD instructions and forms.

During the bidding period and prior to the deadline for the submission of QBDs, Bidders may submit a request for a substitution of an "or equal" product, equipment, or service specified in the Contract Documents by completing and submitting this form as an attachment to a QBD, in accordance with the QBD process. The TJPA will respond in writing to a pre-bid request for substitution in accordance with the QBD process and deadlines specified in the bidding documents.

Pre-bid requests for substitution requested during the bidding period and accepted by Addendum prior to opening of bids are included in the Contract Documents.

Spec. Section:		Date:					
Drawing Sheet:		District (1/a)					
		Detail(s):					
Proposed Substitution:							
Manufacturer/Address/Phone:							
Trade Name/Model No.:							
Product History: New	2-5 years old	5-10 years old	More than 10 years old				
Differences between proposed sul data):	ostitution and specified	product (attach required p	point-by-point comparative				
Reason for not providing specifie	d item:						
Similar installation where propose Installed):	ed substitution has been	used (Project/Address/A	rchitect/Owner/Date				
Proposed substitution affects other	r parts of the Work:	No Yes: explain					
Changes or modifications needed the proposed substitution:	to coordinate other part	s of the Work that will be	e necessary to accommodate				



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### **QBD & VE Process**

Project: Transbay Transit Center	O) (WEBCOR/OBAYASHI JOINT VENTURE USE) QBD No.:					
G	Received:					
No.:	TJPA to: Date:					
To: Webcor/Obayashi Joint Venture	Consultant to TJPA:					
(See Exhibit A For Contact Information)	Addendum Required? Yes: No:					
	To Bidders Yes: No:					
From:	Date:					
Firm:						
	Fax:					
Specification Section:	Paragraph(s):					
Drawing Sheet:						
• Mark this circle if the QBD can be answered by Bidd an be obtained.	er's review of the documents. Reply with location(s) when	re the infor				
• Mark this circle if the QBD can be answered by Bidd n be obtained. eply:	er's review of the documents. Reply with location(s) when					
Mark this circle if the QBD can be answered by Bidd n be obtained.  Part of the QBD can be answered by Bidd n be obtained.  Part of the QBD can be answered by Bidd n be obtained.  Part of the QBD can be answered by Bidd n be obtained by Bidd n be obtained.  Part of the QBD can be answered by Bidd n be obtained by Bidd n be obtai	er's review of the documents. Reply with location(s) when  Date:  Date:  per not change the Bid Documents unless the information of the second control of	contained t				

#### SECTION 00 04 20 - VALUE ENGINEERING PROPOSALS

#### PART 1 - GENERAL

#### 1.1 SUMMARY

A. Bidders are encouraged to submit Value Engineering proposals in conjunction with their Bids (a "Pre-bid VE proposal"). Following award of a Trade Work Package subcontract ("Subcontract"). Trade Subcontractors are encouraged to submit Value Engineering proposals during the performance of the Work (a "Post-contract-award VE proposal"). This section addresses both Pre-Bid and Post-contract-award VE proposal (collectively referred to as a "VE proposal") requirements and procedures.

#### 1.2 DEFINITION

- A. "Value Engineering" or "VE" as used in this section is a tool whereby Bidders or Trade Subcontractors use their expertise to develop, prepare, and submit proposals to optimize value during the performance of the Work.
- B. "Bidder" or "Bidders" as used in this section shall mean potential Trade Subcontractors that submit a bid directly to the CM/GC. A lower tier subcontractor or a material supplier to a potential Trade Subcontractor is not a Bidder for purposes of this section and cannot submit Pre-bid VE proposals directly to the CM/GC.
- C. "Trade Subcontractor" or "Trade Subcontractors" as used in this section shall mean the entity that has been awarded a Trade Work Package and executed a Subcontract with the CM/GC for the Trade Work Package.

#### 1.3 REQUIREMENTS

- A. VE proposals must include:
  - A VE technical proposal:
    - A detailed description of the VE work to be performed, including the means and methods of performance.
    - b. A description of other work that may be affected by the VE work.
    - c. A description of proposed changes, if any, to the Contract Documents and a listing of those Contract Documents as a result of the VE work.
    - A description of known or anticipated impacts to LEED certification as a result of the VE work.
  - A VE cost proposal:
    - a. Any known or anticipated schedule impacts stated in plus or minus working days.
    - b. The costs savings stated as a specific dollar amount.
    - c. A description of bid items affected and resulting quantity changes, if any.
  - Name and address of projects on which a similar VE proposal has been used and the date the proposal was implemented.
- B. If a VE proposal calls for changes in material, a request for substitution must accompany the VE proposal. Refer to Section 01 16 30.



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**Questions?** 



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## SBE Program Overview/Participation Goal





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### SBE PROGRAM OVERVIEW

## **Certification & Certifying Agencies**







**DBE** 

**SBE** 

**LBE** 



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## **Veteran Business & Workforce Participation**





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## Overall SBE Project Participation Goal: 17%

143 SBEs to date









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### **Participation Goal**

10% SBE Participation Goal for this Package

### Focus on "Trade Package Specific Information"

- Certifications: SBE/DBE/LBE
- Certification: Assistance Provided By Program
- Compliance: Commercially Useful Function Guidelines



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### E. Subcontractor List (SL) - Project Bidding Manual

E. Subcontractor List (SL)

Bidder shall provide the requested information for each subcontractor who shall perform work in excess of 1/2 of 1% of the Grand Total Bid Price. If this project involves the construction of streets, highways, or bridges, Bidder shall provide the information for each subcontractor who shall perform in excess of 1/2 of 1% of the Grand Total Bid Price or \$10,000, whichever is greater.

Under San Francisco Administrative Code section 6.21A(9) and California Public Contract Code section 4104, failure to provide at a minimum the name, location of the place of business, and the portion of work to be performed by each such subcontractor may render the bid nonresponsive or the Bidder unqualified to perform the work under this Contract. Bidders may provide license numbers or additional identifying information within 24 hours of the time bids are received. Where Webcor/Obayashi Joint Venture cannot identify a subcontractor with the information provided by a Bidder or where conflicting information is provided, Webcor/Obayashi Joint Venture may consider the subcontractor unlisted for purposes of Public Contract Code section 4106.

Bidder shall also list all SBE subcontractors and suppliers, including the respective subcontract dollar amounts for each, on the Bidders/Proposers Information Form in order to receive participation credit toward the SBE participation goal. Failure to include this information with the Bid may result in a determination that the Bidder has not met the SBE participation goal and its bid is therefore nonresponsive.

Subcontractor Name:	Oct 11 Oct 11	J Ou	<del>,</del>			
Address: Portion of Work:		()	V			
	Amou	unt of Subcontract:				
Contractor's License No.:	San Francisco Business Tax Registration No.:					



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#### Bidder/Proposer Information Request From 00 08 21/AT3-B

## TRANSBAY JOINT POWERS AUTHORITY BIDDERS/PROPOSERS INFORMATION REQUEST FORM SECTION 00 08 21/AT3-B

To be completed by Prime Contractor and submitted as part of bid/proposal.

NAME OF PROJECT/PROPOSAL							PROJECT/PROPOSAL NUMBER				
PROPOSER BUSINESS NAME AND ADDRESS											
NAME OF PERSON SUBMITTING BID			SIGNATURE OF P	SIGNATURE OF PROPOSER				DATE			
CONTACT PERSON NAME			CONTACT PHONE	CONTACT PHONE NUMBER			CONTACT EMAIL				
IMPORTANT: 1) Identify all DBE/SBE firms being form. 4) Attach "Intent to Perform" letter signed by		) List names of all DI	BE/SBE subcontract	tors and their respecti	ve items of work. 3	Attach a copy of the	proof of DBE/SBE	ertification for each	DBE/SBE sub <mark>con</mark> tra	ctor listed on this	
iorm. 4) Attach Intent to Ferform letter signed o	y the subcontractor.				<del></del>			OBE-SBE Participation	on.		_
LIST BUSINESS FIRM(s) List Name, Address, and Contact Person (if not the same as above)	Phone Number	Email Address	Age of Firm	Item of Work, Service or Materials Supplied	NAICS Code (if known) *	Annual Gross Receipts of Firm	Certifi <mark>e</mark> d DBE or SBE ( <mark>Y</mark> /N)		Type of DBE or	Award Amount	Percentage of Contract Participation
A. PRIME Contractor											
B. Subcontractor/Vendor/Joint Venture											



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Remember to sign all forms!!

**Questions?** 

**Thank You!**