

# Memorandum

CS Memorandum No. 1421

To:

Distribution

From:

Beverly Ward, CMB/Risk Management Assistant

Date:

April 19, 2013

Reference: Project No. M544.1, Contract No. CS-149

Task No. 1-8.02, Change Control

Subject:

Configuration Management Board Meeting No. 122

Attached please find minutes for Configuration Management Board Meeting No. 122 held on April 17, 2013.

Attachments: CMB Meeting No. 122 Rev. 0 Minutes with attachments

Cc:

David Kuehn, STV (w/attachments) david.kuehn@stvinc.com

Shahnam Farhangi, SFMTA (w/attachments)

Arthur Wong, SFMTA (w/attachments)

Roger Nguyen, SFMTA (w/attachments)

Eric Stassevitch, CSP (w/attachments)

Jane Wang, SFMTA (w/attachments)

Aileen Read, CSDG (w/attachments)

CS File No. M544.1.5.0890

#### Distribution:

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Joon Park, SFMTA

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Brian Kelleher, SFMTA

Vivian Chow, SFMTA

Sarah Wilson, CSP

Mun Leong, CSP Beverly Ward, CSP

SFMITA





# **CMB Meeting Minutes #122**

DATE: April 18, 2013

MEETING DATE: April 17, 2013

LOCATION: 821 Howard St, Main Conference Room

TIME: 3:00 PM

ATTENDEES: J Funghi (JF), A. Hoe (AH), R Edwards (RE), M. Benson (MB), R. Redmond, (RR)

J. Park (JP), M. Latch (ML), B. Kelleher (BK), V. Chow (VC), S. Wilson (SW), M. Leong (ML)

B. Ward (BW), L. Zurinaga (LZ), B. Lebovitz (BL),

COPIES TO: Attendees: S. Farhangi (SF) E. Stassevitch (ES), R. Nguyen (RN), A. Wong (AW),

J. Wang (JW), A. Read (AR), D. Kuehn (DK)

File No. M544.1.5.0890

REFERENCE Project No. M544.1, Contract No. 149 Task 1-8.02

Final Design

SUBJECT: Configuration Management Board Meeting # 122 – Rev. No. 0

### RECORD OF MEETING (Italicized text indicates status update of open items)

ITEM #	DISCUSSION								
7- 04/03/13	1252 – R. Edwards presented PCC 012 - Revised Tunnel Alignment for approval of the Reprofile of tunnel to avoid the micropile installed under CN1251. In response to RFI 179 this PCC directs the Contractor to use the revised micropile northbound and southbound profile to avoid conflict with existing micropile. The change is required so that TBM and Tunnel structure is below previously installed micro-piles (see attached). The CMB recommend a request be made to the Contractor to segregate all changes so the information may be included in the documentation regarding the Designers E&O issue. Also the CMB need evidence that the design change has been routed and is signed off by the various disciplines as backup documentation for the files. Notification of the profile change will be submitted to BART and the IRP. Status: 04/17 This item was not discussed at this week's	RE 04/24/13							
8- 04/03/13	meeting.  1252 – Design Services During Construction - M. Benson presented for a later discussion in more detail a summary of CS155-2 (DP2) Task16 Design Services expended for subtask 16.30 and 16.40. Demonstrating actual cost to date of design services expended during the construction phase. The CMB recommend the chart be expanded showing the total budget for the each individual task in column format, also a breakout of the submittal description and detailing the RFI category type reviewed under the headwalls. In addition information regarding hours spent on activities not included in 16.30 and 16.40. The CMB also requested the same level of effort be presented for review for Design Contract CS155-1 (DP1). This item will be brought back to the next CMB meeting. 04/10 M. Benson reported a modification to the DP2 Design Services chart was updated expanding the summary to demonstrate the burnout of the individual task/categories. Further investigation still needs to take place to resolve some issues with a conflicting burn rate between the actual progress payment invoice submitted and documentation submitted by the Designer	MB 04/24/13							





ITEM#	DISCUSSION	ACTION BY DUE DATE
	prior to being forward to the Deputy Program Manager for review. A detail presentation will be given at next week's meeting of DP2 and DP1 cost breakdown by category. Status: 04/17 A expanded summary spreadsheet was presented showing the break out of the categories for work under subtask 16.30 and 16.40 for - work completed to date, remaining work and reasons for overruns to support the reason for request for additional \$10K in funds. The CMB suggested the CM team put the Contractor on notice that any submittal regarding design substitution for review will be at the Contractor's expense. In addition the CMB requested a presentation of the DP1 Task 16 Design Services hours and cost detail summary also be brought to the CMB for review when finalize. This item will be brought back to next week's CMB.	
1- 04/10/13	1300 – Delegation of Authority (\$5M) – R. Redmond introduced for discussion The Executive Director's delegation of authority to approve up to \$5M in construction change orders before it requires SFMTA Board approval. The CMB agreed a structured resolution needs to be implemented justifying the need for an increase to the level of authority limit requiring SFMTA Board approval. R. Redmond will draft a "white paper" document outlining the rationale of why a higher level of authority is needed, and to site examples of what other agencies are doing. A review of the document by the CMB will be done and if agreed will be to submitting to the Program Director for his approval in going forward. Status: 04/17 A "white paper" proposal was presented to the CMB outlining the recommendation to increase the limit of delegation of authority to an aggregated total of \$20M before requiring Board approval. Allowing for each individual contract package a not to exceed allowance of \$5M of its scope of work. The CMB was in agreement with the proposal and requested a calendar item be put together to present to the SFMTA Board for consideration.	
1-	1252 – S. Wilson presented Evacuation of Merit of COR 083 – Ellis Shaft Concrete Obstruction – Contractor encountered a concrete obstruction 10 feet below grade during excavation of the Ellis St. Shaft. Additional work to remove the obstruction was necessary to continue excavation of the shaft. <b>CMB agreed with merit</b> for differing site condition work associated with removal of the concrete obstruction.	
2-	1252 – PCC 10 Relocation of TBM Retrieval Shaft – The Program's Estimator and CM Team provided an estimate analysis of cost, comparing the Contractor's proposal to the Engineer's Estimate for relocation of the Retrieval Shaft to the Pagoda Theater. Highlighting ten (10) major line items in BIH's proposal to perform the work estimated value of \$14M. The Engineer's estimate values the work at \$9M a difference in cost of \$4M (see attached). The Engineer's Estimate and Contractor's Proposal cited above excludes the credit amount for deleted scope of work due to the relocation of the Retrieval Shaft.	
3-	1252 – COR 018 Moscone Headwall End Stops - Issue Resolution Ladder negotiations between SFMTA and BIH – R. Redmond presented for information material demonstrating the elevation ladder discussions which took place regarding the unresolved issue of whether or not the "End Stops" are part of the 1252 contract requirement . The Contractor suggested a joint resolution would be to "come to agreement on merit now and quantum can discussed and agreed upon by both parties in the near future". The CMB suggested another meeting with the BIH's Sr. Manager should take place to agree on a settlement proposal (see attached). This item will be brought back to the CMB for further discussion as progress resolution is made.	
4-	The Program Trend/Change Control Log dated 04/17 was not viewed at this week's meeting. The log is updated to include most recent changes and trends for Contract1252. The log is attached for distribution with these meeting minutes.	



## **ACTION ITEMS**

ITEM #	MTG DATE	MTG ACTION DATE	DESCRIPTION	BIC	DUE DATE	STATUS
1	11/07/12	11/07/12	1300 – 1254 – SF Planning Request - Cost	RE	04/24/13	Open
7	04/03/13	04/03/13	1252 - PCC 12 - Advise BART and IRP	RE	04/24/13	Open
8	04/03/13	04/03/10	1252 - DP2/DP1 - Design Services hours and cost during construction - DP1 Review	МВ	04/24/13	Open

Meeting adjourned at 5:15pm

These meeting minutes have been prepared by B. Ward and reviewed by, R. Edwards and are the preparer's interpretation of discussions that took place. If the reader's interpretation differs, please contact the author in writing within four (4) days of receipt of these minutes.

Signed: [Initials of preparer & reviewer] Date: 4/19/2013 [Date review completed]



# **Meeting Agenda**

Project No. M544.1, Contract No. CS-149
Program/Construction Management
Configuration Management Board (CMB) Meeting No. 122
April 17, 2013
3:00pm – 5:00pm
Central Subway Project Office
821 Howard St. 2<sup>nd</sup> Floor
Main Conference Room

#### Attendees:

Mark Benson	John Haley	Mark Latch	Eric Stassevitch
Vivian Chow	Albert Hoe	Brad Lebovitz	Beverly Ward
Ross Edwards	Brian Kelleher	Roger Nguyen	Sarah Wilson
Shahnam Farhangi	Jim Kelly	Joon Park	Arthur Wong
John Funghi	David Kuehn	Richard Redmond	Luis Zurinaga

- 1. 1252 COR 083 Ellis Shaft Concrete Obstruction Merit
  - PCC 10 Relocation of TBM Retrieval Shaft Update
  - Design Services (DP2/DP1) Hours/Cost during Construction Follow up presentation
- 2. 1300 "White Paper" Delegation of Authority (\$5M) For Review
- 3. Trend/Change Log 04/17/13
- 4. Other Business Issue Resolution Ladder COR-018 Moscone Headwall End Stops

Note: Red indicates new item added after distribution of agenda







# **Meeting Attendance Sheet**

Project No. M544.1, Contract No. 149
Program/Construction Management
Configuration Management Board Meeting No. 122
April 17, 2013
3:00 p.m. – 5:00 p.m.
Central Subway Project Office
821 Howard, 2<sup>nd</sup> Floor
Main Conference Room

Deliver Meeting Attendance Sheet with original signatures/initials to Document Control.

NAME	AFFILIATION	PHONE	E-MAIL (for minutes)	INITIALS
Please enter name		ter initials if your nar ne number and ema	ne is listed below. il address if your name is not listed	below.
Benson, Mark	CSP	(415) 701-4295	Mark.Benson@sfmta.com	mas
Chow, Vivian	SFMTA	(415) 701-5264	Vivian.chow@sfmta.com	NC
Edwards, Ross	CSP	(415) 701-5296	Ross.Edwards@sfmta.com	AR.
Farhangi, Shahnam	SFMTA	(415) 554-0721	Shahnam.Farhangi@sfmta.com	
Funghi, John	SFMTA	(415) 701-4299	John.Funghi@sfmta.com	S
Haley, John	SFMTA		John.Haley@sfmta.com	
Hoe, Albert	SFMTA	(415) 701-4289	Albert.Hoe@sfmta.com	MA
Kelleher, Brian	SFMTA	(415) 701-5289	Kelleher.Brian@sfmta.com	MO
Kelly, Jim	SFMTA		Jim.Kelly@sfmta.com	
Kuehn, David	STV/PMOC	(510) 464-8053	David.kuehn@stvinc.com	
Latch, Mark	CSP	(415) 701-5294	Mark.Latch@sfmta.com	VOL
Lebovitz, Brad	STV/PMOC	(510) 464-8052	Bradley.lebovitz@stvinc.com	3/





NAME	AFFILIATION	PHONE	E-MAIL (for minutes)	INITIALS
Nguyen, Roger	SFMTA	(415) 701-4312	Roger.Nguyen@sfmta.com	
Park, Joon	SFMTA	(415) 701-4742	Joon.Park@sfmta.com	
Redmond, Richard	CSP	(415) 701-4288	Richard.Redmond@sfmta.com	RR
Stassevitch, Eric	CSP	(415) 701-4426	Eric.Stassevitch@sfmta.com	
Ward, Beverly	CSP	(415) 701-5291	Beverly.Ward@sfmta.com	Ro
Wilson, Sarah	CSP	(415) 243-0950	Sarah.Wilson@sfmta.com	StW
Wong, Arthur	SFMTA	(415) 701-4305	Arthur.Wong@sfmta.com	)
Zurinaga, Luis	SFCTA	(415) 716-6956	Luis.zurinaga@sfcta.org	die
LEONG, MUN	SFMTA	(415)531-9476	MUN·LEONG @ SFMT A·COM	Cons.
		J. Park	was in attendance L Not Sign in.	2,
		but did	e not sign in.	
			Ruc	
		<u> </u>		

CMB Meeting – No.122 Page 2 of 2



SFMTA Contract No. 1252

Contractor:

Barnard Impregilo Healy JV (BIH)

## **EVALUATION OF MERIT**

#### **COR 083**

Recommendation: Accept justification of Merit for COR 083, Ellis Shaft Concrete Obstruction. There is no time extension requested or recommended for this work.

Facts: On March 19th, 2013 the Contractor was excavating the Ellis Street Shaft when they encountered a concrete obstruction at approximately 10 feet below grade. See attached sketch FS 1252 - 041 for plan location. The Contractor spent 4 hours removing the obstruction with a mini-excavator and breaker which was witnessed and tracked by the SFTMA inspectors.

Justification: The concrete obstruction constitutes a differing and unforeseen site condition as it was not shown in the Contract Documents. The additional work to remove the obstruction was necessary to continue excavation of the Ellis Street Shaft.

RE has evaluated the conditions outlined in Article 3.04 and found that: conditions differ materially and conditions caused the scope of work to increase.

Change Type: (2) Unforeseen Condition

Sarah Wilson

Resident Engineer

Configuration Management Board

Approval







CP/PCC COR	#83	Contract No. 1252

## **DSC FINDING OF FACT**

<u>DIFFERING SITE CONDITIONS</u> - REFERENCE APPROPRIATE SPECIFICATIONS IN CONTRACT GENERAL PROVISIONS AND SPECIAL PROVISIONS

1.	REPORTED DATE OF OCCURE	RENCE	3/19/2013					
2.	DATE OF CONTRACTOR'S WE	RITTEN NOTICE	3/19/2013					
3.	TYPE OF WORK CONTRACTO	R WAS PERFORMING	Ellis shaft excavation					
4.	NATURE OF OBSTRUCTION							
	Buried abandoned concrete vau	lt / foundation						
5.	LOCATION OF OBSTRUCTION	Ellis/Stockton. Appro:	ximately 10' below grade within grout	shaft.				
6.	METHOD USED TO OVERCOM	E OBSTRUCTION						
	Concrete object was removed us	sing a mini excavator with	breaker attachment					
7.	SIGNIFICANT IMPACT ON CON	STRUCTION PROGRES	S, IF ANY.(SUPPLIED BY THE CONT	TRACTOR)				
	COST ~\$4,000.00 as stated in COR #83 dated 3/29/13							
			a TIA will not be submitted					
8.	CONCLUSION, WHETHER-OR- (BASED ON CONTRACT DOCL		N BE CLASSIFIED AS A DIFFERING	SITE CONDITION				
	Confirmed differing site condition	)						
9.	ATTACHMENTS:							
	SPECIFICATION	General Provisions Artic	cle 3.04 Unforeseen or Differing Cond	itions				
	DRAWINGS	None						
	INSPECTION RPT	Daily Inspection Report	dated 3/19/2013 by William Hawk					
	OTHER	Photos attached						
			•					
repar	ed							
y:	Aa.	eay Wilson		4/12/13				
		-	esident Engineer	Date				

Sarah Wilson, Resident Engineer SFMTA Representative



- written permission at least three (3) Working Days in advance, or such other period as may be specified, except in the event of an emergency prior to performing such Work, so that the City may make the necessary arrangement for testing and inspection.
- G. If Contractor receives a written notice from the City that a Clarification is forthcoming from the City, all Work performed before the receipt of the Clarification shall be coordinated with the City to minimize the effect of the Clarification on Work in progress. All affected Work performed after receipt of the City's written notice but before receipt of the Clarification and not so coordinated shall be at Contractor's risk.
- H. During all disputes or disagreements with the City, Contractor shall carry on the Work and adhere to the progress schedule as by the Contract Documents. Contractor shall not delay or postpone performance of any portion of the Work pending resolution of any disputes or disagreements, except as the City and Contractor may otherwise agree in writing.

## 3.04 UNFORESEEN OR DIFFERING CONDITIONS

- A. Under section 7104 of the California Public Contract Code, if any of the following conditions are encountered at the Site, Contractor shall promptly, and before such conditions are disturbed, notify the City in writing.
  - Material that Contractor believes may be hazardous waste, as defined in section 25117 of the Health and Safety Code, that is required to be removed to a Class I, Class II, or Class III disposal Site in accordance with provisions of existing Law.
  - Subsurface or latent physical conditions at the Site differing materially from those indicated by information about the Site made available to Bidders prior to the deadline for submitting bids.
  - Unknown physical conditions at the Site of any unusual nature, different materially from those ordinarily encountered and generally recognized as inherent in the work of the character provided for in the Contract Documents.
- B. Contractor's written notice shall inform the City as to how such conditions affect its Work and recommend methods to overcome such conditions.
- C. Differing Conditions shall not include:
  - All that is indicated in or may reasonably interpreted from the Contract Documents or Reference Documents;
  - 2. All that could be seen on Site by diligent observation;
  - Conditions that are materially similar or characteristically the same as those indicated or described in the Contract Documents or Reference Documents.
  - Conditions where the location of a building component is in the proximity where indicated in or reasonably interpreted from the Contract Documents or Reference Documents.
- D. The City will promptly investigate the conditions reported in Contractor's written notice, and will issue a written report of findings to Contractor.
- E. Only if the City determines, in its sole discretion, that the conditions reported do materially so differ, or do involve hazardous waste, or do cause a decrease or increase in Contractor's scope of Work, will the City issue a Change Order as provided in Article

- 6 of these General Provisions, and/or a time extension as provided in Article 7 of these General Provisions, as appropriate.
- F. Should Contractor disagree with the City's determination, Contractor shall submit a written Notice of Potential Claim to the City as provided in Section 13.01 of these General Provisions. In the event of such disagreement, Contractor shall proceed with all Work to be performed under the Contract Documents, and shall not be excused from any scheduled completion date provided for by the Contract Documents.
- G. Contractor's shall remain responsible for the safety, security, and protection of the Site and affected area of the Work for the duration of the City's investigation of potential Differing Conditions.

#### 3.05 CONTRACTOR'S ORGANIZATION

- A. Contractor's Legal Address. The address given in the Contractor's bid or Proposal is hereby designated as the legal address of the Contractor, but such address may be changed at any time by notice in writing, delivered to SFMTA. The delivering to such legal address or the depositing in any post office or post office box regularly maintained by the United States Postal Service, in a postpaid wrapper, directed to the Contractor at such address, of any drawing, notice, letter or other communication, shall be deemed legal and sufficient service thereof upon the Contractor.
- B. Contractor's Office At the Work. The Contractor shall maintain an office at the site of the Work, which office shall be headquarters of a representative authorized to receive instructions, drawings or other communications from the Engineer. Such instructions, drawings, or other communications given to such representative or delivered at their office in their absence shall be deemed to have been given to the Contractor.
- C. Contractor's Superintendents or Foremen.
  - Contractor shall at all times be represented at the Site by one or more Contractor superintendents or foremen who are competent and whom Contractor has been authorized in writing to make decisions and receive and carry out any instructions from the City. Contractor will be held responsible for the faithful compliance with such instructions.
  - 2. Prior to the issuance of Notice to Proceed, Contractor shall inform the City in writing of the names, addresses and telephone numbers of its personnel whom it has authorized to act as its representatives at the Site and who are to be contacted in case of emergencies at the Site during non-working hours, including Saturdays, Sundays and holidays. If Contractor is a joint venture, it shall designate only one such representative.
  - 3. The City reserves the right to reject Contractor's project manager, general construction superintendents, project coordinators, foremen or other Key Personnel at any time for cause as provided in subsection 3.05.B. The City shall be given written notice of, and shall have the right to approve, replacement of Contractor's project manager, superintendents and foremen, and other such Key Personnel.

#### 3.06 LABOR, MATERIALS AND EQUIPMENT

A. The Contractor shall at all times keep on the premises a sufficient amount of materials and employ a sufficient number of workers to prosecute the Work at the rate



## DAILY REPORT

Contract Day 00417

· Ciantificationing paratopolise. Commissioning Camminguinities:

PROJECT: 1252 TBM, Launch Box and Tunnel

**DAY:** Tuesday

**DATE:** 3/19/2013

INSPECTOR: Bill Hawk

SHIFT: Day

TIME: 0545 to 1415

TEMPERATURE: 60 - 70

PRECIPITATION: None

SKY: Clear

WIND: 00-10

**CONTRACTOR: BIH** 

FIGNACIMS 4350 PMS & Dire Dalley Insult to Granting (North, Columns 1976)

Location: UMS Headwall North Subcontractor: CJA - NCC

Feature: Excavation QA/QC Iuspector: BIH CJN drilled and jet grouted column #N7 today. Hauled off jet grout spoils today.

HIDE CIMS REPORTERS STORWS of those Pringry Science (Spinish)

Location: UMS Headwall South

Subcontractor: CJA - NCC

Feature: Walls

QA/QC Inspector: BIH

Contractor finished placing lean concrete in SRV-A today. First truck arrived on site at 12:30 and contractor started placing. Checked

water in basement at Crate & Barrel today and it was dry.

BUINGOME 1090 EINS Shelis, Exceptage Sheliz Instellating.

Location: Ellis Street Comp Grouting Subcontractor: CJA - NCC

Feature: Excavation QA/QC Inspector:

CJN started excavating for the second lift of shotcrete in the Ellis shaft today. While excavating for this lift the contractor found a

concrete beam on the West side of the shaft. Took 4 hours to demo.

ÄRIKAIS 2010 Alb A Merkor Comprehens Philipi Cillings

Location: 4th and Market Comp Grouting

Feature: Excavation

Subcontractor:

QA/QC Inspector:

BIH continue to pothole utilities for Comp grout on 4th & Market.

Rejords

North Beach retrieval shaft construction site;

No contractor onsite, all work put on hold per SFMTA.

All work to the best of my knowledge was performed per specs and drawings.

This report is generated by SFMTA inspector Bill Hawk for the hours of 5:45 A.M. to 2:15 P.M. For work at other locations or witnessed by others see reports by Audie Reynolds, or G. Fernandez Today is contract work day #417.

322773 CA 352819-2-3	HAMBINU TMHO	Smirge		Description Remarks
	CRANE	CJ-NC-JV	UMS-HDWL	885 Leibherr
	DRILL	CJ-NC-JV	ELLIS-GR	Jet grout
2	TRUCK	CJ-NC-JV	UMS-HDWL	P/U
4	VACTOR	CJ-NC-JV	ELLIS-GR	Truck
	MINI-EXCAVATOR	CJ-NC-JV	UMS-HDWL	
	GROUT PLANT	CJ-NC-JV	UMS-HDWL	







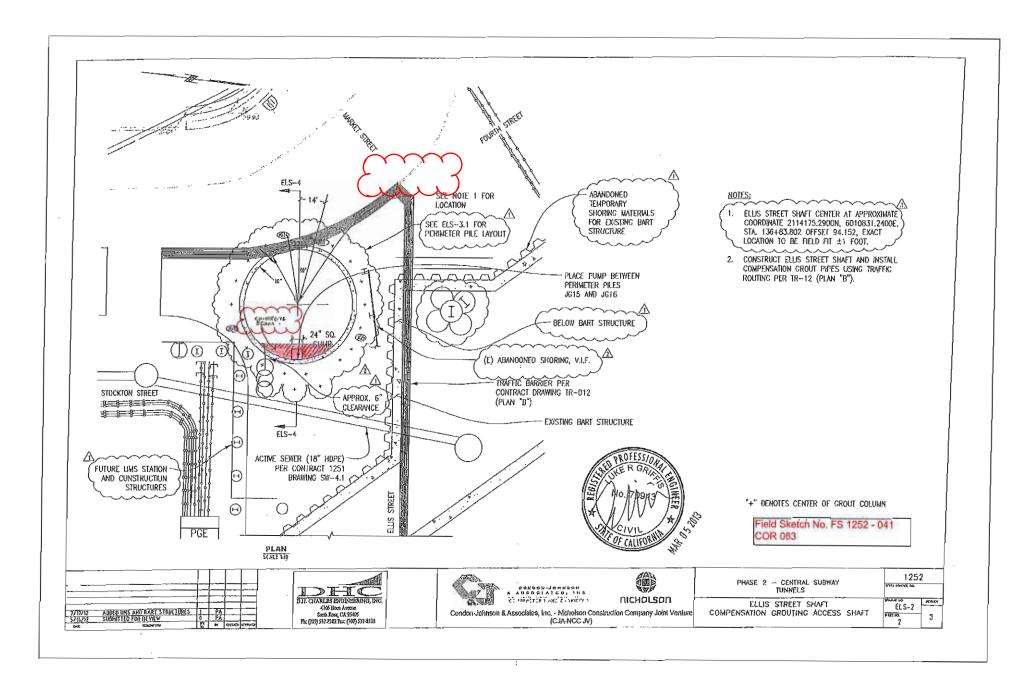
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FORKLIFT	CJ-NO	C <b>-JV</b>	UMS-I	-IDWL			
BACKHOE	CJ-NO	C <b>-JV</b>	ELLIS	-GR			
MINI-EXCAVA	TOR CJ-NO	C <b>-JV</b>	ELLIS	-GR			
रकारमञ्जलकार के १८४५ इस्टाइक्टाइट	or. Songe	Sujiv	Tooms	gnack: 7/	drivas.	Montevire	Regularites
Flagger	вінју			2		ELLIS-GR	
Jet grout	CJ-NC-JV	1		5		UMS-HDWL	
Secant Piles	CJ-NC-JV	1		6		UMS-HDWL	Crew waiting for sidewalk pedstrian drawing
Superintendent	BIHJV	I				ELLIS-GR	This superintendent also oversees UMS headwall subcontractors.
shaft work	CJ-NC-JV			2		ELLIS-GR	
	Totals	: 3	0	15	0		











To: Richard Redmond and Dan Schall

From: Sarah Wilson (Resident Engineer for SFMTA) and Ben Campbell (PM for BIH)

**Date:** April 17, 2013

Reference: Project No. M544.1, Contract No. CN 1252 Central Subway Tunneling

Subject: CS CN 1252 PCC 010 BIH and SFMTA Estimate Analysis

The following memorandum is to highlight the difference between the SFMTA's Engineer's estimate and BIH's estimate for PCC 010 – Relocation of the retrieval shaft to Pagoda Theater.

This comparison does not consider the credit amounts of the work.

In general, BIH's estimate for the work was \$14,114,107. The SFMTA's estimate was \$9,492,614. The difference in cost was \$4,621,493. The major line items for this cost difference are the following:

	Description	BIH	SFMTA	Delta
1	Markups	\$2,704,353	\$1,415,742	\$1,288,611
2	Additional Indirects & Retrieval Shaft Support	\$698,656	\$ 342,622	\$ 356,034
3	Instrumentation – Monitoring and Reporting	\$157,360	\$53,767	\$103,593
4	Compensation Grouting and Permeation Grouting	\$1,137,899	\$161,464	\$976,435
5	Tunnel Excavation and Surface Support	\$1,756,617	\$1,230,641	\$525,976
6	Tunnel Interventions, Saturday Maintenance, and Technical Assistance	\$484,828	\$22,870	\$461,958
7	Tunnel - Remove Rail, Utilities, and Clean Tunnel	\$152,583.04	\$54,200.34	\$98,383
8	Retrieval Shaft – Strut and Waler Installation and Shaft Excavation	\$777,595	\$551,636	\$225,958
9	Ground Treatment Alt – Backfill Material	\$144,400	\$55,746	\$88,654
10	Roof for Shaft	\$141,017	\$78,403	\$62,614
	Total Delta	\$8,155,308	\$3,967,090	\$4,188,218



The following are the details regarding the difference in these 10 items:

#### Item 1 – Markup

Contractor applies 23% markup on subcontractor markups; EE applies 5% OH&P / 1.68% B&I for prime contractor on top of 15% OH&P / 2.25% B&I for subcontractor

Contractor also applies 23% markup to 'Additional Indirects & General Conditions' for \$131,149.56; EE does not apply markup to these costs

### <u>Item 2 – Additional Indirects & Retrieval Shaft Support</u>

There are two components to that make up the \$356,034 cost difference between the EE estimate and BIH's estimate:

- 1. The additional indirects excluding markups; BIH estimate was \$568,850 and the EE estimate was \$342,622, (Delta = \$226,228) and
- The retrieval shaft support, BIH estimate was \$129,726, and the EE estimate was 0.

BIH additional indirects amounted to \$568,850 where EE estimate was \$342,622. The main difference was a labor discrepancy of \$86,660 for job staff where BIH included 33 office staff per day where the EE estimated provided for 26 office staff per day. There are also discrepancies of labor rates among the office staff. The other differences are the yard cost difference of \$24,917 and the small tools cost of \$31,543. The total difference for the additional indirects before markups was \$226,228.

Engineer's estimate assumes secant wall operations handled by subcontractor and did not allocated any monies in the EE estimate (Engineer's estimate assumes this cost is covered within the 15% subcontractor markup for OH&P). BIH provided \$129,726 in their estimate for retrieval shaft support and secant pile support. This cost covers the cost of their superintendent, field engineer, and work truck.

### Item 3 – Instrumentation, Monitoring and Reporting

Both estimates used 15 months for monitoring. The main difference is the cost per month. BIH used \$10,490/month; EE \$3,585/month and the labor rates (BIH used \$137.48/hour vs. EE used prevailing wage of \$69.28/hour). This labor rate difference accounts for \$75,964.34 of the estimate discrepancy.

The remaining cost difference of \$27,628 is the total months of daily readings and monthly readings. BIH's estimate assumes 15 months of total monitoring and reporting. The SFMTA believes there are overlap in monitoring and reporting not captured in BIH's estimate.

## <u>Item 4 – Compensation Grouting and Permeation Grouting</u>

BIH included permeation grouting in their estimate for \$408,000. The EE did not provide for this item in their estimate.



The quantity used for compensation grouting and grout pipes installation for both estimates are the same. BIH's compensation grouting estimate was \$729,899. BIH used a unit cost of \$480/LF for grout tubes and \$75/CF to grout. There was no additional detail provided to justify this value. The EE estimate was \$161,464 based on the contract unit price of \$95/LF to install the grout tubes and \$5/CF to grout.

### Item 5 – Tunnel Excavation and Surface Support

BIH's estimate for surface support was \$598,310 compared to the EE estimate of \$329,637. There are 3 major differences in the \$268,673 difference in cost:

- 1. BIH's continuous conveyor rental rate was \$1,525.68/hr and surface conveyor rate of \$222.90/hr compared to the EE conveyor rental rate of \$245.16/hr for total difference of \$137,384.
- 2. For the surface support crew BIH used different labor rates than the engineer's estimate. The surface support for BIH consists of 2,250 manhours for \$194,474 compared to the EE estimate of 2,124 man hours for \$145,342. The difference is \$49,132
- 3. BIH's equipment cost is different from the EE estimate. BIH has \$226,403 compared to the EE estimate of \$144,246. The difference is \$82,157. Main equipment differences are associated with rental rates BIH uses for Cat 345 Excavator, Grout Plant & Silos and Electrical Substation.

BIH's estimate for tunnel excavation was \$1,158,307 compared to the EE estimate of \$901,003 for a difference of \$257,304. The 2 main differences difference in the cost are the following:

- 1. BIH assumed a production rate of 30.5 LF/day. The EE estimate was 34.1 LF/day. The production rate difference accounts for \$120,397 cost difference.
- 2. For each tunnel drive, BIH also assumed 15.5 men/shift where the EE assumed 12 men/shift. The men usage accounts for approximately \$90,000 in cost difference.

### <u>Item 6 – Tunnel Interventions, Saturday Maintenance & Technical Assistance</u>

- 1. BIH includes costs for one intervention for each tunnel drive \$ 205,470 vs. engineer's estimate has no interventions in final 275 LF of each tunnel drive.
- 2. BIH includes all crews (surface and headings) for a Saturday maintenance for each tunnel at \$100,698. Engineer's estimate assumes this cost is built into the tunnel production rate.
- 3. Within Technical Assistance BIH includes costs for engineering stamps \$16,425, grout consultant fees \$14,235 and a design growth provision \$120,000. The engineer's estimate does not consider these additional costs within their estimate. Both the contractor and the engineer's estimate include costs for Robbins Technical Assistance but the amount of hours vary for a \$5,130 difference.

### Item 7 – Remove Rail, Utilities, and Clean Tunnel

BIH's estimate included 20 hrs per tunnel for crew and equipment as compared to the EE estimate of 15 hrs per tunnel for crew and equipment for difference of \$16,579. BIH also included 40 hours for Surface Support (service crews) for tunnel cleanup compared to the EE



estimate of 15 hrs for Surface Support during tunnel cleanup for difference of \$53,917; Crew size and labor rate difference between BIH and EE's estimate was \$27,886.

These three items combined comes to a total difference of \$98,383.

#### Item 8 – Retrieval Shaft – Strut and Waler Installation and Shaft Excavation

There are 2 major differences in cost:

- Shaft Excavation BIH has \$213,410 in shaft excavation compared to the EE of \$164,334. Both estimates used the same hours for equipment labor. The difference is BIH used a blended rate for labor vs the EE using the prevailing wage rates and BIH had one additional crew member for 300 more hours than the engineer's estimate. The labor difference is \$30,000. The contractor's estimate also included miscellaneous STS for \$19,820.
- 2. The Temp Struts and Walers BIH's estimate to fabricate and install the strut and walers is \$564,185 compared to EE of \$387,302 for a difference of \$176,883. The following are the differences between the costs:
  - a. Fabricate Struts & Walers BIH had \$297,741 compared to EE \$256,194.
  - b. Equipment BIH \$101,601 vs EE \$34,435 (BIH uses Diesel Welder Rental @ \$246.37/day for 132 DAYS vs. EE of Welder @ \$11.87/hr AT 240 HRS). BIH also included 190 hrs for 50 ton crane and operator for fabricate struts & walers for \$41,467.
  - c. Labor BIH used 1920 manhours for \$206,310 compared to the EE using 840 manhours for \$96,673.

### Item 9 – Ground Treatment Alt – Backfill Material

BIH includes 5,000 tons of crushed rock @ 28.88/ton. The EE uses 2,520 CY of crushed rock @ \$20.34/cy. The material cost difference was \$88,654. The difference in the quantity is the amount of backfill material above the tunneling lining. BIH's estimated 10' of cover. The EE used 5' of cover.

### Item 10 - Roof for Shaft

There are 2 differences in the cost:

- 1. BIH assumed 15 tons vs EE of 9 tons for steel roof frame. This quantity difference accounts for \$19,912 in cost.
- 2. BIH assumed using Precast Panels for the roof deck, compared to using Lightweight Concrete on Metal Deck. The cost difference was \$42,857.

# **DETAILED COMPARISON SHEET - PCC010**

			TOTALS						
	Contractor	EE		Delta	Contractor	EE	Delta	Explanation	Detailed Explanation
Design	\$ 750,000.00	\$	351,125.00	\$ 398,875.	00			No detail provided	
Instrumentation & Monitoring	\$ 520,202.67	\$	351,437.00	\$ 168,765.	67				
									Both 15 months - Contractor \$10,490/month; EE \$3,585/month; Contractor has cos for Daily and Monthly INC & OSP readings costs as well as Reporting and Maintenance costs per month; The difference here is the contractor's labor rates
					\$ 157,360.2			Monitoring/Maintenance/Reporting	\$137.48 vs. prevailing wage \$69.28;
					\$ 97,273.6			7 Prime Contactor Markups	
					\$ 10,998.00	\$ 21,111.		0) Mobilization or Meetings & Submittals	
							\$ 168,488.9	2 TOTAL	
Instrumentation & Monitoring - Allowance	\$ 100,904.28	Ş	66,671.75	\$ 34,232.			20 4 44644		
					\$ 18,868.2			8 Prime Contractor Markups	
					\$ 29,981.00			0 AMTS - 1 additional	Difference in contract of the contract (427, 40 to FF contribution of CO 20
					\$ 30,547.00	\$ 18,220.	00 \$ 12,327.0 \$ <b>36,749.2</b>	0 Tiltmeter - 9 each	Difference in contractor's labor rates \$137.48 vs EE prevailing wage \$69.28
							\$ 36,749.2	8 IOIAL	
Demolition of Existing Structure	\$ 350,000.00	ć	322,384.00	\$ 27,616.	20				
Demontion of Existing Structure	3 330,000.00	۲	322,384.00	<i>\$</i> 27,010.	\$ 63,862.80	) \$ 20,424.	00 \$ 43.438.8	0 Prime Contractor Markups	
		1			\$ 05,802.80	\$ 16,632.		0) Backfill w/ Imported Fill (assume not all Crushed concrete from Site)	
					7	7 10,032.	\$ 26,806.8		
							<b>V</b> 20,000.0		
Site Work	\$ 895,000.00	Ś	344,931.70	\$ 550,068.	30	+			
	φ σσο,σσοισσ	1	,	7 555,555	\$ 167,585.4	3 \$ 70,175.	75 \$ 97.409.7	3 Prime Contactor & Subcontractor Markups	
					\$ 408,200.00			O Chemical/Permeation Grouting	
					,,	1	,,		
									Crew Differential for Site Grading, Temp Utilities & Site Setup; Hours differential for Site Grading, Temp Utilities & Site Setup 100 hrs vs 56 hrs per person; Labor Rate
					\$ 57,694.50	\$ 33,516.	66 \$ 24,177.8	4 LABOR - Site Grading (004A) & Site Setup (004B2)	Differential - 10 hrs blended time & not prevailing wage vs 8 hrs prevailing wage
					\$ 23,807.49	9 \$ 18,764.	31 \$ 5,042.6	8 MATERIAL - Site Grading (004A) - Crushed Stone & Geotextile Fabric	Contractor has 13,000 SY of fabric and 564 tons of stone; EE has 11,900 SF of fabric and 220 tons of stone
					\$ 24,069.50	\$ 16,095.	12 \$ 7,974.3	8 EQUIPMENT - Site Grading (004A) & Site Setup (004B2)	Equipment Differential due to equipment rates and hour differential;
					\$ 25,185.00	\$ 18,799.	99 \$ 6,385.0	1   Fencing - Chain Link Fence & Silt Fence	Contractors material, labor and equipment not believed to be broken out; Silt Fenc costs is higher than EE & Chain link fence cost higher than EE
							\$ 549,189.6	4 TOTAL	
Construction of Retrieval Shaft	\$ 4,035,000.00	\$	3,292,784.08	\$ 742,215.					
					\$ 1,011,011.19	9 \$ 677,527.	06 \$ 333,484.1	3 Prime Contactor & Subcontractor Markups	
					\$ 47,725.60	) \$ -	\$ 47,725.6	0 Assist Secant Wall Sucontractor - Retrieval shaft	Engineer's estimate assumes secant wall operations handled by subcontractor
									Total Hours are the same for equipment and labor 240hrs; Different labor rates used; Contractor uses blended rate; EE uses prevailing wage rates - Contractor assumes 1 additional laborer total hours 1800 vs 1500 hrs in engineers estimate -
				1					Labor difference \$30,000; Contractor includes "Misc Hand Tools Not Covered in Mi
				1	\$ 213.409.50	\$ 164.334.	35 \$ 49,075.1	5 Excavation	ST&S" for \$19,819.50
		1			ψ 210,100101	φ 10 1,00 11	γ (5)073.1		Fabricate Struts & Walers Contractor \$297,741.67 vs EE \$256,194.34; Equipment -
									Contractor \$60,134.10 vs EE \$34,435.20 (Contractor uses Diesel Welder Rental @ \$246.37/day for 132 DAYS vs. EE of Welder @ \$11.87/hr AT 240 HRS); Labor
									Contractor \$206,309.70 vs EE \$96,672.60 (Contractor has double man hours 1920 h vs. EE 840 hrs); Contractor includes 190 hrs for 50 ton crane and operator for
				1	\$ 564,185.4	\$ 387,302.	14 \$ 176,883.3	Temporary Struts & Walers	fabricate struts & walers \$41,467.50
									Material Cost per CY 2500PSI concrete - Contractor \$142.35 vs EE \$108/cy - \$5,780.0 difference; Contractor includes "Misc Hand Tools Not Covered in MH ST&S" for
									\$4,380; Contractor includes 50 ton crane and operator \$4,365; Contractor uses 2
					\$ 34,828.10	)   \$ 10,854.	00 \$ 23,974.1	0  Mud Slab	days vs. EE 1 day

			1				Matterial Contract CV (2000C) and analysis of 4.47 (22) as EE (4.20 for
							Material Cost per CY 6000PSI concrete - Contractor \$147.825 vs EE \$128/cy - \$3,522.63 difference; Concrete Pump Truck Contractor \$215/hr vs EE \$95.81/hr from
			ć 101 000 00	¢ 171 F0C 00	10 202 00	Navort Clab	•
			\$ 181,888.00	\$ 1/1,596.00	\$ 10,292.00	J Invert Stab	Caltrans; Subcontractor includes Superintendents, pickup truck and engineer for Retrieval
			¢ 02.000.00	<u> </u>	¢ 02.000.00	O Casant Bila Malla Court for Batrianal	
			\$ 82,080.00	\$ -	\$ 82,080.00	O Secant Pile Walls - Supt for Retrieval	Shaft - Engineer's estimate assumes included in markups
			å 26.62 <b>7.</b> 40	ć 47.044.70	0 705 40	NO NO NO	Engineer's estimate does not include 50 ton crane and operator \$4,365; Remaining
			\$ 26,637.10			K Rail Barrier	difference Contractor uses 2 - 10 hr days, EE uses 2 - 8 hr days
			\$ 33,564.00	\$ 31,690.75		5 Traffic Control	
					\$ 734,182.96	5   TUTAL	
Ground Treatment Alternative	\$ 746,000.00 \$ 522,760	76 \$ 223,239.24					
Ground Treatment Arternative	3 740,000.00 3 322,700	223,239.24	\$ 139,013.75	\$ 75,696.89	\$ 62.216.86	5 Prime Contactor & Subcontractor Markups	
			3 139,013.73	\$ 75,090.83	7 03,310.80	Frime Contactor & Subcontractor Markups	Contractor includes 5,000 tons of crushed rock @ 28.88/ton; EE uses 2,520 CY of
			\$ 144,400.00	\$ 55,746.19	, ¢ 00 6E2 01	1 Backfill Material Only	crushed rock @ \$20.34/cy
	+		3 144,400.00	\$ 55,740.13	7 00,033.01	Backilli Material Offiy	Material Cost for Temporary Steel difference \$20,200; Contractor uses 2-10hr days,
			\$ 85,514.20	\$ 72,892.05	12 622 15	5 Temporary Bulkhead	EE uses 3-8 hr days
	+		\$ 65,514.20	\$ 72,692.03	3 12,022.13	Temporary Bulkneau	Contractor assumes 4-10hr days; EE uses 5-8hr days therefore labor rate
							discrepency; Contractor includes Underground Mechanic/Welder - EE does not
			\$ 71,859.65	¢ (2.222.00	0.637.65	- Craut Interfere	include in crew to grout interface
			+ · · · · · · · · · · · · · · · · · · ·	<u> </u>		Grout Interface  Mancage & 32m Telebelt	
			\$ 32,850.00		\$ 32,850.00	J Mancage & 32m Telebelt	Contractor includes; EE does not
			¢ 07 500 00	¢ 92 929 00	14.663.00	N Haul Away	Contractor assumes 5,000 tons of crushed stone to haul away; EE uses 3,906.31 tons
			\$ 97,500.00	\$ 82,838.00	\$ 14,662.00	·	Contractor assumes 5,000 tons of crushed stone to had away; EE uses 3,906.31 tons
Town of Foton day	¢ 4 607 000 00 ¢ 2 200 074	29 \$ 1,297,025.71			\$ 221,732.47	/ IUIAL	
Tunnel Extension	\$ 4,607,000.00 \$ 3,309,974	.29 \$ 1,297,025.71					Difference in Driver Control to Manhous FF 450/OHOD / 4 C00/ DOLLAR Control to
			¢ 050,000,50	ć 470 204 20		A Drive a Contract of Mandaus	Difference in Prime Contractor Markup EE 15%OH&P / 1.68% B&I vs. Contractor
			\$ 859,068.59	\$ 4/9,291.25	3 3/9,///.34	Prime Contractor Markup	23%
							Contractor includes conveyor "rental rate" at \$1,525.68/hr vs EE of \$245.16/hr for
							total difference of \$137,383.86; Contractor uses different labor rates than engineer'
							estimate - Contractor has 2,250 man hours for \$194,473.8 vs EE of 2,124 man hours
				4 000 00= 0			for \$145,342; Contractors equipment costs differ from engineer's estimate;
			\$ 598,309.96	\$ 329,637.64	\$ 268,672.32	2 Surface Support	Contractor has \$226,403.55 vs EE of \$144,246.04
							Contractor assume unit cost of \$0.1643 per KWH; EE uses \$0.21/KWH plus
			\$ 114,975.00	\$ 161,385.00	\$ (46,410.00	D) Power Consumption	\$0.018375 tax per KWH
							Production rate for the contractor is slower than the engineer's estimate. Engineer's
							estimate production rate is 34.1 LF/DAY vs Contractor's estimate of 30.55 LF/DAY.
							Also, engineer's estimate production rate takes into consideration potential
							interventions and maintanence. Production rate difference accounts for
							\$120,397.60; Contractor estimates 15.5 men per shift vs EE uses 12 men per shift fo
			\$ 1,158,307.00	\$ 901,002.92	\$ 257,304.08	Tunnel Excavation	approximately \$90,000 difference
							Contractors estimate includes 20 hrs per tunnel for crew and equipment vs EE
							estimate of 15 hrs per tunnel for crew and equipment for difference of \$16,579;
							Contractor includes 40 hours for Surface Support (service crews) for tunnel cleanup
							vs EE of 15 hrs for Surface Support during tunnel cleanup for difference of
							\$53,916.90; Crew size and labor rate difference between contractor and engineer's
			\$ 152,583.04	\$ 54,200.34	\$ 98,382.70	Remove rail / utilities and clean tunnel; Service Crews During Tunnel Cleanup	estimate for total differenc of \$27,886
							The contractor uses \$1,481.07/LF for Precast segments plus \$75.09/LF for shipping;
				1	6 /47 517 70	Precast Segments & Precast Segment Repair	EE uses \$1,579.05/LF for precast segments and shipping
			\$ 827,276.00	\$ 874,793.70	/  \ \(\4/,\JI/./\)		
			\$ 827,276.00	\$ 874,793.70	7 3 (47,317.70		The contractor includes all crews (both headings and surface support) at a Saturday
			\$ 827,276.00	\$ 874,793.70	(47,517.70		
							The contractor includes all crews (both headings and surface support) at a Saturday rate during this maintenance. The engineer's estimate acccounts for the cost
			\$ 827,276.00 \$ 100,698.08			3 Saturday Maintenance	The contractor includes all crews (both headings and surface support) at a Saturday rate during this maintenance. The engineer's estimate accounts for the cost maintenance within the production rate for the Tunnel Drive.
				\$ -		3 Saturday Maintenance	The contractor includes all crews (both headings and surface support) at a Saturday rate during this maintenance. The engineer's estimate acccounts for the cost

				\$ 210,824.90	\$ 148,406.07	\$ 62,418.83	3 Construct Permanent Bulkheads	Contractor uses 190 CY of 4000 PSI concrete @ \$158.775/cy vs EE of 146 CY of 6000 PSI concrete @ \$128/cy also rebar quantities differ, contractor uses 28,900 lbs vs EE of 23,846 lbs total difference \$16,998.25; Equipment rate differences for concrete pump truck and slick line - For pump truck contractor uses \$268.275/hr vs EE of \$95.81/hr for slick line contractor uses \$54.75/l.f. vs EE of \$2.38/l.f. for total difference of \$13,923.50; Contractor includes a 35k lb forklift and a 50 ton crane vs EE only includes 50 ton crane for a difference of \$11,515.20; Contractor assumes 12 - 10 hour days (1,080 hrs) vs EE of 11 -10 hr days (990 hrs) combined with labor rate differences the total labor difference is \$17,857.90  Contractor includes Engineering stamp costs \$16,425; Design Growth Provision \$120,000; Grout Consultant Fees \$14,235; Robbins Technical Assistance \$28,000;
								The Engineer's Estimate includes only the Robbins Technical Assistance for 163 hrs.
				\$ 178,660.00	\$ 22,870.40	\$ 155,789.60	Technical Assistance & Professional Tunnel Services	vs Contractor's 200 hrs.
						\$ 1,297,023.38	TOTAL	
Cover & Site Restoration	\$ 248,000.00 \$	152,703.38	\$ 95,296.62					
				\$ 46,418.00	\$ 31,067.23	\$ 15,350.77	Prime Contactor & Subcontractor Markups	
				\$ 141,017.00	\$ 78,402.51	\$ 62,614.49	Roof for Shaft	Quantity Differential - Contractor assumed 15 tons vs EE of 9 tons for steel roof frame \$19,912.50 difference; Material Difference for Roof Deck - Precast Panels vs.  Lightweight Concrete on Metal Deck \$42,857.05 difference  Contractor includes slit fence (already included in sitework) \$2,463.75; Material
				A 27.442.20	Å 25.070.22	¢ 44.272.00		difference - Contractor assumes 12,000 SY geotextile fabric & 500 Tons of crushed stone vs EE of 10,966 SF and 200 tons for total difference of \$4,334.26; Contractor
				<u> </u>	\$ 25,870.32	1	Restore Sidewalks	assumes 2 - 10hr days vs EE of 2-8hr days \$4,400  Contractor assumes 5-10hr days vs EE of 3-8hr days
				\$ 23,421.80	\$ 17,363.32	\$ 6,058.48		Contractor assumes 5-10ff days vs EE of 3-8ff days
						3 33,230.02	ITOTAL	
Additional Indirect & General Conditions	\$ 700,000.00 \$	342,622.72	\$ 357,377.28					
				\$ 131,149.56	\$ -	\$ 131,149.56	Prime Contactor & Subcontractor Markups	
				\$ 58,114.00	\$ 33,197.00	\$ 24,917.00	) Yard	Contractors uses 10-10hr days; EE uses 10-8hr days; Equipment rate discrepency for connex boxes; Contractor includes yard rental and employee parking vs EE assumes MTA is paying for current yard and parking
				\$ 14,235.00		\$ 13,034.00		Contractor uses office expense of \$7,117.5 per week vs. EE of \$2,402.36/month from per day cost submitted in COR08
				\$ 260,092.76	\$ 183,323.00	¢ 96 660 76	Lob Stoff	Contractor includes 33 office staff per day vs. EE of 26; Also labor rate discrepencies
				\$ 209,983.70	\$ 165,525.00	\$ 80,000.70	1 JOD Stail	Contractor includes 33 office starr per day vs. EE of 26, Also rabor rate discrepencies  Contractor includes multiplier per 17,000 man hours; EE uses average rate submitted in COR08 (and backed up by invoices) for per day cost for first aid and
				\$ 16,534.50			Safety Equipment & Supplies	safety supplies
				\$ 1,752.00	\$ 1,095.00	\$ 657.00	Meals & Lodging	Contractor includes 16 each for meals/car/lodging vs EE of 10 days
				\$ 2,179.05	\$ 774.00	\$ 1,405.05	Travel	Contractor uses 2 months for apartment utilties vs. EE of 2 weeks; Contractor includes \$1,084 for airline tickets for the additional two week vs EE of \$500
								Contractor includes hook up utilities costs; EE does not have cost for additional
				\$ 7,227.00			Utilities & Communications	utility hookups
				\$ 5,420.25			Diesel for pickups & light equipment	EE assumes fuel costs included in equipment rates
	<del>                                     </del>			\$ 3,285.00 \$ 13,248.00			O Gas for pickups & light equipment Pickups for Job Staff	EE assumes fuel costs included in equipment rates
				ب 15,248.00	ب 15,248.00	· ·	TELEWARDS FOR THE STATE OF THE	Contractor includes multiplier per 17,000 man hours; EE uses average rate
				\$ 32,576.25	\$ 1,033.00	\$ 31,543.25	Small Tools	submitted in COR08 (and backed up by invoices) for per day cost
				\$ 8,250.00	\$ 8,250.00	1	Quality Control	
				\$ 5,256.00			Owners Field Office	
				\$ 2,500.00			Security	Invoices to MTA shows \$1,100/week
				\$ 26,455.00	\$ 19,844.00	\$ 6,611.00	) Survey	Contractors uses 10-10hr days; EE uses 10-8hr days
				\$ 43,779.00	\$ 21,315.00	\$ 22,464.00	Traffic Control	Contractors uses 10-10hr days; EE uses 10-8hr days; Equipment rate discrepency for Flashing arrow board and portable message board; Contractor includes Portable Message Board for 60 days vs EE of 80 hrs
				\$ 58,055.63		\$ 15,071.63	B Environmental Controls	Contractors uses 10-10hr days; EE uses 10-8hr days; Labor rate discrepency for operator and pipelayer and equipment rate discrepency for Water Truck
		-				\$ 357,378.00	TOTAL	

Bid Item ES-4 & ST-4 Fixed Costs	\$ 262,000.00	\$ 262,834.00	\$ (834.00)						
Compensation Grouting	\$ 900,000.00	\$ 172,385.00	\$ 727,615.00						
				\$ 170,10	L.50	\$ 10,9	921.00	\$ 159,180.50	Prime Contactor Markups
				\$	-	\$ 24,1	150.00	\$ (24,150.00)	Subcontractor Markups Subcontractor Markups
									Grout Pipes & Pre-condition - EE uses \$95/l.f. per bid sheet; Contractor uses
				\$ 600,000	0.00	\$ 118,7	750.00	\$ 481,250.00	\$480/l.f.
									Comp Grouting - EE uses \$5/c.f. per bid sheet; Contractor uses \$75/c.p + consult
				\$ 115,10	2.50	\$ 6,2	250.00	\$ 108,852.50	fees
								\$ 725,133.00	TOTAL

\$ 14,114,107 \$ 9,492,614 \$ 4,621,493



						D	CC 010
			Engineer's	Dol	ta / Build	Agree / Disagree /	CC 010
No. Activity Name	Contractor (C		timate (EE)	Dei	Up	Impasse	Comments
1.1 Design	\$ 750,00	0 \$	351,125	\$	(398,875)		
1.2 Instrumentation & Monitoring	\$ 520,20	3 \$	351,436	\$	(168,767)		
			Markup	\$	75,009	I	Contractor uses a 23% markup on top of the subcontractors total estimate including markups.
Labor rates	ofessio	onal services	\$	103,593	I	The Contractor's rates are higher as they identify themselves as a professional service instead of a contractor regulated by pre uses prevailing wage.	
Mot	etings	/ Submittals	\$	(10,113)		The Engineer's Estimate contains more money for the mobilization of this activity than what was included in the Contractors p	
			\$	(278)		Remaining Delta	
1.3 Demolition of Existing Structure	0 \$	322,383	\$	(27,617)		The prime Contractor uses a 23% markup on top of their subcontractors total estimate including markups. The Engineer's esti material (crushed rock) for some fill locations.	
1.4 Site Work	\$ 895,00	0 \$	344,932	\$	(550,068)		
			Markup	\$	97,410	I	Contractor uses a 23% markup vs. the Engineer's Estimate of 15% OH&P / 1.68% Bonding and Insurance
		Chemi	cal Grouting	\$	408,200	I	Chemical Grouting has not been verified for inclusion in scope therefore it is excluded from the Engineer's Estimate.
	Site	Gradin	g and Setup	\$	37,195	D	Labor material and equipment differences between the two estimates with respect to this scope of work differ. Primarily wor
			Fencing	\$	6,385		The unit cost used by the Contractor for this scope is higher than the Engineer's Estimate.
				\$	(878)		Remaining Delta
1.5 Construction of Retrieval Shaft	\$ 4,035,00	0 \$	3,292,784	\$	(742,216)		
			Markup	\$	333,484	I	Contractor uses a 23% markup on top of the subcontractors total estimate including markups.
	Assist Secant	Pile Su	ıbcontractor	\$	47,726	D	Engineer's estimate assumes secant wall operations will be handled by the subcontractor.
			Excavation	\$	49,075	D	Labor rate differences as well as the Contractor having a larger crew for this activity create this difference.
	Tempor	ary Stru	uts & Walers	\$	176,883	D	The proposal from the Contractor contains a larger amount of labor hours to complete this work and higher priced equipment
			Mud Slab	\$	23,974		The material price used by the Contractor appears to be higher and the assumption of crane utilization is different between the
			Invert Slab	\$	10,292		The material price used by the Contractor is higher and the pump truck performing the concrete pumping appears to be priced CalTrans rates.



1					
	Secant Pile Walls	\$	82,080	I	The subcontractor's estimate being used by the Contractor details out additional indirects beyond their allowed mark up.
	K Rail Barrier	\$	8,795		The Engineer's Estimate does not include a crane during this work. The shift assumptions during this work are different as we
	Traffic Control	\$	1,873		
		\$	(8,034)		Remaining Delta
1.6	Ground Treatment Alternative \$ 746,000 \$ 522,761	\$ (	(223,239)		
	Markup	\$	63,317	I	Contractor uses a 23% markup vs. the Engineer's Estimate of 15% OH&P / 1.68% Bonding and Insurance.
	Backfill Material Only	\$	88,654	D	The Contractor includes a substantially larger quantity for backfill at a lower unit price.
	Temporary Bulkhead	\$	12,622		The material pricing used by the Contractor is higher than the Engineer's Estimate material cost, while the Engineer's Estimate labor cost than the Contractor's proposal.
	Grout Interface	\$	9,628		The Contractor proposes a larger crew for this work than the Engineer's Estimate.
	Macage & 32m Telebelt	\$	32,850		These were not included in the Engineer's Estimate for the Ground Treatment Alternative.
	Haul and Dispose	\$	14,662		The quantity used by the Contractor is higher than the Engineer's Estimate quantity.
		\$	(1,507)		Remaining Delta
1.7	Tunnel Extension \$ 4,607,000 \$ 3,309,974	\$ (1,	,297,026)		
=					
ğ	Markup	\$	379,778	I	Contractor uses a 23% markup vs. the Engineer's Estimate of 15% OH&P / 1.68% Bonding and Insurance.
obe (CO	Markup Surface Support		379,778 268,672	I D	Contractor uses a 23% markup vs. the Engineer's Estimate of 15% OH&P / 1.68% Bonding and Insurance.  A conveyor use rate is used by the Contractor that is higher than the Engineer's Estimated conveyor use rate.
nai scope (CO:	· ·	\$			
dditional scope (CO)	Surface Support	\$	268,672		A conveyor use rate is used by the Contractor that is higher than the Engineer's Estimated conveyor use rate.
Additional Scope (CO:	Surface Support  Power Consumption	\$ \$	268,672 (46,410)	D	A conveyor use rate is used by the Contractor that is higher than the Engineer's Estimated conveyor use rate.  The Engineer's Estimate uses a higher power rate from the BLS.
Additional Scope (CO)	Surface Support  Power Consumption  Tunnel Excavation	\$ \$ \$ \$	268,672 (46,410) 257,304	D	A conveyor use rate is used by the Contractor that is higher than the Engineer's Estimated conveyor use rate.  The Engineer's Estimate uses a higher power rate from the BLS.  Production rates for the contractor is slower, and they have a larger crew.
Additional Scope (CO)	Surface Support  Power Consumption  Tunnel Excavation  Remove rail / Utilities and Clean Tunnel	\$ \$ \$ \$	268,672 (46,410) 257,304 98,383	D	A conveyor use rate is used by the Contractor that is higher than the Engineer's Estimated conveyor use rate.  The Engineer's Estimate uses a higher power rate from the BLS.  Production rates for the contractor is slower, and they have a larger crew.  The contractors duration is 33% longer than the EE.
Additional Scope (CO)	Surface Support  Power Consumption  Tunnel Excavation  Remove rail / Utilities and Clean Tunnel  Precast Segments	\$ \$ \$ \$ \$	268,672 (46,410) 257,304 98,383 (47,518)	D D	A conveyor use rate is used by the Contractor that is higher than the Engineer's Estimated conveyor use rate.  The Engineer's Estimate uses a higher power rate from the BLS.  Production rates for the contractor is slower, and they have a larger crew.  The contractors duration is 33% longer than the EE.  The EE unit price is FOB destination and applies sales tax.  The contractor includes all crews (both headings and surface support) at a Saturday rate during this maintenance. The cost maintenance is supported by the cost mai
Additional Scope (CO)	Surface Support  Power Consumption  Tunnel Excavation  Remove rail / Utilities and Clean Tunnel  Precast Segments  Saturday Maintenance	\$ \$ \$ \$ \$ \$	268,672 (46,410) 257,304 98,383 (47,518) 100,698	D D	A conveyor use rate is used by the Contractor that is higher than the Engineer's Estimated conveyor use rate.  The Engineer's Estimate uses a higher power rate from the BLS.  Production rates for the contractor is slower, and they have a larger crew.  The contractors duration is 33% longer than the EE.  The EE unit price is FOB destination and applies sales tax.  The contractor includes all crews (both headings and surface support) at a Saturday rate during this maintenance. The cost macaptured within the Engineer's Estimate TBM use rate.
	Surface Support  Power Consumption  Tunnel Excavation  Remove rail / Utilities and Clean Tunnel  Precast Segments  Saturday Maintenance  Interventions	\$ \$ \$ \$ \$ \$ \$ \$ \$ \$ \$ \$ \$ \$ \$ \$ \$	268,672 (46,410) 257,304 98,383 (47,518) 100,698 205,470	D D	A conveyor use rate is used by the Contractor that is higher than the Engineer's Estimated conveyor use rate.  The Engineer's Estimate uses a higher power rate from the BLS.  Production rates for the contractor is slower, and they have a larger crew.  The contractors duration is 33% longer than the EE.  The EE unit price is FOB destination and applies sales tax.  The contractor includes all crews (both headings and surface support) at a Saturday rate during this maintenance. The cost macaptured within the Engineer's Estimate TBM use rate.  Not included in the Engineer's Estimate.





ı		Γ		The only technical assistance that has been justified is the Robbins specialist and has been added at \$140/hr. In addition to Ro
	Technical Assistance \$	155,790	I	Contractor includes "Engineering stamp costs (16,425); Design Growth Provision (120,000); Grout Consultant Fees (14,235)"
	\$	(3)		Remaining Delta
1.8	Cover & Site Restoration \$ 248,000 \$ 152,703 \$	(95,297)		
	Markup \$	15,351	I	Contractor uses a 23% markup vs. the Engineer's Estimate of 15% OH&P / 1.68% Bonding and Insurance.
	Roof of Shaft \$	62,614	D	Roof construction assumptions varied between the Engineer's Estimate and the Contractors Proposal creating a difference in o
	Site Grading \$	11,273		The quantities used for geotextile fabric and crushed stone to be implemented during this work were substantially different be estimates.
	Restore Sidewalk \$	6,058		Total man hours to complete this scope of work were different between the two estimates with the Contractor's being higher.
	\$	(0)		Remaining Delta
1.9	Additional Indirect and General Conditions \$ 700,000 \$ 342,623 \$	(357,377)		Both the Engineer's Estimate and the Contractor's Proposal use 14 days to complete the scope of work outlined. The Engineer \$24,473 per day while the Contractor's Proposal uses \$50,000 per day.
	Markup \$	131,150	Ī	The Engineer's Estimate does not include markup on the additional indirects.
	Yard \$	24,917		This delta is due to different equipment rates and the contractors inclusion of employee parking costs.
	Office Expense \$	13,034		The Contractor uses a higher office expense than what was submitted in other change orders.
	Job Staff \$	86,661		The Engineer's Estimate includes 26 staff per day in contrast to the Contractor's 33.
	Safety Equipment & Supplies \$	10,480	_	The Contractor uses higher rates than what was submitted in other change orders with supporting documentation.
	Meals & Lodging \$	657		
	Travel \$	1,405		
	Utilities & Communications \$	4,380		
	Diesel for pickups & light equipment \$	5,420		
	Gas for pickups & light equipment \$	3,285		
	Pickups for Job Staff \$	-		
	Small Tools \$	31,543		The Contractor uses higher rates than what was submitted in other change orders with supporting documentation.
	Quality Control \$	-		
	Owners Field Office \$	-		
	Security \$	300		





<u> </u>						
		Survey	\$ 6	,611		The Contractor's proposed survey costs don't align with the invoices provided to the MTA.
		Traffic Control	\$ 22	,464		Differing equipment rates and durations of use are responsible for this difference.
	Enviror	nmental Controls	\$ 15	,072		Shift differences and labor rate differences as well as a different equipment rate for water truck create this delta shown.
1.10 Bid item ES-4 & ST-4 Fixed Costs	\$ 262,000	\$ 262,833	\$	833		
1.11 Compensation Grouting	\$ 900,000	\$ 172,385	\$ (727)	,615)		The Engineer's Estimate uses quantities provided in the Contractor's Proposal. Unit pricing was applied at the same price show Schedule of Bid Prices.
		Markup	\$ 135	,031	I	Contractor uses a 23% markup vs. the Engineer's Estimate of 15% OH&P / 1.68% Bonding and Insurance.
		Grout Pipes	\$ 481	,250	D	The Engineer's Estimate uses \$95 per lineal foot from the CN 1252 bid sheet vs. the Contractor's \$480 per lineal foot.
		Grout	\$ 108	,853	D	The Engineer's Estimate uses \$5 per cubic foot from the CN 1252 bid sheet vs. the Contractor's \$75 per cubic foot (plus consult
			\$ (2,	,482)		Remaining Delta
2.1 Retrieval Shaft Utility Work  2.2 Jet Grouting	\$ (1,100,000)	\$ (3,852,750)	\$ (2,752	,750)		At this point (04/09/13) the contractor's proposal still needs to be reviewed and followed by a scoping meeting.
2.2 Jet Grouting	\$ (1,052,725)	\$ (1,052,725)	\$	-		
2.3 Retrieval Shaft Construction	\$ (2,700,000)	\$ (2,700,000)	\$	-		
	\$ 14,013,203					
TOTAL CREDIT	\$ (4,852,725)	\$ (7,605,475)	\$ (2,752	,750)		
PCC 010 - COST	\$ 9,160,478	\$ 1,820,464	\$ (7,340	,014)		



16.0 DP2 Design Services During Construction	DP2 Planned Hours	DP2 Planned Costs	1252 Planned Hours	1252 Planned Costs	1252 Actual Hours	1252 Actual Costs	DP2 Additional Hours	DP2 Additional Costs	DP2 Remaining Hours	DP2 Remaining Costs
16.30 Shop Drawings Review and Consultation during construction	16,172	\$2,280,333	320	\$48,000	428	\$55,361	52	\$7,179	15,692	\$2,217,793
16.30.C4 Shop Drawings Reviews and RFI – (UMS)	9,202	\$1,388,094	160	\$24,000	202	\$29,253	52	\$7,179	8,948	\$1,351,662
16.30.C6 Shop Drawings Reviews and RFI – (MOS)	6,970	\$892,239	160	\$24,000	226	\$26,108	0	\$0	6,744	\$866,131
16.40 Field Visits / Meetings	1,680	\$253,535	80	\$12,000	28	\$4,296	20	\$2,761	1,632	\$246,478
16.40.C4 Field Visits / Meetings – (UMS)	840	\$144,362	40	\$6,000	18	\$2,717	20	\$2,761	802	\$138,884
16.40.C6 Field Visits / Meetings – (MOS)	840	\$109,173	40	\$6,000	10	\$1,579	0	\$0	830	\$107,594
16.0 Totals	17,852	\$2,533,868	400	\$60,000	456	\$59,657	72	\$9,940	17,324	\$2,464,271

#### **Work Completed to Date:**

Submittals/ Shop Drawing Reviews - 24 Resubmittals/ Shop Drawing Reviews - 22

RFI's - 33 (18 related to rebar fabrication and 8 to mix designs)

#### Remaining Work to be Completed:

Submittals/ Shop Drawing Reviews (In Review) - 4 (jet grout QC plan, revised pile sequence, pre-probe holes, CDF mix design)

Submittals/ Shop Drawing Reviews (Planned yet to be submitted) - 9 (as-builts for ground treatment & headwall construction, secant/tanget pile record reports, slurry walls QC reports)

Submittals/ Shop Drawing Reviews (Anticipated) - 2

Open RFI's - 1 Open NCR's - 2

#### Reasons for Overrun:

Submittals required multiple cycles for approval

Re-sequencing of pile installation required additional work plan reviews

Received more RFI's than anticipated

MOS End Stop issue used hours that were not originally anticipated

Development of two PCC's that was not covered in the original budget

	16.30.C4 (hrs)	16.40.C4 (hrs)	Total (hrs)	Rate (\$/hr)	Value (\$)
David Abrahams	36	12	48	138.06	\$6,627
Aileen Read	12	8	20	138.06	\$2,761
Tom Lee	4	0	4	138.06	\$552
TOTAL			<u> </u>	<u> </u>	\$9,940

#### Memo - C 1300 Changes Requiring SFMTA Board Approval - Requested Change

The anticipated Construction Contract value for the C 1300 award will be in the \$ 720 million to \$ 750 million dollar range.

Under the current Guidelines for "Changes Requiring SFMTA Board Approval", all changes that are approved by the CMB and that increase either a consultant or construction contract require SFMTA Board approval when the change value exceeds the limits shown in the table below.

	Cilan	ges requiring	SUM IN DOG		
Contract Value	Up to \$500,000	\$500,001 to \$1 million	\$1 million to \$10 million	\$10 million to \$50 million	Greater than \$50 million
İndividual Cost Change	Greater than 50% of original contract amount	Greater than \$250,000	Greater than \$500,000	Greater than \$500,000	Greater than \$500,000
Total Project Cost Changes	Greater than 50% of original contract amount	Greater than original cont or \$250,000, is greater	ract amount	Greater than 10% of the original contract amount or \$2.5 million, whichever is greater	Greater than \$5 million
Total Project Schedule Change	Greater tha	n 25% of the c	origina) contra	ct term	

Based upon the anticipated value, any total changes that exceed the \$ 5 million limit will need SFMTA Board approval in order to execute the change.

Previously, SFMTA let a project for the construction of the Chinatown Station, bids ranged in the order of \$ 239 million to \$ 397 million. Had this project been awarded, the same rule would have applied, that any total changes that exceed the \$ 5 million limit will need SFMTA Board approval in order to execute the change.

The current C 1300 project is made up of in essence 4 separate project packages, being issued as one overall contract. Had each of these packages been bid separately, each package would have had a threshold of authority individually for the same \$ 5 million.

**Requested Change** – allow for each individual package its own not to exceed allowance of \$ 5 million before requiring SFMTA Board approval, an aggregate of \$ 20 million, yet each package may not exceed the \$ 5 million within its own individual scope.

Issue Resolution Ladder COR-018 Moscone Headwall End Stops

Meeting was held Mar 11, 2013 between Redmond / Schall

- Held a discussion with Sarah Wilson / Ben Campbell / Mark Benson / Tom Baddeley as to their findings and yet unresolved issue of whether or not End Stops were part of the Contract Requirements
- A copy in .pdf is enclosed of Sarah Wilson / Ben Campbell / Mark Benson report

#### Redmond

- Dwg ES-421 , Note 3 " End Stops are not shown, see Specifications ", this implies they are required, see specifications
- Dwg ST-015 , Typical Waterproof Layout at Transition Structure Expansion Joint , indicates water stop at joints
- Dwg ES-001, Legend Shows Slurry Diaphram Wall Designation
- Dwg UD-404 Indicates current and future slurry wall locations in current and follow on contracts
- Dwg EXGT111 from Geotechnical baseline Report indicates future structure at Moscone Station
- Invitation to Bidders, Page 1, Item 8 indicates "Construction of Station End Walls"
- Spec Sec 01 45 13, Sec 1.01.E.2 indicates "Shaft and Station End Wall Elements" to be Slurry wall or Secant Piles
- Spec Sec 01 12 19, Sec 1.03.C indicates "The Contractor's attention is drawn to work under Contract 1252, which will include installation of excavation support "end-walls" for MOS Station and UMS Station. The installation of "end-walls" for UMS Station will overlap with utility relocation work being performed under Contract 1251. Coordinate, cooperate, and work with the Engineer and the Contract 1251 contractor for this work in the event of work overlap."
- Spec 31 66 16.46 Slurry Diaphram Foundation Wall
  - Design panel joints to provide positive groundwater cut-off into the excavation. Include the use of continuous waterstops at MOS headwalls. Continuous waterstops may be used at the TBM Launch Box, if desired.
  - Approach for constructing joints between adjacent wall panels, including the use of end stops and waterstops, checking plumb and deviation, and details of corrective measures to be implemented, if construction tolerances are exceeded.
    - Indicate how waterstops are to be secured to end stops, released from endstops as the end stop is removed, and protected in place during construction of adjacent panels.
- Redmond Independent estimate of Cost = \$ 111,000 compared to BIH = \$ 145,000

#### Schall

Contract 1252 Contractor (Subcontractor CJN) is responsible for leakage at panel joints per 31
66 16.46 3.01D as stated "water tightness between panels". Key word in this section is
"between panels" – referring to panels installed under contract 1252 as no other joint is shown
or implied.

- Panel joints are clearly stated as joints between panels installed by Contractor. If SFMTA had intentions that these included "future" joints i.e., between panels installed under contract 1252 and 1300 (or future contract) it should have been more clear.
- An example where SFMTA is clear on "future" joints is where is shows on Drawing ES-421 where
  future horizontal slabs are tie into the diaphragm walls by use of rebar couplers. If SFMTA is
  correct in their assertions, the 1252 contract drawings should have showed details of "future"
  walls that tie into the wall panels constructed under contract 1252.
- Many references to "end stops" are shown on the drawings, i.e. drawing ES-421 Note 3, and references in specifications, i.e. section 31 66 16.46, that depict "end stops" <u>between</u> panel joints installed under contract 1252, and not referencing joints between walls installed under contract 1252 and future contracts.
- Spec Section 01 12 19, part 1.03.C indicates "end-walls" for the UMS Station. These "end-walls" refer to the main UMS and MOS station "end walls" constructed under contract 1252 and it is unsure what point is being made in the bullet under "Redmond's" bullet #8 above.
- If this "future" joint was important to have some kind of "end stop" or feature in place where a future contractor could tie into, SFMTA should have clearly stated what type of joint should be left that is compatible with what the future walls will be, i.e. slurry walls, secant walls, or other. The spec should be clear on who is responsible for "water tightness" in this future joint where two different contractors install each adjoining panels.
- SFMTA asserts that "verticality" has to be maintained by "end stops". Verticality and "end stops" are not related.

#### **Suggested Joint Resolution**

DS- My suggested joint resolution is that "merit" can be agreed to now and that "quantum" can be discussed and agreed to between parties in the near future.

### **CENTRAL SUBWAY PROJECT**

## Project Trend/Change Control Log

# Trend Log

ent Cost Estima	te and Allocated (	Contingencies	1					Projected Cost	T	Contract	
Item #	Date Initiated		Change Description	Change Type	CMB No.	Change S	tatus	Impact +Exposure/(Benefit	Comments	Modification Number	Utility Reimbursements
						Approval Action	Approval Date	Actual/Forecast			
CONSTRUCTIO	N TRENDS										
Contract 1250	Utilities Relocation	on #1 (Portal & MOS)									
Contract 1250	<b>Totals</b>							+2,694,211	Total Changes to the Contract in the amount of \$2,694,211, represents a \$740,834 OVER RUN of the original allocated contingency of \$1,953,377.  Changes that will be Utility Reimbursement credits through the Form B process in the amount of \$162,992 will offset some of this OVER RUN.  Final Contract Closeout Total \$11,968,150 will be reduce by \$2,275,419 Utility Reimbursement credits for a Final Program cost of \$9,692,731 for CN 1250		(162,992)
Contract 1251	· Utilities Relocation	on #2 (UMS)					i		Tree 1: 11 11 11 11 11 11 11 11 11 11 11 11		
1251-0001	03/18/11	082-0001	Modify traffic control plan by establishing a single travel lane on Stockton St. in lieu of time-based multiple lane requirements as stipulated in contract plans TR-001 to 004.	7					After discussions with the Contractor and the Union Square Business Improvement District (BID), the SFMTA determined that modifying the lane requirements along Stockton St. and implementing the alternate pedestrian walkway design would be beneficial to the execution of CN 1251 in the following ways: increased public safety, increase construction production, and create a more pleasing environment to the public and merchant.  COR #1	CMOD #4 Approved	
									COMPLETE, NO FURTHER ACTION; CMOD #4		
1251-0002	03/18/11	082-0002	Installation of reinforced concrete slab underneath Joint Trench along Stockton at O'Farrell (East Side). CTL 133+66.37 (27.08 LEFT) to CTL 134+00.87 (27.08 LEFT	1&3	CMB-0035	Agree	04/20/11	+67,634	Pursuant to a commitment between Barney's and SFMTA, Emergency Stair #4 (to be constructed in CN 1253) must avoid existing subsidewalk basement. It was determined that moving the conflicting stairs would require the Joint Trench to be constructed in a manner that would enable it to span the excavated area. The addition of the invert slab allowed for the needed span thereby allowing for a relocation of Emergency Stair #4.  COR #4; PCC #1  COMPLETE, NO FURTHER ACTION; CMOD #2	CMOD #2 Approved	
1251-0003	03/18/11	082-0003	Adjust placement of 3EA manholes along Geary Street and O'Farrell Street. The modified manhole locations require the installation of approximately 265LF of additional HDPE pipe inside the existing 3'x5' brick sewer.	1	CMB-0029	Agree	02/23/11	+148,919	During future station construction, the design team anticipates that excavation related settlement may cause damage to the brick sewers along Geary and O'Farrell Streets. This proposed modification will replace the vulnerable brick sewer within the influence zone with HDPE pipe that will not be as susceptible to settlement-induced damage.  COR #9, PCC #2  COMPLETE, NO FURTHER ACTION; CMOD #1	CMOD #1 Approved	
1251-0004	04/06/11	082-0004	Changes to Neiman Marcus secondary enclosure wall due to various differing site conditions.	2	CMB-0031	Agree	04/13/11	+189,584	Due to various differing site conditions as described in RFIs 15, 37, 38 and 44, changes to the secondary enclosure wall are required. The existing footing were found to be inconsistent, i.e. missing footing in one area, footing sticks out beyond existing wall, overpour on existing footing, existing wall to be 6" into private property. Contract plan SR-302 shows a consistent footing.  COR #8  COMPLETE, NO FURTHER ACTION; CMOD #3	CMOD #3 Approved	

### **CENTRAL SUBWAY PROJECT**

## Project Trend/Change Control Log

Item #	Date Initiated		Change Description	Change Type	CMB No.	Change S	tatus	Projected Cost Impact +Exposure/(Benefit	Comments	Contract Modification Number	Utility Reimbursements
						Approval Action	Approval Date	Actual/Forecast			
1251-0005	04/06/11	082-0005	Existing PG&E conduits were found on top and parallel to existing AWSS on Geary Blvd. at 2 locations (east and west of Stockton)	6				+66,084	Contract plans AW-501.1, 501.2, 501.4 and 501.4 show the existing AWSS to be replaced in place. However, existing PG&E conduits were found to be on top and parallel to the existing AWSS resulting in extra work in working around and/or shifting the existing electrical conduits. Contract plans JT-308 and 309 showed the existing electrical and AWSS to be separate. Estimate includes \$77,892.53 (Synergy FA Request) + \$25,000 (first digging west side) + \$10,000 (temp backfill during moratorium) + \$15,000 (plate rental west side at \$5k per month). Estimate does not include Synergy's cost to sequence his work. Updated projected cost impact from \$50,000 to \$127,893 based on compilation of force accounts received.  RE negotiating  COMPLETE, NO FURTHER ACTION	CMOD #24 Approved	(66,084)
1251-0006	04/20/11	082-0006	Design changes to utilities on Stockton street between Post and Geary	1	CMB-0039	Agree	06/08/11	+398.624	Due to changes to the limits of the UMS Station on Stockton Street between Post and Geary, the original utility design has changed. COR #24, PCC #4 COMPLETE, NO FURTHER ACTION; CMOD #5	CMOD #5 Approved	
1251-0007	04/20/11	082-0007	Design changes to utilities on Ellis Street	1	CMB-0049	Agree	08/24/11	(434,957)	Due to changes to the limits of the UMS Station on Ellis street, the original utility design has changed. PCC #5 COMPLETE, NO FURTHER ACTION; CMOD #5	CMOD #5 Approved	
1251-0008	04/20/11	082-0008	Elimination of underpinning at 150 Stockton	1					Based on field verification, it was determined that underpinning is no longer needed. Contract bid item SR-9 is for a total amount of \$116,000 measured by LF. However, CM team does not anticipate to recover the full amount because contractor may be entitled to retain general conditions cost and some excavation cost that was already performed but encumbered in Bid Item SR-9. Agreed credit of (\$58,000) to be included in Trend #60.  CLOSED, NO FURTHER ACTION		
1251-0009	04/20/11	082-0009	Additional cost for police officers and/or Parking Control Officers for traffic control.	4	CMB-0038	Agree	06/01/11	+261,584	Contract bid item TR-7 for manual traffic control in the amount of \$120,000 is insufficient to control traffic for the duration of the contract. The \$120,000 allowance only equates to one police officer for a duration of 7.5 months. At a minimum, it is anticipated that one police officer or PCO will be needed at Stockton/Post for the entire contract duration of 16 months. Additionally, one PCO is required for each intersection at Geary/Stockton and O'Farrell/Stockton.  COMPLETE, NO FURTHER ACTION; CMOD #4	CMOD #4 Approved	
1251-0010	05/25/11	082-0010	Accelerate Stockton east between O'Farrell and Market	1				+27,409	Contractor needed to rent additional excavators to work concurrently with the other block on Stockton between O'Farrell and Market.  Amount: \$27,409; COR #25  COMPLETE, NO FURTHER ACTION; CMOD #3	CMOD #3 Approved	
1251-0011	06/22/11	082-0011	Potholing at 4th/Howard for PUC sewer design	1					Request from MOS utility design team to pothole for the intercept of a 36" force main sewer and 96" sewer. PUC requested that this be done in order to ensure that we have accurate utility information to avoid costly change orders during construction.  Per direction from CMB on January 18, 2012, this request is denied.  COR #50, PCC #6  CLOSED, NO FURTHER ACTION: Per direction from CMB on January 18, 2012, this request is denied.		
1251-0012	07/06/11	082-0012	Additional cost to lower the AWSS at O'Farrell, east of Stockton, due to numerous existing utility conflicts.	2	CMB-0042, CMB-0050	Agree	8/3/2011, 9/21/2011	,	The AWSS is in conflict with AT&T, PG&E and several other utilities and needs to be installed under all these utilities at about 11' deep (instead of 6' depth as noted in Plan AW-501.4, sheet note #5). During negotiations with the Contractor several items of work were found to be missing for the original cost estimates which increase the amount to \$278,351.  RFI #76, COR #31  COMPLETE, NO FURTHER ACTION; CMOD #6	CMOD #6 Approved	
1251-0013	07/06/11	082-0013	Accelerate start of construction in front of Macys West by trenchless construction method	7					anticipated. To mitigate this potential delay, contractor requested to start construction in front of Macys West. COR 32 (CMB 0055 approval - see also Trend CN1251 #'s 04 & 10) COMPLETE, NO FURTHER ACTION; CMOD #3 (No Cost Change)	CMOD #3 Approved	

Owner Directed Change in Scope
 2 - Unforeseen Conditions
 3 - Errors and Omissions
 4 - Quantity Variation
 5 - Value Engineering
 6 - Private Utilities
 7 - Other

Item #	Date Initiated		Change Description	Change Type	Change Status		itatus	Impact +Exposure/(Benefit	Comments	Contract Modification Number	Utility Reimbursements
						Approval Action	Approval Date	Actual/Forecast			
1251-0014	07/21/11	082-0014	Increase in Bid Item WD-10, Allowance for Additional Excavation and Backfill.	3	CMB-0055	Agree	09/14/11	+191,779	This allowance is for the contractor to perform additional excavation, backfilling and restoration associated with the water tie-ins and capping for the distribution piping system. The contractor has performed two water service tie-ins at an average cost of \$14,000 per tie-in. The current number of tie-ins and capping is 35 separate points. This amounts to a total cost of \$490,000. The current contract allowance amount is \$100,000, therefore an additional \$390,000 will be needed to augment is bid item. CMB made a partial approve of up to \$200K. The initial Contract Modification to supplement this allowance is in the amount of \$191,778.62.  RE's cost analysis of this trend confirms that the initial CMod amount of \$191,778.62 is sufficient to cover for all water tie-in/capping work.  COMPLETE, NO FURTHER ACTION; CMOD #9	CMOD #9 Approved	
1251-0015	08/03/11	082-0015	Additional traffic signal work at Post/Stockton	1				+17,530	Modification of the traffic signal at Post/Stockton is required to implement the detour shown in contract plan TR-010. There are no bid item to bill this work. COR #19 COMPLETE, NO FURTHER ACTION; CMOD #8	CMOD #8 Approved	
1251-0016	08/03/11	082-0016	Additional traffic signal work at Sutter/Mason	2				+32,054	Existing conduits shown in Plan ET-101 differs from what is actually in the field. City's response to RFI 73 directs contractor to install new conduits and conductors. RFI #73; COR #33 COMPLETE, NO FURTHER ACTION; CMOD #8	CMOD #8 Approved	
1251-0017	08/03/11	082-0017	Furnish and install AT&T Manhole 5830 on O'Farrell Street	6	CMB-0051	Agree	09/21/11	+25,000	AT&T was supposed to hire its own subcontractor to furnish and install all AT&T vaults in CN 1251.  AT&T requested SFMTA for Synergy to perform this work as change order to CN 1251.  AT&T agreed to reimburse SFMTA (\$25,000) through the Form B process.  COMPLETE, NO FURTHER ACTION; CMOD #7	CMOD #7 Approved	(25,000)
1251-0018	08/03/11	082-0018	Furnish and install AT&T Manhole 5829 on Geary Blvd.	6	CMB-0051	Agree	09/21/11		AT&T was supposed to hire its own subcontractor to furnish and install all AT&T vaults in CN 1251.  AT&T requested SFMTA for Synergy to perform this work as change order to CN 1251.  AT&T agreed to reimburse SFMTA (\$31,000) through the Form B process.  COMPLETE, NO FURTHER ACTION; CMOD #7	CMOD #7 Approved	(31,000)
1251-0019	08/03/11	082-0019	Extend joint trench and modify existing AT&T Manhole 403 on Ellis Street.	6	CMB-0057	Agree	10/26/11		AT&T was supposed to furnish and install AT&T vault #5833 on Ellis Street. The current design was to intercept the existing AT&T conduit in the middle of Ellis Street. It was discovered that the existing AT&T conduit actually run adjacent to the southern curb line along Ellis Street. Therefore, AT&T requested SFMTA for Synergy to extend the joint trench approximately 200 feet to the West and tie into their existing AT&T vault #403. This work will also require Synergy to enlarge vault #403 to accept the additional conduit.  This additional work for AT&T will need to be reimbursed to SFMTA through the Form B process.  Note: The agreed amount (\$31,000) is for enlargement of vault #403 only; the additional 200 feet of trench to be captured in the JT bid items. (See Trend 60)  COR #43  COMPLETE, NO FURTHER ACTION; CMOD #11	CMOD #11 Approved	(31,000)
1251-0020	09/07/11	082-0020	Change PG&E conduit material from PVC to GRS on west side of Stockton between Geary and Post	6	CMB-0058	Agree	11/02/11		PG&E requested to use GRS material in lieu of PVC in areas where PG&E conduits were expected to be exposed and temporary supported during future UMS station construction. PG&E agreed to reimburse SFMTA (\$19,537) through the Form B process.  COMPLETE, NO FURTHER ACTION; CMOD #21	CMOD #21 Approved	(19,537)
1251-0021	09/07/11	082-0021	Revise PG&E service points and layout of primary lines at various locations, and delete Muni Vault 1850 A at Stockton/Ellis.	6					PG&E made changes to the locations of the service points and layout of some of the primary lines. In addition, due to changes to the limits of the UMS Station on Ellis Street, it was determined that Muni Vault 1850A is no longer needed. Cost for this trend in captured in Trend #31 or CMod #12.  CLOSED; NO FURTHER ACTION. Cost for this trend is captured in Trend #31/CMod #12		
1251-0022	09/07/11	082-0022	Change OCS supports at SF Hilton Hotel on Mason Street from embedded eyebolts to poles w/foundations.	7					During the design phase the representatives of the Hilton Hotel agreed to and signed a license agreement with the SFMTA to allow embedded eyebolt supports. Hilton's Dir of Property Ops now wants to have OCS poles rather than the embedded building eyebolt supports. However, the OCS designer was able to revise the OCS design to eliminate the need for either eyebolts or poles in front of Hilton Hotel, resulting in a \$2,000 credit.  CLOSED; NO FURTHER ACTION. Applicable bid items to be adjusted accordingly, See Trend #60.		

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1251-0023	09/07/11	082-0023	4th Street & Folsom Trolley Bypass	1	CMB-0065	Agree	1/25/2012, 2/29/12		SFMTA Operations has requested a bypass be installed at 4th Street and Folsom Street. \$242,619 in labor costs for OCS installation has not been negotiated yet. 1/25: Condition agreed upon verification material from Contractor to be procured is available. (Verified 02/01/12). 02/29: CMod negotiated cost has been revised to incorporate original three items and the add'l OCS work on Folsom St. COR #52; PCC #7 Updated projected cost impact from \$490,000 to \$405,440. CMod #12 (Formally CMod #15) COMPLETE, NO FURTHER ACTION; CMOD #12	CMOD #12 Approved	
1251-0024	09/07/11	082-0024	Install a 5" slurry wall between the gas line and wet utilities if the separation is less than 3 feet	6	CMB-0059	Agree	11/16/2011, 05/02/12		As a new requirement, PG&E had requested that a 5" slurry wall be installed between the gas line and wet utilities where the separation between the 2 utilities is less than 3 feet.  PG&E agreed to reimburse SFMTA (\$201,410) through the Form B process.  COR #58  COMPLETE, NO FURTHER ACTION; CMOD #19	CMOD #19 Approved	(201,411)
1251-0025	09/07/11	082-0025	Additional PG&E conduit crossings at Geary and O'Farrell to minimize service interruption during future UMS Station construction	6					PG&E requested to install additional conduits crossing Stockton Street at Geary and O'Farrell to minimize service interruption during future UMS Station construction. PG&E agreed to reimburse SFMTA through the Form B process. This item is captured under applicable JT Bid item, see Trend 60.  CLOSED; NO FURTHER ACTION. Item is captured under applicable JT Bid Item, See Trend 60.		
1251-0026	09/14/11	082-0026	Install cantilever footing in lieu of regular OCS foundation at 2 locations on Mason Street between Geary and O'Farrell	2					The sub-basement in the public parking garage at O'Farrell/Mason extends beyond the property line up to the curb line. Therefore, regular foundations as per original design could not be installed.  CLOSED; NO FURTHER ACTION. Item is captured under applicable OCS Bid Item, See Trend 60.		
1251-0027	09/20/11	082-0027	Accelerate installation of AT&T facilities in order for AT&T to start cut-over sooner	1	CMB-0056	Agree	11/30/11	+281,435	Acceleration is necessary to avoid potential delay impacts to Central Subway follow-on contracts.  COR #40  COMPLETE, NO FURTHER ACTION; CMOD #10	CMOD #10 Approved	
1251-0028	10/18/11	082-0028	Furnish and install AT&T Manholes 5828 (Stockton), 5831 (Geary), 5832 (O'Farrell) and 113 (O'Farrell)	6	CMB-0057	Agree	10/26/11	+157,000	AT&T was supposed to hire its own subcontractor to furnish and install all AT&T vaults in CN 1251.  AT&T requested SFMTA for Synergy to perform this work as change order to CN 1251. AT&T agreed to reimburse SFMTA (\$157,000) through the Form B process.  COR #43  COMPLETE, NO FURTHER ACTION; CMOD #11	CMOD #11 Approved	(157,000)
1251-0029	10/26/11	082-0029	Rebuild existing AT&T vault 133 at Post/Stockton and demolish existing AT&T vaults 403 (Ellis) and 113 (O'Farrell)	6					Vault 133 rebuild is superseded by Trend 40. Demolition of existing vaults 403 and 113 is superseded by Trend 43 CLOSED; NO FURTHER ACTION. Demo of exiting vaults 403 and 113 are superseded by Trend 43. (See CMOD #23)		
1251-0030	10/26/11	082-0030	Enlarge existing PG&E vault 873 at SW Geary/Stockton	6	CMB-0058	Agree	11/02/11	+46,366	PG&E asked SFMTA to enlarge vault 873. PG&E agreed to reimburse SFMTA (\$46,366) through the Form B process.  CMB approved a NTE amount of \$40K  COMPLETE, NO FURTHER ACTION; CMOD #21	CMOD #21 Approved	(46,366)
1251-0031	10/26/11	082-0031	Additional PG&E conduits crossing O'Farrell on east side of Stockton (Task Order #32)	6	CMB-0058	Agree	11/02/11	+17,193	PG&E asked SFMTA to install additional conduits. PG&E agreed to reimburse SFMTA (\$17,193) through the Form B process. COMPLETE, NO FURTHER ACTION; CMOD #21	CMOD #21 Approved	(17,193)
1251-0032	11/08/11	082-0032	Excavation and restoration cost for PG&E gas tie-in and kill holes.	6	CMB-0059	Agree	11/16/2011, 05/02/12	+92,292	PG&E gas drawings were not included in the bid package and there was no bid item to capture this work.  Gas drawings was issued by PG&E in June 2011. PG&E agreed to reimburse SFMTA (\$92,292) through the Form B process.  Updated projected cost impact from \$202,400 to \$169,087 due to reduction in number of kill holes from 18 to 15. 04/11: Discovery of actual number of Kill/Tie locations being 26 instead of 15 will require confirmation from PG&E of the locations and the new cost of scope of work.  COMPLETE, NO FURTHER ACTION; CMOD #19	CMOD #19 Approved	(92,292)
1251-0033	11/23/11	082-0033	Install secondary enclosure wall at One Stockton (Apple Store)	1	CMB-0068	Agree	03/07/12		Additional enclosure wall is design initiated change. COR #47, PCC #9 Updated projected cost impact from \$262,484 to \$408,700. 39 Calendar Day Time Extension COMPLETE, NO FURTHER ACTION; CMOD #13 (formally CMOD #14)	CMOD #13 Approved	

Owner Directed Change in Sec 2 - Unforeseen Conditions
 3 - Errors and Omissions
 4 - Quantity Variation
 5 - Value Engineering
 6 - Private Utilities
 7 - Other

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1251-0034	01/10/12	082-0034	Install temporary support as required to protect existing live utilities that are encroaching into the City right-of-way in front of 17-25 Stockton Street.	2	CMB-0069	Agree	04/04/12	+337,548	Existing utilities that are in active service were discovered in the City public right-of-way and are obstructing the performance of Contract work. Worst case scenario - "Not to Exceed" value) CM team will report actual amount value at a later date COR #71  CMB agreed to a Not-to-Exceed amount of \$346,456 on 4/4/12. All physical work was scheduled to complete by 4/13/12  COMPLETE, NO FURTHER ACTION; CMOD #17	CMOD #17 Approved	
1251-0035	01/11/12	082-0035	Potholing on Stockton between Post and Geary for UMS Station design	1					UMS Design Team requested 1251 to pothole (6'Wx12'Lx8'D) on Stockton between Post and Geary to locate existing piles and tie-backs at Union Square. Cost for this scope of work from the Contractor is \$19,870.73. Per direction from the CMB on Jan 18th this request is denied and the DP2 designer will cover this potential future obstruction with a note on the drawings. COR #53 CLOSED; NO FURTHER ACTION. Per direction of CMB on 1/18/12, this request is denied and DP2 Designer will cover this potential future obstruction with a note on the drawings.		
1251-0036	01/11/12	082-0036	Install three 6" PG&E conduits from vault 5800 to PG&E "A" pullbox at 4th/Bryant.	6					CN 1252 Contract is requesting 1251 to install PG&E conduits in order to bring power in advance of the tunnel equipment arrival. The scope of work, which involves trenching at the busy 4th/Bryant intersection, was part of the 1252 contract, hence, a credit of same amount (\$54,892.07) to be due back to 1252. Based upon a field meeting and discussions with BIH on Jan 17th this work will be done under CN 1252 as originally planned.  COR #55  CLOSED; NO FURTHER ACTION. Based on field meeting with BIH on 1/17/12; this work will be completed under CN 1252 as planned.		
1251-0037	01/17/12	082-0037	Install sewer lateral from the Gucci building (240 Stockton) to the main sewer on Maiden Lane. Work will involve plumbing modification inside building to raise invert.	3	CMB-0078	Agree	09/12/12	+27,428	After field investigation, the existing sewer lateral was found to connect to the Stockton main near Geary. However, the location where the lateral is connected to the main is inside the footprint of the UMS station, in which the main is shown in the contract plan to be slurry filled. The contract plan shows the lateral to be connected to the main on Maiden Lane but is not possible due to invert problem. At the CMB meeting on 1/18/12, Albert Hoe reported that he had instructed the design team during the design phase to investigate this lateral and make the connection to the sewer main at Maiden Lane. RE was asked to investigate if this could be a possible error and omission by the sewer design. (See Trends #44 and 45) COMPLETE, NO FURTHER ACTION; CMOD #18	CMOD #18 Approved	
1251-0038	01/04/12	082-0038	Reimburse Synergy for JCDecaux work to remove kiosks	1	CMB-0064, CMB 0080	Agree	1/04/2012, 10/24/12	+29,273	JCDecaux refused to remove the remaining (2EA) kiosks without being paid for work already completed. The CMB approved on 1/04/12 Task Order No. 35 (Removal of 3EA sidewalk kiosks) as requested for the work already completed.  On 10/24/12 the CMB approved Trend #38 removal of the remaining 2EA kiosks; work already completed and paid for as part of the approved CMB 0064 dated 01/04/12 for a total of 5EA kiosks removed. Total work priced at \$29,268.  COMPLETE, NO FURTHER ACTION; CMOD #22	CMod #22 Approved	
1251-0039	01/17/12	082-0039	Furnish and install 2ea benches along 5th Street	1				+4,752	Requested by Muni Operation.  COMPLETE, NO FURTHER ACTION; CMOD #22	CMod #22 Approved	
1251-0040	02/15/12	082-0040	Furnish and install AT&T Manholes 133 at Post/Stockton	6	CMB-0070	Agree	04/11/12	+45,000	AT&T requested SFMTA for Synergy to rebuild manhole 133 at Post/Stockton.  COR #64  AT&T agreed to reimburse SFMTA (\$45,000) through the Form B process.  COMPLETE, NO FURTHER ACTION; CMOD #14	CMOD #14 Approved	(45,000)
1251-0041	02/15/12	082-0041	Install additional 55 LF of AT&T trench to extend conduits from vault 5832 to vault 113 on O'Farrell Street	6	CMB-0070	Agree	04/11/12	+23,704	AT&T requested SFMTA for Synergy to extend their conduit from vault to vault instead of wye-casting into exiting duct bank.  COR #63  AT&T agreed to reimburse SFMTA (\$23,704) through the Form B process.  COMPLETE, NO FURTHER ACTION; CMOD #14	CMOD #14 Approved	(23,704)
1251-0042	02/15/12	082-0042	Install additional 95 LF of AT&T trench to extend conduits from vault 5831 to vault 129 on Geary Blvd.	6	CMB-0070	Agree	04/11/12	+31,525	AT&T requested SFMTA for Synergy to extend their conduit from vault to vault instead of wye-casting into exiting duct bank.  AT&T agreed to reimburse SFMTA (\$31,525) through the Form B process.  COR #62  COMPLETE, NO FURTHER ACTION; CMOD #14	CMOD #14 Approved	(31,525)

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1251-0043	02/15/12	082-0043	Force account work for demolition of existing AT&T vaults 113 (Post/Stockton) and 403 (Ellis)	6	CMB-0076	Agree Conditionally	10/03/12	+52,607	Agreed cost shown in Trends 29 and 40 is for installing vaults only. Cost to demo existing vaults is tracked on force account (estimated cost at \$15k each vault).  AT&T agreed to reimburse SFMTA (\$52,607) through the Form B process.  CMB Agreed contingent on receipt of confirmation letter from AT&T for costs associated with these three trends  (CMB 0076 approval - see Trend CN1251 #'s 72 & 80)  OMPLETE, NO FURTHER ACTION; CMOD #23	CMOD #23 Approved	(52,607)
1251-0044	02/15/12	082-0044	Install new sewer lateral from Macys West on O'Farrell including plumbing modification inside Macy's building.	3	CMB-0078	Agree	09/12/12	+11,438	Contract plan SW-4 shows an existing lateral to be connected to new main. However, the 8" lateral is too big to be connected directly to the new 14" main necessitating a new connection to the manhole. However, numerous existing utilities were in the way and required installation of a new lateral at a higher elevation. Due to the raised lateral invert, modification to the building is also needed. COMPLETE, NO FURTHER ACTION; CMOD #18	CMOD #18 Approved	
1251-0045	02/15/12	082-0045	Install new 2 each sewer laterals on Stockton between Post and Geary	3	CMB-0078	Agree	09/12/12	+30,260	Contract plan SW-3 shows 2 each existing laterals coming from the Union Square garage to be connected to the new main at approximate sta 128+55. However, the laterals were found to be connected to the downstream end of the existing main (toward Geary), which is called for to be abandoned in 1251 to make room for the future station. (See Trends #37 and 44)  COMPLETE, NO FURTHER ACTION; CMOD #18	CMOD #18 Approved	
1251-0046	03/06/12	082-0046	Additional cost for enlarging PG&E vault 584 on O'Farrell east of Stockton	6				+80,000	The two (2) existing PG&E duct banks that were supposed to be intercepted by vault 584 were wider than shown on plan. Vault 584 was needed to be enlarged in order to capture the two (2) ductbanks.  PG&E agreed to reimburse SFMTA (\$80,000) through the Form B process.  COMPLETE, NO FURTHER ACTION; CMOD #24	CMOD #24 Approved	(80,000)
1251-0047	04/10/12	082-0047	Enlarge Muni Vault 900A on Stockton between Post and Geary	2	CMB-0082	Agree	10/31/12	+15,357	Contract plan JT-301 calls for an intercept vault to capture 2 (E) Muni ductbanks (DB). These DBs were found to be farther apart than shown on plan. The intercept vault needs to be widened.  (CMB 0082 approval - see Trend CN1251 #'s 47, 58 & 78)  COMPLETE, NO FURTHER ACTION; CMOD #26	CMOD #26 Approved	
1251-0048	04/10/12	082-0048	Additional cost and time for stuck auger during micropile drilling	2					Contractor's hollow stem auger got stuck during drilling of micropile #27C in front of 17 Stockton. Contractor claims differing condition as cause for the stuck auger. Contractor is asking for 1 day compensable time extension. SFMTA is reviewing claim for entitlement. COR #67 RE Denied COR (City Letter 26); however Contractor will most likely send rebuttal. CLOSED; NO FURTHER ACTION.		
1251-0049	04/10/12	082-0049	Additional cost and time for added rebar and coordination with 17- 19 Stockton Owner's contractor	2	CMB-0083	Agree	11/07/12		Existing footing of One Stockton was found to be recessed from property line. City's response to RFI 171 called for additional rebar to compensate for the gap between back of new enclosure wall and existing footing. Also, the Owner's contractor of 17-19 Stockton asked that Synergy clear his work area so he can pour the primary wall and bring in his new switchgear. Synergy is asking 2 days compensable time extension.  (CMB 0083 approval - see Trend CN1251 #'s 53, 59, and 64)  COMPLETE, NO FURTHER ACTION	CMOD #27 Approved	
1251-0050	04/10/12	082-0050	Additional cost to install a Type 770 pole foundation at a different location, install 2 each DPT mast arms and demo existing wall in conflict with OCS footing	2	CMB-0074	Agree	08/15/12	+48,898	Type 770 pole foundation at SW 5th/Folsom could not be installed per plan due to a conflict with a cistern. Only solution is to remove an existing pole foundation (recently installed in 1251 as contract work) to make room for the 770 pole foundation. At 5th/Folsom, 2 DPT mast arms (not shown in original plan) need to be installed. At Pole #811, an existing concrete wall is in conflict with pole foundation.  (CMB 0074 approval - see Trend CN1251 #'s 67, 74 & 75)  COMPLETE, NO FURTHER ACTION; CMOD #20	CMOD #20 Approved	
1251-0051	04/10/12	082-0051	Intercept existing PG&E duct bank and terminate into vault 5464 at Market/Ellis	6				+23,633	PG&E requested to reroute existing duct bank running north out of MH 1803 at 4th/Pioneer Place into MH 5464 at Market/Ellis PG&E agreed to reimburse SFMTA (\$23,633) through the Form B process.  COMPLETE, NO FURTHER ACTION; CMOD #24	CMOD #24 Approved	(23,633)

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1251-0052	04/10/12	082-0052	Reroute unforeseen existing waterline on Geary east of Stockton	2	CMB-079	Agree	10/10/12	+27,234	An unforeseen existing waterline was found to be in conflict with PG&E vault 573 and needs to be rerouted per City's response to RFI #182.  (CMB 0079 approval - see Trend CN1251 #'s 65 & 70).  This is potentially a E&O issue due to unforeseen existing waterline on discovered along Geary Street (east of Stockton Street) not sown in the contract drawings.  COMPLETE, NO FURTHER ACTION; CMOD #28	CMOD #28 Approved	
1251-0053	04/10/12	082-0053	Additional cost for premium to accelerate contract work	1	CMB-083	Agree	11/07/12	+10,591	SFMTA directed Synergy to accelerate work to advance PG&E and AT&T cut-over and allow CN 1252 Contractor to start work at UMS COR #74  PG&E agreed to reimburse SFMTA (\$10,590) through the Form B process.  11/07/12 (CMB 0083 approval - see Trend CN1251#'s 49, 59, and 64)  COMPLETE, NO FURTHER ACTION; CMOD #27	CMOD #27 Approved	
1251-0054	04/17/12	082-0054	Additional waterproofing at FIDM and north end of Crate & Barrel	2				+8,151	Sidewalk in front of FIDM and north end of Crate & Barrel did not have a sub-sidewalk basement, hence the original plan did not call for waterproofing of the primary wall. While excavating for the joint trench, contractor found the existing waterproofing to be spalling and peeling off from the primary wall. COR #72  COMPLETE, NO FURTHER ACTION; CMOD #22	CMOD #22 Approved	
1251-0055	04/17/12	082-0055	Install Swiveloc lids on all PG&E vaults	6					PG&E requested SFMTA to add this scope to the 1251 contract for safety reason. COR #72 SFMTA decided to defer this work to the 1252 contract. COMPLETE, NO FURTHER ACTION;		
1251-0056	05/31/12	082-0056	Additional work on force account related to sewer installation	2				+45,156	Additional work due to unforeseen and differing conditions during installation of sewer.  COMPLETE, NO FURTHER ACTION; CMOD #15	CMOD #15 Approved	
1251-0057	05/31/12	082-0057	Additional work on force account related to water installation and NRG vault demolition	2					Additional work due to unforeseen and differing conditions during installation of water and demolish existing NRG vaults that are in conflict with utility installation.  COMPLETE, NO FURTHER ACTION; CMOD #16	CMOD #16 Approved	
1251-0058	05/31/12	082-0058	Additional streetlight conduit on 5th Street between Harrison and Bryant	2	CMB-0083	Agree	10/31/12	+17,754	The existing streetlight pullboxes new cables were supposed to be connected to per contract plan did not have power. New conduit needs to be install from the power source.  COR #75  (CMB 0082 approval - see Trend CN1251 #'s 47, 76 & 78)  COMPLETE, NO FURTHER ACTION; CMOD #25	CMOD #25 Approved	
1251-0059	06/26/12	082-0059	Accelerate contract work at Barney's front	1	CMB-0083	Agree	11/07/12		As a result of numerous meetings and complaints by Barneys, it was decided to accelerate contract work in order to restore Barneys sidewalk earlier (CMB 0083 approval - see Trend CN1251 #'s 53, 49, and 64) COMPLETE, NO FURTHER ACTION; CMOD #27	CMOD #27 Approved	
1251-0060	06/26/12	082-0060	Final Bid Item Reconciliation	4				(508,961)	Bid item analysis for entire contract as of 6/12/12.	CMOD #30 Approved	
1251-0061	06/26/12	082-0061	Excavate for PG&E cutover at 177 Stillman	6				+7,424	PG&E requested Synergy to excavate for PG&E cutover at 177 Stillman. Reference document: Email from Michael Lightstone dated 12/9/11 PG&E agreed to reimburse SFMTA (\$7,424) through the Form B process. COMPLETE, NO FURTHER ACTION; CMOD #24	CMOD #24 Approved	(7,424)
1251-0062		082-0062	Additional waterproofing at Macys Men's wall	2				+24,774	Contract did not call for waterproofing at Macys Men's wall. However, when contractor dug for the joint trench, it was found that the existing waterproofing has deteriorated and needed to be replaced. COR# 20 COMPLETE, NO FURTHER ACTION; CMOD #22	CMOD #22 Approved	
1251-0063		082-0063	Excavation and restoration cost for PG&E gas tie-in and kill holes.  Part II	6				+56,458	After completion of Part I (see trend 32), PG&E had offered to self-perform the excavation and restoration of the gas tie-in/kill holes because PG&E had crews available to perform the work. However, PG&E no longer have available crews, hence Synergy had to continue and finish excavating and restoring the last tie-in/kill holes. PG&E agreed to reimburse SFMTA (\$56,458) through the Form B process. COMPLETE, NO FURTHER ACTION; CMOD #24	CMOD #24 Approved	(56,458)

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1251-0064		082-0064	Accelerate finish and detail work of AT&T and PG&E vaults	1	CMB-0083	Agree	11/07/12	+4,704	In order to expedite turn-over of AT&T and PG&E vaults, SFMTA directed Synergy to accelerate the detailing and finish work of these vaults. SFMTA will pay Synergy premium cost for OT hours.  11/07/12 - (CMB 0083 approval - see Trend CN1251 #'s 53, 59, and 49)  COMPLETE, NO FURTHER ACTION; CMod #27	CMOD #27 Approved	
1251-0065		082-0065	Additional fittings for AWSS lateral and chipping of pole foundation at Market/Ellis	2	CMB-0079	Agree	10/10/12		An existing Muni pole foundation is in the way of the AWSS lateral. Additional fittings are required to complete contract work.  (CMB 0079 approval - see Trend CN1251 #'s 52 & 70) This is potentially an E & O issue due to an existing Muni pole foundation is in the way of the AWSS lateral.  COMPLETE, NO FURTHER ACTION; CMOD #28	CMOD #28 Approved	
1251-0066		082-0066	Intercept PG&E conduits at Vault 573 at Geary east of Stockton	6				+6,466	During installation of PG&E intercept vault 573, PG&E had incorrectly identified the conduits to be intercepted. This error was discovered during cut-over process by PG&E.  PG&E agreed to reimburse SFMTA (\$6,466) through the Form B process.  COMPLETE, NO FURTHER ACTION; CMOD #24	CMOD #24 Approved	(6,466)
1251-0067		082-0067	Additional feeder span, no-bo insulator and adjustment of guywire for the Folsom OCS bypass	3	CMB-0074	Agree	08/15/12	+32,149	SFMTA Electrical Designer had pointed out the new Folsom Bypass does not have enough capacity to power the new OCS necessitating installation of feeder spans. Also, adjustments to the guywire are necessary to mitigate conflict with new signal mast arms.  COR #76 7/25/12 - RE presented COR to CMB; direction given to develop one CMod with all remaining items to be purchased for the new OCS bypass.  (CMB 0074 approval - see Trend CN1251 #'s 50, 74 & 75)  COMPLETE, NO FURTHER ACTION; CMOD #20	CMOD #20 Approved	
1251-0068		082-0068	Extended Overhead cost from July 19, 2012 to August 16, 2012	1	CMB-0075	Agree Conditionally	10/03/12	+106,967	Contract is expected to be extended beyond the approved July 18, 2012 completion due to the following reasons: contractor was slowed due to accommodation of AT&T and PG&E cut-over, for example, contractor has to provide windows of time for AT&T to occupy its work space to provide continuity and efficiency for AT&T cut-over, contractor has to advance cleaning and detailing of vaults to turnover to AT&T and PG&E, these work are typically done as punchlist, contractor now has to sequence work and reallocate resources; SFWD cut-over is taking longer than expected; PG&E gas cut-over was delayed due to inability to access Armani building, this delay held up completion of sewer MH, SFWD connection and restoration on O'Farrell east; added change order work, i.e. additional PG&E conduit at vault 573 and additional excavation for AT&T cut-over at 240 Stockton  CMB Agreed contingent on receipt of letter confirming e-mail as presented in the meeting and content viewed related to agreement and remaining actions and release of funds.  COMPLETE, NO FURTHER ACTION; CMOD #24	CMOD #29 Approved	
1251-0069		082-0069	Removal of abandoned PG&E gas valve (8each) and install anodes	6					PG&E asked Synergy to remove all abandoned gas valves (8each) PG&E agreed to reimburse SFMTA (\$4,737) through the Form B process.  COMPLETE, NO FURTHER ACTION; CMOD #24	CMOD #24 Approved	(4,737)
1251-0070		082-0070	Core drill primary wall and install interior plumbing at Armani and Disney for the fire service water cutover	2	CMB-0079	Agree	10/10/12	+14,034	Existing fire service inside the building is a thin-wall steel pipe that extends out to the previously existing sub-sidewalk basement. However, 1251 had backfilled the subsidewalk basement per contract, which now made the steel pipe susceptible to corrosion. SFWD does not want to tie-in to the steel pipe due to corrosion issue plus the fact that the pipe is thin walled, which makes welding almost impossible. A ductile iron pipe needs to be installed from the main and into the building.  COR #77  (CMB 0079 approval - see Trend CN1251 #'s 52 & 65)  COMPLETE, NO FURTHER ACTION; CMOD #28	CMOD #28 Approved	
1251-0071		082-0071	Install a new 8" backflow preventer for the fire service inside Macys Men's building	6		1 - Owner Directed C			The new water main (installed in the 1251 Contract) is closer to the property line than the existing backflow preventer. State law stipulates that a backflow preventer be installed in between the property's fire suppression system and the water main. The SFWD refuses to make this connection until a proper backflow preventer is installed. SFMTA will insist on Macys to install its own backflow preventer. CLOSED; NO FURTHER ACTION.		

<sup>1 -</sup> Owner Directed Change in Scope
2 - Unforeseen Conditions
3 - Errors and Omissions
4 - Quantity Variation
5 - Value Engineering
6 - Private Utilities
7 - Other

Item#	Date Initiated		Change Description	Change Type	CMB No.	Change Sta	atus	Projected Cost Impact +Exposure/(Benefit	Comments	Contract Modification Number	Utility Reimbursements
						Approval Action	Approval Date	Actual/Forecast			
1251-0072	08/08/12	082-0072	Additional AT&T trench from new vault 5829 to existing vault 127 on Geary east of Stockton	6	CMB-0076	Agree	10/03/12		AT&T requested new conduits to maintain continuity between the 2 vaults.  AT&T agreed to reimburse SFMTA (\$23,993) through the Form B process.  RE Tracking work on FAR  CMB Agreed contingent on receipt of confirmation letter from AT&T for costs associated with these three trends  (CMB 0076 approval - see Trend CN1251 #'s 43 & 80)  COMPLETE, NO FURTHER ACTION; CMOD #14	CMOD #14 Approved	(23,993)
1251-0073	08/08/12	082-0073	Additional work to install water and electrical utilities for Flower Stand on Geary west of Stockton	1				+17,966	Contract bid allowance for providing utility services for flower stands (UD-14) had been exhausted during relocation of 2 flower stands. A third and final flower stand is still needed to be relocated.  COMPLETE, NO FURTHER ACTION; CMOD #22	CMOD #22 Approved	
1251-0074	08/08/12	082-0074	Traffic Signal modification at 5th/Folsom	1	CMB-0074	Agree	08/15/12		Due to installation of OCS bypass on Folsom between 4th and 5th Streets, a left turn signal is required at 5th/Folsom. Additional signal heads and modification to the existing traffic signal is necessary.  RE Tracking work on FAR  (CMB 0074 approval - see Trend CN1251 #'s 50, 67, & 75 also).  COMPLETE, NO FURTHER ACTION; CMOD #20	CMOD #20 Approved	
1251-0075	08/08/12	082-0075	Unforeseen conditions related to pole foundation installation for the Folsom OCS Bypass	2	CMB-0074	Agree	08/15/12	+12,568	Contractor encountered unforeseen concrete and brick substructures and abandoned utility lines.  RE Tracking work on FAR  (CMB 0082 approval - see Trend CN1251#'s 47, 58 & 78)  COMPLETE, NO FURTHER ACTION; CMOD #20	CMOD #20 Approved	
1251-0076	08/08/12	082-0076	Adjustment to OCS on Mason Street	2/3	CMB-0082	Agree	10/31/12	+14 988	Modify bracket arm at existing Pole #511 to alleviate tension load and bending of pole. Realign trolley wire on Mason between Geary and Eddy to smoothen transition when shifting from right lane to left lane. Also, add intermediate guywire to prevent excessive sagging of bracket arms at various locations.  RE Tracking work on FAR  (CMB 0082 approval - see Trend CN1251#'s 47, 58 & 78)  COMPLETE, NO FURTHER ACTION; CMOD #26	CMOD #26 Approved	
1251-0077	09/12/12	082-0077	Additional work related to Qwest, TCG and UCCO facilities	2	CMB-0081	Agree Conditionally	10/31/12	+37,181	Qwest, TCG and UCCO requested Synergy to tie-in their existing conduits into the new vaults that Synergy installed per contract. The utility companies are responsible for connecting existing conduits into new vaults, therefore, this request is considered extra work.  Private Utilities companies agreed to reimburse SFMTA (\$37,181) through the Form B process.  RE Tracking work on FAR  CMB agreement contingent upon CMod package to include evidence from all utilities that cost are reimbursable to SFMTA through the Form B process.  COMPLETE, NO FURTHER ACTION; CMOD #25	CMOD #25 Approved	(37,181)
1251-0078	09/12/12	082-0078	Unforeseen conditions encountered during excavation and installation of OCS poles along Mason and 5th Streets.	2	CMB-0082	Agree	10/31/12		Several obstructions, i.e. buried concrete, boulders, brick, abandoned utilities were discovered during excavation and installation of OCS poles along Mason and 5th Street.  RE Tracking work on FAR  (CMB 0082 approval - see Trend CN1251 #s 47, 58 & 76)  COMPLETE, NO FURTHER ACTION; CMOD #26	CMOD #26 Approved	
1251-0079	09/12/12	082-0079	Additional work related to installation of PG&E Vaults 467, 571, 573, 586 and 594 including joint trench leading to these vaults	2					Unforeseen conditions were encountered during installation of select PG&E vaults including joint trenches leading to these vaults.  PG&E agreed to reimburse SFMTA (\$44,530) through the Form B process.  RE Tracking work on FAR  COMPLETE, NO FURTHER ACTION; CMOD #24	CMOD #24 Approved	(44,530)

## Project Trend/Change Control Log

Item#	Date Initiated		Change Description	Change Type	CMB No.	Change Sta	atus	Impact +Exposure/(Benefit	Comments	Contract Modification Number	Utility Reimbursements	
							Approval Action	Approval Date	Actual/Forecast			
1251-0080	09/12/12	082-0	080	Additional work related to installation of AT&T Vaults 5828, 5829, 5830, 5831, 5832 and 5833 including joint trench leading to these vaults	2	CMB-0076	Agree	10/03/12	+56,806	Unforeseen conditions were encountered during installation of select AT&T vaults including joint trenches leading to these vaults. AT&T agreed to reimburse SFMTA (\$56,805) through the Form B process.  CMB Agreed contingent on receipt of confirmation letter from AT&T for costs associated with these three trends  (CMB 0076 approval - see Trend CN1251 #'s 43 & 72)  COMPLETE, NO FURTHER ACTION; CMOD #23	CMOD #23 Approved	(56,806)
1251-0081	09/13/12	082-0	081	PG&E concrete cover versus CDF on electrical duct bank	6	CMB-0107	Agree	02/13/13		Contract Plan JT-014 calls for CDF cover on PG&E duct bank. However, PG&E requested to use regular concrete due to heat dissipation problem with CDF. PG&E agreed to reimburse SFMTA (\$43,881) through the Form B process.  12/19/12 - Presented to CMB, direction given to finalize cost and obtain a Form B agreement with PG&E 02/13/13 - Revised CMod presented to CMB. PG&E agreed with negotiated reimbursement amount.  COMPLETE, NO FURTHER ACTION	CMOD #24 Approved	(43,882)
Contract 1251 To	otals								+3,962,032	Total Changes to the contract in the amount of 3,962,032 represents an UNDERRUN of allocated contingency in the amount of \$1,405,265.32.  Changes that will be Utility Reimbursement credits through the Form B process in the amount of \$1,224.828 will increase the UNDERRUN.  Final Contract Closeout Total \$20,794,581 will be reduce by \$7,618,112 Utility Reimbursement credits for a Final Program cost of \$13,176,469 for CN 1251		(1,224,828)
Contract 1252		COR No.	PCC No.	1252 Change Description	Change Type	CMB Change No.	Configuration Management Board Agree/Disagree	Decision Date	Actual/Forecast	Comments	Contract Modification No.	
1252-0001	04/23/12	1		AWSS Conflict w/ Low Pressure Water	6	CMB-0091	Agree to Merit Agree to Cost	10/10/12 1/16/13	+10,907	AWSS contract work was made more difficult by the proximity of a water line which was closer than indicated on UT-501. See COR 008 for TIA request.  10/10/12 - Merit info presented to CMB - Agreed  01/16/13 - CMB - NOT TO EXCEED Amount \$16,900		
1252-0002	04/23/12	2		AWSS Add. Tie-Rods 4th-Harrison	6	CMB-0086	Agree to Merit Agree to Cost	10/10/12 12/19/12	+58,000	The AWSS line must be restrained a certain distance beyond the 90 degree elbow we are installing under contract 1252. The 1252 contract work includes excavating on both sides of this 12-feet portion of pipe. Additional work scope (per Michael Smith @ DPW): Station 162+80 to 162+90 - Restrain the existing 12-inch tee to the existing pipe north of the tee. Restrain any other joints that are not restrained on the existing pipe up to the new pipe to be installed.  10/10/12 - Merit info presented to CMB - Agreed 12/19/12 - CMB - NOT TO EXCEED Amount \$58,000		
1252-0003	04/23/12	3		AT&T Vault Conflict-4th & Harrison	6	CMB-0092	Agree to Merit Agree to Cost	10/10/12 1/16/13	+16,015	After excavation of the roadway surface and subgrade at Fourth and Harrison streets an AT&T vault was discovered to be in conflict with the current alignment of the 42" RCP sewer main. Verbal authorization was given by an AT&T representative to make modifications to the vault. COR 003 has been submitted by BIH in response to this issue. Work is to be charged via SFMTA Form B agreement to AT&T. 10/10/12 - Merit info presented to CMB - Agreed 01/16/13 - CMB - NOT TO EXCEED Amount \$21,089 04/01/13 - CM team must obtain in writing from AT&T a utility agreement for cost reimbursement.		(16,015)
1252-0004	05/18/12	6		PG&E live electrical delays	6	CMB-0088	Agree to Merit Agree to Cost	11/28/12 1/9/2013	+7,402	PG&E lines indicated on contract drawing UD-502 thru 504 were to be abandoned yet were not yet abandoned when BIH started work. They were abandoned on 5/21.  11/28/12 - Merit info presented to CMB - Agreed  01/09/13 - CMB - NOT TO EXCEED Amount \$7,600  04/01/13 - CM team must obtain in writing from PG&E a utility agreement or cost reimbursement.	CMOD #10 Approved	(7,402)
1252-0005	06/06/12	7		Oil filled pipe @ Launch Box	2	CMB-0093	Agree to Merit Agree to Cost	1/16/13 1/16/13	+9,980	Synergy Demo Crew exposed an existing 6" steel line which had oil in it on the West side of 4th St between Harrison and Bryant. 01/16/132 - Merit info presented to CMB - Agreed 01/16/13 - CMB - NOT TO EXCEED Amount \$10,000	CMOD #5 Approved	

- Owner Directed Change in Sec 2 - Unforeseen Conditions
3 - Errors and Omissions
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## Project Trend/Change Control Log

ltem #	Date Initiated	Change Description			CMB No.	Change St	atus	Impact +Exposure/(Benefit	Comments	Contract Modification Number	Utility Reimbursements
						Approval Action	Approval Date	Actual/Forecast			
1252-0006	04/23/12	8	TIA - Associated w/ COR 001, COR 002, and COR 003	6		Agree to Merit	10/10/12	+269,904	10/10/12 - Merit info associated w/COR's 001, 002 & 003 presented to CMB - Agreed. 01/30/13 Elevation Ladder documenation presented for review of unresolved issue of payment of Indirect		
1252-0007	06/12/12	9	MOS - Live Utilities: PGE, AT&T, and SFWD 8" Water Line extra kill hole location	2		Agree to Merit	11/14/12	+49,007	Live PG&E Electrical Lines Conflict: BIH was notified that PG&E had live electrical lines running through each headwall work zone @ Moscone station. 8 inch Low Pressure Water Line Conflict: Contract drawings show this utility to be abandoned and capped prior to work. Synergy struck and damaged the water line. SFWD directed Synergy to excavate a kill hole so they could properly abandon the line. 11/04/12 - COR Evaluation for Merit presented to CMB.		
1252-0008	06/19/12	10	MOS - Demo PGE duct bank / SF City 911 fiber optic line	2	CMB-0094	Agree to Merit Agree to Cost	10/10/12 1/16/13	+4,916	Upon excavation of the MOS north headwall, BIH's subcontractor Synergy Project Management (SPM) uncovered a PG&E duct bank that contained a live San Francisco 911 fiber optic line.  11/14/12 - Presented to CMB. The narrative will be rewritten CMB agrees with partial merit labor work involved in supporting the utility agencies. This item will be brought back to the CMB for approval.  01/09/13 - CMB - NOT TO EXCEED Amount 4,919.54  04/01/13 - CM team must obtain in writing from PG&E a utility agreement for cost reimbursement.	CMOD #3 Approved	(4,916)
1252-0009	07/02/12	11	MOS - Traffic Signal line re-route south headwall	6	CMB-0095	Agree to Merit Agree to Cost	1/16/13	+37,500	After potholing Synergy discovered several traffic lines which were in the proposed location of the south MOS headwall. Traffic Lines re-routed. 01/16/13 - CMB - NOT TO EXCEED Amount \$37,500		
1252-0010	01/00/00	12	MOS - Archaeological Standby North Headwall	2	CMB-0096	Agree to Merit Agree to Cost	12/11/12 1/16/13	+16,892	Upon excavation of the MOS north headwall, BIH's subcontractor Synergy Project Management (SPM) uncovered a layer of "Midden" or Native American debris.  12/11/12 - Merit info presented to CMB - Agreed 01/16/13 - CMB - NOT TO EXCEED Amount \$7,600	CMOD #6 Approved	
1252-0011	07/06/12	13	PCC No. 13 - MOS - SL conduit from PG&E vault @ north headwall	6		Agree to Merit	11/28/12	+10,903	Permanent power is required to supply an existing Street Light box north of the MOS N headwall.  11/28/12 - Merit info presented to CMB - Agreed  04/01/13 - CM team must obtain in writing from PG&E a utility agreement for cost reimbursement.		(10,903)
1252-0012	06/26/12	15	LB - Pre-Excavation for Slurry Walls	2	CMB-0087	Agree to Merit Agree to Cost	11/28/12 12/19/12	+96,000	Pre-excavation of slurry wall panels due to CDF encased sewer line. The concrete encasement was found by the Contractor to extend to a depth of 9'-11' below the top of guide wall or street surface. The 8" VCP sewer main and concrete encasement was incorrectly shown in the contract drawings to be approximately 4'-5' below the street surface.  11/28/12 - Merit info presented to CMB - Agreed 12/19/12 - CMB - NOT TO EXCEED Amount \$96,000		
1252-0013	07/02/12	17	MOS - Standby Time @ south headwall due to live TS lines	6		Agree to Merit	11/21/12		Standby delays related to the discovery of traffic lines within the proposed location of the south MOS headwall.  11/14/12 - COR presented to CMB. CMB requested additional revisions to the evaluation. CMB agrees with partial merit. The COR will be brought back to the CMB for approval.  11/21/12 - COR revisited at mtg for clarification the issue is related to CMB action from item 3 -7/25/12 (Mtg #88) specifically acted on 08/01/12 (CMB Mtg. 89) referred originally as Trend #15.		
1252-0014	Closed	19	UMS - Grant street 2 way conversion (e- & striping)	7					In order to implement a full street closure for Stockton Street at the UMS location the DPT recommended that Grant Street be converted from an existing one-way street to a two way street for vehicular traffic. Closed - Work is done.  07/18/12 - This potential change was brought before the CMB. Board's decision to have DPT perform the work.  CLOSED; NO FUTHER ACTION		
1252-0015	06/22/12	20	PROJECT WIDE - Utility Demo limit reduction credit	5					BIH's subcontractor Synergy Project Management (SPM) would like to minimize the limits of utility demo at the Launch Box, Moscone station, UMS station and TBM Retrieval Shaft locations. Closed - SFMTA to BIH/SPM "Build per Plan".		
1252-0016	04/02/12	21	UMS - Reduced Duration	5	CMB-0073	Agree Cost (Conditionally)	8/01/12	-0-	No cost change for acceleration of utility relocation, ground improvements (jet grouting), and headwall construction at Union Square/Market Street Station. 08/01/12 - CMB approval condition upon incorporating correctness to backup documentation as required by & documented in CMB mtg. RE to prepare modification.	CMOD #8 Approved	
1252-0017	07/10/12	22	MOS - Asbestos Pipe at north headwall	2	CMB-0090	Agree to Merit Agree to Cost	12/12/12 1/09/13	+5,705	Upon excavation of the MOS north headwall, BIH's subcontractor Synergy Project Management (SPM) uncovered friable asbestos-laden transite pipe.  12/12/12 - Merit info presented to CMB - Agreed 01/09/13 - CMB - NOT TO EXCEED Amount \$6,000	CMOD #5 Approved	
1252-0018	07/10/12	23	MOS - Brick Wall #2 discovered @ north headwall	2		Agree to Merit	12/6/12	+14,997	Upon excavation of the MOS north headwall, BIH's subcontractor Synergy Project Management (SPM) uncovered a buried wall.  11/14/12 COR presented to CMB. Evaluation for merit will be rewritten and brought back to CMB for approval.  11/21/12 - Merit info presented to CMB - Agreed		

- Owner Directed Change in Scope 2 - Unforeseen Conditions

Item#	Date Initiated	ed Change Description		Change Type	CMB No.	Change St	tatus	Impact +Exposure/(Benefit	Comments	Contract Modification Number	Utility Reimbursements
						Approval Action	Approval Date	Actual/Forecast			
1252-0019	08/10/12	26	MOS - Asbestos Pipe at south headwall	2	CMB-0085	Agree to Merit Agree to Cost	12/12/12 1/09/13		Transite pipe was discovered during MOS south headwall excavation. 12/12/12 - Merit info presented to CMB - Agreed 01/09/13 CMB - NOT TO EXCEED Amount \$30,000	CMOD #15	
1252-0020	08/10/12	27	MOS - Oil filled pipe at south headwall	2	CMB-0089	Agree to Merit Agree to Cost	12/12/12 1/09/13		A pipe containing oil was discovered during MOS south headwall excavation. 12/12/12 - Merit info presented to CMB - Agreed 01/09/13 CMB - NOT TO EXCEED Amount \$8,600	CMOD #5 Approved	
1252-0021	06/19/12	29	MOS - Todco scaffolding reimbursement	2	CMB-0097	Agree to Merit Agree to Cost	12/12/12 1/16/13	+1,718	1252 contract work requires the removal of scaffolding erected by Fine Line Construction, the contractor performing renovations on the Woolf House. 12/12/12 - Merit info presented to CMB - Agreed 01/09/13 - CMB - NOT TO EXCEED Amount \$1,717	CMOD #3 Approved	
1252-0022	Closed	closed	Disputed Work Items - NTP2 vs. NTP3	7				-0-	BIH interpretation of Special Provisions SP-3 NTP2 description includes activities that SFMTA interprets to be within NTP3. These activities include: Ellis Street and Green Street shafts and associated compensation grouting, MOS headwalls and jet grouting, jet grouting at cross passage 5, UMS head walls and jet grouting, OCS removal along Stockton Street from Geary to Ellis, and the TBM retrieval shaft. On April 13, SFMTA released the MOS headwalls and jet grouting, jet grouting at cross passage 5, UMS jet grouting, OCS removal along Stockton Street from Geary to Ellis, and preparatory and utility work necessary for the construction of the retrieval shaft.		
1252-0023	05/30/12	4	Manhole in east guidewall footprint	2				-0-	While performing excavation for the east side guidewalls at the TBM Launch Box, BIH's subcontractor CJA-NCC encountered a manhole near the bottom of the excavation which was unexpected. BIH has stated that removal of the manhole prior to the installation of the guidewalls was necessary to ensure the successful installation of the slurry walls.		
1252-0024	Closed	closed	2" gas line inside 16" casing	2					While performing excavation for the Sewer and AWSS trench at the intersection of Fourth and Harrison streets, BIHJV's subcontractor Synergy encountered what was identified to be a 16" depressurized gas main. This gas main contained a 2" gas line which is shown on contract drawing UD-502 to be abandoned/removed.		
1252-0025	04/23/12	5	CDF Encasement on 42" RCP	2					While performing excavation for the east side guidewalls at the TBM Launch Box, BIH's subcontractor CJA/NCC encountered a CDF backfill at the existing 42" RCP sewer which reportedly had a significantly higher compressive strength than the 50-150 psi. which was anticipated. BIH claims that the CDF conflicted with the construction of the guidewalls and it could not be excavated by conventional means.		
1252-0026	Closed	closed	Damage to Live LPW main at 4th and Folsom	2				-0-	Synergy Demo Crew hit a blow-off valve on the 8" water line at the Southwest corner of the MOS headwalls. SFWD is to install a permanent cap per contract drawing WD-404.		
1252-0027	Closed	14	MOS - 76 Gas Station fencing	1					SFMTA requested BIH to install fencing around the perimeter of the 76 gas station at 4th and Folsom St. Issue closed, cost of fence paid by BIH in return for use of gas station lot.  CMB - Temporary use of 800 Folsom Street site for construction staging. Use of this site would be a tradeoff between SFMTA and BIH. The Contractor would maintain the sites security and up-keep in exchange for not billing.		
1252-0028	Closed	16	LB - SPTC delays due to concrete encased 8" sewer	2					Closed. Combined with COR 015. 07/25/12 - Verbal information presented to CMB as a potential change.		
1252-0029	08/06/12	18	MOS - South Headwall re-design	1				+145,000	Costs related to leave end stops in place and a "T-Section" at the Moscone headwalls return walls.  11/14/12 - Presented to CMB. RE is recommending a possible compensation value of \$135K. CMB agrees with partial merit for labor and material cost of this COR. RE will proceed with scoping the work.  04/17/13 - Elevation Ladder of unresolved issue of End Stops presented to CMB - COR 018		
1252-0030	08/02/12	24	Ellis - Utility demolition	3		Agree to Merit	12/6/12	+38,678	BIH says that no utilities were shown at Ellis; however, Reference Drawing UE-126 shows utilities. 12/06/12 - Merit info presented to CMB - Agreed		
1252-0031	Closed	25	Crack Gauges	4				-0-	BIH disagrees with SFMTA on the total number of crack gauges to be installed on the project. Per the contract drawings a total of 926 crack gauges are to be installed. BIH claims that a total of 50 are to be installed.		
1252-0032	08/07/12	28	Ellis asbestos abatement	2		Agree to Merit	12/6/12	+35,386	A steam line containing asbestos was discovered during potholing at the Ellis Street Shaft. 12/06/12 - Merit info presented to CMB - Agreed		
1252-0033	-	30	LB - Class 1 Hazardous Material Haul off	2				+198,276	BIH trucking costs for Class 1 haul off generated at staging yard. Also see COR 054 regarding Class 1 Haz material haul off for Phase 2.		

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1252-0034	-	70		LB - Jet Grout Quantity Overrun	4	CMB-0115	Agree to Merit Agree to Cost	3/20/13 04/03/13	+768,600	The contract drawings call for the contractor to determine the extent of jet grouting at the launch box. Bid Item ES-3 has an estimated quantity of 2,831 CY of in-situ treated ground. The Contractor has currently installed 3,929 CY of Soilcrete (Jet Grout) for ground treatment. This translates to an additional quantity of 1,098 CY of ground treatment beyond the quantity listed for Bid Item ES-3. By subtracting 241 CY for the "scallop" portion of the columns the total is 857 CY. 03/20/13 - Merit info presented to CMB - Agreed 04/03/13 - CMB - NOT TO EXCEED Amount \$599,900		
1252-0035	01/00/00	unsubmitted		Utility Removal UD-304 and UD-503	6				TBD	RFI 00134 asks whether certain utilities indicated on drawings UD-304 (On Stockton inside limits of future UMS Station) and on UD-503 (On Fourth and Stillman Streets outside limits of Launch Box) may be left in place. Answer: "Confirmed, the utilities in question can be abandoned in place and are not required to be removed. The Engineer will seek an adjustment to Bid Item GB-3 for the elimination of this work."		
1252-0036	05/17/12	35		Additional Road Base on Fourth Street	2			12/6/12	+7,000	BIH's subcontractor Synergy Project Management (SPM) discovered what they believe to be an additional layer of road base under the existing asphalt and road base layer while performing roadway demo work along the west side of Fourth street between Harrison and Bryant St. The additional layer is estimated by BIH/SPM to be approximately 8" - 12" thick.  12/06/12 - Evaluation of merit presented to CMB - Agreed to No Merit for this change.		
1252-0037	01/00/00	unsubmitted		DPW permitting potential impacts	7				TBD	DPW Permitting issue to cause potential impacts. DPW is not issuing BIH permits for excavating the MOS headwalls, jet grouting at the LB, and excavating support at the LB, as they claim to have not been able to conduct a thorough review of the project's design documents and were not included in the design process. BIH may be required to re-sequence and stand many other potential impacts w/o said permits.		
1252-0038	05/30/12	38		Manhole in West Guidewall Footprint	3	CMB-0101	Agree to Merit Agree to Cost	12/05/12 1/23/13	+3,821	While performing excavation for the west side guidewalls at the TBM Launch Box, BIH's subcontractor CJA-NCC unexpectedly encountered a manhole foundation within the excavation at approximate station 165+70. It was necessary to chip away a portion of the existing manhole to gain the necessary clearance to construct the west slurry wall.  12/05/12 - CMB agreed with Evaluation of Merit 01/23/13 - CMB - NOT TO EXCEED Amount \$4,052.17	CMOD #12 Approved	
1252-0039	01/00/00	unsubmitted		Panel W-33 Obstruction	2				TBD	While performing excavation for the slurry walls at the TBM Launch Box, BIH's subcontractor CJA-NCC unexpectedly encountered buried (wood pile?) debris located approximately 12 feet below the guide wall within Launch Box Diaphragm Wall Panel W-33, This trend is being tracked separately from Trend 20 because we believe it may be a different structure. BIH has not provided adequate information substantiating the merging of the two trends.		
1252-0040	08/23/12		PCC 1	PCC No.1 - Revisions to Moscone North Headwall Elevation (Top)	1	CMB-0099	Agree to Cost	1/16/2013	+20,358	SFMTA initiated change to revise headwall elevations to facilitate a change in the roof elevation of MOS station. 01/16/13 CMB - NOT TO EXCEED Amount \$20,500	CMOD #7 Approved	
1252-0041	08/23/12		PCC 2	PCC No. 2 - Revisions to UMS Headwall Concrete and Reinforcement Limits	1					SFMTA initiated change to revise UMS headwall concrete and reinforcement limits to provide a cost savings. 08/29/12 - Revised PCC presented to CMB		
1252-0042	08/24/12	31		Retrieval Shaft - Unmarked 12" Steel Pipe	2	CMB-0108	Agree to Merit Agree to Cost	1/2/2013 2/27/13	+1,200	While performing excavation for the joint trench at the retrieval shaft BIH's subcontractor Synergy Project Management (SPM) discovered an abandoned 12" dia. steel pipe which appears to run continuously under Columbus Ave. 01/02/13 - Merit info presented to CMB - Agreed 2/27/13 - Cost presented to CMB - agreed to NTE \$1,250 04/01/13 - No reimburesment from SFWD.	CMOD #13	
1252-0043	08/31/12	32		LB - Panel W29 Wood Pile	2		Agree to Merit	11/28/12	+81,000	While performing excavation for the slurry walls at the TBM Launch Box, BIH's subcontractor CJA-NCC unexpectedly encountered what appeared to be a wood pile within Launch Box Diaphragm Wall Panel W-29. 11/28/12 - Merit info presented to CMB - Agreed		
1252-0044	09/04/12	33		Ret Shaft - 20" Water Line Conflict	2		Agree to Merit	11/14/12	-0-	During excavation for the joint trench at the retrieval shaft SPM discovered that the MRY Duct Bank is directly above an active 20" low pressure waterline. As a result the work at the Retrieval Shaft must reportedly be altered.  11/14/12 - Presented to CMB, the CMB agrees with some merit of this COR, element of change not define clearly. RE will proceed with scoping the work.		
1252-0045	09/11/12	34		LB - Panel W28 Wood Pile	2				+81,000	While performing excavation for the slurry walls at the TBM Launch Box, BIH's subcontractor CJA-NCC unexpectedly encountered what appeared to be a wood pile within Launch Box Diaphragm Wall Panel W-28.		

Owner Directed Change in Scope
 2 - Unforeseen Conditions
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 7 - Other

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1252-0046	01/00/00	36	MOS - Catch Basin @ south headwall	3				-0-	A catch basin on the NW corner of 4th and Folsom interfered with the construction of the MOS Headwalls. Removal of the catch basin was needed in order for the headwalls to be built. BIH claims the catch basin was not shown in the contract drawings. Closed due to improper notification.		
1252-0047	01/00/00	37	UMS - 12" steel pipe removal	3				+3,500	A 12" steel pipe at the north UMS headwall location interfered with the demolition of other existing UMS utilities. BIH claims the steel pipe was not shown in the contract drawings. Closed due to improper notification.		
1252-0048	09/07/12	39	MOS - 16" Steel Pipe removal @ northeast headwall	3	CMB-0102	Agree to Cost	1/23/13	+2,952	SPM removed an unmarked 16" steel pipe from the excavation of the NE MOS Headwall. Construction of the MOS headwall could not commence without this utility being removed. BIH claims the 16" steel pipe was not shown in the contract drawings. 01/23/13 - CMB - NOT TO EXCEED Amount \$2,951.99 04/01/13 - CM team must obtain in writing from PG&E a utility agreement for cost reimbursement.	CMOD #14	(2,952)
1252-0049	01/00/00	40	MOS - Extra Road Base @ northeast headwall	2				-0-	BIH's subcontractor Synergy Project Management (SPM) discovered what they believe to be an additional layer of road base under the existing asphalt at the NE MOS headwall location. The road base in this location was approx. 20" thick on a patch that was roughly 25' x 25'. Closed due to improper notification.		
1252-0050	05/18/12	41	LB - Impacts due to live PG&E electrical lines (Synergy)	6	CMB-0098	Agree to Merit Agree to Cost	1/16/13	+1,217	Based on direction from the SFMTA, Synergy provided a full time flagger for one night shift of work @ the intersection of I-80 off-ramp near 4th/Bryant streets in order to assist PGE while they performed the abandoning of the existing live PGE electrical at the Launch Box location which was shown to be dead in the contract drawings.  01/13/13 - CMB agreed with Evaluation of Merit  01/16/13 - CMB - NOT TO EXCEED Amount \$1,245  04/01/13 - CM team must obtain in writing from PG&E a utility agreement for cost reimbursement.	CMOD #10 Approved	(\$1,217)
1252-0051	01/00/00	executed	Contract Amendment No. 2	1				(3,040,713)	0	CMOD #2 Approved	
1252-0052	08/17/12	42	LB - Panel W25 Wood Pile	2		Agree to Merit	11/28/12	+116,785	While performing excavation for the slurry walls at the TBM Launch Box, BIH's subcontractor CJA-NCC unexpectedly encountered an obstruction within Launch Box Diaphragm Wall Panel W-25. 11/28/12 - Evaluation of merit presented - CMB agreed		
1252-0053	08/22/12	43	LB - Panel W30 Wood Pile	2		Agree to Merit	11/28/12	+47,185	While performing excavation for the slurry walls at the TBM Launch Box, BIH's subcontractor CJA-NCC unexpectedly encountered an obstruction within Launch Box Diaphragm Wall Panel W-30. 11/28/12 - CMB agreed with Evaluation of Merit		
1252-0054	09/19/12	44	MOS - 16" steel pipe removal @ southeast headwall	3	CMB-0109	Agree to Merit Agree to Cost	12/06/12 2/27/13		SPM removed an unmarked 16" steel pipe from the excavation of the NE MOS Headwall. Construction of the MOS headwall could not commence without this utility being removed. BIH claims the 16" steel pipe was not shown in the contract drawings.  12/06/12 - CMB agreed with Evaluation of Merit 02/27/13 - Cost presented to CMB - agreed to NTE \$1,800 04/01/13 - CM team must obtain in writing from PG&E a utility agreement for cost reimbursement.	CMOD #14	(1,600)
1252-0055	06/09/12	45	Ret Shaft - Credit for reduced AT&T conduits	6				1001	Credit to install 2 less conduits in the AT&T infrastructure at the Retrieval Shaft Joint Trench. The conduit notes on page JT-701 of the contract documents require 8 EA 4" conduits as laid out on the AT&T line. The reduced materials would result in 6 EA 4" conduits as a result.  04/01/13 - CM team must obtain in writing from AT&T a utility agreement for cost reimbursement.		(331)
1252-0056	09/25/12	46	UMS - Unmarked steel pipes (6", 12", 14") / Duct Bank	6	CMB-0103	Agree to Merit Agree to Cost	12/06/12 1/23/13	+7,475	While performing excavation for the utility demolition at the south UMS headwall BIH/Synergy discovered a 6" dia. steel pipe, 16" dia. steel pipe, 18" dia. steel pipe, and a concrete duct bank. BIH claims the utilities were not shown in the contract drawings.  12/206/12 - CMB agreed with Evaluation of Merit 01/23/13 - CMB - NOT TO EXCEED Amount \$7,461		
1252-0057	09/25/12	47	Ret Shaft - unmarked 10" steel pipe/duct bank	6	CMB-0104	Agree to Merit Agree to Cost	12/06/12 1/23/13		Synergy Project Management (SPM), discovered an abandoned duct bank and 10" steel pipe which traveled underneath Columbus Avenue between Powell and Union Streets. Removal of the duct bank was necessary to complete the construction of the 36" RCP sewer main relocation work in this area. The status of the removal of the steel pipe is uncertain and may have not been necessary for the sewer main relocation.  12/06/12 - CMB agreed with Evaluation of Merit 01/23/13 - CMB Not to Exceed \$2,201 04/01/13 - No reimburesment from SFWD	CMOD #13	

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1252-0058	09/28/12	48		UMS - 3'x5' brick sewer at south headwall	6	CMB-0114	Agree to Merit Agree to Cost	12/06/12 03/13/13	+12,475	Synergy Project Management (SPM), discovered a brick sewer within the utility demolition limits at the UMS South headwall. The sewer encountered was larger than the 12" pipe which was shown in the contract drawings. Removal and disposal of the sewer commenced on September 26th and was completed by September 28th. Removal of the sewer was necessary for headwall construction.  12/06/12 - CMB agreed with Evaluation of Merit 03/13/13 - CMB - NOT TO EXCEED Amount \$12,474.65		
1252-0059	01/00/00	49		Ret Shaft - Tree trimming debris haul off	7				-0-	Synergy Project Management (SPM), was requested by the SFMTA to remove and dispose of debris near the Northeast corner of Columbus Avenue and Union Street. The debris resulted from tree trimming activities performed by MUNI operations. CLOSED; NO FURTHER ACTION.		
1252-0060	10/10/12	50		Ret Shaft - 12" steel pipe removal at Union/Columbus	6	CMB-0110	Agree to Merit Agree to Cost	12/12/12 02/27/13	+2,200	On October 4th 2012, the Contractor discovered and removed a 12" Steel pipe at the intersection of Union Street and Columbus Avenue. Removal and disposal of the steel pipe was necessary in order to complete the proposed sewer re-location work near the Retrieval Shaft. Sewer work included the construction of a manhole which had been positioned in the field to avoid an existing MUNI duct bank. 12/12/12 - CMB agreed with Evaluation of Merit 02/27/13 - Cost presented to CMB - Agreed to NTE \$2,600 04/01/13 - No reimbursement from SFWD	CMOD #13	
1252-0061	10/11/12	51		Ret Shaft - Elevation design conflict (30" low psi water / sewer)	3		Agree to Merit	3/13/13	+26,000	03/13/13 - Merit info presented to CMB - Agreed		
1252-0062	09/07/12	53		Chinatown - Night drilling for instrumentation	7					Closed.		
1252-0063	-	54		LB Class 2 Hazardous Material Haul Off (Phase 2)	2				+110,967	BIH trucking costs for Class 1 haul off generated at staging yard. Also see COR 030 regarding Class 1 Haz material haul off for Phase 1.		
1252-0064	10/10/12		PCC 4	PCC No. 4 - Ret shaft sewer pipe material change	1				-0-	Change approximately 65 ft. of pipe for sewer bypass around the TBM Retrieval Shaft from 3' X 5' oval glass fiber reinforced pipe to a 48-inch (OD) HDPE SD-17 pipe with casing insulator placed inside a 54-inch diameter, ½-inch thick steel casing pipe. In addition, delete permanent sheet pile wall that was to have been placed along the west side of the trench to facilitate future maintenance access to the sewer along the shaft.		
1252-0065	12/18/12	57	PCC 8	PCC No. 8 - UMS - Tree Removal	1				-0-	SFMTA is directing removal of a tree at the northeast corner of Stockton and O'Farrell St. CLOSED; NO FURTHER ACTION.		
1252-0066	10/10/12		PCC 5	PCC No. 5 - Ret Shaft Water Dist. Pipe Material Change	1				-0-	Change material type of approximately 188 linear feet of 20-inch water line and approximately 125 linear feet of 30-inch water line from Welded Steel Pipe (WSP) to Ductile Iron Pipe (DIP) with TR-Flex joints. Install 6-inch thick concrete cap over 20-inch water line where cover is less than 24 inches.		
1252-0067	10/26/12	58		Ret Shaft - Additional 10" steel pipe removal	6	CMB-0111	Agree to Merit Agree to Cost	12/12/12 02/27/13		Work is a continuation of work performed in COR 047. 12/12/12 - CMB agreed with Evaluation of Merit 02/27/13 - Cost presented to CMB - Agreed to NTE \$860.85	CMOD #13	
1252-0068	10/10/12		PCC 3	PCC No. 3 - General Detour Signage	1	CMB-0113	Agree to Cost	02/27/13	-0-	Full closure of Stockton Street at Union Square was not anticipated under the 1252 Contract. The implementation of detour signage associated with the full closure of Stockton Street was to occur under the 1300 Contract. After the award of the 1252 Contract it was decided that a full closure of Stockton could be implemented to help reduce the headwall construction durations. As a result of the full closure the City Traffic Engineer has requested that a portion of the 1300 detour signs be installed now under the 1252 Contract to help alleviate traffic congestion and provide better detour signage around Union Square. 10/03/12 - PCC presented to CMB. CMB directed the RE to get a price quote from DPT do the work as a price comparison. This item will be brought back to the CMB at a later date. 11/14/12 - PCC presented to CMB. The CMB did not agree that Central Subway needed to take the lead on implementing detour signage, but suggested that the RE study the traffic activity and at the end of November report findings. 02/27/13 - Cost presented to CMB - Agreed to NTE \$6,152.60		
1252-0069	11/08/12		PCC 6	PCC No. 6 - Supplemental instrumentation of BART tunnel lining.	1				+657,884	Implement additional instrumentation of BART tunnel lining: (A) Existing bolt preload force – Determine the actual load in 12 bolts. (B) Bolt force sensor – Install 12 bolt force sensors at bolts for a total of 24 bolts. (C) Rail movement under dynamic train loading – Install dynamic strain gauges (2 per rail, 8 per tunnel).  10/31/12 - PCC presented to CMB for merit. CMB directed RE to proceed with obtaining a price quote from Contractor to perform the work.		
1252-0070	01/00/00	unsubmitted		Full Closure of 4th Street	1					SFMTA allowed full closure of 4th Street in order to facilitate construction of Launch Box Slurry Wall Construction Week Ending 11/04/12 - 11/11/12.		

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1252-0071	11/07/12	61		LB - Panel P-17 Buried Obstruction	2		Agree to Merit	1/2/13		CJA-NCC discovered an unmarked buried water main at Panel P-17, approximately 6' below the guidewall at CTL Station 165+52, while performing slurry diaphragm wall excavation. 01/02/13 - CMB agreed with Evaluation of Merit.		
1252-0072	11/14/12	62		LB – Panel P-9 Buried Obstruction	2		Agree to Merit	1/23/13		CJA-NCC discovered a buried obstruction while excavating slurry diaphragm wall panel P-9 at the Launch Box location. 01/02/13 - Presented to CMB for merit, CMB did not agree. CMB suggested inspector's daily tags as backup or reference the tag numbers in the write-up when force account work is involved. 01/23/13 - Revised write up presented CMB agreed with Evaluation of Merit.		
1252-0074	11/16/12	65		LB – Panel P-12 Buried Obstruction	2		Agree to Merit	1/23/13	+150,000	CJA-NCC discovered a buried obstruction (water main) while excavating slurry diaphragm wall panel P-12 at the Launch Box location. 01/02/13 - Presented to CMB for merit, CMB did not agree. CMB suggested inspector's daily tags as backup or reference the tag numbers in the write-up when force account work is involved. 01/23/13 - Revised write up presented; CMB agreed with Evaluation of Merit.		
1252-0075	11/19/12	66		Retrieval Shaft - Unmarked 12" Steel Pipe	2	CMB-0112	Agree to Merit Agree to Cost	1/23/13 02/27/13	+3,700	While performing excavation for the joint trench at the retrieval shaft BIH's subcontractor Synergy Project Management (SPM) discovered an abandoned 12" dia. steel pipe which appears to be a Low Pressure Water Main. 01/23/13 - Merit info presented to CMB - Agreed 2/27/13 - Cost presented to CMB - Agreed to NTE \$3,800 04/01/13 - No reimbursement from SFWD	CMOD #13	
1252-0076	11/19/12	67		LB - Panel P-10 Buried Obstruction	2		Agree to Merit	1/23/13		CJA-NCC discovered a buried obstruction or concrete encased clay sewer pipe, approximately 7' below the top of the guide wall while excavating slurry diaphragm wall panel P-10 at the Launch Box location. 01/02/13 - Presented to CMB for merit, CMB did not agree. CMB suggested inspector's daily tags as backup be attached or reference the tag numbers in the write-up when force account work is involved. 01/23/13 - Merit info presented to CMB - Agreed		
1252-0077	12/21/12		PCC 7	PCC No. 7 - Bart Temporary Annex Wall	1	CMB-0106	Agree to Cost	1/30/13	+15,500	SFMTA is requesting Contractor construct temporary wall for Bart Annex for SFMTA use. 01/30/13 - CMB - NOT TO EXCEED Amount \$15,380	CMOD #11 Approved	
1252-0078	12/28/12		PCC 9, FA CO 1	PCC No. 9 - UMS Headwall - Unknown Buried Pipe	1	CMB-0100	Agree to Merit Agree to Cost	1/16/13 1/16/13	+42,000	Related to COR 063. SFMTA instructed BIH to perform investigation into the 48" diameter steel pipe as it is a Differing Site Condition. 01/30/13 01/16/13 - CMB - NOT TO EXCEED Amount \$75,000 04/01/13 - CM team must obtain in writing from AT&T a utility agreement for cost reimbursement.	CMOD #4 Approved	(42,000)
1252-0079	01/09/13		PCC 10, FA CO 3	PCC No. 10 - Relocation of TBM Retrieval Shaft	1					Modify Bid Item ST-4 Construction of Base Bid Permanent Retrieval Shaft to relocate the TBM retrieval Shaft to 1731-1741 Powell Street - 01/09/13 - Draft PCC10 presented to CMB for Contractor Design Activity to be paid on Force Account. NTE value \$20K presented to CMB as a draft copy, final copy distributed to the Contractor increased to \$50K. 02/20/13 - COST IS NOT REFLECTED HERE - SCOPE IS FUNDED BY OTHER CPT 690 \$\$\$\$ 03/06/13 - Cost proposal received from BIH. SFMTA will develop a detail estimate of what is believed to be the scope of work. 03/13/13 - PCC 10 presented for CMB change approval of \$50K NTE amount to perform design activities. CMB requested CM team return with a more detailed estimate, Contractor's cost proposal of the bulleted items as listed on the PCC and backup documentation as evidence of work completed by the Contractor.		
1252-0080	12/19/12	0		Segment Measuring Frequency	7				(1.300.000)	RFI 203.1 - In light of gauging frequency, and the difficulties of erecting a ring with cast in gaskets, BIH JV alternately proposes to assemble a ring on the Master ring at an interval of every 500th ring cast. The assembled ring would be comprised of randomly selected segments, or segments chosen by the Engineer.		
1252-0081	09/09/12	0		F21 and Old Navy Instrumentation Proposal	7				-0-	Wang Technology is proposing instrumentation changes to the Liquid Level Sensors and Tilt Beams in the basements of Old Navy and Forever 21.		

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1252-0082	01/14/13	68		UMS – AT&T Vault Walkway @ N Headwall	2		Agree to Merit	1/16/13	+2,000	SPM discovered an walkway at the UMS north headwall. This walkway is located at the UMS north headwall and connects the south AT&T vault, located within the utility demolition limits, to an north AT&T, located outside of the utility demolition limits. SPM proposes to construct 3'x5' wall to the extents necessary, inside this walkway. The wall will be constructed of plywood and necessary reinforcement in order to create a bulkhead that will isolate the walkway and north vault from the south vault. 01/16/13 - CMB recommendation Contractor/Sub-contractor proceed on Force Account with a "Not to Exceed Amount" \$2K. 04/01/13 - CM team must obtain in writing from AT&T a utility agreement for cost reimbursement.		(2,000)
1252-0084	01/24/13		PCC 11, FA CO 2	PCC No. 11 - UMS – Cap and Remove 48" Steel pipe	1	CMB-0105	Agree to Cost	1/23/13		BIH/Synergy encountered a buried 48" Diameter steel pipe during work at the UMS S. Headwall. The pipe is located 6 feet from the south UMS headwall and 5 feet from the face of the curb. This PCC is to complete removal of pipe @ S. Headwall and Investigate and remove pipe if necessary @ the North headwall.  01/30/13 - CMB - NOT TO EXCEED Amount \$150,000  04/01/13 - CM team must obtain in writing from AT&T a utility agreement for cost reimbursement.	CMOD #9 Approved	(150,000)
1252-0085	01/24/13	71		LB – Ramp Excavation Obstructions	2		Agree to Merit	4/3/13		BIHJV encountered numerous groups of wood piles while performing excavation of the Launch Box ramp. The wood piles are approximately 16"+ in diameter and are located along the north and south perimeter walls of the Launch Box ramp excavation area.  01/30/13 - CMB did not agree with merit of change suggestion the RE negotiate w/Contractor for another concession.  04/03/13 - COR merit evaluation presented to CMB again due to a greater number of obstruction encountered. CMB - Agreed to Partial Merit		
1252-0086	02/08/13	72		Ellis Shaft Jet Grout Obstruction	2				+54,000	On February 6th, 2013, CJA/NCC was drilling column R3 of the Ellis Shaft and reported hitting an obstruction 52ft below existing grade. The obstruction reportedly caused the jet grout monitor to shear off. At this time it is not known what the obstruction is or if it caused the monitor to be sheared off.		
1252-0087	02/14/13	73		MOS - Unknown 16" Pipe removal @ northwest headwall	2		Agree to Merit	3/13/13	+1,071	BIH-JV's subcontractor, Synergy, encountered an abandoned 16" pipe while installing the 12" waterline at the north headwall of Moscone. The pipe was at the same elevation as the new 12" waterline and therefore needed to be removed to facilitate the installation of the new 12" waterline.  03/13/13 - Merit info presented to CMB - Agreed  04/01/13 - CM team must obtain in writing from PG&E a utility agreement for cost reimbursement.		(2,000)
1252-0088	NA	74		Whole Foods - Unknown brick obstruction in Comp Grout Trench	0				-0-	BIH has decided not to submit a COR as production was not significantly impacted.		
1252-0089	03/11/13	75		Hazardous Waste Disposal Denial - Spoils Containment Cost Impacts	7					BIH submitted change order request (COR) 030 seeking reimbursement for the demonstrated additional costs of excavating, handling and disposing of excavated material found to contain hazardous material to a permitted landfill over that which can be disposed of at an unregulated dump site. The SFMTA refused reimbursement for such costs under the hazardous waste bid item allowance. As a result of this determination, BIH is modifying its approach to the construction and handling operations of tunnel spoils generated during tunneling operations.		
1252-0090	03/08/13	76		MOS - 16" Pipe removal @ SW Headwall	2		Agree to Merit	3/20/13	+1,116	BIH-JV's subcontractor, Synergy, encountered an abandoned 16" pipe while installing the 12" waterline at the south headwall of Moscone. The pipe was at the same elevation as the new 12" waterline and therefore needed to be removed to facilitate the installation of the new 12" waterline.  03/20/13 - Merit info presented to CMB - Agreed 04/01/13 - CM team must obtain in writing from PG&E a utility agreement for cost reimbursement.		(2,000)
1252-0091	03/06/13	77		Comp Grout - WFB-5 Drilling Obstruction	2		Agree to Merit	4/3/13	+10,000	On March 06,2013, BIHJV encountered a potential Differing Site Condition (DSC) while drilling the compensation grouting hole WFB-5 located at Whole Foods and more precisely at CTL Station 160+38. This potential DSC consists of an obstruction located at a depth of 9' below grade which prevented CJA-NCC from drilling any further.  04/03/13 - Merit info presented to CMB - Agreed		
1252-0092	03/07/13	78		Comp Grout - WF & ATT	2			3/20/13		BIHJV encountered multiple potential Differing Site Conditions (DSC's) of varying dimensions while excavating the compensation grouting trench for the drill holes located at Whole Foods and AT&T. 03/20/13 - Merit info presented to CMB - Agreed to No Merit for this change.		

Owner Directed Change in Scope
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1252-0093	03/07/13	79		Comp Grout - Old Navy	2		Agree to Merit	3/20/13	+45,000	BIHJV encountered a potential Differing Site Condition (DSC) while sawcuttiing the pavement for the compensation grouting holes located at Old Navy. The original design was to drill the compensation grout holes between two existing PG&E lines. It was discovered in the field that there is not enough clearance between the existing PG&E lines for the original design to be possible and multiple other potential DSCs were also encountered including, but not limited to, tile duct banks, concrete of unknown contents, and steel pipes.  03/20/13 - Merit info presented to CMB - Agreed 04/01/13 - CM team must obtain in writing from PG&E a utility agreement for cost reimbursement.		(45,000)
1252-0094	03/12/13	80		MOS – Asbestos Wrapped 20" water line @ Headwalls	2		Agree to Merit	4/3/13		BIHJVs subcontractor, Synergy Project Management was performing the installation of low pressure water distribution piping at the Moscone north headwall and discovered an unknown material wrapping around the existing 20" waterline which appeared to contain asbestos material.  04/03/13 - Merit info presented to CMB - Agreed		
1252-0095	03/11/13	81		12" Waterline Tee Connection Location (MOS South)	2		Agree to Merit	4/3/13		BIHJV's subcontractor. Synergy Project Management, encountered a potential Differing Site Condition (DSC) upon exposing the tie-in point for the 12" waterline at the south headwall of Moscone. The potential DSC consists of two 45 degree elbows in the existing 12" waterline at the point of the tee connection. SFWD has surveyed the field conditions and indicated that the tee connection will need to be moved to the west.  04/03/13 - Merit info presented to CMB - Agreed		
1252-0096	03/13/13	82		MOS 20" Conflict with 16" AWSS @ South Headwall	2				+50,000	Upon exposing the existing 20" waterline at the south headwall of MOS, in preparation for installing the new 20" waterline shown on WD-403 and amended by RFI 0155, BIHJVs subcontractor Synergy Project Management encountered a potential DSC. The potential DSC consisted of a crossing conflict between the new 16" AWSS, the new 20" waterline, and the existing 6" PE gas. These three utilities cross at multiple locations however the existing depths are roughly the same.		
1252-0097	03/19/13	83		Ellis Shaft Concrete Obstruction	2		Agree to Merit	4/17/13	+4,000	During excavation for the Ellis Street Shaft, BIHJV's subcontractor, CJA-NCC, encountered a concrete obstruction at approximately 10 feet below grade. CJA-NCC spent 4 hours removing the obstruction. 04/17/13 - Merit info presented to CMB - Agreed		
1252-0098	03/16/13	84		Crate & Barrel Water Intrusion	2					Water was discovered seeping into the Crate & Barrel basement in concert with secant pile installation at Pile #SRV-A. At the time, pile excavation was approximately 90 feet deep. BIHJV's subcontractor, CJA-NCC, stopped pile installation and placed lean concrete within the pile excavation. This allowed them to continue secant pile construction on other piles until which time SFMTA could provide appropriate mitigation for the water leak.		
1252-0099	04/05/13		PCC 12	PCC No. 12 - Modifications to Tunnel Alignment at Market Street	1			4/3/13	TBD	IFB Tunnel Profile conflicts with micro-piles installed under Contract 1251. Tunnel Profile needs to be revised (lowered) such that TBM and Tunnel structure is below previously installed micro-piles.  Contractor shall revise compensation grouting design to conform to Contract requirements given the revised tunnel alignment.  04/03/13 - CMB agreed to Micropile profile change being forwarded to the Contractor.  04/10/13 - Updated alignment was presented superseding 04/03/10 version - (lowered 4.9%)  04/10/13 - Original Contractor submittal needs to be evaluated to verify the new alignment has been incorporated.		
1252-0100	03/26/13	85		SFWD Impacts at MOS North	2				+345,600	BIHJV's subcontractor CJA-NCC is in the process of constructing the Moscone Station headwalls, the sequence of construction is such that it requires the 12" and 20" waterlines on the eastside of 4th street to be rerouted prior to completing the headwalls. In accordance with the Contract the San Francisco Water Department (SFWD) is responsible for completing the waterline reroutes (chlorination and tie-in) in a specified duration. However the SFWD failed to complete this work in the contractual durations. As a result, BIHJV claims the headwall construction operation has been incurring stand by costs. 04/10/13 - Viewed at CMB during review of Trend/Change Log COR's. CM team contends the is not a valid change and will reject the Contractor's claim of merit.		
1252-0101	01/28/13	87		Cross Passage 5 - Value Engineering Change Proposal	5							
1252-0102	04/09/13	86		UMS - Secant Pile SRV-J Obstruction DSC	2					BIHJV's subcontractor, CJA-NCC, encountered a potential Differing Site Condition (DSC) while drilling for UMS Secant Pile #SRV-J. The DSC consists of what appears to be an abandoned utility pipe located approximately 10 feet deep.		

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						Approval Action	Approval Date	Actual/Forecast			
Contract 1252 T	otals								Total Changes and Potential Change (trends) to the contract are currently \$1,138,987  Out of Scope Changes to the Contract for Relocation of TBM (Trend 79, PCC 10) to be paid out of CPT690, funded separately. Not include in total above and being tracked separately from original Program Costs of \$1.5783B		(288,336)
CONSTRUCTION	N TRENDS (Based	d on #1252 Trending Log	g and CMod) - SUBTOTALS:					+1,138,987	The \$1,138,987 represents an UNDERRUN of allocated contingency.  Current Balance = (33,658,463 - 1,138,987 = \$32,519,476 This does not include potential reimbursements from utilities		(288,336)
DESIGN TREND	s										
FD-001	07/31/10	084-0001	Narrowing of Platform at UMS	1	CMB-0006	Agree	08/04/10	(800,000)	[In "Current Forecast" - Sep2010 Cost Report.]		
FD-002	07/12/10	084-0002	Redux of Station Emergency Ventilation Fans (UMS)	1	CMB-0009	Agree (Conditionally)	08/25/10		Further actions: Designer required to receive Fire/Life/Safety approval before proceeding with this change. Designer to allocate cost impacts by Station (Current figures are "place-holders.". [In "Current Forecast" - Sep2010 Cost Report.]		
FD-002	07/12/10	085-0001	Redux of Station Emergency Ventilation Fans (CTS)	1	CMB-0009	Agree (Conditionally)	08/25/10	(500,000)	Further actions: Designer required to receive Fire/Life/Safety approval before proceeding with this change. Designer to allocate cost impacts by Station (Current figures are "place-holders.". [In "Current Forecast" - Sep2010 Cost Report.]		
FD-002	07/12/10	086-0001	Redux of Station Emergency Ventilation Fans (MOS)	1	CMB-0009	Agree (Conditionally)	08/25/10	(500,000)	Further actions: Designer required to receive Fire/Life/Safety approval before proceeding with this change. Designer to allocate cost impacts by Station (Current figures are "place-holders.". [In "Current Forecast" - Sep2010 Cost Report.]		
FD-003	07/31/10	085-0002	Lowering of CTS	1	To be verified	Info Only	08/25/10	+7,000,000	Presented to CMB for information/consideration.		
FD-004	07/29/10	084-0003	UMS Structural Configuration	1	CMB-0007	Agree	08/18/10	(8,000,000)	[In "Current Forecast" - Sep2010 Cost Report.]		
FD-005	08/22/10	084-0004	UMS Alternate Station Access/Vent Shaft @ Union Square	1	CMB-0010	Agree	12/29/10	(22,500,000)	Documentation to be filed.		
FD-006	08/03/10	084-0005	Station Headwalls - UMS	1	CMB-0008	Agree	08/18/10	-0-			
FD-006	08/03/10	086-0002	Station Headwalls - MOS	1	CMB-0008	Agree	08/18/10	-0-			
FD-007	08/03/10		Cross-passages	1	CMB-0018	Agree	09/15/10	-0-			
FD-008	07/30/10		Trolley Re-route @ Columbus & Powell	1	CMB-0017	Agree	09/15/10	+2,000,000			
FD-009	10/06/10	082-0003	ECP to Modify Sidewalk Vault Demolition and Construction Sequence to Facilitate Construction of Joint Utilities Trench and Future UMS Station	1	CMB-0019	Agree	12/15/10	+3,000,000			
FD-010	10/06/10	082-0004	Redesign Stockton Street Sanitary Sewer to conform to SFPUC Sewer Criteria that preclude placement of relocated sanitary sewer under sidewalks	1	CMB-0020	Agree	11/17/10	+2,000,000			
FD-011	10/06/10	082-0005	Reconfigure Routing of Water, Sewer and Gas laterals from buildings on north side of Ellis Street	1	CMB-0021	Agree	11/17/10	+500,000			
FD-012	10/06/10	082-0006	Recognize cost transfers from design allowances allocated to contingency to explicit line items in final design estimates	1	CMB-0022	Disagree	11/17/10	-0-			
FD-013	10/06/10	082-0007	Increase Extent of Sub-sidewalks Vault Secondary Closure Walls and Waterproofing	1	CMB-0023	Agree 1 - Owner Directed C	11/17/10 nange in Scope	+4,100,000			

Owifer Directed Change in Sci 2 - Unforeseen Conditions 3 - Errors and Omissions 4 - Quantity Variation 5 - Value Engineering 6 - Private Utilities 7 - Other

Item #	Date Initiated		Change Description	Change Type	СМВ No.	Change Sta	atus	Impact +Exposure/(Benefit	Comments	Contract Modification Number	Utility Reimbursements
						Approval Action	Approval Date	Actual/Forecast			
FD-014	10/06/10	082-0008	Include OCS system for rerouting trolley buses to Fifth Street	1	CMB-0024	Agree	12/15/10	+3,100,000			i e
FD-015	10/06/10	082-0009	Subsidewalk Vault Secondary Closure Walls for Buildings at 800 Market and 838 Market	1	CMB-0025	Agree	11/17/10	+1,000,000			
FD-016	10/06/10	085-0003	Underpinning of Mandarin Tower	1	CMB-0011	over taken by FD-021	01/19/11	+5,000,000	Additional Information Pending.		
FD-017	10/06/10	085-0004	CTS Ground Improvement	1	CMB-0012	over taken by FD-021	01/19/11	+10,300,000	Additional Information Pending.		
FD-018	10/06/10	084-0006	UMS Apple Store Entrance	1	CMB-0013	Disagree	11/10/10		Additional Information Pending.		
FD-019	10/06/10	086-0003	MOS TOD Configuration	1	CMB-0014	Agree	11/10/10	TBD			
FD-020	10/06/10	084-0007	UMS Emergency Stair #4 Relocation	1	CMB-0015	Agree	11/10/10	TBD			
FD-021	01/14/11	085-0005	CTS Lowering and Stations Reconfiguration	1	CMB-0027	Agree	01/19/11	(18,000,000.00)	Agreement with changes to project configuration only. Additional Information required related to cost and schedule impacts. No agreement on Design cost impact, Design costs directly related to this change to be tracked separately		
FD-022	02/16/11	084-0008	Sewer Replacement along Geary & O'Farrell	1	CMB-0029	Agree	02/23/11	(134,000)	This trend has both an EPC number as well as a Construction Trend Number. See also Construction Trend No. 1251-0003		
FD-023	11/17/10	087-0001	Emergency walkways through crossover cavern changed from outside the main tracks to between the main tracks.	1	CMB-0032	Agree	07/27/11				
FD-024	11/17/10	087-0002	Diamond crossover on surface segment to a tandem (universal) crossover.	1	CMB-0033	Agree	08/24/11	(350,000)			
FD-025	04/13/11	083-0001	Bid Option for TBM Retrieval Shaft		CMB-0034	Agree	04/13/11	(10,000,000)	Will require changes to Bid Schedule to incorporate Traffic, Utilities and Pavement Demo/Restoration as incidental costs to the Bid Option. Estimated DP1 cost impact is approx. 80-100 hrs. of engineering time.		
FD-026	05/31/11	084,085,086	Air Replenishment System for Stations	1	CMB-0040	Agree	07/13/11	+1,245,000	Install air replenishment system at MOS, CTS and UMS to address the requirements of the SFFD Bulletin 5.07. The air replenishment system will be used to fill firefighter's self-contained breathing apparatus during firefighting operations in the three subway stations.		
FD-027	07/21/11	082-0010	1 Stockton street (Apple Store) Secondary Closure Wall		CMB-0043	Agree	08/03/11	+500,000	Add secondary closure wall to supplement recently completed primary closure wall built by owner to isolate the sub-sidewalk basement of 1 Stockton Street (Apple Store). 2) Modify position of joint trench (and all associated conduits, ducts etc.) for secondary closure wall to be constructed.		
FD-028	08/03/11	086-0004	MOS Revisions to Emergency Ventilation Requirements		CMB-0052	Agree	09/07/11	+500,000	Changes will extend the date of the 90% (pre-final) submittal by 20 working days and the 100% (final) submittal by 40 working days. CMB did not approve a time extension for 90% or 100% submittal delivery. Project Controls estimated \$321,645.		
FD-029	08/08/11	085-0006	CTS Revisions to Emergency Ventilation Requirements		CMB-0053	Agree	09/07/11	+1,000,000	Changes will extend the date of the 90% (pre-final) submittal by 20 working days and the 100% (final) submittal by 40 working days. CMB did not approve a time extension for 90% or 100% submittal delivery. Project Controls estimated \$411,895.		
FD-030	08/08/11	084-0009	UMS Revisions to Emergency Ventilation Requirements		CMB-0054	Agree	09/07/11	+1,000,000	Changes will extend the date of the 90% (pre-final) submittal by 20 working days and the 100% (final) submittal by 40 working days. CMB did not approve a time extension for 90% or 100% submittal delivery.  Project Controls estimated 733,420.		
FD-031	10/31/11		Accessibility Improvements at the SE corner of Union Square (UMS)								
FD-032	10/31/11		Union Square Entrance Reconfiguration (UMS)								
FD-033	10/31/11		Additional Compensation Grouting due to Tunnel Settlement Alert and Trigger Levels (All Stations)					+21,040,000	ECP dated 11/17/11. ECP being routed for approval.		

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FD-034	12/09/11		Operational Performance and Safety Enhancement at 4th and King		CMB-0062	Agree	12/14/11	+450,000	SFMTA Operations requested that the design of the 4th & King tie-in work be expanded to include a number of improvements at the junction involving the turn-back area extending to the scissors crossover at 6th & King. SFMTA Ops confirmed that the requested changes result in an arrangement that is consistent with standard operation practices and therefore does not involve new or unacceptable risks. CS 1553 Memorandum No. 0081. Conditionally agreed upon verification/resolution of Buy America issue for the switches.  3/14/12: "Buy America" issue no longer applicable. Revised ECP element - remove H&K switch machines and replace with hydraulic/120V switch machines such as Nortrak or equal.		
FD-035	06/26/12		Tunnel Air Replenishment System		CMB-0071	Agree	07/11/12	+1,215,000	Design and construct a fire fighter air replenishment system for Central Subway tunnel as described in SF Fire Code 511.2, Bulletin 5.07 except as noted in the Central Subway Request for Approval of Variance for the ARS to SFFD on March 5, 2012, and subsequently approved by SFFD.  Design Impact: ROM - \$215K  Construction Impact: ROM - \$1M		
FD-036	06/26/12		Surface Segment Sewers - 4th St.		CMB-0072	Agree	07/18/12	+2,200,000	Replace current unreinforced brick crown from 1906 as it may not be able to withstand loading for construction of the CS trackway section. Reconstruct manholes between Brannan and King Streets as existing are in conflict with proposed rail. Replace service laterals and provide sleeves for future replacement.  Additional potential scope option of \$1.5M-Sewer and \$2.3M-Force Main may be requested. If so, it will be Cost to SFPUC		
FD-037	08/27/12		Platform Display System Signs		CMB-0077	Agree (Conditionally)	08/29/12		Modify Stations (Contracts 1253, 1254 and 1255) and Surface, Track and Systems (Contract 1256) technical specifications and drawings for the Platform Display System (PDS) to match the changes made to the PDS units being supplied under the Integrated Systems Replacement (ISR) Project, Contract No.1260.  08/29/12: CMB agreement condition upon follow up action to evaluate procurement by CN1260		
FD-038	11/07/12		Elongated Sidewalk Bulb-out at Chinatown Station					TBD	CTS Sidewalk Bulb out (Southwest corner Stockton/Washington To bring the Central Subway Project - Chinatown Station in closer conformance wit the City's General Plan, SF Planning Department in its May, 2012 GPR Letter (recommends) making design changes specifically the extension of the sidewalk bulb-out at Stockton Street to help create a "station plaza". This elongated bulbout on the southwest corner (SWC) of Stockton and Washington Streets in front of the station headhouse would also include bike racks, benches, trees and other landscape features.  Design Impact: ROM - \$TBD Construction Impact: ROM - \$TBD		
FINAL DESIGN T	RENDS (Based o	n All ECPs) - SUBTOTALS							Incorporated budget increases have been absorbed by allocated and unallocated funds and the program budget to date remains \$1,578,300,000.		-0-
OTHER TRENDS											
X51-001	07/31/10	082-0001	1251 Revised estimate, escalation impact and contingency.	7				+9,532,314	Cost Transfer #0033 (Base \$\$), 0033a (Allocated Contingency), 0036 (Base \$\$ Escalation , 0036a (Allocated Contingency Escalation). [Sep2010 Cost Report]	BT-0033, BT- 0033-A, BT0036, BT-0036-A	
X51-002	07/31/10	082-0002	Form B Credit for 1251 Utilities	7				(7,697,949)	Reserve and Contingencies removed as per communications with PG&E. This is consistent with the 1250 utility agreement. [ Cost Transfer #0034 - Aug2010 Cost Report].	BT-0034	
X52-001	07/31/10	083-0001	1252-(TUN) Revised estimate, escalation impact and contingency	7				(2,165,462)	Cost Transfer #0035 (Base \$\$), 0035a (Allocated Contingency), 0037 (Base \$\$ Escalation , 0037a (Allocated Contingency Escalation). [Sep2010 Cost Report]	BT-0037, BT- 0037-A	
X03-001	08/31/10	003-0001	OEWD's Pilot Training Program	7					Workforce training pilot program in conjunction with the City/County's Office of Economic and Workforce Development (OEWD). Provides specialized training to SF residents to perform tunneling work. Central Subway financial responsibility being investigated. Requires further clarification		
X53-001	07/18/11	084-0001	CS 155-2 (DP2) CBP4 - Construction Budget Adjustment YOE	7	CMB-0044	Agree 1 - Owner Directed C			Adjust construction budget in Section 6 of Contract No. CS 155-2 to Year of Expenditure		

Owner Directed Change in Scc
 2 - Unforeseen Conditions
 3 - Errors and Omissions
 4 - Quantity Variation
 5 - Value Engineering
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 7 - Other

Item #	Date Initiated	Change Description	Change Type	CMB No.	Change S	status	Projected Cost Impact +Exposure/(Benefit	Comments	Contract Modification Number	Utility Reimbursements	
						Approval Action	Approval Date	Actual/Forecast			
X53-002	10/25/11		Change UMS Advertise Date to April 4th, 2012						DP2 Designer's new proposed dates for Pre-Final and Final Design have pushed out Advertise Dates.		
X53-003	04/11/12	084-0002	CN1253 (UMS) Construction Budget Adjustment 90%						CMB is currently vetting the 90% estimate of \$221,534,723 which represents a \$XX increase from the 65% base amount in 2010\$. Increase would deplete current YOE dollars and require use of unallocated contingency.		
X53-004	06/26/12	084-0002	Approve/Execute/Certify durations change for UMS Contract						Shortened the duration for Approve/Execute/Certify - UMS Contract from 40 to 24days to reflect an optimistic but doable duration for contractor submittals.		
X54-001	07/13/11	085-0001	CS 155-2 (DP2) CBP5 - Construction Budget Adjustment YOE	7	CMB-0045	Agree	07/27/11		Adjust construction budget in Section 6 of Contract No. CS 155-2 to Year of Expenditure		
X54-002	10/25/11		Change CTS Advertise Date to May 23rd, 2012		CMB-0061	Agree	12/28/11		DP2 Designer's new proposed dates for Pre-Final and Final Design have pushed out Advertise Dates.		
X54-003	11/02/11		Change CTS Advertise Date to February 8th, 2012						Change CTS Advertise Date from May 23, 2012 to February 8, 2012 (-74 working days)		
X54-005	12/06/11		Revisions to CTS Construction Schedule		CMB-0060	Agree	12/28/11				
X54-006	12/07/11	085-0002	CS 155-2 (DP2) CBP4 - Construction Budget Adjustment - allowed	7							
X55-001	07/18/11	086-0001	CS 155-2 (DP2) CBP6 - Construction Budget Adjustment YOE	7	CMB-0046	Agree	07/27/11		Adjust construction budget in Section 6 of Contract No. CS 155-2 to Year of Expenditure		
X55-002	10/25/11		Change MOS Advertise Date to June 25th, 2012						DP2 Designer's new proposed dates for Pre-Final and Final Design have pushed out Advertise Dates.		
X55-003	11/02/11		Change MOS Advertise Date to May 23rd, 2012						Change MOS Advertise Date from June 25, 2012 to May 23, 2012 (-22 working days)		
X55-004	06/26/12		Change MOS Advertise Date to Aug 20, 2012						Change MOS to August 20, 2012		
X56-001	10/25/11		Change STS Advertise Date to July 27th, 2012						DP2 Designer's new proposed dates for Pre-Final and Final Design have pushed out the Station's Advertise Dates. STS Advertise Date is staggered from Station's Advertise Dates.		
X56-002	12/14/11		STS Construction Schedule Revision for Equipment Procurement								
X56-003	06/26/12		Change STS Advertise Date to October 1, 2012						Change STS Advertise Date to October 1, 2012		
X40-001	10/19/11	028-0001	SFPUC CDD Updated Budgets	7		Authorized		+505,127	1250 SFPUC CDD Monthly Service Report Final & 1251 SFPUC CDD Estimate	BT-0172, BT- 0177	
X80-001	10/19/11	071-0001	DP1: CS 155-1 Modifications No. 2 & 3	see Prof. Serv		Authorized			Modification No. 2: \$395,584.59, Modification No. 3: \$165,000. Individual details listed in Professional Services. See trend 1551-0002,1551-0005 - 1551-0009	BT-0170, BT- 0171, BT-0173	
X80-002		071-0002	DP1: CS 155-1 Modification No. 4	7		Authorized		+135,898	Modification No. 4: \$135,898 Individual details listed in Professional Services. See trends 1551-0010 - 1551-0014.	BT-0187	
X80-003	10/27/11	029-0001	Increase City Auditor Budget	7		Authorized		+50,220	Reduce unallocated Contingency to increase City Auditor budget as authorized in Budget Authorization #51.	BR#51, BT-0181	
X80-004	10/27/11	232-0001	Increase SFCTA Budget	7		Authorized		+20,000	Increase SFCTA budget per per Budget Authorization #51 to conduct travel forecast (TEP CEQA Modeling) to satisfy PMO review and SFMTA Fleet Plan light rail vehicle.	BR #51, BT-0182	
X80-005	7/1/10, 11/2/10,3/24/1	072-0001	DP2: CS 155-2 Modification No. 1	7		Authorized		+1,010,000	Modification No. 1: \$1,010,600 Individual details listed in Professional Services. See trends 1552-0002, 1552-0003 and 1552-0005.	BT-0194, BR#53	
X80-006	5/6/10,7/25/11	072-0002	DP2: CS 155-2 Exercised Options	see Prof. Serv		Authorized			Individual details listed in Professional Services. See trends 1552-0001, 1552-0007 and 1552-0014.	BT-0023, BT- 0194	
X80-007	11/08/11	151-0001	Operations SFMTA Transit Services			Authorized		+50,000	CSP request services to support and test OCS for 30/45 trolley reroute. Authorized per Budget Revision #53	BR #53, BT-0189	

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X80-008	09/01/11	081-0001	SFMTA Safety, Training, Security & Enforcement Div PCOs	7		Authorized		+60,000	CSP request PCOs to support 1251 and 1252 construction for one year. Authorized \$60,000 per Budget Revision #45.	BR #45, BT-0190	
X80-009	11/30/11	016-0001	SFMTA Sustainable Streets 30 and 45 re-route	7		Authorized		-0-	CSP request services to support 30/45 trolley reroute. \$162,600 was reduced from DPT staffing plan budget.	BT-0188	
X80-010	11/09/11	073-0001	DP3: CS 155-3 Modification No. 1	7		Authorized		+152,882	Modification No. 1: \$152,882 Individual details listed in Professional Services. See trends 1553-0012 and 1553-0013.	BT-0203	
X80-011	8/9/11, 9/22/11, 10/11/11, 11/9/11	073-0002	DP3: CS 155-3 Exercised Options	see Prof. Serv		Authorized		+1,026,398	Individual details listed in Professional Services. See trends 1553-0001 - 1553-0004, 1553-0006, 1553-0009 - 1553-0011, 1553-0014. <b>Updated from \$971,686 to include Trend 1553-0014.</b>	BT-0203	
X80-012		151-0002	OCS materials procured directly for work in reference to CN1251 CMOD#12.		CMB-0065	Agree	1/25/2012, 2/29/12	+126,149	See also Trend 1251-0023		
X80-013	05/30/12	073-0003	DP3: Provide Vibration Impact Analysis and Extend PC Support Technical and CSP Quality Manager	1				+133,906	Amend #2: Vibration Impact Analysis \$38,380 Amend #3: PC Support Tech \$34,483; Quality Manager - \$61,043	TBD	
X80-014	12/17/12		For combining the stations and track and systems into Contract 1300 (SSTS)	7					Combined all the Station ad Track and Systems into one Contract. Removed the buffer float activities from the satin to track and systems and overlapped work that can now be done concurrent.		
X80-015	12/17/12		Changing the Bid Opening date and condensing the Contract Duration for Contract 1300	7		Agree	11/14/12		Change bid opening to March 19, 2013 and reevaluated procurement durations, revised calendars for UMS Gargage, revised productin rates for steel.  11/14/13 CMB Agreed verbally to change @ Mtg #101		
X80-016	02/19/13		Change to Tunnel and CTS interface and buffer float Contract 1300 (SSTS)	7		Agree	01/23/13		Change (MPS) reducing the number of days currently in (from 550 calendar days from NTP to 450 calendar days) for the key interface between CTS and the tunnel completion. Reduced number of days will be issued as part of Add #3 of the 1300 contract.  1/23/13 CMB Agreed verbally to change @ Mtg #111.		
THER TRENDS	S (Based on Vario	ous Trends)							Current Forecast reflects a net +3,537,933 unfavorable impact for all Other Trends.		-0-
GRAND TOTALS	5								Current Forecast reflects an estimated net +66,751,620 unfavorable exposure to the project to date. Incorporated budget increases have been absorbed by allocated and unallocated funds and the program budget to date remains \$1,578,300,000.		(288,336)
lollar amoun e CCOP's. T	ts are reflected he total values	d in the "Other Trends	ing trends are listed for administrative purposes. The " section of this log in the form of cost (budget) transfers - ofessional contract are for tracking all potential cost								
Contract CS-15	5-1										
1551-0001	07/30/10	071-0001	Conform Contract Terms per Negotiations from 10/2/09 to 11/6/09	7				-0-	To be addressed in Amendment 1.	Amendment 1 Pending	-0-
1551-0002	02/18/11	071-0002	Project Office Delay (Adjustments for OH Rate and Team Productivity impact)	7		Authorized	07/29/11	+101,411	Amendment Signed by ED/CEO 7/29/11 COMPLETE, NO FURTHER ACTION; Amendment #2	Amendment 2 Approved	
1551-0003	02/18/11	071-0003	Additional Construction Support for CP-1	7							-0-
1551-0004	02/18/11	071-0004	Redesign Required by Barney's and PUC for CP-2	7							-0-
1551-0005	02/18/11	071-0005	Archeological Monitoring 16.20.C1 (total)	7		Authorized	07/29/11	+197,173	Amendment Signed by ED/CEO 7/29/11 COMPLETE, NO FURTHER ACTION; Amendment #2	Amendment 2 Approved	
1551-0006	02/18/11	071-0006	Eyebolts	7		Authorized	07/29/11	+50,000	Amendment Signed by ED/CEO 7/29/11 COMPLETE, NO FURTHER ACTION; Amendment #2	Amendment 2 Approved	
1551-0007		071-0007	Secondary Closure Walls 800/838 Market	1		Authorized	07/29/11	+47,400	Amendment Signed by ED/CEO 7/29/11 COMPLETE, NO FURTHER ACTION; Amendment #2	Amendment 2 Approved	

Item #	Date Initiated	ate Initiated	Change Description	Change Type	CMB No.	Change Sta	tus	Impact +Exposure/(Benefit	Comments	Contract Modification Number	Utility Reimbursements	
							Approval Action	Approval Date	Actual/Forecast			
1551-0008			071-0008	Delete Optional Tasks - Tasks 1-14	1				-0-	Deleted Options in the amount of (\$529,952) in Amendment has been reversed through Budget Authorization #50.  COMPLETE, NO FURTHER ACTION; Amendment #2	Amendment 2 Approved	
1551-0009			071-0009	CTS Lowering	1		Authorized	12/08/11	+165,000	Amendment Signed by ED/CEO 12/8/11 COMPLETE, NO FURTHER ACTION; Amendment #3	Amendment 3 Approved	
1551-0010			071-0010	Modify Sidewalk Vault Demo ECP-FD009	7		Authorized	12/08/11	+39,311	Amendment Signed by ED/CEO 12/8/11 COMPLETE, NO FURTHER ACTION; Amendment #4	Amendment 4 Approved	
1551-0011			071-0011	Modify Stockton St. Sewer ECP-FD010	7		Authorized	12/08/11	+4,112	Amendment Signed by ED/CEO 12/8/11 COMPLETE, NO FURTHER ACTION; Amendment #4	Amendment 4 Approved	
1551-0012			071-0012	Reconfigure Utilities N. Side Ellis ECP-FD011	7		Authorized	12/08/11	+2,448	Amendment Signed by ED/CEO 12/8/11 COMPLETE, NO FURTHER ACTION; Amendment #4	Amendment 4 Approved	
1551-0013			071-0013	Extend SubSidewalk Closure Wall ECP-FD013	7		Authorized	12/08/11	+85,233	Amendment Signed by ED/CEO 12/8/11 COMPLETE, NO FURTHER ACTION; Amendment #4	Amendment 4 Approved	
1551-0014			071-0014	Reroute OCS to Fifth St. ECP-FD014	7		Authorized	12/08/11	+4,794	Amendment Signed by ED/CEO 12/8/11 COMPLETE, NO FURTHER ACTION; Amendment #4	Amendment 4 Approved	
1551-0015			071-0015	Retrieval Shaft Redesign - Sewer By Pass	7				+56,000	Awaiting documentation from Designer		
1551-0016			071-0016	Design Measures for Settlement Protection	7				+99,000	Awaiting documentation from Designer		
1551-0017			071-0017	Incorporate Headwalls MOS/UMS	1		Disagree at this time	11/01/11	+42,000	In letter dated November 1, 2011 DPM responded that until concurrence with DP2 on cost transfer or additional documentation, the requested change is denied.		
1551-0018			071-0018	Prepare Utility Composite	-		Disagree	11/01/11	+50,000	DPM responded that Program does not agree in letter dated November 1, 2011.		
1551-0019			071-0019	Incorporate Cross Passages	1		Disagree at this time	11/01/11	+43,000	In letter dated November 1, 2011 DPM responded that until concurrence with DP2 on cost transfer or additional documentation, the requested change is denied.		
Contract CS-155-	-1 Total								+986,882	Of the total cost exposure shown, Contract Modifications and Authorized Option dollars have been absorbed by DP1 allocated contingency in the amount of \$696,483 of a total budget of \$705,000. Additional potential exposure is +\$391,411. Currently, overall contract value remains unchanged in the amount of \$6,500,000.		-0-
Contract CS-155	5-2											
1552-0001	05/06/10	072-	0001	Optional Task 2.50 and Task 12.07	1		Authorized	05/06/10	+274,775	CS Letter 0473 from ED/CEO Optional Task 2.50 to support art enhancement activities NTE \$164,383 and Optional Task 12.07 to support design structures for Public Art NTE \$110,392.		
1552-0002	07/01/10	072-	0002	Expanded Hydraulic Testing at CTS	7		Authorized	07/01/10	+26,100	Estimated cost breakdown is included in the 7/1/10 letter from CSDG and includes signed approval by SFMTA. Amendment No. 1 authorized by ED/CEO on 12/21/11.  COMPLETE, NO FURTHER ACTION; Amendment #1	Amendment 1 Approved	
1552-0003	10/11/10	072-	0003	Additional Soil Borings at UMS Station - Task No. 3.10 Supplemental Investigations	7		Authorized	11/02/10		Estimated cost breakdown is included in the 10/11/10 letter from CSDG and includes signed approval by SFMTA. Amendment No. 1 authorized by ED/CEO on 12/21/11.  COMPLETE, NO FURTHER ACTION; Amendment #1	Amendment 1 Approved	
1552-0004	02/11/11	072-	0004	MOS TOD White Paper Proposal	1				+33,847	Conceptual study will assess a potential high rise building at the Moscone station headhouse. Estimated cost breakdown is included in the 2/11/2011 letter from CSDG - <b>On Hold.</b>		
1552-0005	03/24/11	072-	0005	CTS - Alternate 5	7		Authorized	03/24/11	+950,000	CS Letter from DED dated 3/24/11 has agreed to a modification of \$950,000 for performing additional work. Amendment No. 1 authorized by ED/CEO on 12/21/11.  COMPLETE, NO FURTHER ACTION; Amendment #1	Amendment 1 Approved	
1552-0006	06/28/11	072-	0006	Audited Overhead Rate Adjustment for Year 2010 - Request for Amendment	7				-0-	Estimated cost of \$406,320 is included in the 6/28/11 letter from CSDG. See 1552-0006 Rev. 1 for most current estimate		
1552-0007	07/25/11	072-	0007	REVIT and CAD Support (to City Staff) Option to DP2 Contract (Optional Services Task 12.12)	1		Authorized	07/25/11	+79,200	CS Letter No. 0768 from ED/CEO dated 7/25/11 has authorized Optional Task 12.12 NTE \$79,200.		
1552-0008	08/03/11	072-	8000	MOS Revisions to Emergency Ventilation Requirements	-		Provide further Justification	09/07/11	-0-	CMB did not approve a \$60,000 proposed increase. Document References ECP FD028, CSDG letter dated 8/8/11. DPM responded that program does not agree in letter dated 10/17/11.		
1552-0009	08/03/11	072-	0009	CTS Revisions to Emergency Ventilation Requirements	-		Provide further Justification 1 - Owner Directed C		-0-	CMB did not approve an \$80,000 proposed increase. Document References ECP FD029, CSDG letter dated 8/8/11. DPM responded that program does not agree in letter dated 10/17/11.		

Owner Directed Change in Scc
 2 - Unforeseen Conditions
 3 - Errors and Omissions
 4 - Quantity Variation
 5 - Value Engineering
 6 - Private Utilities
 7 - Other

Item #	Date Initiated		Change Description	Change Type	CMB No.	Change Sta	atus	Impact +Exposure/(Benefit	Comments	Contract Modification Number	Utility Reimbursements
						Approval Action	Approval Date	Actual/Forecast			
1552-0010	08/03/11	072-0010	UMS Revisions to Emergency Ventilation Requirements			Provide further Justification	09/07/11	-0-	CMB did not approve a \$100,000 proposed increase. Document References ECP FD030, CSDG letter dated 8/8/11. DPM responded that program does not agree in letter dated 10/17/11.		
1552-0011	08/17/11	072-0011	Audited Overhead Rate Adjustment for Year 2010 - Request for Amendment - Rev. 1	7				+426,322	Estimated cost breakdown is included in the 8/17/11 letter from CSDG. This is a revision to the 6/28/11 letter and cost breakdown.		
1552-0012	08/23/11	072-0012	Station Air Replenishment System	-		Disagree	10/17/11	+36,240	Estimated cost breakdown is included in the 8/23/11 letter from CSDG. DPM responded that program does not agree in letter dated 10/17/11.		
1552-0013	09/01/11	072-0013	COR for Additional Services Related to MOS Constructability Review and Assessment of Alternatives	-				-0-	Cost charged to Task 2.70- part of base work		
1552-0014	09/22/11	072-0014	Proposal for Additional Work to provide Structural Engineering Support (Optional Services)	1		Authorized Optional Task 12.01.C5 only	11/04/11	125 724	Estimated cost breakdown is included in the 9/22/11 letter from CSDG. Referenced Optional Work Tasks 12.01.C5 and 12.07.C5 - Effort re-evaluated - proposed cost to be resubmitted. <b>CS Letter No. 1232</b> dated 11/4/11 from Director of Transportation has authorized Optional Task 12.01.C5 for the amount of \$12,796.	Option	
Contract CS-155	-2 Total							+1,896,708	Of the total cost exposure shown, Contract Modifications and Authorized Option dollars have been absorbed by DP2 allocated contingency in the amount of \$1,046,324 of a total budget of \$4,890,707. Overall contract value remains unchanged in the amount of \$39,949,959.		-0-
Contract CS-15	5-3					<u> </u>					
1553-0001	08/09/11	073-0001	Authorization to commence optional tasks 9.20J Technical Specifications Item J Facility SCADA	1		Authorized	08/01/11	+259,305	SFMTA letter 0933 from ED/CEO dated 8/9/11authorizing \$738,787 in optional tasks.	Option	
1553-0002	08/09/11	073-0002	Authorization to commence optional tasks 12.05 Architectural Plans	1		Authorized	08/01/11	+257,129	SFMTA letter 0933 from ED/CEO dated 8/9/11authorizing \$738,787 in optional tasks.  COMPLETE, NO FURTHER ACTION; OPTION	Option	
1553-0003	08/09/11	073-0003	Authorization to commence optional tasks 12.13J Facility SCADA Design	1		Authorized	08/01/11	+169,553	SFMTA letter 0933 from ED/CEO dated 8/9/11authorizing \$738,787 in optional tasks.  COMPLETE, NO FURTHER ACTION; OPTION	Option	
1553-0004	08/09/11	073-0004	Authorization to commence optional tasks 12.12E traction power cables for CAD production	1		Authorized	08/01/11	+52,800	SFMTA letter 0933 from ED/CEO dated 8/9/11authorizing \$738,787 in optional tasks.  COMPLETE, NO FURTHER ACTION; OPTION	Option	
1553-0005	09/19/11	073-0005	Proposal to hire Wilson Ihrig to support Acoustics, Noise and Vibration tasks.	7		Authorized	03/08/12		Signed by Director of Transportation 3/8/2012.  COMPLETE, NO FURTHER ACTION ; Amendment 2	Amendment 2 Approved	
1553-0006	09/22/11	073-0006	Proposal to exercise optional task 12.07 Public Art.	1		Authorized	11/04/11	+10,285	Letter dated 9/22/11 to DOM. PMCM response pending. Priced level of Effort assumed for this task. SFMTA Letter 1213 from Director of Transportation dated 11/4/11 authorizing optional task.		
1553-0007	09/27/11	073-0007	Proposal to exercise optional sub-task 12.12 structural design of the OCS attachments.	7				+59,460	Letter dated 9/27/11to DOM. NOT FOLLOWING CONTRACT REQUIREMENTS FOR PROPER NOTIFICATION OF CHANGE.  PMCM has responded to clarify scope in stations and Tunnel Design. Awaiting resubmittal of request by DP3		
1553-0008	10/05/11	073-0008	Scope Clarification - Add Emergency and Location Signage.	7		Disagree A.12.08- Signage	11/09/11		Letter dated 10/5/11 to DOM. NOT FOLLOWING CONTRACT REQUIREMENTS FOR PROPER NOTIFICATION OF CHANGE.  CS Memo No. 0882 from DOM to DP3 PM considers A.12.08 Signage as part of the work necessary to complete the trackway elements of the scope. The work in question is considered part of the base scope of services.		
1553-0009	10/11/11	073-0009	Proposal to exercise mechanical optional task A 12.11 to design a water line on the FBS station platform.	1		Authorized	11/04/11	+33,000	SFMTA Letter 1213 from Director of Transportation dated 11/4/11 authorizing optional task.  COMPLETE, NO FURTHER ACTION; OPTION	Option	
1553-0010		073-0010	Proposal to exercise Task 12.01 Surface Segment site Drainage	1		Authorized	11/04/11	+108,240	SFMTA Letter 1213 from Director of Transportation dated 11/4/11 authorizing optional task. COMPLETE, NO FURTHER ACTION; OPTION	Option	
1553-0011		073-0011	Proposal to exercise Task 12.02 Sewer Relocation and Analysis Report.	1		Authorized	11/04/11	+81,374	SFMTA Letter 1213 from Director of Transportation dated 11/4/11 authorizing optional task. COMPLETE, NO FURTHER ACTION; OPTION	Option	
1553-0012	11/09/11	073-0012	CTS - Alternate 5	7		Authorized	01/18/12	+88,855	Contract Modification No. 1 authorized by ED/CEO on 1/18/12 COMPLETE, NO FURTHER ACTION; Amendment #1	Amendment 1 Approved	
1553-0013	11/09/11	073-0013	Proposal for Geotechnical Services	7		Authorized	01/18/12		Letter dated October 7, 2011 to DOM. PM/CM response pending. Contract Modification No. 1 authorized by ED/CEO on 1/18/12 COMPLETE, NO FURTHER ACTION; Amendment #1	Amendment 1 Approved	
1553-0014	02/06/12	073-0014	Authorization to commence optional tasks 12.12E traction power cables for CAD production, Optional task 2.50 Coordination with Art			Authorized 1 - Owner Directed C 2 - Unforeseen		+54,712	SFMTA Letter 1381 from Director of Transportation dated 2/06/12 authorizing optional tasks 12.12e in the amount of \$41,280 and 2.50 for \$13,432 COMPLETE, NO FURTHER ACTION; OPTION	Option	
Trend Ch	nange Log 2013041	17 Program Trend Details				3 - Errors and 0 4 - Quantity V 5 - Value Eng 6 - Private U 7 - Othe	Omissions 'ariation ineering Itilities			Pa	age 25 of 26

Item#	Date Initiated	Change Description	Change Type	CMB No.	Change S	tatus	Impact +Exposure/(Benefit	Comments	Contract Modification Number	Utility Reimbursements	
						Approval Action	Approval Date	Actual/Forecast			
1553-0015	03/20/12	073-0015	Proposal for additional services in Response to Approved (ECP) FD- 034 Operation Performance and Safety Enhancements to 4th and King and 6th and King.	1				+26,026	FD-034 was updated by CMB on 3/14/12. Proposal transmitted via letter CS1553 No. 0012 dated 3/20/12 to DOM.  Amendment #4 PENDING	Option	
1553-0016	03/23/12	073-0016	Proposal for additional work - Tunnel Air Replenishment System (Exercise Optional Service)	7		Authorized	04/26/12	+173,119	SFMTA letter 1658 from Director of Transportation dated 4/26/2012 authorizing \$173,119 in optional tasks. Included in FD-035 to be presented to CMB on 6/26/12	Option	
1553-0017	05/14/12	073-0017	Extension of PC Support Technician	1		Authorized	05/04/12	+34,483	Signed by Director of Transportation 5/14/12 CCOMPLETE, NO FURTHER ACTION; Amendment #3	Amendment 3 Approved	
1553-0018	05/14/12	073-0018	Extension of CSP Quality Manager	1		Authorized	05/04/12	+61,043	Signed by Director of Transportation 5/14/12 CCOMPLETE, NO FURTHER ACTION; Amendment #3	Amendment 3 Approved	
1553-0019	04/09/12	073-0019	Authorization to commence optional task 12.02 Utility Plans for design of repositioned and reconstructed manholes for the 78 inch diameter sewer on 4th St.	1		Authorized	04/09/12	+52,712	SFMTA Letter 1630 from the Director of Transportation dated 4/9/2012 authorizing optional task 12.02 in the amount of \$52,712 COMPLETE, NO FURTHER ACTION; OPTION	Option	
1553-0020	04/09/12	073-0020	Authorization to commence optional task 12.12 civil and structural support for traction power duct banks	1		Authorized	04/09/12	+109,000	SFMTA Letter 1630 from the Director of Transportation dated 4/9/2012 authorizing optional task 12.12 in the amount of \$109,000 COMPLETE, NO FURTHER ACTION; OPTION	Option	
1553-0021	04/26/12	073-0021	Authorization to commence optional task 12.11 design of the tunnel based Air Replenishment System including fill panels, feeder pipes, gauges, valves, fire proofing, anchors, supports, low level alarms, wiring, signage, connections to SCADA and monitoring devices, equipment placement, and impact protection	1		Authorized	04/26/12	+173,119	SFMTA Letter 1658 from the Director of Transportation dated 4/26/2012 authorizing optional task 12.11 in the amount of \$173,119  COMPLETE, NO FURTHER ACTION; OPTION	Option	
1553-0022	04/26/12	073-0022	Increased authorization for optional task 12.12.e CAD production support	1		Authorized	04/26/12	+30,000	SFMTA Letter 1658 from the Director of Transportation dated 4/26/2012 authorizing the increase in optional task 12.12e in the amount of \$30,000 COMPLETE, NO FURTHER ACTION; OPTION	Option	
1553-0023	05/21/12	073-0023	Authorization to commence option task 12.11 structural design support for Fire Protection and Plumbing designs	1		Authorized	05/21/12	+39,204	SFMTA Letter 1688 from the Director of Transportation dated 5/21/2012 authorizing the increase in optional task 12.11 in the amount of \$39,204 COMPLETE, NO FURTHER ACTION; OPTION	Option	
1553-0024	05/21/12	073-0024	Authorization to commence optional task 12.12 structural design support for Traction Power and Power/Lighting designs	1		Authorized	05/21/12	,	SFMTA Letter 1688 from the Director of Transportation dated 5/21/2012 authorizing the increase in optional task 12.12 in the amount of \$43,638 COMPLETE, NO FURTHER ACTION; OPTION	Option	
1553-0025	05/21/12	073-0025	Authorization to commence optional task 12.13 structural design support for Telephone and CCTV designs	1		Authorized	05/21/12		SFMTA Letter 1688 from the Director of Transportation dated 5/21/2012 authorizing the in crease in optional task 12.13 in the amount of \$24,328 COMPLETE, NO FURTHER ACTION; OPTION	Option	
1553-0026	05/21/12	073-0026	Authorization to commence optional task 9.20 Technical Specifications for structural design support for above designs	1		Authorized	05/21/12	+3,039	SFMTA Letter 1688 from the Director of Transportation dated 5/21/2012 authorizing the increase in optional task 9.20 in the amount of \$3,039 COMPLETE, NO FURTHER ACTION; OPTION	Option	
Contract CS-155	5-3 Total							+2,046,831	Of the total cost exposure shown, Contract Modifications and Authorized Option dollars have been absorbed by DP3 allocated contingency in the amount of \$1,168,995 of a total budget of \$4,598,725. Overall contract value remains unchanged in the amount of \$19,919,526.		-0-

## **CENTRAL SUBWAY PROJECT - Configuration Management Board Change Control Log**

Initial Implementing Procedure						СМВ	
Change Form No.	Title of Change	Schedule Impact		st Impact (X,000)	CMB No.	Agree / Disagree	Final Decision Record Date
1250-0002	Chgs to Sewer on 4th between Howard and Folsom		\$	107	CMB-0001	Agree	07/12/10
1250-0003	Quantity Adjustment for JT-6 and JT-7		\$	192	CMB-0002	Agree	08/04/10
1250-0004	Demolition of existing brick and concrete footing on 4th between Howard and Folsom		\$	170	CMB-0003	Agree	07/12/10
1250-0005	Modify AWSS at 4th/Bryant and 4th/Harrison		\$	586	CMB-0004	Agree	08/04/10
1250-0006	Install four additional piles and reinforce existing foundation at 401 4th Street		\$	130	CMB-0005	Agree	08/25/10
FD-001	Narrowing of Platform at UMS		\$	(800)	CMB-0006	Agree	08/04/10
FD-004	UMS Structural Configuration		\$	(8,000)	CMB-0007	Agree	08/18/10
FD-006	Station Headwalls - UMS/MOS		\$	-	CMB-0008	Agree	08/18/10
FD-002	Redux of Station Emergency Ventilation Fans - UMS/CTS/MOS		\$	(3,000)	CMB-0009	Agree (Conditionally)	08/25/10
FD-005	UMS Alternate Station Access/Vent Shaft @ Union Square	T	\$	(22,500)	CMB-0010	Agree	12/29/10
FD-016	Underpinning of Mandarin Tower		\$	5,000	CMB-0011	Over Taken by FD-021	01/19/11
FD-017	CTS Ground Improvement	T	\$	10,300	CMB-0012	Over Taken by FD-021	01/19/11
FD-018	UMS Apple Store Entrance	T	\$	-	CMB-0013	Disagree	11/10/10
FD-019	MOS TOD Configuration	T	Ī	TBD	CMB-0014	Agree	11/10/10
FD-020	UMS Emergency Stair #4 Relocation			TBD	CMB-0015	Agree	11/10/10
1250-0016	Additional AWSS modification at 4th/Harrison	T	\$	156	CMB-0016	Agree	11/10/10
FD-008	Trolley Re-route @ Columbus & Powell	T	\$	2,000	CMB-0017	Agree	09/15/10
FD-007	Cross-passages		\$	-	CMB-0018	Agree	09/15/10
FD-009	ECP to Modify Sidewalk Vault Demolition and Construction Sequence to Facilitate Construction of Joint Utilities Trench and Future UMS Station		\$	3,000	CMB-0019	Agree	12/15/10
FD-010	Redesign Stockton Street Sanitary Sewer to conform to SFPUC Sewer Criteria that preclude placement of relocated sanitary sewer under sidewalks		\$	2,000	CMB-0020	Agree	11/17/10
FD-011	Reconfigure Routing of Water, Sewer and Gas laterals from buildings on north side of Ellis Street		\$	500	CMB-0021	Agree	11/17/10
FD-012	Recognize cost transfers from design allowances allocated to contingency to explicit line items in final design estimates		\$	-	CMB-0022	Disagree	11/17/10
FD-013	Increase Extent of Sub-sidewalks Vault Secondary Closure Walls and Waterproofing		\$	4,100	CMB-0023	Agree	11/17/10
FD-014	Include OCS system for rerouting trolley buses to Fifth Street		\$	3,100	CMB-0024	Agree	12/15/10
FD-015	Subsidewalk Vault Secondary Closure Walls for Buildings at 800 Market and 838 Market		\$	1,000	CMB-0025	Agree	11/17/10
1250-0022	Install additional 30 feet of DIP and new AWSS at 4th/Harrison	†	\$	160	CMB-0026	Agree	01/12/11
FD-021	CTS Lowering and Stations Reconfiguration	1	\$	(18,000)	CMB-0027	Agree	01/19/11
1250-0026	Supporting working around and protecting SFWD existing facilities	1	\$	66	CMB -0028	Agree	02/09/11
1251-003	Extending Sewer lines on O'Farrell and Geary - CMod 001	1	\$	149	CMB-0029	Agree	02/23/11

## **CENTRAL SUBWAY PROJECT - Configuration Management Board Change Control Log**

Initial Implementing Procedure						СМВ	
Change Form No.	Title of Change	Schedule Impact		est Impact (X,000)	CMB No.	Agree / Disagree	Final Decision Record Date
1250-0030	Differing site conditions during utility installations - CMod #16 - Public only		\$	238	CMB-0030	Agree	04/13/11
1251-0004	Additional work related to secondary basement closure wall, 150 Stockton Street		\$	190	CMB-0031	Agree	04/13/11
FD-023	Change to the emergency walkway configuration in the cross cavern at CTS	[	\$	-	CMB-0032	Agree	07/27/11
FD-024	Change No. 5 diamond X-over on surface segment to tandem (universal) crossover	[	\$	(350)	CMB-0033	Agree	08/24/11
FD-025	Bid Option for TBM Retrieval Shaft		\$	(10,000)	CMB-0034	Agree	04/13/11
1251-0002	Installation of concrete slab under joint trench at Stockton and O'Farrell CMod #02 (Not to Exceed Total)		\$	71	CMB-0035	Agree	04/20/11
1250-0029	Adjustment to Additional Excavation and Backfill Bid Item CMod #17		\$	112	CMB-0036	Agree	05/04/11
1250-0034	Supplement Bid Item TR -6 DPT Traffic Control Allowance CMod #18		\$	69	CMB-0037	Agree	05/04/11
1251-0009	Supplement Bid Item TR-07- Allowance for Manual Traffic Control with Add'l funds		\$	263	CMB-0038	Agree	06/01/11
1251-0006	Revising layouts of utilities, northern portion of Stockton Street		\$	399	CMB-0039	Agree	06/08/11
FD-026	Air Replenishment Systems in the three underground stations		\$	1,245	CMB-0040	Agree	07/13/11
1250-0036	Rental/Maintenance costs for support of Archeological Trenches - 05/30: SFMTA Board approval due to contract value exceeding the 25% threshold remaining item will be handled through the claims process. CM will provide and update at a later date.  09/12/12: Rental/Maintenance costs for support of Archeological Trenches (Part 1 of 4), (Part 2 of 4), (Part 3 of 4, (Part 4 of 4)		\$	597	CMB-0041	Agree	09/12/12
1251-0012	Compensate Contractor for additional expenses to modified installation of AWSS on O'Farrell East on Stockton St CMod #07 representing change, now CMod #06 (Refer to Approve CMB-0050, which notes the contract modification amount for this work)			-	CMB-0042	Agree	08/03/11
FD-027	1 Stockton Street (Apple Store) Secondary Closure Wall		\$	500	CMB-0043	Agree	08/03/11
X53-001	CS 155-2 (DP2) CBP4 (UMS) - Construction Budget Adjustment YOE			-	CMB-0044	Agree	07/27/11
X54-001	CS 155-2 (DP2) CBP5 (CTS) - Construction Budget Adjustment YOE			-	CMB-0045	Agree	07/27/11
X55-001	CS 155-2 (DP2) CBP6 (MOS) - Construction Budget Adjustment YOE			-	CMB-0046	Agree	07/27/11
1250-0012 & 0013	Differing site conditions during utility installations - CMod #21 - Private only		\$	98	CMB-0047	Agree	08/03/11
1250-0024	Costs associated with support, workaround and protection of existing AT&T utilities - CMod #19		\$	95	CMB-0048	Agree	08/24/11
1251-0007	Costs associated with design changes to utility layouts along Ellis Street - CMod #05		\$	(435)	CMB-0049	Agree	08/24/11
1251-0012	Additional expenses related to modified installation of the AWSS on O'Farrell East of Stockton St - CMod #06 (Ref. CMB-0042 for original CMod presented for this work)		\$	278	CMB-0050	Agree	09/21/11
1251-0017 & 0018	Installation of AT&T manholes 5829 and 5830 located on Geary at Stockton - CMod #07		\$	56	CMB-0051	Agree	09/21/11
FD-028	MOS Revisions to Emergency Ventilation Requirements		\$	500	CMB-0052	Agree	09/07/11

## **CENTRAL SUBWAY PROJECT - Configuration Management Board Change Control Log**

Initial Implementing Procedure						СМВ	
Change Form No.	Title of Change	Schedule Impact		Impact 000)	CMB No.	Agree / Disagree	Final Decision Record Date
FD-029	CTS Revisions to Emergency Ventilation Requirements		\$	1,000	CMB-0053	Agree	09/07/11
FD-030	UMS Revisions to Emergency Ventilation Requirements		\$	1,000	CMB-0054	Agree	09/07/11
1251-0014	Increase Bid Item WD-10 Allowance for Add'l Excavation and Backfill - CMod #09		\$	200	CMB-0055	Agree	09/14/11
1251-0027	AT&T installation additional cost to accelerate work - CMod #10		\$	281	CMB-0056	Agree	11/30/11
1251-0019 & 0028	Installation of AT&T manholes 5828, 5831, 113, 5832 and 403 - CMod #11		\$	188	CMB-0057	Agree	10/26/11
1251-0020, 0030 & 0031	PG&E Field Changes - Cost will be part of the Form B calculations and be included in the reimbursement from PG&E. (Formally CMod #12 New CMod number is pending assignment)		\$	89	CMB-0058	Agree	11/02/11
1251-0024 & 0032	PG&E Field Changes - (Formally CMod #13 New CMod number is pending assignment) 1/25: Revision to the number of Kill Tie in locations will reduced this CMod to \$315K when conditions are satisfactorily met. 04/11: Discovery of the actual number of Kill/Tie locations being 26 instead of 15 will require confirmation from PG&E of the locations and the new cost of scope of work . 05/02: Previously approved CMod for \$349K on 11/16/11. Revised CMod approved for 12 Kill hole locations and "not to exceed" value. PGE email concurrence presented 05/23/12		\$	303	CMB-0059	Agree	11/16/11
X54-005	Revisions to MPS - CTS Construction Schedule		\$	-	CMB-0060	Agree	12/28/11
X55-002	MPS - STS Construction Schedule Revision for Procurement of Equipment		\$	-	CMB-0061	Agree	12/28/11
FD-034	STS 4th and King Operational Performance and Safety Enhancements. 12/14/11: Agree contingent up "Buy America" waiver. 03/14: "Buy America" contingency no longer applicable. Revised ECP change element - Removing H&K switches and replace with hydraulic/120V. Revised CSP Design Criteria to reflect element design change. CMB approval of replacement agreed on 03/14/12. Revision made to the approved ECP at Mtgs. #71 & #72.		\$	450	CMB-0062	Agree	12/14/11
CS-155-2	CS 155-2 (DP2) CTS Construction Budget Adjustment - (65% Submittal)		\$	45,261	CMB-0063	Agree	12/21/11
1251 -0038 (TO-035)	CN1251 (3EA) Kiosk Removal; previous work, and Addl (2EA) new work (see CMB 0080 approved on 10/24/12 for \$29,267.83) for all (5EA) Kiosks.		\$	-	CMB-0064	Agree	01/04/12
1251-0023	Overhead Contact System (OCS) Facilities along Folsom St. between 4th & 5th Streets and Installation of Foundations and Poles - <b>CMod #12 (Formally CMod #15)</b> Condition agreed upon verification material from Contractor to be procured is available. (Verified 02/01/12). 02/29: CMod negotiated cost has been revised to incorporate original three items and the add'l OCS work on Folsom St.		\$	542	CMB-0065	Agree	02/29/12
CS-155-2	CS 155-2 (DP2) UMS Construction Budget Adjustment - (65% Submittal)		\$	27,986	CMB-0066	Agree	02/01/12
CS-155-2	CS 155-2 (DP2) MOS Construction Budget Adjustment - (65% Submittal)		\$	22,947	CMB-0067	Agree	02/01/12
1251 - 0033	Installation of Secondary Closure Wall at 1 Stockton St. (Apple Store) - <b>CMod #13 (Formally CMod #14)</b> (Negotiated Direct Cost \$264K, & Negotiated OH Cost \$143K)		\$	409	CMB-0068	Agree	03/07/12

## **CENTRAL SUBWAY PROJECT - Configuration Management Board Change Control Log**

Initial Implementing Procedure							
Change Form No.	Title of Change	Schedule Impact		t Impact ,000)	CMB No.	Agree / Disagree	Final Decision Record Date
1251-0034	Additional work related to discovery of conflicting utilities within the subsidewalk basement at 17-19 Stockton Street. (Worst case scenario - "Not to Exceed" value) CM team will report actual amount value at a later date.		\$	346	CMB-0069	Agree	04/04/12
1251-0040, 0041, & 0042	Installation of approximately 150LF in additional AT&T trenching (including conduit packages) and the installation of AT&T Vault No.133 (Reimbursement to SFMTA for this compensation value via the Form B process - <b>CMod #14</b>		\$	100	CMB-0070	Agree	04/11/12
FD-035	Tunnel Air Replenishment System (ARS)		\$	1,215	CMB-0071	Agree	07/11/12
FD-036	Surface Segment Sewers - 4th St. Base and SFPUC Option		\$	2,200	CMB-0072	Agree	07/18/12
1252-025	UMS Reduced Duration - 08/01/12:Condition upon incorporating correctness to backup documentation as required by & documented in CMB mtg.		\$	-	CMB-0073	Agree (Conditionally)	08/01/12
1251-0050, 0067, 0074 & 0075	Trend #50 - Installation of MUNI 770 Pole at 5th and Folsom Trend #67 - OCS Feeder Work On Folsom Trend #74 - Traffic Signal Modifications At 5th And Folsom Trend #75 - Unforeseen Conditions During Pole Foundation Installation On Folsom		\$	1,100	CMB-0074	Agree	08/15/12
1251-0068	Additional time related overhead (TRO) costs resulting from the 29EA calendar day Contract extension		\$	107	CMB-0075	Agree (Conditionally)	10/03/12
1251-0043, 0072 & 0080	Trend #43 FAR for Demolition of existing AT&T Vault #113 and 403 Trend #72 Additional AT&T trench from Vault #5829 and 127 Trend #80 Additional work related to installation of AT&T Vaults #5828, 5829, 5830, 5831, 5832 and 5833.		\$	129	CMB-0076	Agree (Conditionally)	10/03/12
FD-037	Platform Display System Signs - 08/29/12: Condition follow up action to evaluate procumbent by CN1260)		\$	500	CMB-0077	Agree (Conditionally)	08/29/12
1251-0037, 0044 & 0045	Gucci Store, Macy's West and Union Square Garage Sewer Installations		\$	71	CMB-0078	Agree	09/12/12
1251-0052, 0065 and 0070	Trend #52 - Reroute Unforeseen existing waterline discovered along Geary St (east of Stockton St.) Trend #65 - Additional fittings for AWSS lateral and chipping of pole foundation at Market/Ellis Streets Trend #70 - Core drill primary wall and install interior plumbing at Armani and Disney for the completion of fire service water cutover work.		\$	65	CMB-0079	Agree	10/10/12

## **CENTRAL SUBWAY PROJECT - Configuration Management Board Change Control Log**

Initial Implementing Procedure						СМВ		
Change Form No.	Title of Change	Schedule Impact	*Cost Imp		CMB No.	Agree / Disagree	Final Decision Record Date	
1251-0038, 0039, 0054,0062 and 0073	Trend #38 - Reimburse Synergy for JCDecaux's removal of 2EA kiosks and other Central Subway related work (TO #35 for this work approved on 01/04/12 - CMB 0064).  Trend #39 - Furnish and install 2EA benches along 5th Street.  Trend #54 - Additional waterproofing at FIDM and north end of Crate and Barrel.  Trend #62 - Additional waterproofing at Macy's Men's wall.  Trend 73 - Additional work to install water and electrical utilities for flower stand on Geary west of Stockton.		\$	86	CMB-0080	Agree	10/24/12	
1251-0077	Additional Work Related to Qwest, TCG and UCCO Infrastructure - Contingent CMod pig to include evidence from all utilities that cost are reimbursable to SFMTA		\$	41	CMB-0081	Agree (Conditionally)	10/31/12	
1251-0047, 0058, 0076, and 0078	Muni Vault 900A, Additional SL Work, Additional OCS Work		\$	76	CMB-0082	Agree	10/31/12	
1251-0049, 0053, 0059 and 0064	Contract Acceleration work and Additional Rebar work at 1 Stockton Street Trend #49 Additional cost related to installation of additional rebar at 1 Stockton Street Trend #53 Additional costs to accelerate Contract work related to AT&T and PG&E vaults Trend #59 Additional costs to accelerate Contract work as required to clear Barneys frontage		\$	41	CMB-0083	Agree	11/07/12	
1252	Retrieval Shaft Options (Board Action) for approval presented to the Directors by J.F.			-	CMB-0084	Agree	12/05/12	
1252-COR26	MOS - Asbestos Pipe at south headwall - Not To Exceed \$30K		\$	30	CMB-0085	Agree	01/09/13	
1252-COR02	Pre-excavation to remove concrete encased sewer line. \$13K increase of original \$45K for a total of \$58K Not To Exceed		\$	58	CMB-0086	Agree	12/19/12	
1252-COR15	Additional work to restrain the AWSS line - Not To Exceed \$96K		\$	96	CMB-0087	Agree	12/19/12	
1252-COR06	PG&E live electrical delays - Not To Exceed \$7,600		\$	8	CMB-0088	Agree	01/09/13	
1252-COR27	MOS Oil Filled Pipe at south headwall - Not To Exceed \$8,600		\$	9	CMB-0089	Agree	01/09/13	
1252-COR22	MOS Asbestos Pipe at north headwall - Not To Exceed \$6K		\$	6	CMB-0090	Agree	01/09/13	
1252-COR01	AWSS Conflict with Low Pressure Water - Not To Exceed \$16,900		\$	17	CMB-0091	Agree	01/16/13	
1252-COR03	AT&T Vault Conflict -4th & Harrison - Not To Exceed \$21,089		\$	21	CMB-0092	Agree	01/16/13	
1252-COR07	Oil Filled pipe @ Launch Box - Not To Exceed \$10K		\$	10	CMB-0093	Agree	01/16/13	
1252-COR10	MOS - Demo Pea duct bank / SF City 911 fiber optic line - Not To Exceed \$4,915		\$	5	CMB-0094	Agree	01/16/13	
1252-COR11	MOS - Traffic Signal line re-route south headwall - Not To Exceed \$37,500		\$	38	CMB-0095	Agree	01/16/13	
1252-COR12	MOS - Archaeological Standby North Headwall - Not To Exceed \$16,892		\$	17	CMB-0096	Agree	01/16/13	
1252-COR29	MOS - Todco scaffolding reimbursement - Not To Exceed \$1,717		\$	2	CMB-0097	Agree	01/16/13	

## **CENTRAL SUBWAY PROJECT - Configuration Management Board Change Control Log**

	Initial Implementing Procedure				СМВ	
Change Form No.	Title of Change	Schedule Impact	Impact (000)	CMB No.	Agree / Disagree	Final Decision Record Date
1252-COR41	LB Impacts due to live PG&E electrical lines (Flagging) Not To Exceed \$1,245		\$ 1	CMB-0098	Agree	01/16/13
1252-PCC01	Revisions to Moscone North Headwall Elevation (Top) Not To Exceed \$20,500		\$ 21	CMB-0099	Agree	01/16/13
1252 PCC09	UMS Headwall - Unknown Buried Pipe - Not To Exceed \$75K		\$ 75	CMB-0100	Agree	01/16/13
1252-COR.38	Manhole in West side Guidewalls Footprint - Not To Exceed \$4,052.17		\$ 4	CMB-0101	Agree	01/23/13
1252-COR39	MOS - 16" Steel Pipe Removal at North east Headwall - Not To Exceed \$2,951.99		\$ 2	CMB-0102	Agree	01/23/13
1252-COR46	UMS - Unmarked Steel Pipes (6", 12" and 14") & Duct Bank - Not To Exceed \$7,461.14		\$ 7	CMB-0103	Agree	01/23/13
1252-COR47	Retrieval Shaft - Unmarked 10" Steel Pipe / Duct Bank Removal - NTE \$2,201.54		\$ 2	CMB-0104	Agree	01/23/13
1252-PCC11	Cap and Removal of 48" Steel Pipe - Not To Exceed \$150,000		\$ 150	CMB-0105	Agree	01/23/13
1252-PCC07	BART Annex Wall - Not To Exceed \$15,380		\$ 15	CMB-0106	Agree	01/30/13
61, 63, 66, 69,	CMod #24 PG&E:  1. Trend 05 – Addll wok to work around and shift existing PG&E conduits on Geary Blvd. at 2 locations  2. Trend 46 – Additional cost for enlarging PG&E Vault No. 584 on O'Farrell east of Stockton  3. Trend.51 – Intercept existing PG&E ductbank and terminate into Vault No. 5464 Market/Ellis  4. Trend 61 – Excavate for PG&E service cut-over at 177 Stillman  5. Trend 63 – Excavation and restoration for PG&E gas tie-in and kill holes (Pt.2)  6. Trend 66 – Intercept PG&E conduits at Vault No. 573 at Geary east of Stockton  7. Trend 69 – Removal of abandoned PG&E gas valve (8EA and installation of anodes  8. Trend 79 – Additional work related to the installation of PG&E Vault Nos. 467, 571, 573, 586 and 594 (including joint trench leading to these vaults).  9. Trend 81 – Use of regular concrete as opposed to cover PG&E electrical ductbanks.		\$ 333	CMB-0107	Agree	02/13/13
1252-031	Retrieval Shaft Unmarked 12" Steel Pipe - Not To Exceed \$1,250		\$ 1	CMB-0108	Agree	02/27/13
1252-044	MOS - 16" Steel pipe removal at headwall - Not To Exceed \$1,800		\$ 2	CMB-0109	Agree	02/27/13
1252-050	MOS - 12" Steel pipe removal at Union/Columbus Streets - Not To Exceed \$2,600		\$ 3	CMB-0110	Agree	02/27/13
1252 - 058	10" Steel pipe removal at Union and Columbus Streets - Not To Exceed \$860.86		\$ 1	CMB-0111	Agree	02/27/13
1252 - 066	MOS - 12" Steel pipe removal intersection of Union and Columbus - Not To Exceed \$3,800		\$ 4	CMB-0112	Agree	02/27/13
1252-PCC03	Modified Stockton St. Detour Signage Plan - Not To Exceed \$6,152.60		\$ 6	CMB-0113	Agree	02/27/13
1252 - 048	Removal of 3" x 5" brick sewer at UMS South Headwall - Not To Exceed \$12,474.65		\$ 12	CMB-0114	Agree	03/13/13
1252 - 070	LB Jet Grout Quantity Overrun - Bid Item ES-3- Not To Exceed \$599,900		\$ 600	CMB-0115	Agree	04/03/13
	Total		\$ 82,630			