



PROJECT MEMORANDUM

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PG&E EMBARCADERO-POTRERO 230 KV TRANSMISSION PROJECT

To:Billie Blanchard, Project Manager, CPUCFrom:Vida Strong, Aspen Project ManagerDate:August 4, 2016Subject:Monitoring Report #97 – July 25, 2016 to July 31, 2016

This report provides a summary of the construction and compliance activities associated with the PG&E Embarcadero-Potrero (E-P) 230 kV Transmission Project.

A summary of the Notices to Proceed (NTPs) for construction and Minor Project Change (MPC) activities are provided in Tables 1 and 2, respectively (below).

CPUC Environmental Monitor (EM): Jody Fessler was on site July 26th.

CPUC NTPs

E-P Potrero Switchyard Site Preparation

NTP #1 was issued on August 21, 2014 for the site preparation of the Potrero Switchyard on 23rd Street adjacent to the existing Potrero Substation on the corner of 23rd Street and Illinois Street in San Francisco. NTP #1 included conditions that had to be satisfied prior to the start of construction.

Summary of Activity:

1. Site preparation activities have been completed and all work is now being conducted for the GIS building and cable tie-in work approved by the CPUC under NTP #5 (see below).

Environmental Compliance:

1. All environmental compliance monitoring will be reported below for the GIS building and cable tiein work.

E-P Horizontal Directional Drill (HDD) Construction

NTP #2 was issued on August 28, 2014 for the HDD Construction on Spear Street, at the northern end of the project, and 23rd Street, at the southern end of the project, in San Francisco. Both HDDs would terminate within the San Francisco Bay and will be tied together in the future via a subsea cable. NTP #2 included conditions that had to be satisfied prior to the start of construction, as well as prior to the start of any work in the Bay.

Summary of Activity at the Northern Bore (Spear Street):

1. The HDD work is complete and HDD Company demobilized from the site during Week #26.

Summary of Activity at the Southern Bore (23rd Street):

1. The HDD work is complete and HDD Company demobilized from the site during Week #26.

E-P Underground Duct Bank Construction

NTP #3 was issued on October 9, 2014 for the underground duct bank and vault installation component of the Embarcadero-Potrero 230 kV Transmission Project between the horizontal directional drill (HDD) transition on Spear Street to the Embarcadero Substation on Folsom Street in the northern section, and between the HDD transition on 23rd Street to the Potrero Switchyard in the southern section, in the City of San Francisco. NTP #3 included conditions that had to be satisfied prior to the start of construction.

Summary of Activity for the Duct Bank North (Folsom St. and Spear St.):

Folsom Street

1. All work activities have been completed at this location.

Spear Street, Duct Bank and Vault (between Folsom St and Harrison St)

- 1. NRE and Kinectrics conducted an impedance test on the power lines between the transition vault and the Embarcadero Substation on Monday.
- 2. Sumitomo and NRE conducted wire splicing in the transition vault on Spear Street Tuesday through Saturday (see Figure 1).
- 3. At the time of the CPUC EM site visit on July 26th, crews were conducting wire splicing in the transition vault.

Environmental Compliance:

- 1. PG&E's Environmental Inspector (EI) conducted monitoring of this area on Monday and Friday, including SWPPP inspections and nesting bird sweeps. No biological finds were noted.
- 2. PG&E's EI noted no housekeeping or compliance issues at this location.
- 3. The CPUC EM observed that the site was neat and clean, and that SWPPP measures were in place. All observed work activities were in compliance with mitigation measures (MMs), Applicant Proposed Measures (APMs), and other permit requirements.

Summary of Activity for the Duct Bank South (23rd Street):

23rd Street, Duct Bank and Vault

- 1. APEC excavated for the water and sewer line tie-in Monday through Sunday (see Figure 2).
- 2. NRE and Kinectrics conducted an impedance test on the power lines between the transition vault and the Potrero Substation on Monday.
- No other cable work was conducted Tuesday through Saturday at the transition vault on 23rd Street. Wire splicing will be conducted after it is completed at the Spear Street transition vault on Duct Bank North.
- 4. At the time of the CPUC EM site visit on July 26th, APEC was working on the water and sewer tie-in on 23rd Street. No work was being conducted at the transition vault, but materials and equipment were staged at that location.

Environmental Compliance:

1. PG&E's Environmental Inspector (EI) conducted monitoring of this area on Monday and Friday, including SWPPP inspections and nesting bird sweeps. No biological finds were noted.

- 2. Cultural monitoring was conducted by Far Western Monday through Sunday and cultural constituents were observed.
- 3. PG&E's EI noted no housekeeping or compliance issues at this location.
- 4. The CPUC EM observed that the site was neat and clean, and that SWPPP measures were in place. All observed work activities were in compliance with the MMs, APMs, and other permit requirements.

E-P Submarine Rock and Debris Removal

NTP #4 was issued on November 21, 2014 for the removal of rock obstructing the path of the submarine cable component of the Embarcadero-Potrero 230 kV Transmission Project along the submarine cable line and off shore of Pier 50 in the San Francisco Bay. NTP #4 included conditions that had to be satisfied prior to the start of construction.

Summary of Activity:

1. All work activities related to NTP #4 have been completed.

Environmental Compliance:

1. No compliance monitoring was necessary at this location.

E-P Potrero GIS Building and Cable Tie-in

NTP #5 was issued on March 27, 2015 for construction of the 230 kV Potrero gas-insulated switchgear (GIS) building and cable tie-in component of the Embarcadero-Potrero 230 kV Transmission Project at the Potrero Switchyard site, in the City San Francisco. NTP #5 included conditions that had to be satisfied prior to the start of construction.

Summary of Activity:

Potrero Switchyard

- 1. Office trailer use occurred Monday through Sunday.
- 2. Overaa aided other work crews and conducted housekeeping and dust control activities Monday through Saturday.
- 3. Overaa drilled the outside walls of the GIS building for architectural panels Monday through Saturday.
- 4. Mitchell conducted plumbing in the GIS building Monday through Saturday.
- 5. CCE installed infrastructure and conducted electrical work in the GIS building Monday through Saturday.
- 6. CCE conducted electrical work on the transformer Monday through Sunday.
- 7. Spencer Masonry installed bricks and mortar for the perimeter wall Monday through Saturday.
- 8. ACME installed gate card readers on/in the GIS building Monday through Wednesday.
- 9. Chain Link Fence & Supply Inc. installed fence on Monday.
- 10. Scaffolding Solutions Inc. removed scaffolding from the reactor on Monday and Tuesday.
- 11. APEC excavated and installed conduit north of the GIS building on Friday.
- 12. APEC excavated for soil samples on Humboldt Street on Friday.

- 13. Nexans assembled cable in the GIS basement on Thursday and Friday.
- 14. MEI installed lights on the GIS building Wednesday through Saturday.
- 15. Clean Harbors replaced roll-off bins Monday through Saturday.
- 16. At the time of the CPUC EM site visit on July 26th, crews were preparing to install panels on the GIS building, conducting plumbing and electrical work in the GIS building, conducting electrical work on the transformer, and working on building the perimeter wall.

Substation Adjacent to Potrero Switchyard

- 1. CCE conducted electrical work in the control building Monday through Friday.
- 2. CCE QEW monitored work in the substation Monday through Friday.
- 3. CCE constructed metal infrastructure for use in the GIS building Monday through Saturday.
- 4. Nexans conducted electrical work on the 115 kV bus Monday through Wednesday.
- 5. Nexans spliced cables (wire) on the 115 kV bus Wednesday through Friday.
- 6. At the time of the CPUC EM site visit on July 26th, crews were conducting work on the 115 kV bus and assembling metal infrastructure.

Environmental Compliance:

- 1. No cultural monitoring was required during the subject week.
- 2. Air quality monitoring was conducted by ERM Monday through Sunday.
- 3. PG&E's Environmental Inspector (EI) conducted monitoring of this area on Monday and Friday, including SWPPP inspections and nesting bird sweeps. No biological finds were noted.
- 4. PG&E's EI noted one new housekeeping and compliance issue:
 - On July 29th, a light tower near the 23rd Street gate had no secondary containment or drip pan. The PG&E EI recommended that the tower have secondary containment.
- 5. The CPUC EM observed that the site was neat and clean, and that SWPPP measures were in place. All observed work activities were in compliance with MMs, APMs, and other permit requirements.

E-P Submarine Cable Installation

NTP #6 was issued on April 7, 2015 for the submarine cable installation component of the Embarcadero-Potrero 230 kV Transmission Project in the San Francisco Bay. NTP #6 included conditions that had to be satisfied prior to the start of construction.

Summary of Activity:

1. All work activities for the submarine cable installation were completed during Week #50.

Amador Staging and Laydown Yard

A Minor Project Change #1 was issued on July 23, 2014 for the use of the Amador Staging and Laydown Yard on Amador Street, San Francisco. The Minor Project Change #1 included conditions that had to be satisfied prior to the staging of equipment and materials at the yard.

Summary of Activity:

1. All remaining materials were removed on December 7th and the yard has been turned back over to the Port of San Francisco.

Environmental Compliance:

1. No compliance monitoring was necessary at this location.

Notices to Proceed

Table 1 summarizes the Notices to Proceed (NTP) for the Embarcadero-Potrero Project.

	Date	Date		
NTP #	Requested	Issued	Phase	Description
NTP #1	6/23/14	8/21/14	Potrero Site	Site preparation and excavation of the 230 kV
			Preparation	Potrero Switchyard site on 23 rd St., SF.
NTP #2	7/31/14	8/28/14	HDD	Horizontal directional drilling on Spear St. and
				23 rd St. connecting to the SF Bay.
NTP #3	9/18/14	10/09/14	Underground	Underground duct bank and vault installation
			Duct Bank and	between the HDD transition on Spear St. to
			Vaults	the Embarcadero Substation on Folsom St. in
				the northern section, and between the HDD
				transition on 23 rd St. to the Potrero Switchyard
				in the southern section, SF.
NTP #3	11/13/14	11/14/14	Underground	Trench from the new Potrero Switchyard to
MOD			Duct Bank and	the existing switchyard for the 230 kV/115 kV
			Vaults	connections across the Trans Bay Cable.
NTP #4	11/19/14	11/21/14	Subsea Cable	Rock and debris removal along subsea cable
				route.
NTP #5	2/19/15	3/27/15	Potrero GIS	Construction of 230 kV Potrero gas-insulated
			Switchgear	switchgear (GIS) building and cable tie-in
			Building	component at Potrero Switchyard.

Table 1 Notice to Proceeds (NTPs)

Minor Project Changes

Table 2 summarizes the Minor Project Changes submitted for the Embarcadero-Potrero Project.

Table 2 Minor Project Changes (MPCs) (Updated 08/04/16)

MPC #	Date Requested	Date Issued	Phase	Description
MPC #1	7/16/14	7/23/14	Amador	Use of an existing staging and laydown yard
			Staging and	adjacent to Alternate Staging Area #3 (as
			Laydown Yard	identified in the IS/MND)on Amador St., SF.
MPC #2	12/31/14	1/5/15	Staging and	Use of an existing paved staging and laydown
			Laydown Yard	yard at 1215 Michigan Street, SF, two blocks
				from the Potrero Switchyard.

PROJECT PHOTOS



Figure 1: Splicing cable in transition vault on Spear Street, July 26, 2016.



Figure 2: APEC conducting water and sewer line tie-in work on 23rd Street, July 26, 2016.



Figure 3: Perimeter wall being installation at Potrero Switchyard, July 26, 2016.



Figure 4: Cable pulled through basement of GIS building in Potrero Switchyard, July 26, 2016.