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PROJECT MEMORANDUM KIRBY HILLS NATURAL GAS STORAGE FACILITY PROJECT, PHASE 2

To: Junaid Rahman, CPUC

From: Vida Strong, Aspen Project Manager

Date: October 1, 2008

Subject: Report #16: September 14, 2008 – September 27, 2008

CPUC ENVIRONMENTAL MONITOR (EM): Jody Fessler

CPUC EM Jody Fessler was on site Thursday, September 18th, and Wednesday, September 24th.

WELL SITES:

Summary of Activity:

Well Site 21 (WS-21)

September 14th – September 20th

On Monday, Ensign Drilling moved two workover rigs from WS-22 to WS-21 well pad and set up on WS-21-4 and WS-21-5 (see Figure 1). The workover rigs stayed at WS-21-4 and WS-21-5 throughout the week. On Wednesday, crews installed cable and HDPE piping in the pipeline trench at the well site. WS-21-4 was completed on Saturday.

September 21st – September 27th

Throughout the week, Ensign Drilling had a workover rig on WS-21-5. On Monday, crews completed the installation of the pipeline across WS-21. Also see pipeline discussion below.

Well Site 22 (WS-22)

September 14th – September 20th

On Monday, Ensign Drilling moved two workover rigs from the WS-22 to WS-21 well pad. On Tuesday, crews conducted clean-up of the well pad area. On Wednesday, crews installed the pipeline tee at the well site. On Thursday, crews welded branch piping from the pipeline tee to above grade flange and welded the pipeline piping across the well site. On Friday, crews moved miscellaneous piping, valves and material to the well site from the compressor yard area.

 $September\ 21^{st}-September\ 27^{th}$

On Tuesday, crews completed the installation of cable in the pipeline trench across WS-22 and backfilled the trench. On Wednesday and Thursday, crews began excavating for the piping at WS-22 (see Figure 2). Also see pipeline discussion below.

Well Site 23 (WS-23)

September 14th – September 20th

Throughout the week, Ensign Drilling continued to drill at WS-23-15. Crews are drilling 24 hours a day, 7 days a week.

 $September\ 21^{st}-September\ 27^{th}$

Throughout the week, Ensign Drilling continued to drill at WS-23-15 (see Figure 3). Crews are drilling 24 hours a day, 7 days a week.

Observation Well Lambie 6 (Well L6)

No work activities occurred at Well L6 during the subject week.

Observation Well Lambie 7 (Well L7)

No work activities occurred at Well L7 during the subject week.

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PIPELINE:

Summary of Activity:

September 14th – September 20th

On Monday, crews installed a tee at WS-21 and welded pipeline at WS-21. On Tuesday, crews welded pipeline at WS-21 and the pipeline to WS-22. On Wednesday, crews welded pipe joints between WS-21 and WS-22. On Thursday, crews continued welding pipeline across WS-22 and graded the pipeline right-of-way area between the compressor station and WS-21. On Friday, crews installed cable and HDPE piping between WS-21 and WS-22.

September 21st – September 27th

On Monday, crews completed the installation of the pipeline across WS-21. On Tuesday and Wednesday, crews worked on cleaning up the right-of-way between WS-21 and WS-22. On Thursday and Friday, crews installed anodes at the pipeline at the point of intersection outside the compressor station fence.

ACCESS ROADS:

Summary of Activity:

On Thursday, September 18^{th} , crews graded the access road and pipeline right-of-way area between the compressor station and WS-21.

On Wednesday, September 24th, crews completed grading of the roadway base between the compressor station and WS-21. On Thursday, September 25th, crews installed culverts on the road between the compressor site and WS-21.

STAGING AREAS:

Summary of Activity:

Crews are utilizing the temporary work area/staging yard on the north side of the compressor station for materials storage, equipment storage, and welding operations.

COMPRESSOR STATION SITE:

Summary of Activity:

September 14th – September 20th

Throughout the week, crews excavated trenches for piping; fabricated miscellaneous piping spool; constructed forms for the glycol contactor foundation and the glycol regeneration skid foundation; conducted layout work for MAK-6150 filter foundation; set the compressor skids on their foundations; installed rebar for the glycol contactor foundation, the glycol regeneration skid foundation, and the MAK-6150 footing.

September 21st – September 27th

Throughout the week, crews completed rebar installation for the glycol contactor, glycol regeneration skid and MAK-6150 foundations; conducted miscellaneous pipe spool fabrication; prepared for early injection piping hydrostatic testing; prepared for epoxy grout installation on unit CBA-3000; poured concrete for glycol contactor and MAK-6150 footings; stripped forms from the glycol contactor footing; installed forms and prepared for epoxy grouting for compressor CBA-300 skid unit; began assembly of early injection piping inside the compressor station; and welded and installed piping inside the compressor facility related to the early injection system (see Figures 4 and 5).

Environmental Compliance:

The CPUC EM observed that all work activities were in compliance with the approved Mitigated Negative Declaration and other permit requirements. The CPUC EM reviewed LGS' Environmental Inspector's (EI) daily reports and survey reports. Environmental training of crew personnel by LGS's EI was on-going as new crew personnel came onto the site. Sensitive environmental areas were staked, flagged, and/or fenced. The wetland area near WS-23 was fenced off and had silt fencing installed on the upslope side so potential erosion from WS-23 would not enter the wetland area. The CPUC EM observed water trucks continuously watering the work areas and access roads. The refueling tank and other small cans at the compressor station were surrounded with secondary containment. The sites were cleaned of trash on a daily basis.

NOTICES TO PROCEED (NTP):

To date, six Notices to Proceed (NTPs) have been issued for the Kirby Hills Natural Gas Storage Facility Phase II Project (see Table 1). Additional NTPs are anticipated for the project.

TABLE 1 Notice to Proceed Requests (Updated 10-01-08)

	Date	Date	
NTP#	Requested	Issued	Description
#1	4-11-08	4-21-08	Request authorization from the CPUC to commence with construction activities associated with three new wells (Well Sites 21, 22, and 23), a 2,700-foot-long pipeline (flow line), and access roads and staging areas for Phase II of the Kirby Hills Natural Gas Storage Facility Project.
#2	4-11-08	4-20-08	Request authorization from the CPUC to commence with reentry and conversion of Wells Lambie 6 and Lambie 7 to observation wells for Phase II of the Kirby Hills Natural Gas Storage Facility Project.
#3	5-2-08	5-6-08	Request a NTP from the CPUC for PG&E's hot tapping work at the Kirby Hills Natural Gas Storage Facility meter station, located west of Birds Landing Road in Solano County.
#4	4-29-08	5-7-08	Request authorization from the CPUC to commence with the civil, mechanical, electrical, and instrumentation work at the compressor station facility of the Kirby Hills for Phase II of the Kirby Hills Natural Gas Storage Facility Project.
#5	5-23-08	N/A	Request authorization from the CPUC for extra work space at the corner of Shiloh Road and the access road to Kirby Hills. This work space was already approved under NTP #1 and therefore NTP #5 is not necessary. Wetland areas within the work space will be totally avoided.
#6	6-9-08	6-13-08	Request to install compressor units on foundations at Compressor Station.

VARIANCE REQUESTS:

No Variance Requests have been submitted to the CPUC to date.

PHOTOGRAPHS



Figure 1 – Workover rigs at WS-21, September 18, 2008.



Figure 2 – Piping excavation across south side of WS-22, September 24, 2008.



Figure 3 – Drill rig set up at WS-23-15, September 24, 2008.



Figure 4 – Compressors being installed at the Compressor Station, September 24, 2008.



Figure 5 – Excavations for foundations and piping at the Compressor Station, September 24, 2008.