

**APPENDIX B**

**STREAMBED ALTERATION NOTIFICATIONS**



February 12, 2009

Mr. Chuck Armor  
Regional Manager, Region 3: Bay Delta/Central Coast Region  
California Department of Fish and Game  
Post Office Box 47  
Yountville, CA 94599  
Attn: Suzanne Gilmore

**Subject: 1603 Streambed Alteration Notification for the Mirant Willow Pass Generating Station Off-Site Water Pipelines**

Dear Mr. Armor:

The attached Streambed Alteration Notification (SAN) package for the Mirant Willow Pass Generating Station (WPGS) project is being submitted by URS Corporation (URS) on behalf of Mirant Willow Pass, LLC (Mirant Willow Pass). While the WPGS is being constructed within the footprint of the existing Pittsburg Power Plant property, Mirant Willow Pass proposes to construct two parallel off-site water pipelines as part of the proposed WPGS project, which is currently under review by the California Energy Commission (CEC). These water pipelines would be constructed to transport water to and from the WPGS and the Delta Diablo Sanitation District Wastewater Treatment Plant. Construction of the pipelines would require two crossings of Kirker Creek (Creek Crossings 1 and 3), one crossing of an unnamed tributary of Kirker Creek (Creek Crossing 2), one crossing of a drainage channel located in a railroad switchyard (Drainage Channel Crossing 2), and one crossing of a drainage channel immediately south of the developed portion of the existing Pittsburg Power Plant (Drainage Channel Crossing 1).

In December 2008 and January 2009, Suzanne Gilmore (California Department of Fish and Game [CDFG]) and Jon Stead (URS) discussed the WPGS project and the five crossings that would be involved to construct the water pipelines. Ms. Gilmore confirmed that one crossing, Drainage Channel Crossing 1, would not require notification because the new pipelines will intersect the channel at a location where the channel is confined within a culvert, underneath a roadway. At the time of that conversation, installation of the pipelines at Creek Crossing 3 was expected to involve temporary construction of an open trench through Kirker Creek, which would require a SAN. It has since been established that for Creek Crossing 3, the pipeline would be installed within the existing roadway or roadway shoulder (Arcy Lane), and would cross the creek at a location where the creek is already culverted underneath the existing roadway. Therefore, this crossing is now similar to Drainage Channel Crossing 1, with there being no impacts to the creek itself, and it is assumed that no SAN is required at Creek Crossing 3. Ms. Gilmore confirmed that a separate SAN would be required for each of the remaining three crossings: Drainage Channel Crossing 2 (based on connectivity of this channel with a channel that drains to Suisun Bay, confirmed following the conversation with Ms. Gilmore), Creek Crossing 1, and Creek Crossing 2.

This SAN package includes:

- Three completed CDFG notification forms (one for each crossing)

URS Corporation  
1333 Broadway, Suite 800  
Oakland, CA 94612  
Tel: (510) 893-3600  
Fax: (510) 874.3268  
www.urscorp.com



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- Three sets of “Streambed Alteration Notification Additional Pages” (one for each crossing)
- Three sets of figures (one for each crossing)

The notifications describe the proposed work and potential water quality impacts for each crossing. Avoidance, minimization, and restoration measures would be implemented to reduce potential adverse effects to sensitive habitats and listed species.

Additional project documentation referenced in the notifications is enclosed on CD. The referenced documents include:

- Application for Certification (AFC) (June 2008)
- AFC Supplement in Response to Data Adequacy Review (September 2008)
- Responses to California Energy Commission (CEC) Data Requests (December 2008)
- Responses to CEC Workshop Questions, which includes a Memorandum Summarizing Plant Survey Conducted After Submittal of the AFC (February 2009)

The CEC is the lead agency for the WPGS project. Under the CEC licensing process, the applicant prepares an Application for Certification in lieu of an Environmental Impact Report. The AFC is then reviewed by the CEC’s staff and the public. The CEC staff publishes a preliminary and a final staff assessment with their findings for the Commissioners’ review of the project. Final CEC certification is dependent upon approval by the CEC Commissioners.

Please contact Jon Stead at (510) 874-3058 or Kathy Rushmore at (415) 243-3833 if you have any questions regarding this submittal. We are available for a site visit or meetings at your convenience.

Sincerely,

**URS CORPORATION**

[ORIGINAL SIGNED]

Jonathan Stead  
Senior Biologist

Enclosures

cc: Jon Sacks, Mirant  
Ron Kino, Mirant  
Ivor Benci-Woodward, CEC  
Kathy Rushmore, URS

FOR DEPARTMENT USE ONLY

Date Received	Amount Received	Amount Due	Date Complete	Notification No.
	\$	\$		



**STATE OF CALIFORNIA  
DEPARTMENT OF FISH AND GAME  
NOTIFICATION OF LAKE OR STREAMBED ALTERATION**



**Complete EACH field, unless otherwise indicated, following the enclosed instructions and submit ALL required enclosures. Attach additional pages, if necessary.**

**1. APPLICANT PROPOSING PROJECT**

Name	Jonathan Sacks			
Business/Agency	Mirant Willow Pass, LLC			
Street Address	P.O. Box 192			
City, State, Zip	Pittsburg, California 94565			
Telephone	(925) 427-3517	Fax	(925) 427-3518	
Email	jon.sacks@mirant.com			

**2. CONTACT PERSON** *(Complete only if different from applicant)*

Name	Jonathan Stead			
Street Address	1333 Broadway, Suite 800			
City, State, Zip	Oakland, California 94612			
Telephone	(510) 874-3058	Fax	(510) 874-3264	
Email	jon_stead@urscorp.com			

**3. PROPERTY OWNER** *(Complete only if different from applicant)*

Name	Mirant Delta, LLC (Attn: Jonathan Sacks)			
Street Address	P.O. Box 192			
City, State, Zip	Pittsburg, California 94565			
Telephone	(925) 427-3517	Fax	(925) 427-3518	
Email	jon.sacks@mirant.com			

**4. PROJECT NAME AND AGREEMENT TERM**

A. Project Name	Willow Pass Creek Crossing 1 Project			
B. Agreement Term Requested	<input checked="" type="checkbox"/> Regular (5 years or less)			
	<input type="checkbox"/> Long-term (greater than 5 years)			
C. Project Term		D. Seasonal Work Period		E. Number of Work Days
Beginning (year)	Ending (year)	Start Date (month/day)	End Date (month/day)	
2009	2014	06/15	10/15	
				120.00

NOTIFICATION OF LAKE OR STREAMBED ALTERATION

**5. AGREEMENT TYPE**

Check the applicable box. If box B, C, D, or E is checked, complete the specified attachment.

A.	<input checked="" type="checkbox"/> Standard (Most construction projects, excluding the categories listed below)
B.	<input type="checkbox"/> Gravel/Sand/Rock Extraction (Attachment A) <span style="float: right;">Mine I.D. Number: _____</span>
C.	<input type="checkbox"/> Timber Harvesting (Attachment B) <span style="float: right;">THP Number: _____</span>
D.	<input type="checkbox"/> Water Diversion/Extraction/Impoundment (Attachment C) <span style="float: right;">SWRCB Number: _____</span>
E.	<input type="checkbox"/> Routine Maintenance (Attachment D)
F.	<input type="checkbox"/> DFG Fisheries Restoration Grant Program (FRGP) <span style="float: right;">FRGP Contract Number: _____</span>
G.	<input type="checkbox"/> Master
H.	<input type="checkbox"/> Master Timber Harvesting

**6. FEES**

Please see the current fee schedule to determine the appropriate notification fee. Itemize each project's estimated cost and corresponding fee. **Note: The Department may not process this notification until the correct fee has been received.**

	A. Project	B. Project Cost	C. Project Fee
1	Willow Pass Creek Crossing 1 Project	\$444,900.00	\$2,250.00
2			
3			
4			
5			
		D. Base Fee (if applicable)	
		<b>E. TOTAL FEE ENCLOSED</b>	<b>\$2,250.00</b>

**7. PRIOR NOTIFICATION OR ORDER**

A. Has a notification previously been submitted to, or a Lake or Streambed Alteration Agreement previously been issued by, the Department for the project described in this notification?

Yes (Provide the information below)  No

Applicant: \_\_\_\_\_ Notification Number: \_\_\_\_\_ Date: \_\_\_\_\_

B. Is this notification being submitted in response to an order, notice, or other directive ("order") by a court or administrative agency (including the Department)?

No  Yes (Enclose a copy of the order, notice, or other directive. If the directive is not in writing, identify the person who directed the applicant to submit this notification and the agency he or she represents, and describe the circumstances relating to the order.)

Continued on additional page(s)

NOTIFICATION OF LAKE OR STREAMBED ALTERATION

8. PROJECT LOCATION

A. Address or description of project location. (Include a map that marks the location of the project with a reference to the nearest city or town, and provide driving directions from a major road or highway)				
The proposed project is located approximately 30 miles northeast of San Francisco in the City of Pittsburg, within Contra Costa County (Figure 1).  Driving Directions: From Napa, California Merge onto CA-29 South (10 minutes, 6.7 miles) Turn left at Airport Boulevard/CA-12/Jameson Canyon Road (10 minutes, 5.8 miles) Take the ramp onto I-80 East (1 minute, 0.7 mile) Take the exit onto I-680 South toward Benicia (17 minutes, 17.5 miles) Take exit 53 toward Antioch/Pittsburg/State Highway 4 East (0.2 mile) Keep left at the fork to continue toward CA-4 East (0.3 mile) Keep right at the fork, follow signs for Antioch/Pittsburg/State Highway 4 and merge onto CA-4 East (11 minutes, 11.5 miles) Take the Loveridge Road exit (0.3 mile), Slight left at Loveridge Road (2 minutes, 0.5 mile) Turn left at Pittsburg Antioch Highway (2 minutes, 0.6 mile)				
<input type="checkbox"/> Continued on additional page(s)				
B. River, stream, or lake affected by the project.		Kirker Creek		
C. What water body is the river, stream, or lake tributary to?			New York Slough	
D. Is the river or stream segment affected by the project listed in the state or federal Wild and Scenic Rivers Acts?				<input type="checkbox"/> Yes
				<input checked="" type="checkbox"/> No
				<input type="checkbox"/> Unknown
E. County	Contra Costa			
F. USGS 7.5 Minute Quad Map Name		G. Township	H. Range	I. Section
Antioch North		CA Land Grants	Civil Colonies	
<input type="checkbox"/> Continued on additional page(s)				
K. Meridian (check one)		<input type="checkbox"/> Humboldt		
		<input checked="" type="checkbox"/> Mt. Diablo		
		<input type="checkbox"/> San Bernardino		
L. Assessor's Parcel Number(s)				
073190XXX				
<input type="checkbox"/> Continued on additional page(s)				
M. Coordinates (If available, provide at least latitude/longitude or UTM coordinates and check appropriate boxes)				
Latitude/Longitude	Latitude: 38.01815233210		Longitude: -121.86951112400	
	<input type="checkbox"/> Degrees/Minutes/Seconds		<input checked="" type="checkbox"/> Decimal Degrees	
UTM	Easting:		Northing:	<input type="checkbox"/> Zone 10
				<input type="checkbox"/> Zone 11
Datum used for Latitude/Longitude or UTM		<input type="checkbox"/> NAD 27		<input checked="" type="checkbox"/> NAD 83 or WGS 84

NOTIFICATION OF LAKE OR STREAMBED ALTERATION

9. PROJECT CATEGORY AND WORK TYPE (Check each box that applies)

PROJECT CATEGORY	NEW CONSTRUCTION	REPLACE EXISTING STRUCTURE	REPAIR/MAINTAIN EXISTING STRUCTURE
Bank stabilization – bioengineering/recontouring	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Bank stabilization – rip-rap/retaining wall/gabion	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Boat dock/pier	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Boat ramp	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Bridge	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Channel clearing/vegetation management	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Culvert	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Debris basin	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Dam	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Diversion structure – weir or pump intake	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Filling of wetland, river, stream, or lake	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Geotechnical survey	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Habitat enhancement – revegetation/mitigation	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Levee	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Low water crossing	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Road/trail	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Sediment removal – pond, stream, or marina	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Storm drain outfall structure	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Temporary stream crossing	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Utility crossing : Horizontal Directional Drilling	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jack/bore	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Open trench	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
<b>Other (specify):</b> water pipe line (pipe ramming)	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

NOTIFICATION OF LAKE OR STREAMBED ALTERATION

**10. PROJECT DESCRIPTION**

A. Describe the project in detail. Photographs of the project location and immediate surrounding area should be included.

- Include any structures (e.g., rip-rap, culverts, or channel clearing) that will be placed, built, or completed in or near the stream, river, or lake.
- Specify the type and volume of materials that will be used.
- If water will be diverted or drafted, specify the purpose or use.

Enclose diagrams, drawings, plans, and/or maps that provide all of the following: site specific construction details; the dimensions of each structure and/or extent of each activity in the bed, channel, bank or floodplain; an overview of the entire project area (i.e., "bird's-eye view") showing the location of each structure and/or activity, significant area features, and where the equipment/machinery will enter and exit the project area.

Please see attached CDFG 1603 SAN Additional Pages, Box 10A.

Continued on additional page(s)

B. Specify the equipment and machinery that will be used to complete the project.

Please see attached CDFG 1603 SAN Additional Pages, Box 10B.

Continued on additional page(s)

C. Will water be present during the proposed work period (specified in box 4.D) in the stream, river, or lake (specified in box 8.B).

Yes  No (Skip to box 11)

D. Will the proposed project require work in the wetted portion of the channel?

Yes (Enclose a plan to divert water around work site)  
 No

NOTIFICATION OF LAKE OR STREAMBED ALTERATION

11. PROJECT IMPACTS

A. Describe impacts to the bed, channel, and bank of the river, stream, or lake, and the associated riparian habitat. Specify the dimensions of the modifications in length (linear feet) and area (square feet or acres) and the type and volume of material (cubic yards) that will be moved, displaced, or otherwise disturbed, if applicable.

Please see attached CDFG 1603 SAN Additional Pages, Box 11A.

Continued on additional page(s)

B. Will the project affect any vegetation?  Yes (Complete the tables below)  No

Vegetation Type	Temporary Impact	Permanent Impact
ruderal/bare ground	Linear feet: _____ Total area: <u>974.34 sq mi</u>	Linear feet: _____ Total area: <u>0</u>
	Linear feet: _____ Total area: _____	Linear feet: _____ Total area: _____

Tree Species	Number of Trees to be Removed	Trunk Diameter (range)
None		

Continued on additional page(s)

C. Are any special status animal or plant species, or habitat that could support such species, known to be present on or near the project site?

Yes (List each species and/or describe the habitat below)  No  Unknown

Continued on additional page(s)

D. Identify the source(s) of information that supports a “yes” or “no” answer above in Box 11.C.

Please see attached CDFG 1603 SAN Additional Pages, Box 11D.

Continued on additional page(s)

E. Has a biological study been completed for the project site?

Yes (Enclose the biological study)  No

Note: A biological assessment or study may be required to evaluate potential project impacts on biological resources.

F. Has a hydrological study been completed for the project or project site?

Yes (Enclose the hydrological study)  No

Note: A hydrological study or other information on site hydraulics (e.g., flows, channel characteristics, and/or flood recurrence intervals) may be required to evaluate potential project impacts on hydrology.

NOTIFICATION OF LAKE OR STREAMBED ALTERATION

12. MEASURES TO PROTECT FISH, WILDLIFE, AND PLANT RESOURCES

A. Describe the techniques that will be used to prevent sediment from entering watercourses during and after construction.

Please see attached CDFG 1603 SAN Additional Pages, Box 12A.

Continued on additional page(s)

B. Describe project avoidance and/or minimization measures to protect fish, wildlife, and plant resources.

Please see attached CDFG 1603 SAN Additional Pages, Box 12B.

Continued on additional page(s)

C. Describe any project mitigation and/or compensation measures to protect fish, wildlife, and plant resources.

Please see attached CDFG 1603 SAN Additional Pages, Box 12B.

Continued on additional page(s)

13. PERMITS

List any local, state, and federal permits required for the project and check the corresponding box(es). Enclose a copy of each permit that has been issued.

- A. California Energy Commission License  Applied  Issued
- B. BAAQMD Final Determination of Compliance and Permit to Operate  Applied  Issued
- C. \_\_\_\_\_  Applied  Issued
- D. Unknown whether  local,  state, or  federal permit is needed for the project. (Check each box that applies)

Continued on additional page(s)

NOTIFICATION OF LAKE OR STREAMBED ALTERATION

**14. ENVIRONMENTAL REVIEW**

A. Has a draft or final document been prepared for the project pursuant to the California Environmental Quality Act (CEQA), National Environmental Protection Act (NEPA), California Endangered Species Act (CESA) and/or federal Endangered Species Act (ESA)?			
<input checked="" type="checkbox"/> Yes (Check the box for each CEQA, NEPA, CESA, and ESA document that has been prepared and enclose a copy of each) <input type="checkbox"/> No (Check the box for each CEQA, NEPA, CESA, and ESA document listed below that will be or is being prepared)			
<input type="checkbox"/> Notice of Exemption	<input type="checkbox"/> Mitigated Negative Declaration	<input checked="" type="checkbox"/> NEPA document (type): <u>EPA, in process</u>	
<input type="checkbox"/> Initial Study	<input checked="" type="checkbox"/> Environmental Impact Report	<input checked="" type="checkbox"/> CESA document (type): <u>AFC</u>	
<input type="checkbox"/> Negative Declaration	<input type="checkbox"/> Notice of Determination (Enclose)	<input checked="" type="checkbox"/> ESA document (type): <u>Section 7 Consult.</u>	
<input type="checkbox"/> THP/ NTMP	<input type="checkbox"/> Mitigation, Monitoring, Reporting Plan		
B. State Clearinghouse Number (if applicable)			
C. Has a CEQA lead agency been determined?		<input checked="" type="checkbox"/> Yes (Complete boxes D, E, and F) <input type="checkbox"/> No (Skip to box 14.G)	
D. CEQA Lead Agency	California Energy Commission		
E. Contact Person	Ivor Benci-Woodward	F. Telephone Number	(916) 654-3911
G. If the project described in this notification is part of a larger project or plan, briefly describe that larger project or plan.			
Please see attached CDFG 1603 SAN Additional Pages, Box 14G.			
<input checked="" type="checkbox"/> Continued on additional page(s)			
H. Has an environmental filing fee (Fish and Game Code section 711.4) been paid?			
<input checked="" type="checkbox"/> Yes (Enclose proof of payment) <input type="checkbox"/> No (Briefly explain below the reason a filing fee has not been paid)			
<p><i>Note: If a filing fee is required, the Department may not finalize a Lake or Streambed Alteration Agreement until the filing fee is paid.</i></p>			

**15. SITE INSPECTION**

Check one box only.	
<input type="checkbox"/> In the event the Department determines that a site inspection is necessary, I hereby authorize a Department representative to enter the property where the project described in this notification will take place at any reasonable time, and hereby certify that I am authorized to grant the Department such entry.	
<input checked="" type="checkbox"/> I request the Department to first contact (insert name) <u>Jonathan Stead</u> at (insert telephone number) <u>(510) 874-3058</u> to schedule a date and time to enter the property where the project described in this notification will take place. I understand that this may delay the Department's determination as to whether a Lake or Streambed Alteration Agreement is required and/or the Department's issuance of a draft agreement pursuant to this notification.	

NOTIFICATION OF LAKE OR STREAMBED ALTERATION

16. DIGITAL FORMAT

Is any of the information included as part of the notification available in digital format (i.e., CD, DVD, etc.)?
<input checked="" type="checkbox"/> Yes (Please enclose the information via digital media with the completed notification form)
<input type="checkbox"/> No

17. SIGNATURE

I hereby certify that to the best of my knowledge the information in this notification is true and correct and that I am authorized to sign this notification as, or on behalf of, the applicant. I understand that if any information in this notification is found to be untrue or incorrect, the Department may suspend processing this notification or suspend or revoke any draft or final Lake or Streambed Alteration Agreement issued pursuant to this notification. I understand also that if any information in this notification is found to be untrue or incorrect and the project described in this notification has already begun, I and/or the applicant may be subject to civil or criminal prosecution. I understand that this notification applies only to the project(s) described herein and that I and/or the applicant may be subject to civil or criminal prosecution for undertaking any project not described herein unless the Department has been separately notified of that project in accordance with Fish and Game Code section 1602 or 1611.

	02/09/09
Signature of Applicant or Applicant's Authorized Representative	Date
Jonathan A. Sacks	
Print Name	



# Creek Crossing 1

## CDFG Streambed Alteration Notification Additional Pages

**Box 1 through Box 9 – Please see Notification.**

### **Box 10. Project Description**

#### **Box 10A. Describe the project in detail**

The Willow Pass Generating Station (WPGS) project consists of constructing a new 550-megawatt (MW) natural-gas-fired electric generating facility within the existing Pittsburg Power Plant (PPP) site. The WPGS site consists of 26 acres within the 1,000-acre PPP site. As part of the WPGS project (refer to Box 14G for a more detailed description), two new 5-mile-long parallel off-site water pipelines would need to be constructed between the WPGS site and the Delta Diablo Sanitation District Wastewater Treatment Plant (DDSD WTP) (Figure 2). One water line would be used to supply recycled water from DDSD to the WPGS, and one water line would be used to return wastewater from the WPGS to DDSD WTP. Three miles of the five-mile-long route currently contains an unused fuel oil pipeline owned by Mirant Delta, which historically was used to convey oil. The existing pipeline is 10.75 inches in diameter, is now out of service, and will be replaced by the new water pipelines. The new water pipelines would be underground, except at the intersection of Harbor Street, where the pipeline would cross overhead adjacent to the railroad tracks, consistent with the location of the existing unused fuel oil pipeline. These water pipelines would connect directly to existing facilities at the DDSD WTP.

Construction of the pipelines would require one crossing of Kirker Creek (Creek Crossing 1), one crossing of an unnamed tributary of Kirker Creek (Creek Crossing 2), and one crossing of a drainage channel in the rail switchyard (Drainage Channel Crossing 2). (Locations of these crossings are shown on Figure 2.) This streambed alteration notification is for the Creek Crossing 1 project. Photographs 1 and 2 show the location of Kirker Creek at Creek Crossing 1. Separate notifications for the other creek crossing project and the drainage channel crossing project have been submitted with this notification.

Creek Crossing 1 is located at Kirker Creek, south of Pittsburg-Antioch Highway (Figure 3). The crossing at this location is approximately 30 feet wide, from top of bank to top of bank. Pipe ramming would be used to install the pipes underneath the channel at this location. Pipe ramming is a system of installing a crossing by driving an open-ended casing using a percussive hammer from a shaft that displaces a volume of soil equivalent to only the wall thickness of the casing. Soil would remain in the casing until the crossing has been completed and then would be removed by water, augering, jet-cutting or compressed air. This method does not use hydraulic drilling muds such as those used in some other underground pipe installation methods.

The estimated depths of the pipelines at this location are as follows: with an estimated creek depth of 10 feet, a 7-foot clearance between the bottom of the channel and the top of pipe, the casing pipe diameter, plus additional depth for equipment, the approximate depth of the launching and receiving pits at this crossing is estimated to be 24 feet.

At Creek Crossing 1, the launching and receiving pits would be at least 10 feet back from the top of the banks of Kirker Creek (Figure 3). Several existing pipelines cross Kirker Creek at this location. Due to these additional pipelines, the area is kept relatively free of vegetation. The only vegetation that would be affected as part of this project is nonnative annual grassland.

Temporary access and staging of equipment would occur only on existing paved or gravel roadway or ruderal nonnative vegetation/bare ground. For temporary access, vehicles and equipment would enter from the adjacent road and into their construction area. The staging areas would be adjacent to the road, so access would be directly from the road into the staging area. Therefore, no additional area would be impacted from access besides what is already accounted for in the staging area. For Creek Crossing 1, two 50-foot by 200-foot staging areas would be needed.

Work at this crossing would occur during one season (June 15 to October 15) of one year sometime between 2009 and 2014.

**Box 10B. Specify the equipment and machinery that will be used to complete the project.**

Pipe ramming would be used for this crossing of Kirker Creek (Creek Crossing 1). Pipe ramming operations are relatively compact and require a pneumatic hammer mounted on the casing and a pipe cradle to permit correct casing alignment during driving. Both of these items would be within the temporary jacking shaft excavation. On the surface, an air compressor is required to operate the hammer. Spoils from within the casing can be removed using compressed air to push the column of soil into the receiving pit, or an auguring system can be used within the pit to mechanically remove the soil. An excavator would be needed to excavate the jacking shafts, a pile driver would be used to drive sheet piles and dump trucks would remove spoils. A fusion bonding machine would be needed for fusing the HDPE carrier pipe joints together.

**Box 10C and Box 10D** – Please see Notification.

**Box 11. Project Impact Area**

**Box 11A. Describe impacts to the bed, channel, and bank of the river, stream, or lake, and the associated riparian habitat.**

Construction of this project would require crossing Kirker Creek (Figure 3). The underground, pipe ramming type of installation to be used at this crossing would avoid all direct impacts to the bed, channel, and banks of the stream.

Kirker Creek watershed originates in the foothills of Mount Diablo and encompasses 14.6 square miles, including the eastern half of the City of Pittsburg. Kirker Creek drains into New York Slough either through the Dowest Slough or the Los Medanos Wasteway (Figure 2). The existing drainage system for Kirker Creek is largely composed of open channels fed by a combination of street runoff and storm drains.

Kirker Creek is a seasonally intermittent stream that does not maintain a significant year-round natural flow (KCWPG and CCRCO, 2004). It flows primarily in the rainy season and dries out

in the summer, although irrigation and related urban runoff produce some urban dry-weather flow that keeps areas of the creek wet throughout the year.

Potential wetlands occur within the Creek Crossing 1 project area (Figures 2 and 3). Although direct impacts to potential wetlands at this location would be avoided, indirect impacts could occur at this creek crossing if construction causes sediment or construction debris to enter the potential wetlands or aquatic habitat. Since potential wetlands would be avoided, they have not been formally delineated. Boundaries of these potential wetlands, however, were easily identified during reconnaissance level surveys and from aerial photography because the potential wetlands occur within defined channels. Avoidance measures, or Best Management Practices (BMPs), would be implemented to prevent sediment and construction debris from entering these potential wetlands. Please refer to Box 12A below.

**Box 11B. Will the project impact any vegetation?**

Yes. Construction of the proposed project would temporarily impact 45.31 square meters of ruderal/bare ground vegetation with the placement of the launching and receiving pits (Figures 2 and 3) and 929.03 square meters of ruderal/bare ground vegetation for access and staging. This vegetation type is typically dominated by herbaceous, nonnative species such as Bermuda grass (*Cynodon dactylon*), broadleaf filaree (*Erodium botrys*), redstem filaree (*Erodium cicutarium*), prickly lettuce (*Lactuca serriola*), black mustard (*Brassica juncea*), fennel (*Foeniculum vulgare*), broadleaf pepperweed (*Lepidium latifolium*), bur clover (*Medicago polymorpha*), and short pod mustard (*Hirschfeldia incana*). Other species found in ruderal areas include yellow star thistle (*Centaurea solstitialis*), Italian thistle (*Carduus pycnocephalus*), and milk thistle (*Silybum marianum*).

**Box 11C. Are any special status animal or plant species, or habitat that could support such species, known to be present on or near the project site?**

Yes. Several special-status animal species could occur near the project site. Special-status species with potential to occur in the project area were determined based on the proximity of known occurrences, the historic range of these species, habitat evaluations, limited wetland delineations, and field surveys conducted in 2008. Surveys were conducted for special-status plant species in May and August 2008, with negative results, and no special-status plant species are expected to occur in the vicinity of the Creek Crossing 1 project area. For a complete discussion on special-status species that may be affected by the entire Willow Pass Generating Station project, please refer to the Biological Resources Section of the 2008 Application for Certification (AFC), and the memorandum documenting plant surveys conducted following completion of the AFC, which are included with this notification package.

Portions of Kirker Creek and its tributary have the potential to support the federally threatened California red-legged frog (*Rana draytonii*). The highly modified channel in the project area provides only marginally suitable habitat for California red-legged frog, due to the channel's highly confined, fragmented nature, the presence of nonnative fishes, and the likely abundance of predators such as domestic cats and raccoons. Upland habitat adjacent to the channel consists of short annual grasses that offer frogs little in the way of cover. The presence of suitable, occupied habitat farther up in the watershed, however, increases the likelihood that a stray or dispersing frog may occasionally be present in Kirker Creek or its unnamed tributary, within or near the water pipeline alignment.

The western pond turtle (*Actinemys marmorata*), a California species of special concern, has some potential to occur in Kirker Creek and its unnamed tributary, although it is unlikely that these waterways in the project vicinity provide habitat capable of sustaining a population of pond turtles.

The project area lacks trees, but a few trees are scattered in the project vicinity. The tree nearest to the project area is approximately 90 feet to the west. Some wildlife species have the potential to use trees that may be scattered in the project vicinity. These species include:

- Swainson's hawk (*Buteo swainsoni*) (California threatened) – for nesting
- white-tailed kite (*Elanus laeocurus*) (California fully protected) – for nesting
- great blue heron (*Ardea herodias*) (California species of special concern) – for nesting
- migratory birds (protected by the Migratory Bird Treaty Act) – for nesting
- loggerhead shrike (*Lanius ludovicianus*) (California species of special concern) – forage in grassland and ruderal vegetation where shrubs and trees are present
- western red bat (*Lasiurus blossevillii*) (Western Bat Working Group High Priority Species) – roost in trees and forage over open grassland and ruderal areas nearby

After implementation of the avoidance and minimization measures proposed in the AFC and the subsequent letters submitted to the California Energy Commission (both included with this notification package), the project is not likely to significantly impact special-status species.

**Box 11D. Identify the source(s) of information that supports a “yes” or “no” answer above in Box 11.C.**

Focused surveys and habitat assessments for special-status species and/or sensitive habitat species, and wetland delineations were conducted in the study area in 2008. Results of these surveys are summarized in the June 30, 2008 AFC and in the memorandum documenting plant surveys that were conducted following completion of the AFC.

**Box 11E. Has a biological study been completed for the project site?**

Yes. An AFC has been prepared and was submitted to the California Energy Commission (CEC) in 2008. A memorandum documenting the negative findings of the plant surveys conducted following completion of the AFC has been prepared and submitted to the CEC. A biological resources summary and request for informal consultation with the U.S. Fish and Wildlife Service (USFWS) are currently being prepared for the U.S. Environmental Protection Agency (the anticipated lead federal agency for the WPGS project).

**Box 11F. Has a hydrological study been completed for the project or project site?**

No. A hydrological study for the creek is not needed because construction will consist of pipe ramming, and no work will be done in the creeks.

## **Box 12. Measures to Protect Fish, Wildlife, and Plant Resources**

### **Box 12A. Describe the techniques that will be used to prevent sediment from entering watercourses during and after construction.**

Water quality is not expected to be adversely affected by the proposed project with implementation of the measures described below.

#### **Avoid Sensitive Habitats and Species during Construction by Developing Construction Exclusion Zones and Silt Fencing in Sensitive Areas**

In general, disturbance to existing grades and vegetation would be limited to the actual site of the water pipeline alignment. Information about environmentally sensitive areas would be shown on contract plans and discussed in the Special Provisions. Environmentally sensitive area provisions could include, but are not limited to, the use of temporary orange fencing to delineate the proposed limit of work in areas adjacent to sensitive resources, or to delineate and exclude sensitive resources from potential construction impacts.

Contractor encroachment into environmentally sensitive areas would be restricted (including the staging/operation of heavy equipment or casting of excavation materials). Provisions for environmentally sensitive areas would be implemented as a first order of work, and would remain in place until all construction activities are complete; this includes any nest sites identified during preconstruction surveys. Placement of all roads, staging areas, and other facilities would avoid disturbance to wetlands and other sensitive areas of habitat, except where unavoidable impacts have been identified and mitigation has been proposed. Existing ingress or egress points would be used. Equipment parking, project access, supply logistics, equipment maintenance, and other project-related activities would occur at a designated staging area. Following completion of the work, the contours of the area would be returned to preconstruction conditions or better.

#### **Provide Worker Environmental Awareness Training for All Construction Personnel**

Training would include the identification of the special-status biological resources and measures required to minimize project impacts during construction and operation.

#### **General Avoidance of Wetland/Stream Impacts**

The launching and receiving pits would be located at least 10 feet back from the top of the banks of Kirker Creek. No work would be conducted within Kirker Creek.

Regional Water Quality Control Board (RWQCB)-approved physical barriers adequate to prevent the flow or discharge of sediment into these systems would be constructed and maintained between working areas and streams, lakes, and wetlands. Erosion control and sediment retention devices (e.g., well-anchored sandbag cofferdams, straw bales, or silt fences) would be incorporated into the project design and implemented at the time of construction. These devices would be in place during construction activities, and afterwards if necessary, to minimize sediment impacts to the wetlands and input to waters of the United States. These devices would be placed at all locations where sediment input is likely.

A supply of erosion control materials would be kept on hand to cover small sites that could become bare and to respond to sediment emergencies. Oily or greasy substances originating

from the contractor's operations would not be allowed to enter or be placed where they would later enter a live or dry stream, pond, or wetland.

An emergency response plan would be prepared and submitted to appropriate agencies prior to the start of construction. The plan would identify actions that would be taken in the event of a spill of petroleum products or other material harmful to aquatic or plant life, and the emergency response materials that would be kept at the site to allow the rapid containment and cleanup of any spilled material.

### **Revegetation and Restoration of Disturbed Areas**

Vegetation disturbed during the installation of the water line would be replanted with appropriate native annual grassland species. The topography would be restored after proposed construction activities have been completed.

### **Box 12B. Describe project avoidance and/or minimization measures to protect fish, wildlife, and plant resources.**

Mirant Willow Pass would implement measures to avoid and minimize potential impacts to sensitive biological resources during pipeline installation. Examples of these measures are described in Box 12A and include erosion control measures to prevent run-off and impacts to water quality, installation of appropriate fencing to indicate limits of construction areas and ensure workers and equipment operate in designated construction zones, implementation of spill and secondary containment systems to prevent soil and groundwater contamination, and appropriate reseeding and reinstatement to restore habitats following construction. Additional species-specific measures are summarized below.

### **Cap All Open Pipes**

Capping open pipes at the end of each day during construction would reduce the potential for wildlife to enter a pipe and become trapped.

### **California Red-Legged Frog Avoidance and Minimization Measures**

Where the water pipeline alignment crosses Kirker Creek, pipe ramming techniques are proposed to avoid disturbance to the stream channel, bed, and banks. Additionally, the following measures are proposed to avoid impacts to California red-legged frog:

- Work areas and their immediate vicinity would be surveyed for California red-legged frog two weeks prior to the beginning of construction, one day prior to the beginning of work, as well as immediately prior to construction activities begin each day when the ground will be disturbed.
- Prior to construction, a qualified biologist would conduct training sessions to familiarize all construction personnel with identification of California red-legged frog (and Western pond turtle), their habitat, general provisions and protections afforded by the Endangered Species Act, measures implemented to protect the species, and a review of the project boundaries. This training would also be provided to any new workers. All ground disturbances at this location would be monitored by a qualified biologist.

- California red-legged frogs are not expected to occur in the work areas. If California red-legged frog is found within the construction area, the USFWS would be contacted and work would be postponed until the frog had moved out of the work area of its own volition or other arrangements were made in coordination with USFWS. No handling or relocation of California red-legged frogs is proposed as a part of this project.
- During work activities, trash that may attract predators would be properly contained, removed from the worksite, and disposed of regularly. Following construction, trash and construction debris would be removed from work areas.
- Construction activities would be timed to occur during the dry season (April 1 to November 1) to minimize the chances of dispersing frogs being present in Kirker Creek.

### **Western Pond Turtle Avoidance and Minimization Measures**

Avoidance and minimization measures designed to protect California red-legged frog would also protect western pond turtles.

### **Preconstruction Avian Surveys**

If construction occurs between March 15 and August 15, preconstruction surveys for nesting migratory birds and nesting raptors would be conducted in ornamental trees, riparian vegetation, and other trees near the water pipeline alignment. Surveys would also be conducted where the water supply and discharge pipeline alignment crosses stream and drainage channels, and where it passes through ruderal grassland habitat. If nests of migratory birds, raptors, or special-status species are identified, nest monitoring and avoidance measures would be required to prevent direct and indirect disturbance to nesting birds. If construction activities would cause unavoidable disturbance to an active nest site, consultation with the California Department of Fish and Game and/or the USFWS would be necessary.

### **Box 12C. Describe any project mitigation and/or compensation measures to protect fish, wildlife, and plant resources.**

Please refer to Box 12B.

### **Box 13. Permits** – Please see Notification.

### **Box 14A-F, H, and I. Environmental Review** – Please see Notification.

### **Box 14G. If the project described in this notification is part of a larger project or plan, briefly describe that larger project or plan.**

Mirant has proposed to construct the Willow Pass Generating Station in Pittsburg, California (Figure 2). The WPGS project would consist of new natural-gas-fired generation facilities and ancillary systems. The WPGS project would involve construction of new generating units that would become the WPGS; construction of electric and gas transmission lines adjacent to the WPGS facility; and construction of water supply and wastewater pipelines connecting to the DDSD WTP. The WPGS generating units, natural gas line, transmission lines, and construction

laydown and parking areas are all located within the existing PPP site and adjacent Pacific Gas and Electric Company switchyard.

The only project components extending beyond the boundaries of the PPP site and PG&E switchyard are the water supply and wastewater discharge pipelines.

On-site construction for the WPGS project is expected to commence in fourth quarter 2009. Construction and startup of the new generating units should be completed by July 2012.

Potential impacts that the proposed project may have on the environment have been evaluated in detail. An Application for Certification has been prepared and was submitted to the California Energy Commission for the WPGS project in 2008. The WPGS project would avoid or minimize potential environmental impacts through project siting and design, best management practices, and incorporation of mitigation measures. As a result, the WPGS project would have no significant environmental impacts.

**Box 15** – Please see Notification.

**Box 16. Digital Format**

**Is any of the information included as part of the notification available in digital format (i.e., CD, DVD, etc)?**

Yes. CDs are enclosed. The referenced documents include:

- Application for Certification for the Willow Pass Generating Station (June 2008)
- AFC Supplement in Response to Data Adequacy Review (September 2008)
- Responses to California Energy Commission Data Requests (December 2008)
- Responses to California Energy Commission Workshop Questions, which includes a Plant Survey conducted after submittal of the AFC (February 2009).

**Box 17. Signature** – Please see Notification.

**References**

KCWPG and CCRCD (Kirker Creek Watershed Planning Group and Contra Costa Resource Conservation District), 2004. Kirker Creek Watershed Management Plan. January, 2004. <http://www.ccrd.org/Kirker/full%20book.pdf>. Accessed May 2008.

## Photographs



Photograph 1. Kirker Creek Channel at Creek Crossing 1 on December 3, 2008, looking west.



Photograph 2. Kirker Creek channel at Creek Crossing 1 on December 3, 2008, looking east.



**PROJECT LOCATION**

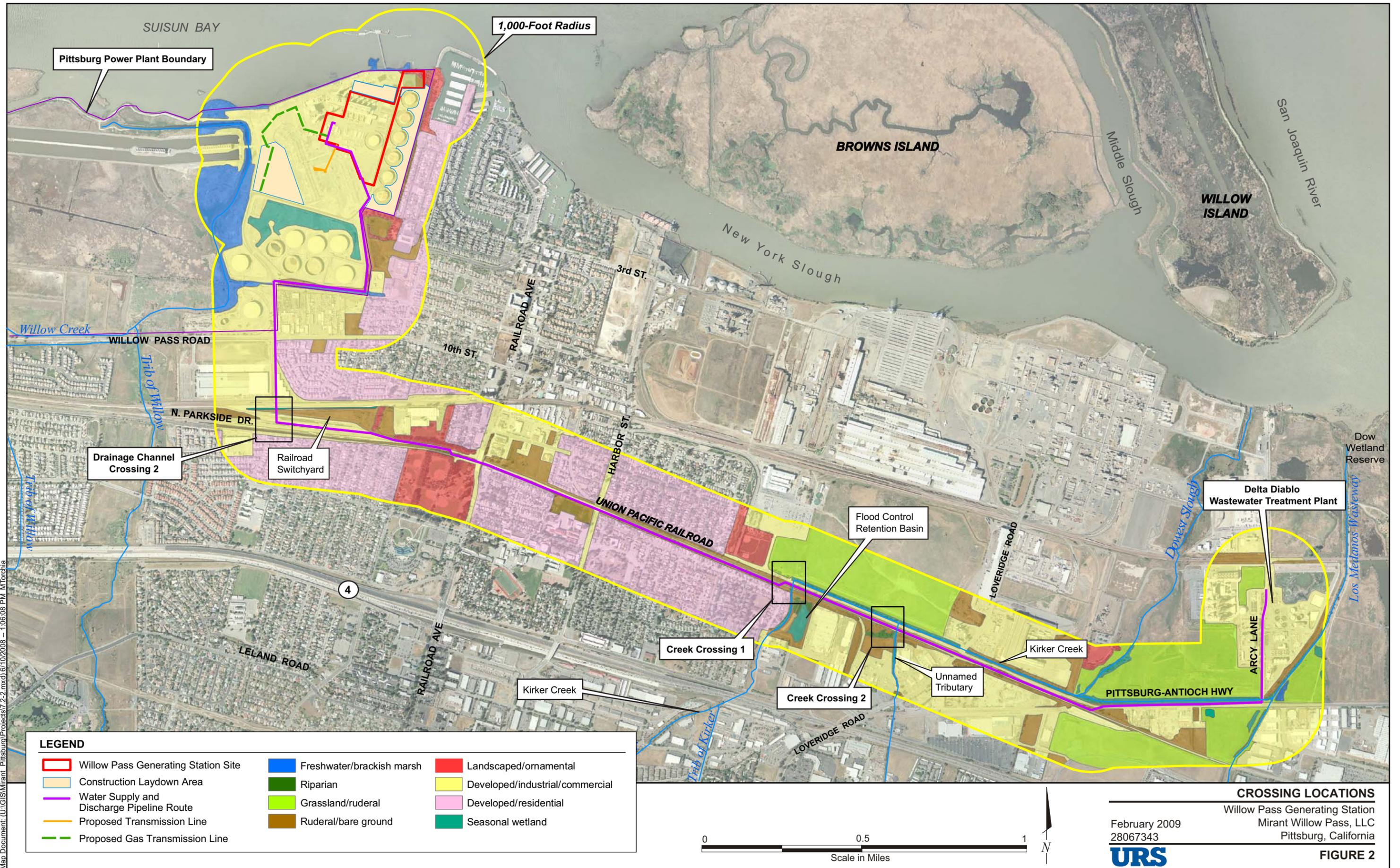
**VICINITY MAP**

Willow Pass Generating Station  
 Mirant Willow Pass, LLC  
 Pittsburg, California

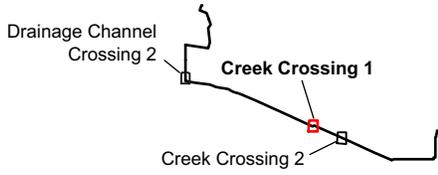
February 2009  
 28067343



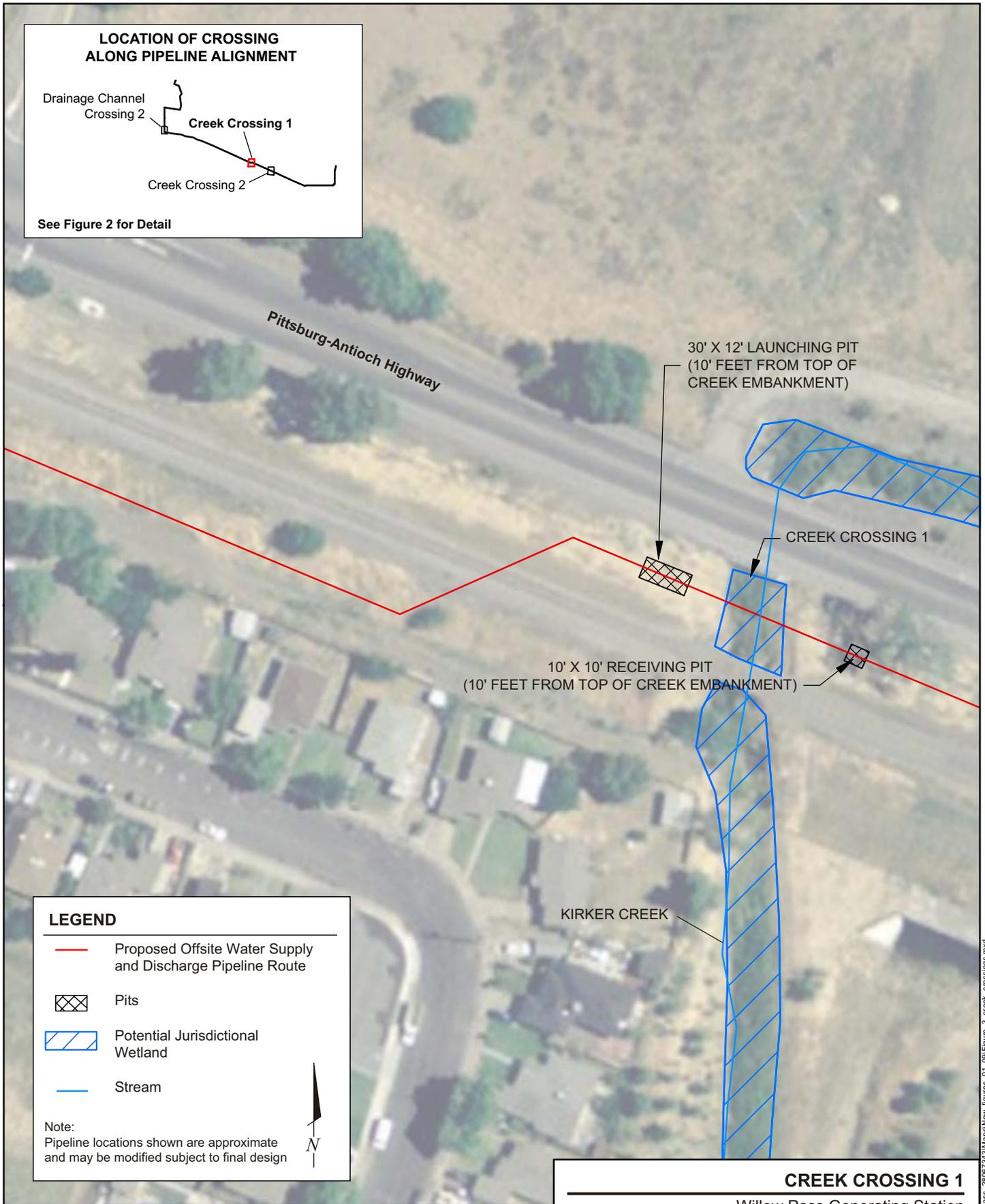
**FIGURE 1**



**LOCATION OF CROSSING  
ALONG PIPELINE ALIGNMENT**



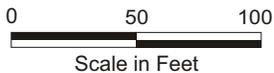
See Figure 2 for Detail



**LEGEND**

- Proposed Offsite Water Supply and Discharge Pipeline Route
- Pits
- Potential Jurisdictional Wetland
- Stream

Note:  
Pipeline locations shown are approximate  
and may be modified subject to final design



**CREEK CROSSING 1**

Willow Pass Generating Station  
Mirant Willow Pass, LLC  
Pittsburg, California

February 2009  
28067343



**FIGURE 3**

L:\Projects\Mirant\_Willow\_Pass\_28067343\MapaNew\_figures\_01\_09\Figure\_3\_creek\_crossings.mxd

FOR DEPARTMENT USE ONLY

Date Received	Amount Received	Amount Due	Date Complete	Notification No.
	\$	\$		



STATE OF CALIFORNIA  
DEPARTMENT OF FISH AND GAME  
**NOTIFICATION OF LAKE OR STREAMBED ALTERATION**



**Complete EACH field, unless otherwise indicated, following the enclosed instructions and submit ALL required enclosures. Attach additional pages, if necessary.**

**1. APPLICANT PROPOSING PROJECT**

Name	Jonathan Sacks			
Business/Agency	Mirant Willow Pass, LLC			
Street Address	P.O. Box 192			
City, State, Zip	Pittsburg, California 94565			
Telephone	(925) 427-3517	Fax	(925) 427-3518	
Email	jon.sacks@mirant.com			

**2. CONTACT PERSON** *(Complete only if different from applicant)*

Name	Jonathan Stead			
Street Address	1333 Broadway, Suite 800			
City, State, Zip	Oakland, California 94612			
Telephone	(510) 874-3058	Fax	(510) 874-3268	
Email	jon_stead@urscorp.com			

**3. PROPERTY OWNER** *(Complete only if different from applicant)*

Name	Mirant Delta, LLC (Attn: Jonathan Sacks)			
Street Address	P.O. Box 192			
City, State, Zip	Pittsburg, California 94565			
Telephone	(925) 427-3517	Fax	(925) 427-3518	
Email	jon.sacks@mirant.com			

**4. PROJECT NAME AND AGREEMENT TERM**

A. Project Name	Willow Pass Creek Crossing 2 Project			
B. Agreement Term Requested	<input checked="" type="checkbox"/> Regular (5 years or less) <input type="checkbox"/> Long-term (greater than 5 years)			
C. Project Term	D. Seasonal Work Period		E. Number of Work Days	
Beginning (year)	Ending (year)	Start Date (month/day)	End Date (month/day)	
2009	2014	06/15	10/15	120.00

NOTIFICATION OF LAKE OR STREAMBED ALTERATION

**5. AGREEMENT TYPE**

Check the applicable box. If box B, C, D, or E is checked, complete the specified attachment.

A.	<input checked="" type="checkbox"/> Standard (Most construction projects, excluding the categories listed below)
B.	<input type="checkbox"/> Gravel/Sand/Rock Extraction (Attachment A) <span style="float: right;">Mine I.D. Number: _____</span>
C.	<input type="checkbox"/> Timber Harvesting (Attachment B) <span style="float: right;">THP Number: _____</span>
D.	<input type="checkbox"/> Water Diversion/Extraction/Impoundment (Attachment C) <span style="float: right;">SWRCB Number: _____</span>
E.	<input type="checkbox"/> Routine Maintenance (Attachment D)
F.	<input type="checkbox"/> DFG Fisheries Restoration Grant Program (FRGP) <span style="float: right;">FRGP Contract Number: _____</span>
G.	<input type="checkbox"/> Master
H.	<input type="checkbox"/> Master Timber Harvesting

**6. FEES**

Please see the current fee schedule to determine the appropriate notification fee. Itemize each project's estimated cost and corresponding fee. **Note: The Department may not process this notification until the correct fee has been received.**

	A. Project	B. Project Cost	C. Project Fee
1	Willow Pass Creek Crossing 2 Project	\$397,000.00	\$2,250.00
2			
3			
4			
5			
		D. Base Fee (if applicable)	
		<b>E. TOTAL FEE ENCLOSED</b>	<b>\$2,250.00</b>

**7. PRIOR NOTIFICATION OR ORDER**

A. Has a notification previously been submitted to, or a Lake or Streambed Alteration Agreement previously been issued by, the Department for the project described in this notification?

Yes (Provide the information below)  No

Applicant: \_\_\_\_\_ Notification Number: \_\_\_\_\_ Date: \_\_\_\_\_

B. Is this notification being submitted in response to an order, notice, or other directive ("order") by a court or administrative agency (including the Department)?

No  Yes (Enclose a copy of the order, notice, or other directive. If the directive is not in writing, identify the person who directed the applicant to submit this notification and the agency he or she represents, and describe the circumstances relating to the order.)

Continued on additional page(s)

NOTIFICATION OF LAKE OR STREAMBED ALTERATION

8. PROJECT LOCATION

A. Address or description of project location. <i>(Include a map that marks the location of the project with a reference to the nearest city or town, and provide driving directions from a major road or highway)</i>				
The proposed project is located approximately 30 miles northeast of San Francisco in the City of Pittsburg, within Contra Costa County (Figure 1).				
Driving Directions: From Napa, California Merge onto CA-29 South (10 minutes, 6.7 miles) Turn left at Airport Boulevard/CA-12/Jameson Canyon Road (10 minutes, 5.8 miles) Take the ramp onto I-80 East (1 minute, 0.7 mile) Take the exit onto I-680 South toward Benicia (17 minutes, 17.5 miles) Take exit 53 toward Antioch/Pittsburg/State Highway 4 East (0.2 mile) Keep left at the fork to continue toward CA-4 East (0.3 mile) Keep right at the fork, follow signs for Antioch/Pittsburg/State Highway 4 and merge onto CA-4 East (11 minutes, 11.5 miles) Take the Loveridge Road exit (0.3 mile), Slight left at Loveridge Road (2 minutes, 0.5 mile) Turn left at Pittsburg Antioch Highway (0.2 mile)				
<input type="checkbox"/> Continued on additional page(s)				
B. River, stream, or lake affected by the project.		Unnamed Tributary of Kirker Creek		
C. What water body is the river, stream, or lake tributary to?		Kirker Creek, New York Slough		
D. Is the river or stream segment affected by the project listed in the state or federal Wild and Scenic Rivers Acts?		<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No <input type="checkbox"/> Unknown		
E. County	Contra Costa			
F. USGS 7.5 Minute Quad Map Name	G. Township	H. Range	I. Section	J. ¼ Section
Antioch North	CA Land Grants	Civil Colonies		
<input type="checkbox"/> Continued on additional page(s)				
K. Meridian (check one)	<input type="checkbox"/> Humboldt <input checked="" type="checkbox"/> Mt. Diablo <input type="checkbox"/> San Bernardino			
L. Assessor's Parcel Number(s)				
073190XXX				
<input type="checkbox"/> Continued on additional page(s)				
M. Coordinates (If available, provide at least latitude/longitude or UTM coordinates and check appropriate boxes)				
Latitude/Longitude	Latitude: 38.01615763860		Longitude: -121.86368850300	
	<input type="checkbox"/> Degrees/Minutes/Seconds		<input checked="" type="checkbox"/> Decimal Degrees <input type="checkbox"/> Decimal Minutes	
UTM	Easting:	Northing:	<input type="checkbox"/> Zone 10 <input type="checkbox"/> Zone 11	
Datum used for Latitude/Longitude or UTM		<input type="checkbox"/> NAD 27 <input checked="" type="checkbox"/> NAD 83 or WGS 84		

NOTIFICATION OF LAKE OR STREAMBED ALTERATION

9. PROJECT CATEGORY AND WORK TYPE (Check each box that applies)

PROJECT CATEGORY	NEW CONSTRUCTION	REPLACE EXISTING STRUCTURE	REPAIR/MAINTAIN EXISTING STRUCTURE
Bank stabilization – bioengineering/recontouring	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Bank stabilization – rip-rap/retaining wall/gabion	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Boat dock/pier	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Boat ramp	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Bridge	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Channel clearing/vegetation management	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Culvert	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Debris basin	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Dam	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Diversion structure – weir or pump intake	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Filling of wetland, river, stream, or lake	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Geotechnical survey	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Habitat enhancement – revegetation/mitigation	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Levee	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Low water crossing	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Road/trail	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Sediment removal – pond, stream, or marina	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Storm drain outfall structure	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Temporary stream crossing	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Utility crossing : Horizontal Directional Drilling	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jack/bore	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Open trench	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
<b>Other (specify):</b> water pipe lines (pipe ramming)	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

NOTIFICATION OF LAKE OR STREAMBED ALTERATION

**10. PROJECT DESCRIPTION**

A. Describe the project in detail. Photographs of the project location and immediate surrounding area should be included.

- Include any structures (e.g., rip-rap, culverts, or channel clearing) that will be placed, built, or completed in or near the stream, river, or lake.
- Specify the type and volume of materials that will be used.
- If water will be diverted or drafted, specify the purpose or use.

Enclose diagrams, drawings, plans, and/or maps that provide all of the following: site specific construction details; the dimensions of each structure and/or extent of each activity in the bed, channel, bank or floodplain; an overview of the entire project area (i.e., "bird's-eye view") showing the location of each structure and/or activity, significant area features, and where the equipment/machinery will enter and exit the project area.

Please see attached CDFG 1603 SAN Additional Pages, Box 10A.

Continued on additional page(s)

B. Specify the equipment and machinery that will be used to complete the project.

Please see attached CDFG 1603 SAN Additional Pages, Box 10B.

Continued on additional page(s)

C. Will water be present during the proposed work period (specified in box 4.D) in the stream, river, or lake (specified in box 8.B).

Yes  No (Skip to box 11)

D. Will the proposed project require work in the wetted portion of the channel?

Yes (Enclose a plan to divert water around work site)  
 No

NOTIFICATION OF LAKE OR STREAMBED ALTERATION

11. PROJECT IMPACTS

A. Describe impacts to the bed, channel, and bank of the river, stream, or lake, and the associated riparian habitat. Specify the dimensions of the modifications in length (linear feet) and area (square feet or acres) and the type and volume of material (cubic yards) that will be moved, displaced, or otherwise disturbed, if applicable.

Please see attached CDFG 1603 SAN Additional Pages, Box 11A.

Continued on additional page(s)

B. Will the project affect any vegetation?  Yes (Complete the tables below)  No

Vegetation Type	Temporary Impact	Permanent Impact
ruderal/bare ground	Linear feet: _____ Total area: <u>971.36 sq mi</u>	Linear feet: _____ Total area: <u>0</u>
	Linear feet: _____ Total area: _____	Linear feet: _____ Total area: _____

Tree Species	Number of Trees to be Removed	Trunk Diameter (range)
None		

Continued on additional page(s)

C. Are any special status animal or plant species, or habitat that could support such species, known to be present on or near the project site?

Yes (List each species and/or describe the habitat below)  No  Unknown

Continued on additional page(s)

D. Identify the source(s) of information that supports a “yes” or “no” answer above in Box 11.C.

Please see attached CDFG 1603 SAN Additional Pages, Box 11D.

Continued on additional page(s)

E. Has a biological study been completed for the project site?

Yes (Enclose the biological study)  No

Note: A biological assessment or study may be required to evaluate potential project impacts on biological resources.

F. Has a hydrological study been completed for the project or project site?

Yes (Enclose the hydrological study)  No

Note: A hydrological study or other information on site hydraulics (e.g., flows, channel characteristics, and/or flood recurrence intervals) may be required to evaluate potential project impacts on hydrology.

NOTIFICATION OF LAKE OR STREAMBED ALTERATION

12. MEASURES TO PROTECT FISH, WILDLIFE, AND PLANT RESOURCES

A. Describe the techniques that will be used to prevent sediment from entering watercourses during and after construction.

Please see attached CDFG 1603 SAN Additional Pages, Box 12A.

Continued on additional page(s)

B. Describe project avoidance and/or minimization measures to protect fish, wildlife, and plant resources.

Please see attached CDFG 1603 SAN Additional Pages, Box 12B.

Continued on additional page(s)

C. Describe any project mitigation and/or compensation measures to protect fish, wildlife, and plant resources.

Please see attached CDFG 1603 SAN Additional Pages, Box 12B.

Continued on additional page(s)

13. PERMITS

List any local, state, and federal permits required for the project and check the corresponding box(es). Enclose a copy of each permit that has been issued.

- A. California Energy Commission License  Applied  Issued
- B. BAAQMD Final Determination of Compliance and Permit to Operate  Applied  Issued
- C. \_\_\_\_\_  Applied  Issued
- D. Unknown whether  local,  state, or  federal permit is needed for the project. (Check each box that applies)

Continued on additional page(s)

NOTIFICATION OF LAKE OR STREAMBED ALTERATION

**14. ENVIRONMENTAL REVIEW**

A. Has a draft or final document been prepared for the project pursuant to the California Environmental Quality Act (CEQA), National Environmental Protection Act (NEPA), California Endangered Species Act (CESA) and/or federal Endangered Species Act (ESA)?			
<input checked="" type="checkbox"/> Yes (Check the box for each CEQA, NEPA, CESA, and ESA document that has been prepared and enclose a copy of each) <input type="checkbox"/> No (Check the box for each CEQA, NEPA, CESA, and ESA document listed below that will be or is being prepared)			
<input type="checkbox"/> Notice of Exemption	<input type="checkbox"/> Mitigated Negative Declaration	<input checked="" type="checkbox"/> NEPA document (type): <u>EPA, in process</u>	
<input type="checkbox"/> Initial Study	<input checked="" type="checkbox"/> Environmental Impact Report	<input checked="" type="checkbox"/> CESA document (type): <u>AFC</u>	
<input type="checkbox"/> Negative Declaration	<input type="checkbox"/> Notice of Determination (Enclose)	<input checked="" type="checkbox"/> ESA document (type): <u>Section 7 Consult.</u>	
<input type="checkbox"/> THP/ NTMP	<input type="checkbox"/> Mitigation, Monitoring, Reporting Plan		
B. State Clearinghouse Number (if applicable)			
C. Has a CEQA lead agency been determined?		<input checked="" type="checkbox"/> Yes (Complete boxes D, E, and F) <input type="checkbox"/> No (Skip to box 14.G)	
D. CEQA Lead Agency	California Energy Commission		
E. Contact Person	Ivor Benci-Woodward	F. Telephone Number	(916) 654-3911
G. If the project described in this notification is part of a larger project or plan, briefly describe that larger project or plan.			
Please see attached CDFG 1603 SAN Additional Pages, Box 14G.			
<input checked="" type="checkbox"/> Continued on additional page(s)			
H. Has an environmental filing fee (Fish and Game Code section 711.4) been paid?			
<input checked="" type="checkbox"/> Yes (Enclose proof of payment) <input type="checkbox"/> No (Briefly explain below the reason a filing fee has not been paid)			
<p><i>Note: If a filing fee is required, the Department may not finalize a Lake or Streambed Alteration Agreement until the filing fee is paid.</i></p>			

**15. SITE INSPECTION**

Check one box only.	
<input type="checkbox"/> In the event the Department determines that a site inspection is necessary, I hereby authorize a Department representative to enter the property where the project described in this notification will take place at any reasonable time, and hereby certify that I am authorized to grant the Department such entry.	
<input checked="" type="checkbox"/> I request the Department to first contact (insert name) <u>Jonathan Stead</u> at (insert telephone number) <u>(510) 874-3058</u> to schedule a date and time to enter the property where the project described in this notification will take place. I understand that this may delay the Department's determination as to whether a Lake or Streambed Alteration Agreement is required and/or the Department's issuance of a draft agreement pursuant to this notification.	

NOTIFICATION OF LAKE OR STREAMBED ALTERATION

16. DIGITAL FORMAT

Is any of the information included as part of the notification available in digital format (i.e., CD, DVD, etc.)?
<input checked="" type="checkbox"/> Yes (Please enclose the information via digital media with the completed notification form)
<input type="checkbox"/> No

17. SIGNATURE

I hereby certify that to the best of my knowledge the information in this notification is true and correct and that I am authorized to sign this notification as, or on behalf of, the applicant. I understand that if any information in this notification is found to be untrue or incorrect, the Department may suspend processing this notification or suspend or revoke any draft or final Lake or Streambed Alteration Agreement issued pursuant to this notification. I understand also that if any information in this notification is found to be untrue or incorrect and the project described in this notification has already begun, I and/or the applicant may be subject to civil or criminal prosecution. I understand that this notification applies only to the project(s) described herein and that I and/or the applicant may be subject to civil or criminal prosecution for undertaking any project not described herein unless the Department has been separately notified of that project in accordance with Fish and Game Code section 1602 or 1611.

	02/09/09
Signature of Applicant or Applicant's Authorized Representative	Date
Jonathan A. Sacks	
Print Name	



# Creek Crossing 2

## CDFG Streambed Alteration Notification Additional Pages

**Box 1 through Box 9** – Please see Notification.

### **Box 10. Project Description**

#### **Box 10A. Describe the project in detail.**

The Willow Pass Generating Station (WPGS) project consists of constructing a new 550-megawatt (MW) natural-gas-fired electric generating facility within the existing Pittsburg Power Plant (PPP) site. The WPGS site consists of 26 acres within the 1,000-acre PPP site. As part of the WPGS project (refer to Box 14G for a more detailed description), two new 5-mile-long parallel off-site water pipelines would need to be constructed between the WPGS site and the Delta Diablo Sanitation District Wastewater Treatment Plant (DDSD WTP) (Figure 2). One water line would be used to supply recycled water from DDSD to the WPGS, and one water line would be used to return wastewater from the WPGS to the DDSD WTP. Three miles of the five-mile-long route currently contains an unused fuel oil pipeline owned by Mirant Delta, which historically was used to convey oil. The existing pipeline is 10.75 inches in diameter, is now out of service, and will be replaced by the new water pipelines. The new water pipelines would be underground, except at the intersection of Harbor Street, where the pipeline would cross overhead adjacent to the railroad tracks, consistent with the location of the existing unused fuel oil pipeline. These water pipelines would connect directly to existing facilities at the DDSD WTP.

Construction of the pipelines would require one crossing of Kirker Creek (Creek Crossings 1), one crossing of an unnamed tributary of Kirker Creek (Creek Crossing 2), and one crossing of a drainage channel located in the rail switchyard (Drainage Channel Crossing 2). (Locations of these crossings are shown on Figure 2.) This streambed alteration notification is for the Creek Crossing 2 project. Photographs 1 and 2 show an unnamed tributary of Kirker Creek at Creek Crossing 2. Separate notifications for the other creek crossing project and the drainage channel crossing project have been submitted with this notification.

Creek Crossing 2 is located at an unnamed tributary of Kirker Creek west of Loveridge Road (Figure 3). The crossing at this location is approximately 18 feet wide, from top of bank to top of bank. Pipe ramming would be used to install the pipes underneath the channel at this location. Pipe ramming is a system of installing a crossing by driving an open-ended casing using a percussive hammer from a shaft that displaces a volume of soil equivalent to only the wall thickness of the casing. Soil would remain in the casing until the crossing has been completed and then would be removed by water, augering, jet-cutting or compressed air. This method does not use hydraulic drilling muds such as those used in some other underground pipe installation methods.

The estimated depths of the pipelines at this location are as follows: a 30-inch casing pipe will likely be sufficient to house the two 10-inch carrier pipes. A clearance of 5 feet between the top of pipe and the bottom of the channel is assumed because this crossing has low flows. With an estimated creek depth of 8 feet, the 5-foot clearance, the casing pipe diameter, plus additional

depth for equipment, the approximate depth of the launching and receiving pits at this crossing is estimated to be 20 feet.

At Creek Crossing 2, the launching and receiving pits would be at least 10 feet back from the top of the banks of Kirker Creek (Figure 3). The only vegetation that would be affected is ruderal vegetation consisting of nonnative annual grassland.

Temporary access and staging of equipment would occur only on existing paved or gravel roadway or ruderal nonnative vegetation/bare ground. For temporary access, vehicles and equipment would enter from the adjacent road and into their construction area. The staging areas would be adjacent to the road, so access would be directly from the road into the staging area. Therefore, no additional area would be impacted from access besides what is already accounted for in the staging area. For Creek Crossing 2, two 50-foot by 200-foot staging areas would be needed.

Work at this crossing would occur during one season (June 15 to October 15) of one year sometime between 2009 and 2014.

**Box 10B. Specify the equipment and machinery that will be used to complete the project.**

Pipe ramming operations are relatively compact and require a pneumatic hammer mounted on the casing and a pipe cradle to permit correct casing alignment during driving. Both of these items are within the temporary jacking shaft excavation. On the surface, an air compressor is required to operate the hammer. Spoils from within the casing can be removed using compressed air to push the column of soil into the receiving pit, or an auguring system can be used within the pit to mechanically remove the soil. An excavator will be needed to excavate the shafts, a pile driver to drive sheet piles and dump trucks to remove spoils. A fusion bonding machine will be needed for fusing the HDPE carrier pipe joints together.

**Box 10C and Box 10D** – Please see Notification.

**Box 11. Project Impact Area**

**Box 11A. Describe impacts to the bed, channel, and bank of the river, stream, or lake, and the associated riparian habitat.**

Construction of this project would require crossing a tributary to Kirker Creek (Figure 3). The underground, pipe ramming type of installation to be used at this crossing would avoid all direct impacts to the bed, channel, and banks of the stream.

Kirker Creek watershed originates in the foothills of Mount Diablo and encompasses 14.6 square miles, including the eastern half of the City of Pittsburg. Kirker Creek drains into New York Slough either through the Dowest Slough or the Los Medanos Wasteway (Figure 2). The existing drainage system for Kirker Creek is largely composed of open channels fed by a combination of street runoff and storm drains.

Kirker Creek is a seasonally intermittent stream that does not maintain a significant year-round natural flow (KCWPG and CCRCDD, 2004). It flows primarily in the rainy season and dries out

in the summer, although irrigation and related urban runoff produce some urban dry-weather flow that keeps areas of the creek wet throughout the year.

Potential wetlands occur within the Creek Crossing 2 project area (Figure 2 and Figure 3). Although direct impacts to potential wetlands at this location would be avoided, indirect impacts could occur at this creek crossing if construction causes sediment or construction debris to enter the potential wetlands or aquatic habitat. Since potential wetlands would be avoided, they have not been formally delineated. Boundaries of these wetlands, however, were easily identified during reconnaissance level surveys and from aerial photography because the potential wetlands occur within defined channels. Avoidance measures, or Best Management Practices (BMPs), would be implemented to prevent sediment and construction debris from entering these potential wetlands. Please refer to Box 12A below.

**Box 11B. Will the project impact any vegetation?**

Yes. Construction of the proposed project would temporarily impact 42.33 square meters of ruderal /bare ground with the placement of the launching and receiving pits and (Figure 2 and Figure 3) and 929.03 square meters of ruderal/bare ground vegetation for access and staging. This vegetation type is typically dominated by herbaceous, nonnative species such as Bermuda grass (*Cynodon dactylon*), broadleaf filaree (*Erodium botrys*), redstem filaree (*Erodium cicutarium*), prickly lettuce (*Lactuca serriola*), black mustard (*Brassica juncea*), fennel (*Foeniculum vulgare*), broadleaf pepperweed (*Lepidium latifolium*), bur clover (*Medicago polymorpha*), and short pod mustard (*Hirschfeldia incana*). Other species found in ruderal areas include yellow star thistle (*Centaurea solstitialis*), Italian thistle (*Carduus pycnocephalus*), and milk thistle (*Silybum marianum*).

**Box 11C. Are any special status animal or plant species, or habitat that could support such species, known to be present on or near the project site?**

Yes. Several special-status animal species could occur near the project site. Special-status species with potential to occur in the project area were determined based on the proximity of known occurrences, the historic range of these species, habitat evaluations, limited wetland delineations, and field surveys conducted in 2008. Surveys were conducted for special-status plant species in May and August 2008, with negative results, and no special-status plant species are expected to occur in the vicinity of the Creek Crossing 1 project area. For a complete discussion on special-status species that may be affected by the entire Willow Pass Generating Station project, please refer to the Biological Resources Section of the 2008 Application for Certification (AFC), and the memorandum documenting plant surveys conducted following completion of the AFC, which are included with this notification package.

Portions of Kirker Creek and its tributary have the potential to support the federally threatened California red-legged frog (*Rana draytonii*). The highly modified channel in the project area provides only marginally suitable habitat for California red-legged frog, due to the channel's highly confined, fragmented nature, the presence of nonnative fishes, and the likely abundance of predators such as domestic cats and raccoons. Upland habitat adjacent to the channel consists of short annual grasses that offer frogs little in the way of cover. The presence of suitable, occupied habitat farther up in the watershed, however, increases the likelihood that a stray or dispersing frog may occasionally be present in Kirker Creek or its unnamed tributary, within or near the water pipeline alignment.

The western pond turtle (*Actinemys marmorata*), a California species of special concern, has some potential to occur in Kirker Creek and its unnamed tributary, although it is unlikely that these waterways in the project vicinity provide habitat capable of sustaining a population of pond turtles.

The project area lacks trees, but some scattered trees are approximately 100 feet north and south of the project area. Some wildlife species have the potential to use trees that may be scattered in the project vicinity. These species include:

- Swainson's hawk (*Buteo swainsoni*) (California threatened) – for nesting
- white-tailed kite (*Elanus laeocurus*) (California fully protected) – for nesting
- great blue heron (*Ardea herodias*) (California species of special concern) – for nesting
- migratory birds (protected by the Migratory Bird Treaty Act) – for nesting
- loggerhead shrike (*Lanius ludovicianus*) (California species of special concern) – forage in grassland and ruderal vegetation where shrubs and trees are present
- western red bat (*Lasiurus blossevillii*) (Western Bat Working Group High Priority Species) – roost in trees and forage over open grassland and ruderal areas nearby

After implementation of the avoidance and minimization measures proposed in the AFC and the subsequent letters submitted to the California Energy Commission (both included with this notification package), the project is not likely to significantly impact special-status species.

**Box 11D. Identify the source(s) of information that supports a “yes” or “no” answer above in Box 11.C.**

Focused surveys and habitat assessments for special-status species and/or sensitive habitat species, and wetland delineations were conducted in the study area in 2008. Results of these surveys are summarized in the June 30, 2008 AFC and in the memorandum documenting plant surveys that were conducted following completion of the AFC.

**Box 11E. Has a biological study been completed for the project site?**

Yes. An AFC has been prepared and was submitted to the California Energy Commission (CEC) in 2008. A memorandum documenting the negative findings of the plant surveys conducted following completion of the AFC has been prepared and submitted to the CEC. A biological resources summary and request for informal consultation with the U.S. Fish and Wildlife Service (USFWS) are currently being prepared for the U.S. Environmental Protection Agency (the anticipated lead federal agency for the WPGS project).

**Box 11F. Has a hydrological study been completed for the project or project sites?**

No. A hydrological study for the creek is not needed because construction will consist of pipe ramming, and no work will be done in the creeks.

## **Box 12. Measures to Protect Fish, Wildlife, and Plant Resources**

### **Box 12A. Describe the techniques that will be used to prevent sediment from entering watercourses during and after construction.**

Water quality is not expected to be adversely affected by the proposed project with implementation of the measures described below.

#### **Avoid Sensitive Habitats and Species during Construction by Developing Construction Exclusion Zones and Silt Fencing in Sensitive Areas**

In general, disturbance to existing grades and vegetation would be limited to the actual site of the water pipeline alignment. Information about environmentally sensitive areas would be shown on contract plans and discussed in the Special Provisions. Environmentally sensitive area provisions could include, but are not limited to, the use of temporary orange fencing to delineate the proposed limit of work in areas adjacent to sensitive resources, or to delineate and exclude sensitive resources from potential construction impacts.

Contractor encroachment into environmentally sensitive areas would be restricted (including the staging/operation of heavy equipment or casting of excavation materials). Provisions for environmentally sensitive areas would be implemented as a first order of work, and would remain in place until all construction activities are complete; this includes any nest sites identified during preconstruction surveys. Placement of all roads, staging areas, and other facilities would avoid disturbance to wetlands and other sensitive areas of habitat, except where unavoidable impacts have been identified and mitigation has been proposed. Existing ingress or egress points would be used. Equipment parking, project access, supply logistics, equipment maintenance, and other project-related activities would occur at a designated staging area. Following completion of the work, the contours of the area would be returned to preconstruction conditions or better.

#### **Provide Worker Environmental Awareness Training for All Construction Personnel**

Training would include the identification of the special-status biological resources and measures required to minimize project impacts during construction and operation.

#### **General Avoidance of Wetland/Stream Impacts**

The launching and receiving pits would be located at least 10 feet back from the top of the banks of Kirker Creek. No work would be conducted within Kirker Creek.

Regional Water Quality Control Board (RWQCB)-approved physical barriers adequate to prevent the flow or discharge of sediment into these systems would be constructed and maintained between working areas and streams, lakes, and wetlands. Erosion control and sediment retention devices (e.g., well-anchored sandbag cofferdams, straw bales, or silt fences) would be incorporated into the project design and implemented at the time of construction. These devices would be in place during construction activities, and afterwards if necessary, to minimize sediment impacts to the wetlands and input to waters of the United States. These devices would be placed at all locations where sediment input is likely.

A supply of erosion control materials would be kept on hand to cover small sites that could become bare and to respond to sediment emergencies. Oily or greasy substances originating

from the contractor's operations would not be allowed to enter or be placed where they would later enter a live or dry stream, pond, or wetland.

An emergency response plan would be prepared and submitted to appropriate agencies prior to the start of construction. The plan would identify actions that would be taken in the event of a spill of petroleum products or other material harmful to aquatic or plant life, and the emergency response materials that would be kept at the site to allow the rapid containment and cleanup of any spilled material.

### **Revegetation and Restoration of Disturbed Areas**

Vegetation disturbed during the installation of the water line would be replanted with appropriate native annual grassland species. The topography would be restored after proposed construction activities have been completed.

### **Box 12B. Describe project avoidance and/or minimization measures to protect fish, wildlife, and plant resources.**

Mirant Willow Pass would implement measures to avoid and minimize potential impacts to sensitive biological resources during pipeline installation. Examples of these measures are described in Box 12A and include erosion control measures to prevent run-off and impacts to water quality, installation of appropriate fencing to indicate limits of construction areas and ensure workers and equipment operate in designated construction zones, implementation of spill and secondary containment systems to prevent soil and groundwater contamination, and appropriate reseeding and reinstatement to restore habitats following construction. Additional species-specific measures are summarized below.

### **Cap All Open Pipes**

Capping open pipes at the end of each day during construction would reduce the potential for wildlife to enter a pipe and become trapped.

### **California Red-Legged Frog Avoidance and Minimization Measures**

Where the water pipeline alignment crosses Kirker Creek, pipe ramming techniques are proposed to avoid disturbance to the stream channel, bed, and banks. Additionally, the following measures are proposed to avoid impacts to California red-legged frog:

- Work areas and their immediate vicinity would be surveyed for California red-legged frog two weeks prior to the beginning of construction, one day prior to the beginning of work, as well as immediately prior to construction activities begin each day when the ground will be disturbed.
- Prior to construction, a qualified biologist would conduct training sessions to familiarize all construction personnel with identification of California red-legged frog (and Western pond turtle), their habitat, general provisions and protections afforded by the Endangered Species Act, measures implemented to protect the species, and a review of the project boundaries. This training would also be provided to any new workers. All ground disturbances at this location would be monitored by a qualified biologist.

- California red-legged frogs are not expected to occur in the work areas. If California red-legged frog is found within the construction area, the USFWS would be contacted and work would be postponed until the frog had moved out of the work area of its own volition or other arrangements were made in coordination with USFWS. No handling or relocation of California red-legged frogs is proposed as a part of this project.
- During work activities, trash that may attract predators would be properly contained, removed from the worksite, and disposed of regularly. Following construction, trash and construction debris would be removed from work areas.
- Construction activities would be timed to occur during the dry season (April 1 to November 1) to minimize the chances of dispersing frogs being present in Kirker Creek.

### **Western Pond Turtle Avoidance and Minimization Measures**

Avoidance and minimization measures designed to protect California red-legged frog would also protect western pond turtles.

### **Preconstruction Avian Surveys**

If construction occurs between March 15 and August 15, preconstruction surveys for nesting migratory birds and nesting raptors would be conducted in ornamental trees, riparian vegetation, and other trees near the water pipeline alignment. Surveys would also be conducted where the water supply and discharge pipeline alignment crosses stream and drainage channels, and where it passes through ruderal grassland habitat. If nests of migratory birds, raptors, or special-status species are identified, nest monitoring and avoidance measures would be required to prevent direct and indirect disturbance to nesting birds. If construction activities would cause unavoidable disturbance to an active nest site, consultation with the California Department of Fish and Game and/or the USFWS would be necessary.

### **Box 12C. Describe any project mitigation and/or compensation measures to protect fish, wildlife, and plant resources.**

Please refer to Box 12B.

### **Box 13. Permits** – Please see Notification.

### **Box 14 A-F, H, and I. Environmental Review** – Please see Notification.

### **Box 14G. If the project described in this notification is part of a larger project or plan, briefly describe that larger project or plan.**

Mirant has proposed to construct the Willow Pass Generating Station in Pittsburg, California (Figure 2). The WPGS project would consist of new natural-gas-fired generation facilities and ancillary systems. The WPGS project would involve construction of new generating units that would become the WPGS; construction of electric and gas transmission lines adjacent to the WPGS facility; and construction of water supply and wastewater pipelines connecting to the DDSD WTP. The WPGS generating units, natural gas line, transmission lines, and construction

laydown and parking areas are all located within the existing PPP site and adjacent Pacific Gas and Electric Company switchyard.

The only project components extending beyond the boundaries of the PPP site and PG&E switchyard are the water supply and wastewater discharge pipelines.

On-site construction for the WPGS project is expected to commence in fourth quarter 2009. Construction and startup of the new generating units should be completed by July 2012.

Potential impacts that the proposed project may have on the environment have been evaluated in detail. An Application for Certification has been prepared and was submitted to the California Energy Commission for the WPGS project in 2008. The WPGS project would avoid or minimize potential environmental impacts through project siting and design, best management practices, and incorporation of mitigation measures. As a result, the WPGS project would have no significant environmental impacts.

**Box 15** – Please see Notification.

**Box 16. Digital Format**

**Is any of the information included as part of the notification available in digital format (i.e., CD, DVD, etc)?**

Yes. CDs are enclosed. The referenced documents include:

- Application for Certification for the Willow Pass Generating Station (June 2008)
- AFC Supplement in Response to Data Adequacy Review (September 2008)
- Responses to California Energy Commission Data Requests (December 2008)
- Responses to California Energy Commission Workshop Questions, which includes a Plant Survey conducted after submittal of the AFC (February 2009).

**Box 17. Signature** – Please see Notification.

**References**

KCWPG and CCRCD (Kirker Creek Watershed Planning Group and Contra Costa Resource Conservation District), 2004. Kirker Creek Watershed Management Plan. January 2004. <http://www.ccrd.org/Kirker/full%20book.pdf>. Accessed May 2008.

## Photographs



Photograph 1. Unnamed Tributary of Kirker Creek on December 3, 2008, looking north.



Photograph 2. Unnamed Tributary of Kirker Creek on December 3, 2008, looking south.



**PROJECT LOCATION**

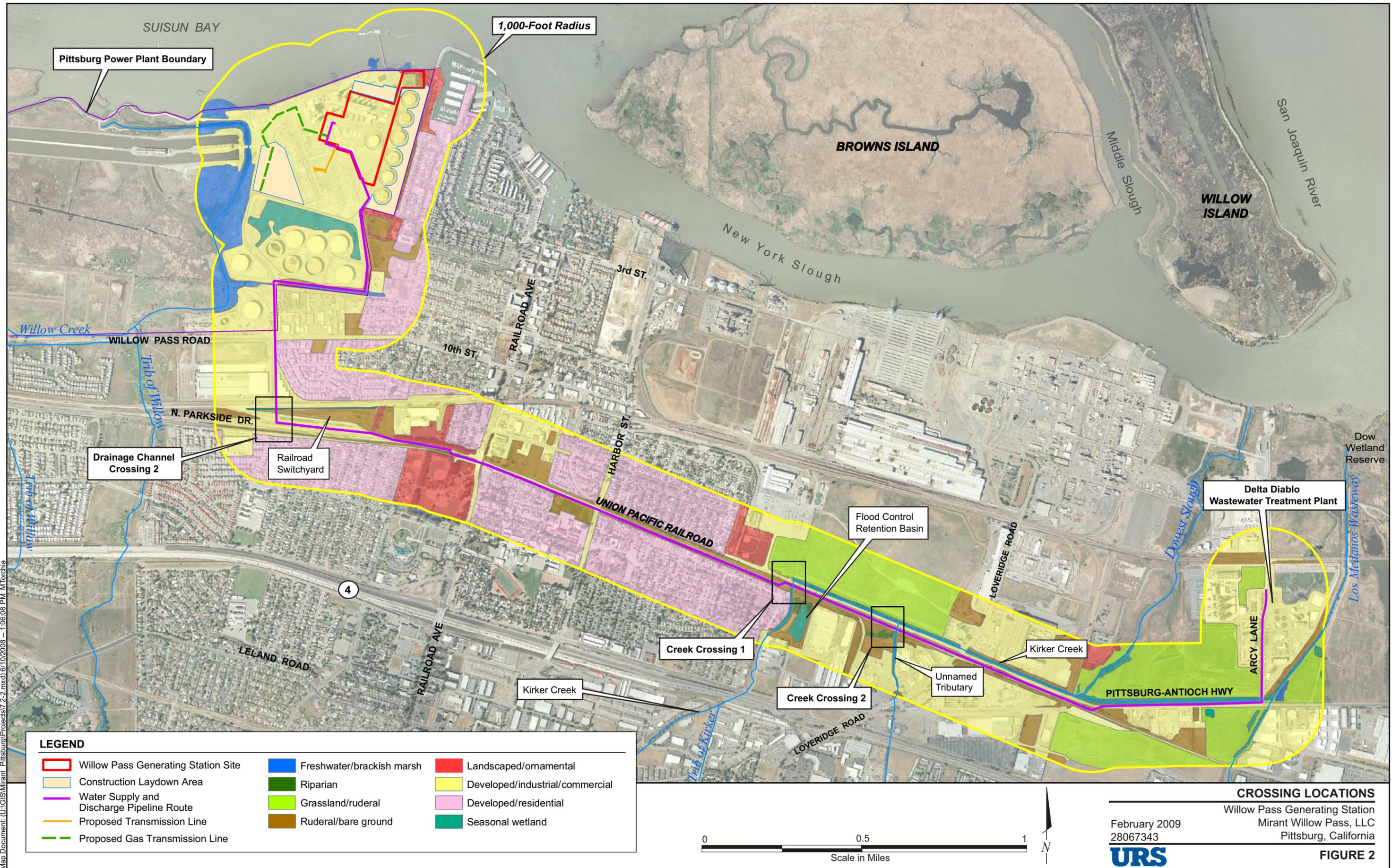
**VICINITY MAP**

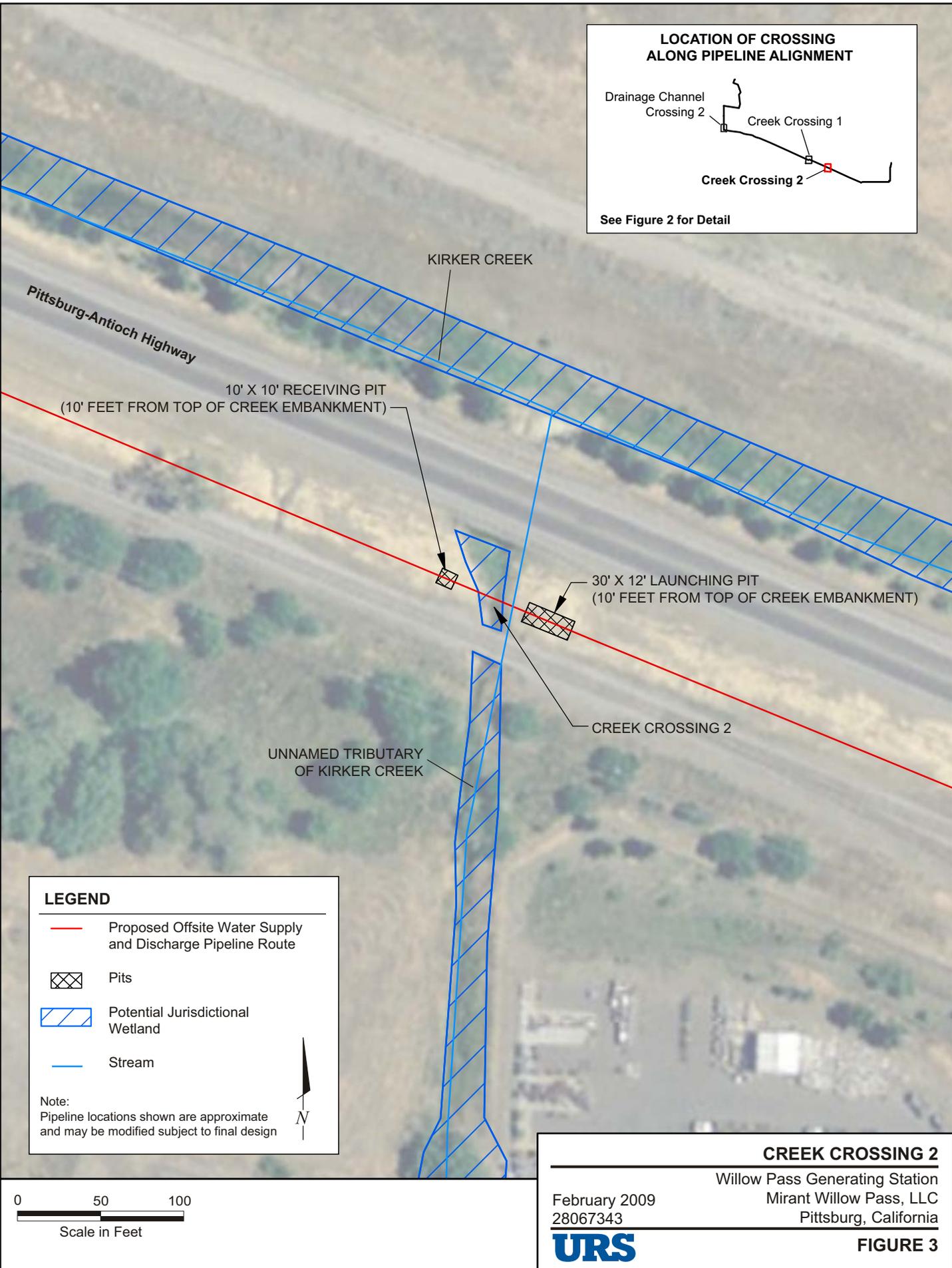
Willow Pass Generating Station  
 Mirant Willow Pass, LLC  
 Pittsburg, California

February 2009  
 28067343



**FIGURE 1**





**LOCATION OF CROSSING ALONG PIPELINE ALIGNMENT**

Drainage Channel Crossing 2

Creek Crossing 1

Creek Crossing 2

See Figure 2 for Detail

**LEGEND**

- Proposed Offsite Water Supply and Discharge Pipeline Route
- Pits
- Potential Jurisdictional Wetland
- Stream

Note:  
Pipeline locations shown are approximate and may be modified subject to final design



**CREEK CROSSING 2**

Willow Pass Generating Station  
Mirant Willow Pass, LLC  
Pittsburg, California

February 2009  
28067343

**URS**

**FIGURE 3**

FOR DEPARTMENT USE ONLY

Date Received	Amount Received	Amount Due	Date Complete	Notification No.
	\$	\$		



STATE OF CALIFORNIA  
DEPARTMENT OF FISH AND GAME  
**NOTIFICATION OF LAKE OR STREAMBED ALTERATION**



Complete EACH field, unless otherwise indicated, following the enclosed instructions and submit ALL required enclosures. Attach additional pages, if necessary.

**1. APPLICANT PROPOSING PROJECT**

Name	Jonathan Sacks			
Business/Agency	Mirant Willow Pass, LLC			
Street Address	P.O. Box 192			
City, State, Zip	Pittsburg, California 94565			
Telephone	(925) 427-3517	Fax	(925) 427-3518	
Email	jon.sacks@mirant.com			

**2. CONTACT PERSON** (Complete only if different from applicant)

Name	Jonathan Stead			
Street Address	1333 Broadway, Suite 800			
City, State, Zip	Oakland, California 94612			
Telephone	(510) 874-3058	Fax	(510) 874-3268	
Email	jon_stead@urscorp.com			

**3. PROPERTY OWNER** (Complete only if different from applicant)

Name	Mirant Delta, LLC (Attn: Jonathan Sacks)			
Street Address	P.O. Box 192			
City, State, Zip	Pittsburg, California 94565			
Telephone	(925) 427-3517	Fax	(925) 427-3518	
Email	jon.sacks@mirant.com			

**4. PROJECT NAME AND AGREEMENT TERM**

A. Project Name		Willow Pass Drainage Channel Crossing 2 Project		
B. Agreement Term Requested		<input checked="" type="checkbox"/> Regular (5 years or less) <input type="checkbox"/> Long-term (greater than 5 years)		
C. Project Term		D. Seasonal Work Period		E. Number of Work Days
Beginning (year)	Ending (year)	Start Date (month/day)	End Date (month/day)	
2009	2014	06/15	10/15	
				120.00

NOTIFICATION OF LAKE OR STREAMBED ALTERATION

**5. AGREEMENT TYPE**

Check the applicable box. If box B, C, D, or E is checked, complete the specified attachment.

A.	<input checked="" type="checkbox"/> Standard (Most construction projects, excluding the categories listed below)	
B.	<input type="checkbox"/> Gravel/Sand/Rock Extraction (Attachment A)	Mine I.D. Number: _____
C.	<input type="checkbox"/> Timber Harvesting (Attachment B)	THP Number: _____
D.	<input type="checkbox"/> Water Diversion/Extraction/Impoundment (Attachment C)	SWRCB Number: _____
E.	<input type="checkbox"/> Routine Maintenance (Attachment D)	
F.	<input type="checkbox"/> DFG Fisheries Restoration Grant Program (FRGP)	FRGP Contract Number: _____
G.	<input type="checkbox"/> Master	
H.	<input type="checkbox"/> Master Timber Harvesting	

**6. FEES**

Please see the current fee schedule to determine the appropriate notification fee. Itemize each project's estimated cost and corresponding fee. **Note: The Department may not process this notification until the correct fee has been received.**

A. Project		B. Project Cost	C. Project Fee
1	Willow Pass Drainage Channel Crossing 2	\$1,741,000.00	\$4,000.00
2			
3			
4			
5			
		D. Base Fee (if applicable)	
		<b>E. TOTAL FEE ENCLOSED</b>	<b>\$4,000.00</b>

**7. PRIOR NOTIFICATION OR ORDER**

A. Has a notification previously been submitted to, or a Lake or Streambed Alteration Agreement previously been issued by, the Department for the project described in this notification?

Yes (Provide the information below)       No

Applicant: \_\_\_\_\_ Notification Number: \_\_\_\_\_ Date: \_\_\_\_\_

B. Is this notification being submitted in response to an order, notice, or other directive ("order") by a court or administrative agency (including the Department)?

No       Yes (Enclose a copy of the order, notice, or other directive. If the directive is not in writing, identify the person who directed the applicant to submit this notification and the agency he or she represents, and describe the circumstances relating to the order.)

Continued on additional page(s)

NOTIFICATION OF LAKE OR STREAMBED ALTERATION

**8. PROJECT LOCATION**

A. Address or description of project location. (Include a map that marks the location of the project with a reference to the nearest city or town, and provide driving directions from a major road or highway)				
The proposed project is approximately 30 miles northeast of San Francisco in the City of Pittsburg, within Contra Costa County (Figure 1). Driving Directions: From Napa, California Merge onto CA-29 South (10 minutes, 6.7 miles) Turn left at Airport Boulevard/CA-12/Jameson Canyon Road (10 minutes, 5.8 miles) Take the ramp onto I-80 East (1 minute, 0.7 mile) Take the exit onto I-680 South toward Benicia (17 minutes, 17.5 miles) Take exit 53 toward Antioch/Pittsburg/State Highway 4 East (0.2 mile) Keep left at the fork to continue toward CA-4 East (0.3 mile) Keep right at the fork, follow signs for Antioch/Pittsburg/State Highway 4 and merge onto CA-4 East (10.1 miles) Take exit 23 for Railroad Avenue (0.4 mile) Turn left at Railroad Avenue (0.4 mile) Slight right at North Parkside Drive (0.8 mile)				
<input type="checkbox"/> Continued on additional page(s)				
B. River, stream, or lake affected by the project.		Drainage Channel		
C. What water body is the river, stream, or lake tributary to?			Suisun Bay	
D. Is the river or stream segment affected by the project listed in the state or federal Wild and Scenic Rivers Acts?			<input type="checkbox"/> Yes	<input checked="" type="checkbox"/> No
E. County			Contra Costa	
F. USGS 7.5 Minute Quad Map Name		G. Township	H. Range	I. Section
Honker Bay		CA Land Grants	Civil Colonies	
<input type="checkbox"/> Continued on additional page(s)				
K. Meridian (check one)		<input type="checkbox"/> Humboldt <input checked="" type="checkbox"/> Mt. Diablo <input type="checkbox"/> San Bernardino		
L. Assessor's Parcel Number(s)				
086110XXX				
<input type="checkbox"/> Continued on additional page(s)				
M. Coordinates (If available, provide at least latitude/longitude or UTM coordinates and check appropriate boxes)				
Latitude/Longitude		Latitude: 38.02629804790		Longitude: -121.89851519700
		<input type="checkbox"/> Degrees/Minutes/Seconds		<input checked="" type="checkbox"/> Decimal Degrees
UTM		Easting:		Northing:
				<input type="checkbox"/> Zone 10 <input type="checkbox"/> Zone 11
Datum used for Latitude/Longitude or UTM		<input type="checkbox"/> NAD 27 <input checked="" type="checkbox"/> NAD 83 or WGS 84		

NOTIFICATION OF LAKE OR STREAMBED ALTERATION

**9. PROJECT CATEGORY AND WORK TYPE** (Check each box that applies)

PROJECT CATEGORY	NEW CONSTRUCTION	REPLACE EXISTING STRUCTURE	REPAIR/MAINTAIN EXISTING STRUCTURE
Bank stabilization – bioengineering/recontouring	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Bank stabilization – rip-rap/retaining wall/gabion	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Boat dock/pier	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Boat ramp	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Bridge	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Channel clearing/vegetation management	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Culvert	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Debris basin	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Dam	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Diversion structure – weir or pump intake	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Filling of wetland, river, stream, or lake	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Geotechnical survey	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Habitat enhancement – revegetation/mitigation	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Levee	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Low water crossing	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Road/trail	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Sediment removal – pond, stream, or marina	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Storm drain outfall structure	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Temporary stream crossing	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Utility crossing : Horizontal Directional Drilling	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Jack/bore	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Open trench	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
<b>Other</b> (specify): <b>water pipe line (microtunneling)</b>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

NOTIFICATION OF LAKE OR STREAMBED ALTERATION

**10. PROJECT DESCRIPTION**

A. Describe the project in detail. Photographs of the project location and immediate surrounding area should be included.

- Include any structures (e.g., rip-rap, culverts, or channel clearing) that will be placed, built, or completed in or near the stream, river, or lake.
- Specify the type and volume of materials that will be used.
- If water will be diverted or drafted, specify the purpose or use.

Enclose diagrams, drawings, plans, and/or maps that provide all of the following: site specific construction details; the dimensions of each structure and/or extent of each activity in the bed, channel, bank or floodplain; an overview of the entire project area (i.e., "bird's-eye view") showing the location of each structure and/or activity, significant area features, and where the equipment/machinery will enter and exit the project area.

Please see attached CDFG 1603 SAN Additional Pages, Box 10A.

Continued on additional page(s)

B. Specify the equipment and machinery that will be used to complete the project.

Please see attached CDFG 1603 SAN Additional Pages, Box 10B.

Continued on additional page(s)

C. Will water be present during the proposed work period (specified in box 4.D) in the stream, river, or lake (specified in box 8.B).

Yes  No (Skip to box 11)

D. Will the proposed project require work in the wetted portion of the channel?

Yes (Enclose a plan to divert water around work site)  
 No

NOTIFICATION OF LAKE OR STREAMBED ALTERATION

11. PROJECT IMPACTS

A. Describe impacts to the bed, channel, and bank of the river, stream, or lake, and the associated riparian habitat. Specify the dimensions of the modifications in length (linear feet) and area (square feet or acres) and the type and volume of material (cubic yards) that will be moved, displaced, or otherwise disturbed, if applicable.

Please see attached CDFG 1603 SAN Additional Pages, Box 11A.

Continued on additional page(s)

B. Will the project affect any vegetation?  Yes (Complete the tables below)  No

Vegetation Type	Temporary Impact	Permanent Impact
	Linear feet: _____ Total area: _____	Linear feet: _____ Total area: _____
	Linear feet: _____ Total area: _____	Linear feet: _____ Total area: _____

Tree Species	Number of Trees to be Removed	Trunk Diameter (range)
None		

Continued on additional page(s)

C. Are any special status animal or plant species, or habitat that could support such species, known to be present on or near the project site?

Yes (List each species and/or describe the habitat below)  No  Unknown

Continued on additional page(s)

D. Identify the source(s) of information that supports a “yes” or “no” answer above in Box 11.C.

Please see attached CDFG 1603 SAN Additional Pages, Box 11D.

Continued on additional page(s)

E. Has a biological study been completed for the project site?

Yes (Enclose the biological study)  No

Note: A biological assessment or study may be required to evaluate potential project impacts on biological resources.

F. Has a hydrological study been completed for the project or project site?

Yes (Enclose the hydrological study)  No

Note: A hydrological study or other information on site hydraulics (e.g., flows, channel characteristics, and/or flood recurrence intervals) may be required to evaluate potential project impacts on hydrology.

NOTIFICATION OF LAKE OR STREAMBED ALTERATION

**12. MEASURES TO PROTECT FISH, WILDLIFE, AND PLANT RESOURCES**

A. Describe the techniques that will be used to prevent sediment from entering watercourses during and after construction.

Please see attached CDFG 1603 SAN Additional Pages, Box 12A.

Continued on additional page(s)

B. Describe project avoidance and/or minimization measures to protect fish, wildlife, and plant resources.

Please see attached CDFG 1603 SAN Additional Pages, Box 12B.

Continued on additional page(s)

C. Describe any project mitigation and/or compensation measures to protect fish, wildlife, and plant resources.

Please see attached CDFG 1603 SAN Additional Pages, Box 12B.

Continued on additional page(s)

**13. PERMITS**

List any local, state, and federal permits required for the project and check the corresponding box(es). Enclose a copy of each permit that has been issued.

- A. California Energy Commission License  Applied  Issued
- B. BAAQMD Final Determination of Compliance and Permit to Operate  Applied  Issued
- C. \_\_\_\_\_  Applied  Issued
- D. Unknown whether  local,  state, or  federal permit is needed for the project. (Check each box that applies)

Continued on additional page(s)

NOTIFICATION OF LAKE OR STREAMBED ALTERATION

**14. ENVIRONMENTAL REVIEW**

A. Has a draft or final document been prepared for the project pursuant to the California Environmental Quality Act (CEQA), National Environmental Protection Act (NEPA), California Endangered Species Act (CESA) and/or federal Endangered Species Act (ESA)?			
<input checked="" type="checkbox"/> Yes (Check the box for each CEQA, NEPA, CESA, and ESA document that has been prepared and enclose a copy of each) <input type="checkbox"/> No (Check the box for each CEQA, NEPA, CESA, and ESA document listed below that will be or is being prepared)			
<input type="checkbox"/> Notice of Exemption	<input type="checkbox"/> Mitigated Negative Declaration	<input checked="" type="checkbox"/> NEPA document (type): <u>EPA, in process</u>	
<input type="checkbox"/> Initial Study	<input checked="" type="checkbox"/> Environmental Impact Report	<input checked="" type="checkbox"/> CESA document (type): <u>AFC</u>	
<input type="checkbox"/> Negative Declaration	<input type="checkbox"/> Notice of Determination (Enclose)	<input type="checkbox"/> ESA document (type): _____	
<input type="checkbox"/> THP/ NTMP	<input type="checkbox"/> Mitigation, Monitoring, Reporting Plan		
B. State Clearinghouse Number (if applicable)			
C. Has a CEQA lead agency been determined?		<input checked="" type="checkbox"/> Yes (Complete boxes D, E, and F) <input type="checkbox"/> No (Skip to box 14.G)	
D. CEQA Lead Agency	California Energy Commission		
E. Contact Person	Ivor Benci-Woodward	F. Telephone Number	(916) 654-3911
G. If the project described in this notification is part of a larger project or plan, briefly describe that larger project or plan.			
Please see attached CDFG 1603 SAN Additional Pages, Box 14G.			
<input checked="" type="checkbox"/> Continued on additional page(s)			
H. Has an environmental filing fee (Fish and Game Code section 711.4) been paid?			
<input checked="" type="checkbox"/> Yes (Enclose proof of payment) <input type="checkbox"/> No (Briefly explain below the reason a filing fee has not been paid)			
<p><i>Note: If a filing fee is required, the Department may not finalize a Lake or Streambed Alteration Agreement until the filing fee is paid.</i></p>			

**15. SITE INSPECTION**

Check one box only.	
<input type="checkbox"/> In the event the Department determines that a site inspection is necessary, I hereby authorize a Department representative to enter the property where the project described in this notification will take place at any reasonable time, and hereby certify that I am authorized to grant the Department such entry.	
<input checked="" type="checkbox"/> I request the Department to first contact (insert name) <u>Jonathan Stead</u> at (insert telephone number) <u>(510) 874-3058</u> to schedule a date and time to enter the property where the project described in this notification will take place. I understand that this may delay the Department's determination as to whether a Lake or Streambed Alteration Agreement is required and/or the Department's issuance of a draft agreement pursuant to this notification.	

NOTIFICATION OF LAKE OR STREAMBED ALTERATION

16. DIGITAL FORMAT

Is any of the information included as part of the notification available in digital format (i.e., CD, DVD, etc.)?
<input checked="" type="checkbox"/> Yes (Please enclose the information via digital media with the completed notification form)
<input type="checkbox"/> No

17. SIGNATURE

I hereby certify that to the best of my knowledge the information in this notification is true and correct and that I am authorized to sign this notification as, or on behalf of, the applicant. I understand that if any information in this notification is found to be untrue or incorrect, the Department may suspend processing this notification or suspend or revoke any draft or final Lake or Streambed Alteration Agreement issued pursuant to this notification. I understand also that if any information in this notification is found to be untrue or incorrect and the project described in this notification has already begun, I and/or the applicant may be subject to civil or criminal prosecution. I understand that this notification applies only to the project(s) described herein and that I and/or the applicant may be subject to civil or criminal prosecution for undertaking any project not described herein unless the Department has been separately notified of that project in accordance with Fish and Game Code section 1602 or 1611.

	02/09/09
Signature of Applicant or Applicant's Authorized Representative	Date
Jonathan A. Sacks	
Print Name	



# Drainage Channel Crossing 2

## CDFG Streambed Alteration Notification Additional Pages

**Box 1 through Box 9** – Please see Notification.

### **Box 10. Project Description**

#### **Box 10A. Describe the project in detail.**

The Willow Pass Generating Station (WPGS) project consists of constructing a new 550-megawatt (MW) natural-gas-fired electric generating facility within the existing Pittsburg Power Plant (PPP) site. The WPGS site consists of 26 acres within the 1,000-acre PPP site. As part of the WPGS project (refer to Box 14G for a more detailed description), two new 5-mile-long parallel off-site water pipelines would need to be constructed between the WPGS site and the Delta Diablo Sanitation District Wastewater Treatment Plant (DDSD WTP) (Figure 2). One water line would be used to supply recycled water from DDSD to the WPGS, and one water line would be used to return wastewater from the WPGS to the DDSD WTP. Three miles of the five-mile-long route currently contains an unused fuel oil pipeline owned by Mirant Delta, which historically was used to convey oil. The existing pipeline is 10.75 inches in diameter, is now out of service, and will be replaced by the new water pipelines. The new water pipelines would be underground, except at the intersection of Harbor Street, where the pipeline would cross overhead adjacent to the railroad tracks, consistent with the location of the existing unused fuel oil pipeline. These water pipelines would connect directly to existing facilities at the DDSD WTP.

Construction of the pipelines would require one crossing of Kirker Creek (Creek Crossings 1), one crossing of an unnamed tributary of Kirker Creek (Creek Crossing 2), and one crossing of a drainage channel located in the rail switchyard (Drainage Channel Crossing 2). (Locations of these crossings are shown on Figure 2.) This streambed alteration notification is for the Drainage Channel Crossing 2 project. Photograph 1 shows Drainage Channel Crossing 2. Photographs 2 and 3 show locations to which Drainage Channel Crossing 2 drains. Separate notifications for the other two creek crossing projects have been submitted with this notification.

Drainage Channel 2 is located in a rail switchyard north of Parkside Drive (Figure 3). The crossing at this location is approximately 15 feet wide, from top of bank to top of bank. Microtunneling would be used to install the pipes underneath the channel at this location. Microtunneling is a remote controlled operation, with a control located at the surface that controls the tunneling machine at the head of the jacked pipe using a series of gauges, television cameras, and a laser targeting system. The launching and receiving pits would be located more than 100 feet from the drainage channel. The launching pit would be located on existing pavement in the parking area of a commercial building. The receiving pit would be located in the rail switchyard in between sets of train tracks. Access to the receiving pit would occur somewhere along the railroad corridor in nearly bare ground. The 50-foot by 100-foot staging area would be placed between the railroad tracks.

The depth of the casing pipe is estimated to be as deep as 20 feet and the depths of the launching and receiving pits are estimated to be 30 feet. However, this is subject to the railroad's review.

Work at this crossing would occur during one season (June 15 to October 15) of one year sometime between 2009 and 2014.

**Box 10B. Specify the equipment and machinery that will be used to complete the project.**

The microtunneling system uses a surface slurry plant, a slurry separation plant, a control container, and a lubrication injection and pumping plant. These would all be located away from the drainage channel. An excavator would be needed to excavate the shafts, a pile driver to drive sheet piles, and dump trucks to remove spoils. A fusion bonding machine would be needed for fusing the high density polyethylene (HDPE) carrier pipe joints together.

**Box 10C and Box 10D** – Please see Notification.

**Box 11. Project Impact Area**

**Box 11A. Describe impacts to the bed, channel, and bank of the river, stream, or lake, and the associated riparian habitat.**

Construction of this project would require crossing a constructed drainage ditch that appears to flow into a channel that flows into Suisun Bay. The channel has a minimal slope gradient, and may be at a topographic high spot; it is difficult to determine whether water flows to the west (to Suisun Bay) or the east (to a detention basin at the edge of a commercial parking lot). The detention basin to the east likely is filled during large flood events. The majority of water, however, most likely flows west, eventually crossing under the roadway and entering a riparian channel in a marsh area west of the Pittsburg Power Plant (Figure 2). This channel then flows north to Suisun Bay.

Potential wetlands occur within the Drainage Channel Crossing 2 project area (Figure 2 and Figure 3). The underground, microtunneling type of installation to be used at this crossing would avoid all direct impacts to the bed, channel, and banks of the drainage channel.

Although direct impacts to wetlands at this location would be avoided, indirect impacts could occur at this creek crossing if construction causes sediment or construction debris to enter the drainage channel. Because potential wetlands would be avoided, they have not been formally delineated. Boundaries of these potential wetlands, however, were easily identified during reconnaissance level surveys because the potential wetlands occur within defined channels. Avoidance measures, or Best Management Practices (BMPs), would be implemented to prevent sediment and construction debris from entering these wetlands. Please refer to Box 12A below.

**Box 11B. Will the project impact any vegetation?**

No. The railroad switch yard contains bare ground and railroad tracks, and appears to be kept free of vegetation. No vegetation would be impacted with the placement of the launching pit, as it is located in an existing paved parking located behind a commercial building. Construction of the proposed project would temporarily impact approximately 13.78 square meters of nearly bare ground at the receiving pit (Figures 2 and 3). The receiving pit, located within the railroad switchyard, is primarily within a bare area, but may support some nonnative species typical of disturbed areas, such as such as Bermuda grass (*Cynodon dactylon*), broadleaf filaree (*Erodium botrys*), redstem filaree (*Erodium cicutarium*), prickly lettuce (*Lactuca serriola*), black mustard (*Brassica juncea*), fennel (*Foeniculum vulgare*), broadleaf pepperweed (*Lepidium latifolium*), bur clover (*Medicago polymorpha*), and short pod mustard (*Hirschfeldia incana*). Other species

found in ruderal areas include yellow star thistle (*Centaurea solstitialis*), Italian thistle (*Carduus pycnocephalus*), and milk thistle (*Silybum marianum*). Access to the receiving pit would occur somewhere along the railroad corridor in nearly bare ground. The approximately 50-foot by 100-foot staging area would be placed between the railroad tracks.

**Box 11C. Are any special status animal or plant species, or habitat that could support such species, known to be present on or near the project site?**

Yes. A few special-status animal species could occur near the project site, but none are expected to occur within the project area. Special-status species with potential to occur in the project area were determined based on the proximity of known occurrences, the historic range of these species, habitat evaluations, limited wetland delineations, and field surveys conducted in 2008. Surveys were conducted for special-status plant species, with negative results, and no special-status plant species are expected to occur in the vicinity of the Drainage Channel Crossing 2 project area. For a complete discussion on special-status species that may be affected by the entire Willow Pass Generating Station project, please refer to the Biological Resources Section of the 2008 Application for Certification (AFC), and the memorandum documenting plant surveys conducted following completion of the AFC, which are included with this notification package.

The project area lacks trees, but a few trees are scattered in the project vicinity. The tree nearest to the project area is approximately 170 feet to the northwest. Some wildlife species have the potential to use trees that may be scattered in the project vicinity. These species include:

- Swainson's hawk (*Buteo swainsoni*) (California threatened) – for nesting
- white-tailed kite (*Elanus laeocurus*) (California fully protected) – for nesting
- great blue heron (*Ardea herodias*) (California species of special concern) – for nesting
- migratory birds (protected by the Migratory Bird Treaty Act) – for nesting
- loggerhead shrike (*Lanius ludovicianus*) (California species of special concern) – forage in grassland and ruderal vegetation where shrubs and trees are present
- western red bat (*Lasiurus blossevillii*) (Western Bat Working Group High Priority Species) – roost in trees and forage over open grassland and ruderal areas nearby

After implementation of the avoidance and minimization measures proposed in the AFC and the subsequent letters submitted to the California Energy Commission (both included with this notification package), the project is not likely to significantly impact special-status species.

**Box 11D. Identify the source(s) of information that supports a “yes” or “no” answer above in Box 11.C.**

Focused surveys and habitat assessments for special-status species and/or sensitive habitat species, and wetland delineations were conducted in the study area in 2008. Results of these surveys are summarized in the June 30, 2008 AFC and in the memorandum documenting plant surveys that were conducted following completion of the AFC.

**Box 11E. Has a biological study been completed for the project site?**

Yes. An AFC has been prepared and was submitted to the California Energy Commission (CEC) in 2008. A memorandum documenting the negative findings of the plant surveys conducted

following completion of the AFC has been prepared and submitted to the CEC. A biological resources summary and request for informal consultation with the U.S. Fish and Wildlife Service (USFWS) are currently being prepared for the U.S. Environmental Protection Agency (the anticipated lead federal agency for the WPGS project).

**Box 11F. Has a hydrological study been completed for the project or project sites?**

No. A hydrological study of the creeks is not needed because construction will consist of microtunneling, and no work will be done in the creeks.

**Box 12. Measures to Protect Fish, Wildlife, and Plant Resources**

**Box 12A. Describe the techniques that will be used to prevent sediment from entering watercourses during and after construction.**

Water quality is not expected to be adversely affected by the proposed project with implementation of the measures described below.

**Avoid Sensitive Habitats and Species during Construction by Developing Construction Exclusion Zones and Silt Fencing in Sensitive Areas**

In general, disturbance to existing grades and vegetation would be limited to the actual site of the water pipeline alignment. Information about environmentally sensitive areas would be shown on contract plans and discussed in the Special Provisions. Environmentally sensitive area provisions could include, but are not limited to, the use of temporary orange fencing to delineate the proposed limit of work in areas adjacent to sensitive resources, or to delineate and exclude sensitive resources from potential construction impacts.

Contractor encroachment into environmentally sensitive areas would be restricted (including the staging/operation of heavy equipment or casting of excavation materials). Provisions for environmentally sensitive areas would be implemented as a first order of work, and would remain in place until all construction activities are complete; this includes any nest sites identified during preconstruction surveys. Placement of all roads, staging areas, and other facilities would avoid disturbance to wetlands and other sensitive areas of habitat, except where unavoidable impacts have been identified and mitigation has been proposed. Existing ingress or egress points would be used. Equipment parking, project access, supply logistics, equipment maintenance, and other project-related activities would occur at a designated staging area. Following completion of the work, the contours of the area would be returned to preconstruction conditions or better.

**Provide Worker Environmental Awareness Training for All Construction Personnel**

Training would include the identification of the special-status biological resources and measures required to minimize project impacts during construction and operation.

**General Avoidance of Wetland/Stream Impacts**

The launching and receiving pits would be located at least 10 feet back from the top of the banks of Kirker Creek. No work would be conducted within Kirker Creek.

Regional Water Quality Control Board (RWQCB)-approved physical barriers adequate to prevent the flow or discharge of sediment into these systems would be constructed and

maintained between working areas and streams, lakes, and wetlands. Erosion control and sediment retention devices (e.g., well-anchored sandbag cofferdams, straw bales, or silt fences) would be incorporated into the project design and implemented at the time of construction. These devices would be in place during construction activities, and afterwards if necessary, to minimize sediment impacts to the wetlands and input to waters of the United States. These devices would be placed at all locations where sediment input is likely.

A supply of erosion control materials would be kept on hand to cover small sites that could become bare and to respond to sediment emergencies. Oily or greasy substances originating from the contractor's operations would not be allowed to enter or be placed where they would later enter a live or dry stream, pond, or wetland.

An emergency response plan would be prepared and submitted to appropriate agencies prior to the start of construction. The plan would identify actions that would be taken in the event of a spill of petroleum products or other material harmful to aquatic or plant life, and the emergency response materials that would be kept at the site to allow the rapid containment and cleanup of any spilled material.

### **Revegetation and Restoration of Disturbed Areas**

Vegetation disturbed during the installation of the water line would be replanted with appropriate native annual grassland species. The topography would be restored after proposed construction activities have been completed.

### **Measures to Avoid and Minimize Potential for Frac-Outs**

The measures listed below would be implemented to reduce the risk of frac-out.

#### *Preconstruction*

A Frac-Out Contingency Plan would be prepared and implemented to minimize potential for frac-out during microtunneling. This plan would describe BMPs for dealing with a frac-out should one occur. Prevention and cleanup plans would include: (1) Name(s) and phone numbers of biological monitor(s), third-party monitors, and crew supervisor(s), (2) Monitoring protocols (including biological monitoring and frac-out monitoring), and (3) Containment and cleanup plan (include staging location of vacuum trucks and equipment, equipment list, necessary hose lengths, etc.).

#### *Construction*

1. The microtunneling operation would be designed, pre-planned, and directed in such a way as to minimize the risk of spills of all types. A contingency plan would be provided in the event of frac-out. In substrates where frac-outs are likely to occur, work would occur in a manner that would reduce risk, such as using lower pressure and greater boring depths.
2. Biological monitor(s) would continuously monitor the microtunneling operation to ensure adequate protection controls have been installed. All field personnel would be briefed in their responsibility for timely reporting of frac-out releases to the monitor on site.

3. If a frac-out or spill into the drainage channel occurs, CDFG would be contacted immediately.
4. In the case of a frac-out into the drainage channel, the work activities at Drainage Channel Crossing 2 would cease immediately and the CDFG would be consulted. Work at Drainage Channel Crossing 2 would not resume until the CDFG determines that no resources are at risk.
5. Any sediment, including natural substrate, that enters the channel in a frac-out situation would be contained and removed from the channel as part of the cleanup procedure.
6. Access to the work site would be via designated, existing rights-of-way, roads, and access ramps. The use of additional roads to access the drainage channel to perform cleanup activities in the event of a petroleum, construction material, deleterious substance spill or frac-out would be coordinated with the CDFG or its agents. Should the situation pose a significant or immediate threat to the environment, the area could be accessed immediately to implement the containment measures, and the CDFG would be contacted concurrently.

**Box 12B. Describe project avoidance and/or minimization measures to protect fish, wildlife, and plant resources.**

Mirant Willow Pass would implement measures to avoid and minimize potential impacts to sensitive biological resources during pipeline installation. Examples of these measures are described in Box 12A and include erosion control measures to prevent run-off and impacts to water quality, installation of appropriate fencing to indicate limits of construction areas and ensure workers and equipment operate in designated construction zones, implementation of spill and secondary containment systems to prevent soil and groundwater contamination, and appropriate reseeding and reinstatement to restore habitats following construction. Additional species-specific measures are summarized below.

**Cap All Open Pipes**

Capping open pipes at the end of each day during construction would reduce the potential for wildlife to enter a pipe and become trapped.

**Preconstruction Avian Surveys**

If construction occurs between March 15 and August 15, preconstruction surveys for nesting migratory birds and nesting raptors would be conducted in ornamental trees, riparian vegetation, and other trees near the water pipeline alignment. Surveys would also be conducted where the water supply and discharge pipeline alignment crosses stream and drainage channels, and where it passes through ruderal grassland habitat. If nests of migratory birds, raptors, or special-status species are identified, nest monitoring and avoidance measures would be required to prevent direct and indirect disturbance to nesting birds. If construction activities would cause unavoidable disturbance to an active nest site, consultation with the California Department of Fish and Game and/or the USFWS would be necessary.

**Box 12C. Describe any project mitigation and/or compensation measures to protect fish, wildlife, and plant resources.**

Please refer to Box 12B.

**Box 13. Permits** – Please see Notification.

**Box 14A-F, H, and I. Environmental Review** – Please see Notification.

**Box 14G. If the project described in this notification is part of a larger project or plan, briefly describe that larger project or plan.**

Mirant has proposed to construct the Willow Pass Generating Station in Pittsburg, California (Figure 2). The WPGS project would consist of new natural-gas-fired generation facilities and ancillary systems. The WPGS project would involve construction of new generating units that would become the WPGS; construction of electric and gas transmission lines adjacent to the WPGS facility; and construction of water supply and wastewater pipelines connecting to the DDSD WTP. The WPGS generating units, natural gas line, transmission lines, and construction laydown and parking areas are all located within the existing PPP site and adjacent Pacific Gas and Electric Company switchyard.

The only project components extending beyond the boundaries of the PPP site and PG&E switchyard are the water supply and wastewater discharge pipelines.

On-site construction for the WPGS project is expected to commence in fourth quarter 2009. Construction and startup of the new generating units should be completed by July 2012.

Potential impacts that the proposed project may have on the environment have been evaluated in detail. An Application for Certification has been prepared and was submitted to the California Energy Commission for the WPGS project in 2008. The WPGS project would avoid or minimize potential environmental impacts through project siting and design, best management practices, and incorporation of mitigation measures. As a result, the WPGS project would have no significant environmental impacts.

**Box 15** – Please see Notification.

**Box 16. Digital Format**

**Is any of the information included as part of the notification available in digital format (i.e., CD, DVD, etc)?**

Yes. CDs are enclosed. The referenced documents include:

- Application for Certification for the Willow Pass Generating Station (June 2008)
- AFC Supplement in Response to Data Adequacy Review (September 2008)
- Responses to California Energy Commission Data Requests (December 2008)
- Responses to California Energy Commission Workshop Questions, which includes a Plant Survey conducted after submittal of the AFC (February 2009)

**Box 17. Signature** – Please see Notification.

## Photographs



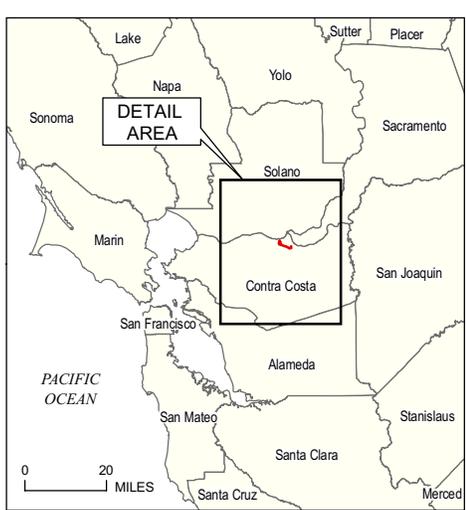
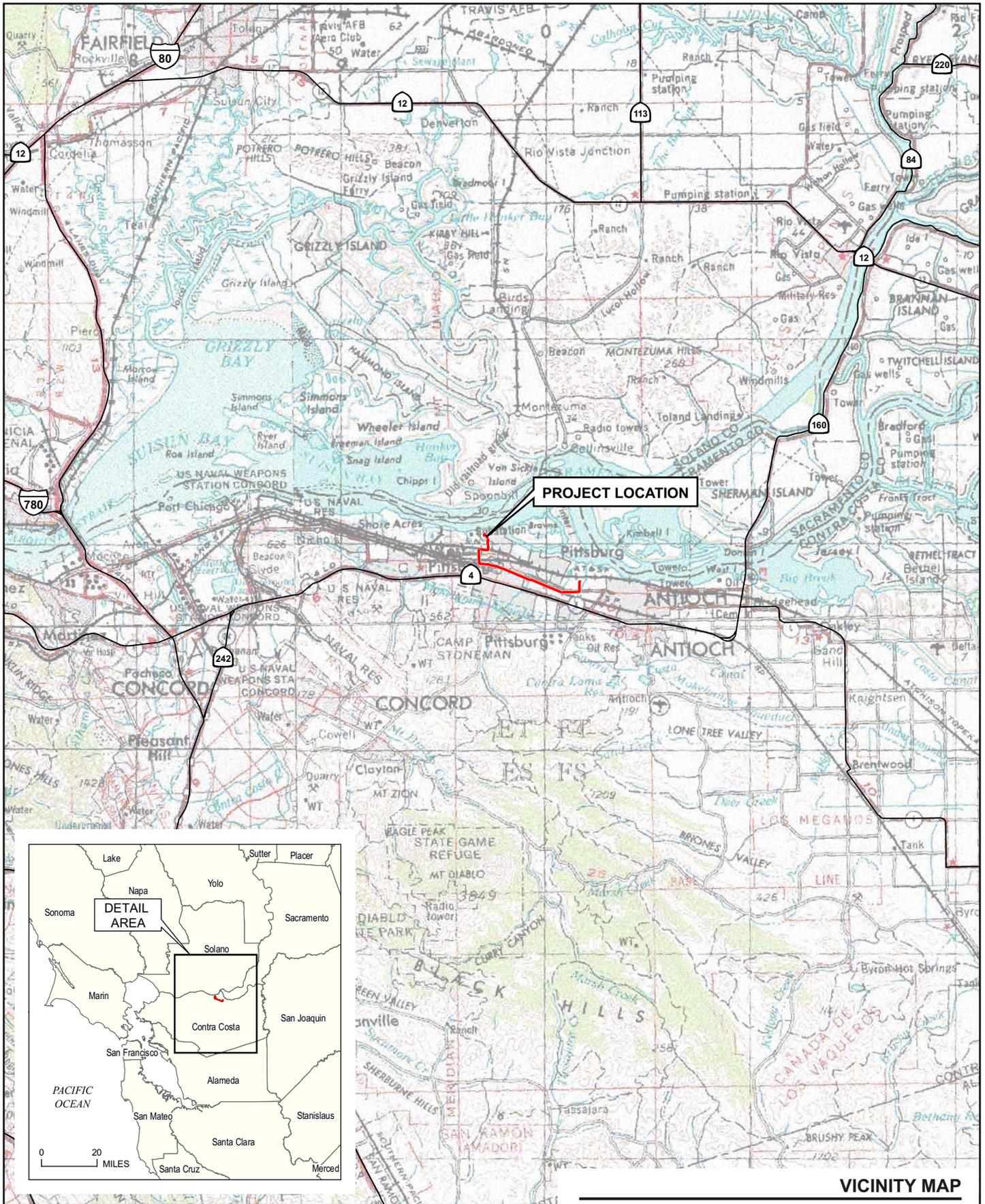
Photograph 1. Drainage Channel Crossing 2 near microtunneling location.



Photograph 2. East end of Drainage Channel 2 where channel enters a detention basin at the edge of a parking area.

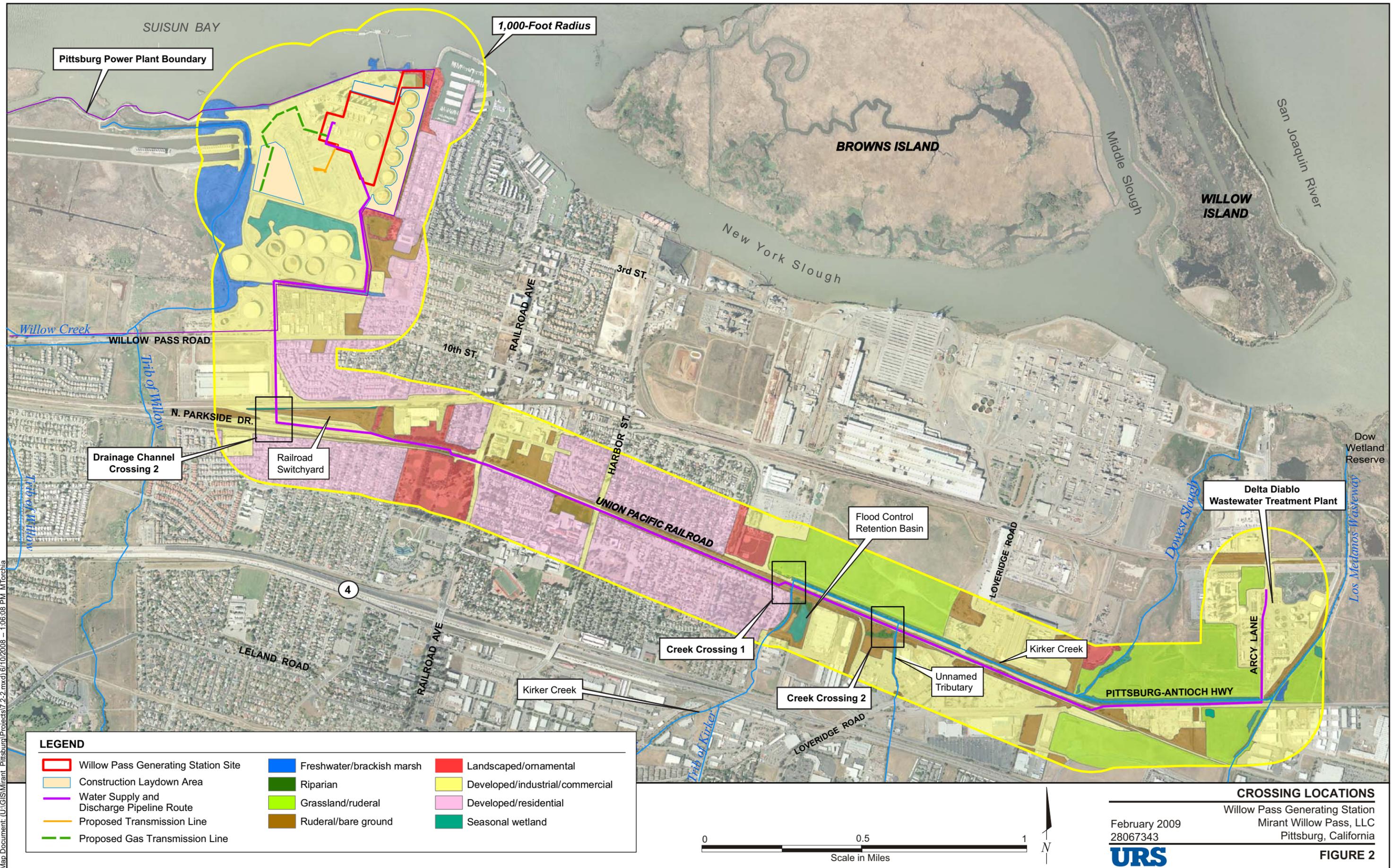


Photograph 3. Riparian channel hydrologically connected to Drainage Channel 2 to the west. This channel flows through a marsh area and enters Suisun Bay.

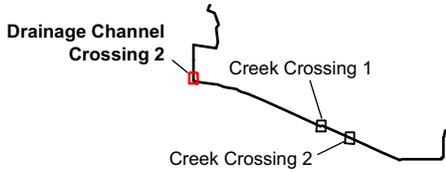


**VICINITY MAP**  
 Willow Pass Generating Station  
 Mirant Willow Pass, LLC  
 Pittsburg, California

February 2009  
 28067343  
**URS**  
**FIGURE 1**



**LOCATION OF CROSSING  
ALONG PIPELINE ALIGNMENT**



See Figure 2 for Detail

30' X 15' LAUNCHING PIT  
(10 FEET FROM FENCE LINE)

DRAINAGE CHANNEL CROSSING 2

12' X 12' RECEIVING PIT  
(20 FEET FROM EDGE OF TRACKS)

**LEGEND**

— Proposed Offsite Water Supply and Discharge Pipeline Route

☒ Pits

▨ Potential Jurisdictional Wetland

Note:  
Pipeline locations shown are approximate  
and may be modified subject to final design



**DRAINAGE CHANNEL CROSSING 2**

February 2009  
28067343

Willow Pass Generating Station  
Mirant Willow Pass, LLC  
Pittsburg, California



**FIGURE 3**