# 3.2: AGRICULTURE

## Introduction

This section discusses the current agricultural resources in the vicinity of the project, as well as current land use policies and regulatory documents related to agriculture. This section also discusses potential impacts the project could have on agricultural resources and presents mitigation measures for the identified impacts.

## Environmental Setting

### REGIONAL SETTING

In 1999, Butte County agricultural products were valued at $291,311,000. Cropland acreage included 224,392 acres, 76,418 acres of which were in orchards, 96,500 acres were in rice, and 800 acres were in row crops. Rice was the highest value crop at $103,265,000, followed by almonds at $37,449,000. Approximately 269,000 acres were in rangeland and 18,400 acres were in irrigated pasture.

In 1999, Colusa County agricultural products were valued at $351,278,000. Cropland acreage included 298,024 acres, 32,783 acres of which were in orchards, 140,920 acres were in rice, and 31,125 acres were in row crops. Rice was the highest value crop at $154,936,000 followed by processing tomatoes at $65,875,000.

Rice cultural practices include the following (UC Cooperative Extension, 2001):

- Land preparation and tillage once in fall and twice from March to May (fields are leveled, levees and drains are installed/repaired)
- Planting from mid-April to mid-May (soil is flooded and aerial seeding is performed)
- Irrigation land flooding from planting in mid-April to mid-May prior to summer and fall harvests
- Fertilizer applications applied aerially

- Pesticides applied aerially and by ground application and may include herbicides (Londax, Ordram) applied in May, June and July
- Fall and winter are the least agriculturally-intensive periods along the Pipeline alignments

## LOCAL SETTING

The western edge of Butte County, where the Well Pad Site, Storage Loop Pipeline, Remote Facility Site, and part of the Line 400/401 Connection Pipeline project sites are located, is characterized by large-acreage farms dedicated almost entirely to rice production. Irrigation water from canals and ditches is introduced at the high-end of the fields to allow sequential flooding of down-gradient fields. Fields are separated by dikes, and water level and movement is controlled by check-boxes. The rice fields in the vicinity of the Remote Facility Site have been leveled, allowing large tracts to be farmed more efficiently with higher production rates. The majority of the lands devoted to rice farming are now considered "prime agricultural lands" because they are irrigated, according to the Natural Resources Conservation Service (NRCS) soil survey for Butte County. The project study area in Butte County is zoned for agriculture with a 40-acre minimum parcel size (A-40).

Large farms dominate most of the project study area in Colusa County (Line 400/401 Connection Pipeline and Delevan Interconnect Facility). For the most part, the land is flat and used for rice production, orchards, and row crops. Rice is the dominant crop in the county; however, near the Sacramento River there are fruit and nut orchards and row crops. Crops include plum orchards east and west of the Sacramento River; row cropland, rice, and cotton were planted within or adjacent to the proposed Line 400/401 Connection Pipeline ROW. Rice is the predominant crop grown along the ROW, with smaller areas of row cropland and plum orchards on slightly higher ground adjacent to the River floodplain levees. The annual grassland found west of the Glenn-Colusa Canal are used for cattle grazing.

The two Zoning Districts, which encompass the majority of the project study area in Colusa County, are Agricultural Preserve (A-P) and Exclusive Agriculture (E-A). The agricultural areas along the Sacramento River and the Colusa Drain have a Zoning Overlay classification of Designated Floodway (DF), which has been designated by the State Reclamation Board of the Department of Water Resources. Figure 3.9-1 shows agriculture lands within the project study area in Butte and Colusa Counties.

### Cropland Operations

Field reconnaissance in July and November 2001 showed the several cropland uses. In July, rice areas were planted and flooded, and row crops were planted. Plum orchards were either being picked or had been picked. In November, rice areas were either flooded for waterfowl, were fallow, were burned or mowed, or were being harvested for rice straw. Rice straw bales were observed stockpiled adjacent to many of the rice fields. Orchards had been picked and orchard trees were going dormant. Row cropland was in production during November.

Cattle grazing on dry rangeland was observed at the Delevan Interconnect Facility expansion area, and cattle grazing on irrigated pasture was observed at the Well Pad Site expansion area.

Prime Agricultural Land Gross revenues range from $600 to $1000 per acre per year for rice land (US Cooperative Extension, 2001, Colusa County, 2001). These values qualify the land as prime, where gross revenues exceed $200 per acre per year (California Department of Conservation definition of prime land). Row crop and plum orchards also easily qualify as prime land with gross revenues of $1,976 and $1,505 per acre per year, respectively. Irrigated pasture gross revenues are about $125 per acre per year, and grazing is about $7.50 per acre per year. Therefore, these lands are considered to be non-prime.

Soil types affected by facilities construction include #524 Neerdobe clay at the Remote Facility Site expansion area, and #523 Esquon silty clay loam at the Well Pad Site expansion area (NRCS, 2001). The Neerdobe clay is under capability class III and is considered to be prime farmland by NRCS. The Esquon silty clay loam is under capability class V and is not considered prime farmland by NRCS due to flooding.

### Williamson Act Properties

The proposed project crosses three Williamson Act properties, and the Well Pad Site expansion is on land under Williamson Act contract. These lands are under contract with either Butte or Colusa County to remain in agricultural production in return for being taxed for their agricultural use only. The proposed project is adjacent to eight properties that have Williamson Act contracts. Figure 3.2-1a,b identifies Williamson Act properties within the project vicinity.

## Regulatory Setting

The agriculture-related regulations, plans, and policies relevant to the proposed project are described below.

### FEDERAL SETTING

No federal regulations apply to potential impacts to agricultural resources in the project area.

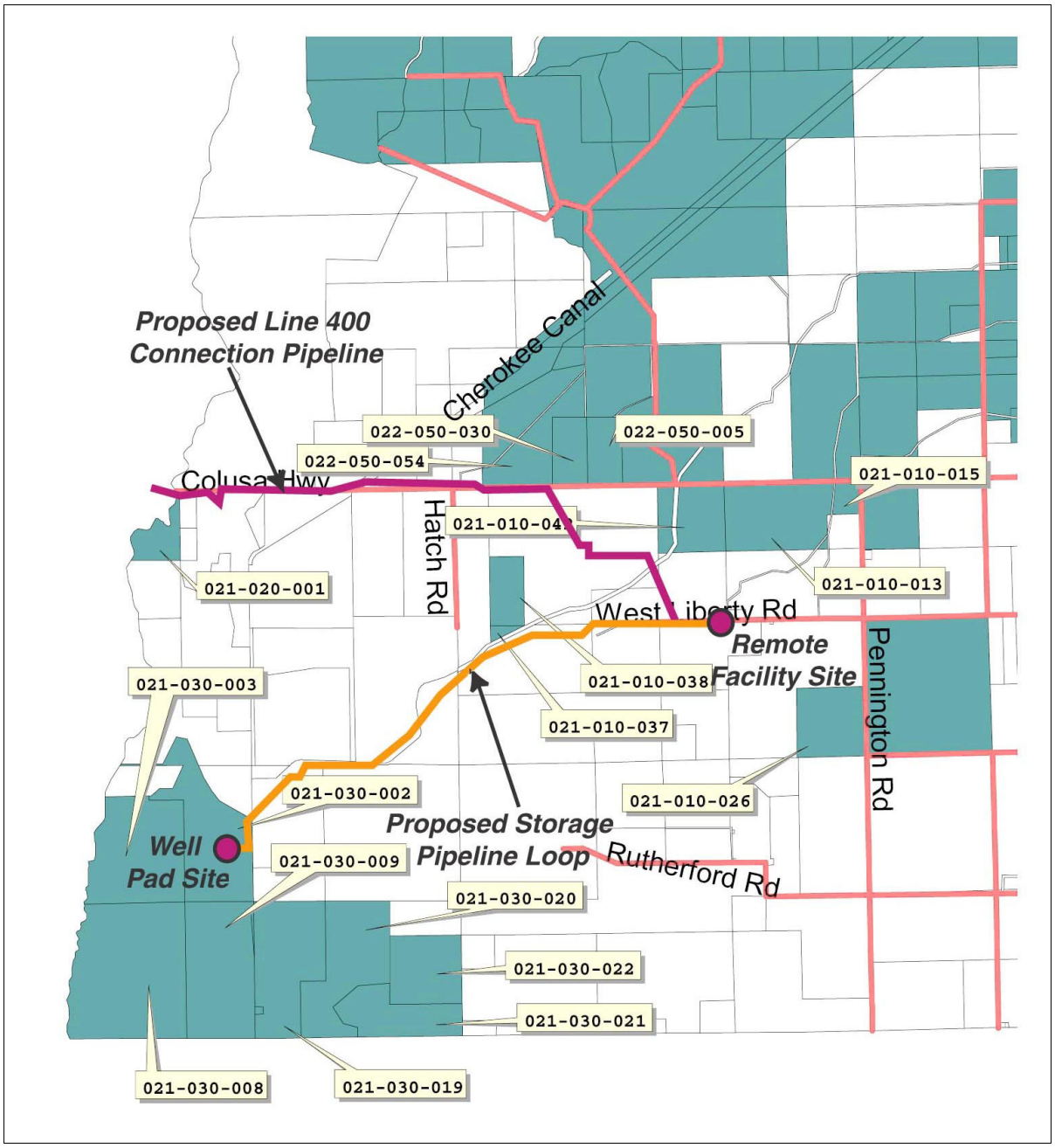
### STATE/REGIONAL SETTING

CEQA, as amended, Appendix G notes that the permanent removal of prime agricultural land from production is a potentially significant impact.

Prime farmlands are defined in the California Government Code 51201 (c) as:

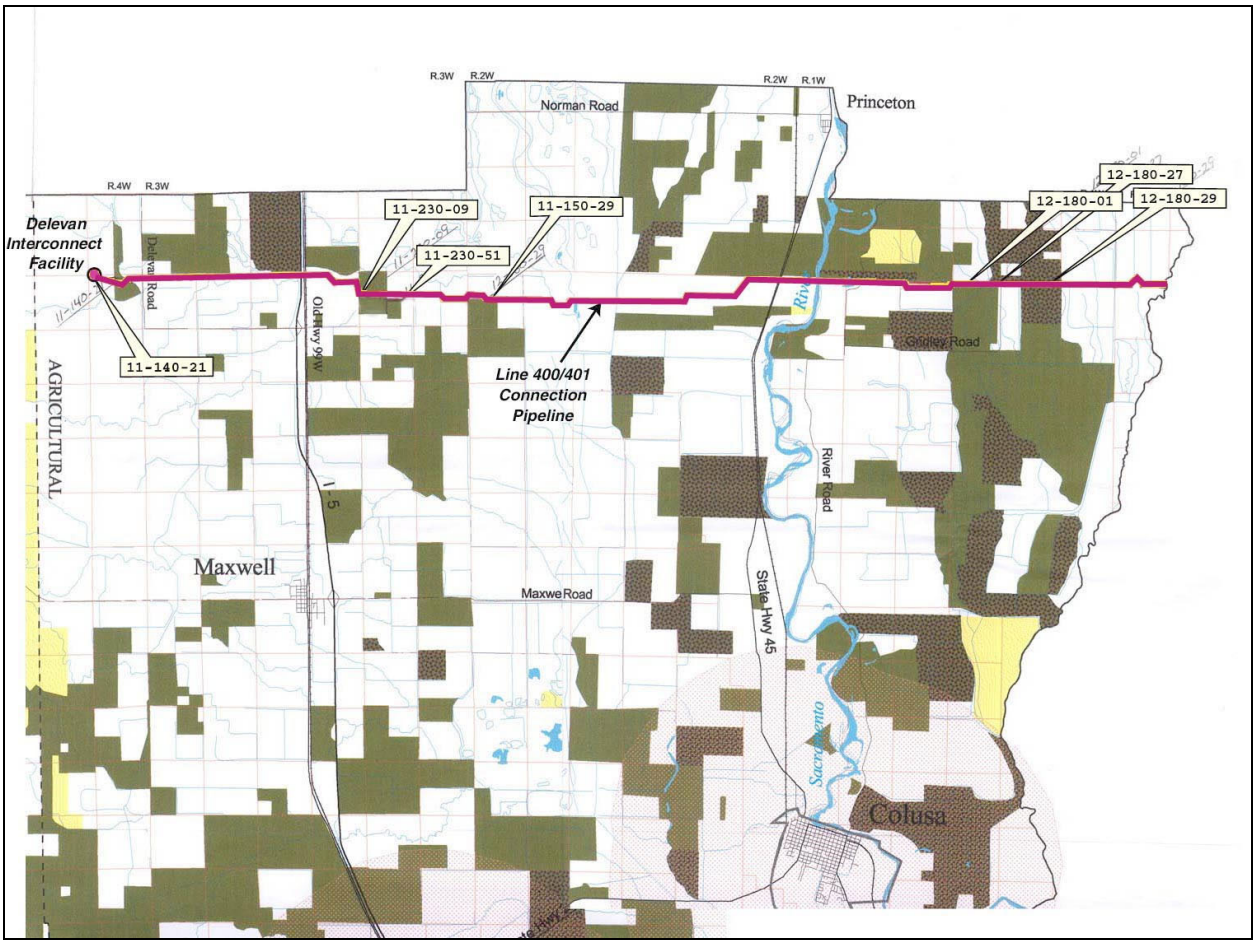
- All land that qualifies for rating as Class I or Class II in the US Natural Resources Conservation Service's Land Use Capability Classification
- Land that qualifies for rating 80 through 100 in the Storie Rating Index
- Land that supports livestock used for the production of food and fiber and has an annual carrying capacity equivalent to at least one animal-unit per acre as defined by the US Department of Agriculture

**Figure 3.2-1a:** Williamson Act Properties Within the Project Vicinity – Butte County




SOURCE: Butte County Development Services 2002

**Figure 3.2-1b:** Williamson Act Properties Within the Project Vicinity – Colusa County




SOURCE: Colusa County Assessor's Office 2002

- Land planted with fruit and nut bearing trees, vines, bushes or crops that have a nonbearing period of less than five years and will normally return during the commercial bearing period on an annual basis from the production of unprocessed agricultural plant production not less than $200 per acre
- Land that has been returned from the production of unprocessed agricultural plant products with an annual gross value of not less than $200 per acre for three of the previous five years.

The California Land Conservation Act of 1965--commonly referred to as the Williamson Act--enables local governments to enter into contracts with private landowners for the purpose of restricting specific parcels of land to agricultural or related open space use. In return, landowners receive property tax assessments, which are much lower than normal because they are based upon farming and open space uses as opposed to full market value.

## LOCAL SETTING

### Butte County.

The *Land Uses Element* of the *Butte County General Plan* lists the following Policies relevant to the proposed project:

> **Policy 2.1.c.** Allow a wide range of agricultural and necessary accessory uses in crop production areas.
>
> **Policy 2.1.d.** Maintain minimum parcel sizes in designated agricultural areas by following comprehensive zoning principles.
>
> **Policy 2.7.b.** Encourage the development of natural gas fields and other fossil fuel sources.

The Butte County *Land Use Plan* and *Agricultural Element* encourage the protection and enhancement of agriculture and of prime agricultural lands (Policies 2.1.c, d). Butte County has designated the project area for agriculture on minimum 40-acre parcel minimum size. "Orchard" and "field crop" land is designated in the plan. Resource extraction and processing are allowed as secondary uses within the Agriculture Zones. Butte County has an Energy Resource Policy that encourages the development of natural gas fields (Policy 2.7.b) and the *Zoning Ordinance* allows gas wells and gas transmission facilities.

### Colusa County.

The land use designation for the majority of the project study area in Colusa County is Agriculture (A-G). The Zoning Districts are Agricultural Preserve (A-P) and Exclusive Agriculture (E-A). The *Land Use Plan* policies for Colusa County indicate that preservation of agricultural production is a primary goal:

> **LU-4.** Agriculture and resources management should be the primary land uses outside of the designated communities. Freestanding subdivisions isolated from existing communities and lacking urban services should be prohibited.

**LU-9.** The proposed development pattern should protect the integrity of agriculture and shall not in any way create a hardship for the county's farmers. Lands presently in agricultural uses that do not adjoin existing communities should be protected through the county's land use regulations. In addition, the CEQA initial study checklist should consider the potential impact of proposed development on existing and adjoining agricultural operations and water supply.

**LU-17.** Multiple uses (grazing, forestry, and recreation) should be allowed on conservation lands so long as environmental resources are protected.

**LU-20.** Lands designated for General or Upland Agriculture should continue to be used for agriculture at least for the duration of the planning period (1987-2010). Such period may be extended by future revisions of the plan.

**LU-25.** Exploration and extraction of oil, gas, and other mineral resources should be conducted in such a way that conflicts with agricultural uses are minimized and permanent interference with agricultural operations is avoided, and in a way that is consistent with the land use compatibility requirements of the Williamson Act, for those lands that are now under contract.

**LU-28.** Preservation of agricultural land under the Williamson Act should be an option available to all those who qualify.

The *Colusa County Land Use Plan* also designates oil and natural gas facilities as a compatible and acceptable use in General Agriculture Zones (A-G) as long as such uses do not interfere with the viability of agriculture or create environmental hazards (LU-25). Accessory facilities involving oil and natural gas are proposed in this project. The *Colusa County Zoning Ordinance* allows for pipelines and associated facilities in all Zoning Districts with County Planning Commission review and approval.

## Impact Analysis

### AREAS OF POTENTIAL ENVIRONMENTAL CONCERN

The following are areas of potential environmental concern that may be associated with the implementation of the proposed project:

- Converting Prime Farmland, Unique Farmland, or Farmland of Statewide Importance (Farmland), as shown on the maps prepared pursuant to the Farmland Mapping and Monitoring Program of the California Resources Agency, to non-agricultural use.
- Conflicting with existing zoning for agricultural use, or a Williamson Act contract.
- Involvement of other changes in the existing environment, which due to their location or nature, could result in conversion of Farmland, to non-agricultural use.

### THRESHOLDS OF SIGNIFICANCE

The following thresholds of significance are used to determine the level of impact to areas of potential environmental concern:

- **Directly convert Farmland to non-agricultural use.** The proposed project shall have a significant impact if it converts land associated with the proposed project from Prime

Farmland, Unique Farmland, or Farmland of Statewide Importance (Farmland) to non-agricultural land, if it directly renders associated agricultural lands unfit for continued agricultural use, or if it directly prevents normal agricultural operations on these lands.

- **Conflict with existing designated uses.** The proposed project shall have a significant impact if the proposed land uses conflict with designated land uses defined by zoning ordinances of Butte and Colusa Counties and/or the Williamson Act.
- **Indirectly convert Farmland to non-agricultural use.** The proposed project shall have a significant impact if it indirectly causes the conversion of Farmland to non-agricultural land, if it indirectly renders associated agricultural lands unfit for continued agricultural use, or if it indirectly damages normal agricultural operations and production on these lands by triggering or causing changes in the existing environment.

## IMPACT DISCUSSION

### Impact 3.2-1. Direct Conversion of Farmland to Non-Agricultural Use

The temporary removal of about 221 acres from agricultural production would occur during construction of the proposed project (see Table 3.2-1). This is considered to be a potentially significant impact. WGSI measure 3.2-1 partially mitigates this impact, which is still considered significant. Agricultural facilities such as fences, drainages conveyance features, water lines, and dikes may be damaged or removed during construction if care is not taken to avoid, relocate, or to immediately repair damage. WGSI Measure 3.2-2 (above) fully addresses this impact.

To address construction impacts on crops, WGSI has proposed the following mitigation measures as part of their project conditions, which would offset losses from this impact to less-than-significant levels:

**WGSI Measure 3.2-1.** Farmers shall be compensated for the loss of crops during construction of the proposed facilities.

**WGSI Measure 3.2-2**. Following construction, agricultural fields shall be surveyed and regraded to their original elevation where needed and all rice field dikes and check boxes will be repaired and/or replaced. Although the trench backfill in agricultural areas will be compacted to the original density to minimize settling (see Section 3.6 Geology), follow-up elevation surveys and finish grading will be provided, if necessary, to ensure that the field grading and irrigation flows are not adversely affected. Fences and irrigation facilities will be replaced or repaired to their original condition following construction.

**Table 3.2-1:** Project Land Requirements (acres[1])

| Land Use | Rice | | Row Crop | | Pasture/ Fallow | | Wetland/ River | | Other[2] |
|---|---|---|---|---|---|---|---|---|---|
| **Project Component** | **Temp** | **Perm** | **Temp** | **Perm** | **Temp** | **Perm** | **Temp** | **Perm** | **Temp** |
| Well Pad Site | | | | | | | 1.4 | 1.3 | |
| Storage Loop Pipeline[4] | 17.2 | | 0.7 | | 2.9 | | 8.4 | | |
| Remote Facility Site | | 5.8 | | | | | | | 5.5 |
| L167 Relocation[3] | 0.8 | 0.5 | | | | | | | |
| Line 400/401 Connection Pipeline | 155.6 | 66.7 | 37.6 | 16.1 | 5.6 | 2.4 | 10.1 | 4.3 | 5.0 |
| Delevan Interconnect Facility | | | | | 0.5 | 0.5 | | | |
| Total | 173.6 | 73.0 | 38.3 | 16.1 | 9.0 | 2.9 | 19.8 | 5.7 | 10.5 |
| **Total Temporary Use** | 251.1 acres | | | | | | | | |
| **Total Permanent Use** | 113.6 acres | | | | | | | | |

Notes:
1. All acreage values are estimated and are approximate
2. "Other" is previously disturbed areas as described in 2.0 Project Description
3. Assumes construction staging for L167 will be provided in the Remote Facility staging area(s)
4. Assumes construction staging for the Storage Pipeline Loop will use the same area as the Line 400/401 Connection Pipeline

SOURCE: WGSI 2001

The project may cause short-term access restrictions for agricultural areas, which could create a significant impact to farming and/or ranching operations. The following measure has been proposed by WGSI to mitigate this impact, which is considered significant:

> **WGSI Measure 3.2-3.** Where required, farmers will be provided breaks in spoil piles, trenches, or pipe strings to accommodate their need for field access during construction.

Pesticide application may occur within approximately five days of rice planting and then again within approximately 40 days of planting. Pesticide application requirements prohibit drift over occupied areas (otherwise, construction workers may be exposed to some periodic spraying drift). This would constitute a significant impact, but can be avoided by proper notification, on-site monitoring, and scheduling coordination.

**Well Pad Site** Construction and operation impacts associated with the project's implementation and the effects on the conversion of agricultural lands are described in the following paragraphs.

*Construction.* Approximately 1.3 acres of laydown and staging area will be temporarily used during construction along the west and north sides of the Pad expansion area, which is predominantly wetlands. Well Pad Site expansion would remove about 1.4 acres of which a portion is now used as non-prime irrigated pasture and cattle grazing. The loss of this acreage for the Well Pad Site would be an adverse but less-than-significant impact because the land is currently not being used as prime agricultural land.

During construction at the Well Pad Site, potential exists for cattle to stray into the construction site. This is considered a significant impact. WGSI mitigation, such as fencing, would reduce this impact to a less than significant level.

*Operations.* The proposed project would permanently remove 1.4 acres of non-prime agricultural lands from production. This is less than significant because the land, which would be converted, is non-prime agricultural land.

**Storage Loop Pipeline.** Construction and operation impacts associated with the project's implementation and the effects on the conversion of agricultural lands are described in the following paragraphs.

*Construction.* The Storage Loop Pipeline would utilize the existing 30-foot wide permanent easement. The pipeline would require use of approximately 29 acres of 60-foot-wide temporary construction working strip or ROW. The temporary construction area would include temporary workspace at each bore site, as described in the Section 2.0 Project Description. The construction ROW would need to be isolated from the adjacent fields and not flooded. Temporary dikes would need to be installed following harvest the fall prior to construction, or during spring field preparation the year of construction. Maximum impacts would occur to the crop in the construction ROW. The agricultural landing area[1] just west of the Remote Facility Site may also be used for Pipeline construction staging (Staging Area). Construction of the Storage Loop Pipeline would thus require a temporary interference with agricultural operations within the construction ROW and Staging Area. WGSI Measures 3.2-1 and 3.2-2 (listed above) offset resulting losses to less-than-significant levels.

*Operations.* No impacts to agricultural lands from operation of the Storage Loop Pipeline are anticipated because the pipeline would occupy the easement of the existing pipeline.

**Remote Facility Site** Construction and operation impacts associated with the project's implementation and the effects on the conversion of agricultural lands are described in the following paragraphs.

*Construction.* A primary staging area would be created on the agricultural landing area just west of the Remote Facility Site. This 5.5-acre area would be used for worker parking and equipment and material storage. To accommodate the relocation of PG&E's L167

[1] The term "landing area," as used by the local farmers, is a non-farmed upland area adjacent to their fields where they store or park farm equipment and where they stage "bank out wagons" during harvest. "Bank out wagons" are the grain trailers that the tractor pulls alongside the harvester as it empties its load, after which the trailers are taken to the landing area where a street-legal truck tows them to the rice dryer.

around the site perimeter, approximately 0.5 acres of new 30-foot wide easement would be required and just under 1 acre would be required for the temporary construction working strip. After implementation of WGSI Measures 3.2-1 and 3.2-2, less-than-significant impacts on agricultural operations are anticipated to result from construction at the Remote Facility.

The Remote Facility site expansion would permanently remove 5.8 acres of prime agricultural land from production. According to CEQA Appendix G, projects that would permanently remove prime agricultural land from production are considered to have significant, unavoidable impacts for which mitigation cannot offset the loss to less than significant levels.

**Line 400/401 Connection Pipeline and Delevan Interconnect Facility.** Construction and operation impacts associated with the project's implementation and the effects on the conversion of agricultural lands are described in the following paragraphs.

*Construction.* The construction ROW is proposed to be 100-feet wide and would occupy about 199 acres of agricultural lands. The construction ROW would include areas of both prime and non-prime agricultural lands. As with the Storage Loop Pipeline construction, the Line 400/401 Connection Pipeline ROW would need to be isolated from the adjacent fields and not flooded. Temporary dikes would need to be installed following harvest the fall prior to construction, or during spring field preparation the year of construction. WGSI Measures 3.2-1 and 3.2-2 offset resulting losses to less-than-significant levels.

Additional land in orchard production may also be significantly impacted at the river bore sites if spoils are placed within the orchards, or if the bore pits encroach on orchard land. This would render the affected portions of orchards unfit for agricultural operations and would thus constitute a significant impact. WGSI Measure 3.2-1 partially mitigates resulting losses, which are considered significant.

Construction of the Delevan Interconnect Facility would temporarily occupy 0.5 acre of non-prime grazing/pastureland for laydown and staging. The Delevan Interconnect Facility would remove about 0.5 acre of non-prime grazing land from production. These are considered less-than-significant impacts.

During construction at both the Line 400/401 Connection Pipeline and the Delevan Interconnect Facility, potential exists for cattle to stray into the construction sites. The following proposed measure mitigates this impact to less-than-significant:

> **WGSI Measure 3.2-4.** Cattle grazing in the annual grasslands west of the Glenn-Colusa Canal will be excluded from the construction work area. This will be accomplished by a temporary solar-powered electric fence or other temporary fence along the ROW and minimizing open pipeline trench, or the rancher may elect to move the cattle to another grazing area during construction.

*Operations.* The permanent operational ROW is proposed to be 30-feet wide and would occupy about 85 acres of agricultural lands. To mitigate effects on agriculture, WGSI has proposed the following measure:

**WGSI Measure 3.2-5.** The installation of Line 400/401 Connection Pipeline with up to five feet of cover in agricultural areas will allow virtually all plowing and ripping practices currently utilized by farmers in the area.

A minimum 5-foot cover over the pipeline in agricultural areas should be enough cover to preclude impacts to the plowing, ripping, or minor field leveling practices of existing agricultural uses. However, major leveling, such as the conversion of contour rice fields to leveled fields, may adversely affect the necessary cover over the pipe. This reduced cover may increase the possibility for agricultural contact with the pipe, leading to a failure and potentially significant impacts. Thus, permanent restrictions on land use within the pipeline permanent easement are necessary for the safe operation of the pipeline. Easement documents restrict development within the easement area and also stipulate that the landowners may not diminish or substantially add to the cover of the pipe. As such, continued existing agricultural operations are anticipated within the permanent easement, although restrictions in land use would apply therein. This impact is considered to be less than significant.

At least one main line block valve lot would be required and would permanently occupy 50 feet by 50 feet of space. The maximum number of valve lots and their locations were not specified prior to design, but each of these lots, if located on prime cropland, would remove that land from production. This is considered a significant unavoidable and cumulative impact.

**Level of Significance Without Mitigation**

With the implementation of proposed WGSI Measures, the impact level is considered less-than-significant for:

- Temporary conversion of existing Prime Farmlands for staging and laydown during construction of the proposed facilities
- Restriction of access to agricultural areas
- Temporary and permanent conversion of 2.7 acres of wetland, a portion of which is used for cattle grazing
- Potential for livestock to stray into the Line 400/401 Connection Pipeline and Delevan Interconnect Facility construction areas
- A permanent easement along the Line 400/401 Connection Pipeline route which would restrict land use but allow continued agricultural operations
- Temporary conversion of 0.5 acres of pastureland for construction and permanent conversion of 0.5 acre of non-prime pastureland for operation of the Delevan Interconnect Facility

Impact level is considered significant for:

- The potential for damage to or removal of agricultural facilities such as fences, drainages conveyance features, water lines, and dikes during construction
- Possible restriction of pesticide application

- Possible straying of livestock into the Well Pad Site construction site
- Encroachment of bore spoils within orchard land
- Permanent removal of 5.8 acres of prime agricultural land from production at the Remote Facility
- The potential for permanent conversion of prime farmland into valve lots

Significant impacts may be reduced to the less-than-significant level through mitigation; however, permanent conversion of Prime Farmland to other uses at the Remote Facility and at the valve lots are considered unavoidable impacts, the losses of which cannot be mitigated to less-than-significant levels.

### Mitigation Measures

The following mitigation measures are proposed for significant impacts related to direct conversion of Prime Farmland into other uses:

**Mitigation Measure 3.2-1.** WGSI shall provide for drainage and irrigation water flow to continue by installing necessary pipes, valves, check dams, berms and dikes in strategic places in cooperation with landowners, farmers and ranchers.

**Mitigation Measure 3.2-2.** To mitigate restriction of access to Farmlands, WGSI shall, with proper construction practices, provide notice to affected farmers and/or ranchers, and access for the framers to communicate with the applicant's construction team on a 24-hour basis. Phone numbers shall be provided on a "hot-line" basis to remedy any such problems before they create losses.

**Mitigation Measure 3.2-3.** All restricted pesticide permit requirements as issued by the Butte County and Colusa County Agricultural Commissioner's offices shall be followed. WGSI shall coordinate with the landowner and both counties to assure that all permit requirements are met without unduly affecting or restricting the agricultural operations. These operations depend on timing of crop treatment to successfully bring crops to harvest. Construction workers may be required to work in other locations during pesticide application periods if the farmer is unable to apply pesticides outside of normal construction hours.

**Mitigation Measure 3.2-4.** Temporary fencing shall be provided in the grazing areas near the Well Pad Site to prevent livestock from straying into the construction areas and to maintain temporary pasture boundaries.

**Mitigation Measure 3.2-5.** Topsoil and subsoil removed during construction activities shall be separated and stockpiled in appropriate locations along the edge of ROW. All soil shall be replaced during backfilling and recontouring at the end of construction with topsoil being replaced last. On-site monitoring shall be conducted to ensure that stockpiling does occur, that topsoil and subsoil are stockpiled separately, that stockpiling is done so that there are no resulting adverse impacts to other farming activities (particularly in orchard areas), and that both subsoil and then topsoil is properly replaced. All construction trench and bore pit spoils shall be placed outside the driplines of all orchard trees and other trees.

**Mitigation Measure 3.2-6.** Impacts from the Remote Facility expansion shall be reduced by positioning block valves at the perimeter of cropland areas so that interference with planting, tillage, and harvesting is minimized.

**Level of Impact after Mitigation**

The proposed project would convert a minimum of 5.8 acres of Prime Farmland to non-agricultural lands. The project impacts for conversion of Prime Farmland into non-agriculture land remain significant after mitigation as losses at the Remote Facility and potentially the valve lot(s) cannot be mitigated to less-than-significant levels.

**Impact 3.2-2: Potential conflict with Existing Designated Land Uses**

The project is generally consistent with zoning and land use policies in both Butte and Colusa Counties; no conflicts with zoning and existing land uses are anticipated for the project.

**Well Pad Site.** The proposed Well Pad Site expansion is not expected to affect Williamson Act properties. As such, no impacts are anticipated from the Well Pad Site construction and expanded operation.

**Storage Loop Pipeline.** No impacts on Williamson Act properties are anticipated from the construction and operation of the Storage Loop Pipeline since the Storage Loop Pipeline route does not cross such properties.

**Remote Facility.** No impacts are anticipated from the construction and expanded operation of the Remote Facility as this site is not located on Williamson Act properties.

**Line 400/401 Connection Pipeline**. The proposed Line 400/401 Connection Pipeline route crosses three Williamson Act properties. As such, construction of the pipeline would cause a temporary but significant impact on these properties. WGSI is required to provide notice to the California Department of Conservation, as consistent with the statutory requirements in Government Code §51290 et. seq., if project components cross or affect lands subject to Williamson Act contracts. Further, the five-foot cover of the pipeline would enable continued agriculture operations during pipeline operation, although restrictions on field leveling would apply. Impacts to Williamson Act lands along the Line 400/401 Connection Pipeline are considered less-than-significant with implementation of the WGSI measures and notification to the Department of Conservation regarding affected properties.

Construction and operation of the Delevan Interconnect Facility would not significantly affect Williamson Act properties.

**Level of Significance without Mitigation**

Conflicts with Williamson Act land are considered to be significant due to permanent conversion of Williamson Act lands at the Well Pad Site.

**Mitigation Measures**

The following mitigation measure is proposed for significant impacts related to conflicts with lands under Williamson Act contract:

**Mitigation Measure 3.2-7.** WGSI shall submit payment of fair market value for crops removed from production by construction or operation of the project.

This measure, combined with the application of WGSI Measure 3.2-6, shall reduce this impact to a less-than-significant level.

**Impact 3.2-3: Indirect Conversion of Farmland to Non-Agricultural Use**

Silt-laden runoff that is not contained would have the potential to foul waterways, and should be carefully monitored in the field operations. Trench spoil sloughing outside the ROW may occur if wet soil conditions are encountered. Sloughing could intensify silt deposition into waterways within the irrigation areas, fields, and orchards. Siltation would be an adverse significant impact to crop production, but can be avoided.

Dust generation by access road use, grading, use of staging areas, ROW clearing, trenching, and backfilling may create adverse, significant, short-term impacts to crops and orchards.

Introduction of noxious weeds into the farming areas is not considered a significant impact since most landowners along the ROW practice herbicide application and noxious weeds such as yellow star thistle currently exist along access roads. However, if any organic crops are grown along access roads or ROW areas, monitoring shall assess conditions prior to construction, and WGSI shall be required to control any increase of noxious weed growth for the growing season after construction is completed.

**Well Pad Site** Construction and operation impacts associated with the project's implementation and the effects on the conversion of agricultural lands are described in the following paragraphs.

*Construction.* Less-than-significant adverse impacts are anticipated from siltation of agriculture waterways and dust generation during construction of the Well Pad Site.

*Operations.* No adverse impacts are anticipated during expanded operations of the Well Pad Site.

**Storage Loop Pipeline.** Construction and operation impacts associated with the project's implementation and the effects on the conversion of agricultural lands are described in the following paragraphs.

*Construction.* Adverse effects from silt-lade runoff and dust generation may occur in the rice fields adjacent to the construction ROW of the Storage Loop Pipeline. This is considered to be a significant adverse impact.

*Operations.* No adverse impacts are anticipated during expanded operations of the Storage Loop Pipeline.

**Remote Facility** Construction and operation impacts associated with the project's implementation and the effects on the conversion of agricultural lands are described in the following paragraphs.

*Construction.* Adverse effects from silt-lade runoff and dust generation may occur in the rice fields adjacent to the construction ROW of the Remote Facility Site. This is considered to be a significant adverse impact.

*Operations.* No adverse impacts are anticipated during expanded operations of the Remote Facility.

**Line 400/401 Connection Pipeline** Construction and operation impacts associated with the project's implementation and the effects on the conversion of agricultural lands are described in the following paragraphs.

*Construction.* Adverse effects from silt-laden runoff and dust generation may occur in the rice fields, row crop fields, and pasturelands adjacent to the construction ROW of the Line 400/401 Connection Pipeline. This is considered to be a significant adverse impact.

Isolation of a cattle watering trough on the south side of the ROW area near the Delevan Compression Station may occur during construction and would create a significant adverse impact on grazing operations in that area if not avoided.

*Operations.* No adverse impacts are anticipated during expanded operations of the Line 400/401 Connection Pipeline or Delevan Interconnect Facility.

### Level of Impact without Mitigation

The level of adverse impacts on agricultural land due to resulting changes to the environment is considered significant.

### Mitigation Measures

Application of the proposed mitigation measures would reduce the level of adverse impact to agricultural lands to a less-than-significant level.

The following measures are proposed for adverse impacts on agricultural lands:

> **Mitigation Measure 3.2-8.** Silt fencing and/or straw bale barriers shall be placed along the edge of ROW to prevent silt-laden runoff and wet soil sloughing from occurring outside the ROW area.
>
> **Mitigation Measure 3.2-9.** On-site monitoring during these activities and sufficient use of water trucks for spraying dust-generating areas (ROW, access roads, pads, staging areas, etc.) shall be performed to mitigate this potential impact to less than significant levels. Pre-planning for water truck scheduling shall be required during construction activities, and training and monitoring of construction and water truck crews shall also be required.
>
> **Mitigation Measure 3.2-10.** If any organic crops are grown along access roads or ROW areas, monitoring shall be performed to assess conditions prior to construction, and WGSI

shall control any increase of noxious weed growth for the growing season after construction is completed.

**Mitigation Measure 3.2-12.** To mitigate significant adverse effects on cattle grazing, WGSI shall provide two cattle water troughs, one north and another south of the ROW from west of the Glenn-Colusa Canal to the Delevan Compressor Station.