



**California Regional Water Quality Control Board
North Coast Region
Bob Anderson, Chairman**



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Secretary for
Environmental Protection

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**Arnold
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Governor

APPENDIX G

ENVIRONMENTAL FACTORS POTENTIALLY AFFECTED:

The environmental factors checked below would be potentially affected by this project, involving at least one impact that is a "Potentially Significant Impact" as indicated by the checklist on the following pages.

Aesthetics	Agriculture Resources	<input checked="" type="checkbox"/> Air Quality
Biological Resources	Cultural Resources	Geology /Soils
<input checked="" type="checkbox"/> Hazards & Hazardous Materials	<input checked="" type="checkbox"/> Hydrology / Water Quality	Land Use / Planning
Mineral Resources	<input checked="" type="checkbox"/> Noise	Population / Housing
Public Services	Recreation	Transportation/Traffic
Utilities / Service Systems	Mandatory Findings of Significance	

DETERMINATION: (To be completed by the Lead Agency)
On the basis of this initial evaluation:

- I find that the proposed project **COULD NOT** have a significant effect on the environment, and a **NEGATIVE DECLARATION** will be prepared.
- X** I find that although the proposed project could have a significant effect on the environment, there will not be a significant effect in this case because revisions in the project have been made by or agreed to by the project proponent. A **MITIGATED NEGATIVE DECLARATION** will be prepared.
- I find that the proposed project **MAY** have a significant effect on the environment, and an **ENVIRONMENTAL IMPACT REPORT** is required.
- I find that the proposed project **MAY** have a "potentially significant impact" or "potentially significant unless mitigated" impact on the environment, but at least one effect 1) has been adequately analyzed in an earlier document pursuant to applicable legal standards, and 2) has been addressed by mitigation measures based on the earlier analysis as described on attached sheets. An **ENVIRONMENTAL IMPACT REPORT** is required, but it must analyze only the effects that remain to be addressed.

I find that although the proposed project could have a significant effect on the environment, because all potentially significant effects (a) have been analyzed adequately in an earlier EIR or NEGATIVE DECLARATION pursuant to applicable standards, and (b) have been avoided or mitigated pursuant to that earlier EIR or NEGATIVE DECLARATION, including revisions or mitigation measures that are imposed upon the proposed project, nothing further is required.

Signature

Date

EVALUATION OF ENVIRONMENTAL IMPACTS:

- 1) A brief explanation is required for all answers except "No Impact" answers that are adequately supported by the information sources a lead agency cites in the parentheses following each question. A "No Impact" answer is adequately supported if the referenced information sources show that the impact simply does not apply to projects like the one involved (e.g., the project falls outside a fault rupture zone). A "No Impact" answer should be explained where it is based on project-specific factors as well as general standards (e.g., the project will not expose sensitive receptors to pollutants, based on a project-specific screening analysis).
- 2) All answers must take account of the whole action involved, including off-site as well as on-site, cumulative as well as project-level, indirect as well as direct, and construction as well as operational impacts.
- 3) Once the lead agency has determined that a particular physical impact may occur, then the checklist answers must indicate whether the impact is potentially significant, less than significant with mitigation, or less than significant. "Potentially Significant Impact" is appropriate if there is substantial evidence that an effect may be significant. If there are one or more "Potentially Significant Impact" entries when the determination is made, an EIR is required.
- 4) "Negative Declaration: Less Than Significant With Mitigation Incorporated" applies where the incorporation of mitigation measures has reduced an effect from "Potentially Significant Impact" to a "Less Than Significant Impact." The lead agency must describe the mitigation measures, and briefly explain how they reduce the effect to a less than significant level (mitigation measures from Section XVII, "Earlier Analyses," may be cross-referenced).
- 5) Earlier analyses may be used where, pursuant to the tiering, program EIR, or other CEQA process, an effect has been adequately analyzed in an earlier EIR or negative declaration. Section 15063(c)(3)(D). In this case, a brief discussion should identify the following:
 - a) Earlier Analysis Used. Identify and state where they are available for review.
 - b) Impacts Adequately Addressed. Identify which effects from the above checklist were within the scope of and adequately analyzed in an earlier document pursuant to applicable legal standards, and state whether such effects were addressed by mitigation measures based on the earlier analysis.

- c) Mitigation Measures. For effects that are "Less than Significant with Mitigation Measures Incorporated," describe the mitigation measures which were incorporated or refined from the earlier document and the extent to which they address site-specific conditions for the project.
- 6) Lead agencies are encouraged to incorporate into the checklist references to information sources for potential impacts (e.g., general plans, zoning ordinances). Reference to a previously prepared or outside document should, where appropriate, include a reference to the page or pages where the statement is substantiated.
- 7) Supporting Information Sources: A source list should be attached, and other sources used or individuals contacted should be cited in the discussion.
- 8) This is only a suggested form, and lead agencies are free to use different formats; however, lead agencies should normally address the questions from this checklist that are relevant to a project's environmental effects in whatever format is selected.
- 9) The explanation of each issue should identify:
 - a) the significance criteria or threshold, if any, used to evaluate each question; and
 - b) the mitigation measure identified, if any, to reduce the impact to less than significance

Issues:

Initial Study Checklist

	Potentially Significant Impact	Less Than Significant With Mitigation Incorporation	Less Than Significant Impact	No Impact
I. AESTHETICS -- Would the project:				
a) Have a substantial adverse effect on a scenic vista?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
The project will not have an adverse effect on scenic vista (1).				
b) Substantially damage scenic resources, including, but not limited to, trees, rock outcroppings, and historic buildings within a state scenic highway?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
The project site is not within sight of a scenic highway (3)				
c) Substantially degrade the existing visual character or quality of the site and its surroundings?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
The existing visual character of the project site and its surroundings will not be altered. (1)				
d) Create a new source of substantial light or glare which would adversely affect day or nighttime views in the area?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
The project site will not create a new source of light or glare. (1)				

	Less Than Significant			
	Potentially Significant Impact	With Mitigation Incorporation	Less Than Significant Impact	No Impact

II. AGRICULTURE RESOURCES: In determining whether impacts to agricultural resources are significant environmental effects, lead agencies may refer to the California Agricultural Land Evaluation and Site Assessment Model (1997) prepared by the California Dept. of Conservation as an optional model to use in assessing impacts on agriculture and farmland. Would the project:

a) Convert 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?

The project will not convert Prime Farmland, Unique Farmland or Farmland of Statewide Importance (19)

b) Conflict with existing zoning for agricultural use, or a Williamson Act contract?

This project does not conflict with an existing zoning for agricultural use or a Williamson Act contract (19)

c) Involve other changes in the existing environment which, due to their location or nature, could result in conversion of Farmland, to non-agricultural use?

This project will not involve a conversion of Farmland (1, 2).

	Less Than Significant			
	Potentially Significant Impact	With Mitigation Incorporation	Less Than Significant Impact	No Impact

III. AIR QUALITY -- Where available, the significance criteria established by the applicable air quality management or air pollution control district may be relied upon to make the following determinations. Would the project:

a) Conflict with or obstruct implementation of the applicable air quality plan?

The location of the project site is in the boundaries of the Bay Area Air Management District. The project does not violate the BAAQMD 2000 Clean Air Plan (1, 4).

b) Violate any air quality standard or contribute substantially to an existing or projected air quality violation?

The project could result in the temporary generation of hydrogen sulfide gas. The BAAQMD has an air quality standard for hydrogen sulfide gas of 0.03 parts per million (ppm) or 42 µg/m³ (1 hour average). Although the project may result in the generation of hydrogen sulfide gas, it is unlikely (5). Other past projects using similar technologies within the jurisdiction of the Regional Water Board did not generate hydrogen sulfide gas. However, the Regional Water Board does require the sampling of hydrogen sulfide gas during the project activities. In the event hydrogen sulfide gas is generated and found above the air quality standard, the BAAQMD will be notified for appropriate enforcement of their air quality control plan.

The BAAQMD has an air quality standard for particulate matter (PM10) of 50 µg/m³ (24-hour average). Dust will be temporarily generated from vehicles and heavy equipment on-site, but for a minimal amount of time. The generation of dust will be insignificant and will not violate air quality standards for particulate matter (1,2).

The BAAQMD has an air quality standard of 0.010 ppm or 26 µg/m³ (24-hour average) for vinyl chloride. The project could result in the generation and emission of vinyl chloride gas, but is unlikely (5). Other past projects using similar technologies within the the jurisdiction of the Regional Water Board did not detect vinyl chloride gas in ambient air. In the event vinyl chloride is detected above 0.010 ppmv the BAAQMD will be notified for appropriate enforcement of their air quality control plan.

c) Result in a cumulatively considerable net increase of any criteria pollutant for which the project region is non-attainment under an applicable federal or state ambient air quality standard (including releasing emissions which exceed quantitative thresholds for ozone precursors)?

Refer to III(a) and III(b) above. The proposed project will not result in a cumulatively considerable net increase of any criteria pollutant. There may be a temporary increase from project activities, but will be limited and cease upon project completion (2,5).

d) Expose sensitive receptors to substantial pollutant concentrations?

There are no odors associated with the injection of Hydrogen Release Compound-Advance (1). There are, however odors associated with hydrogen sulfide gas. As described in section III (a) and III (b) above, the generation of

hydrogen sulfide gas is unlikely. In the event that hydrogen sulfide gas is generated, the amount will be minimal and temporary. Therefore, the impact of odors on sensitive receptors will be insignificant (1, 2, 5, 14).

e) Create objectionable odors affecting a substantial number of people?

See III (d) above.

		Less Than Significant		
	Potentially Significant Impact	With Mitigation Incorporation	Less Than Significant Impact	No Impact

IV. BIOLOGICAL RESOURCES -- Would the project:

a) Have a substantial adverse effect, either directly or through habitat modifications, on any species identified as a candidate, sensitive, or special status species in local or regional plans, policies, or regulations, or by the California Department of Fish and Game or U.S. Fish and Wildlife Service?

	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
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There are no sensitive species identified at the project site (8).

b) Have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, regulations or by the California Department of Fish and Game or US Fish and Wildlife Service?

	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
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The project will not have an impact on riparian habitat (1, 2, 5, 14)

c) Have a substantial adverse effect on federally protected wetlands as defined by Section 404 of the Clean Water Act (including, but not limited to, marsh, vernal pool, coastal, etc.) through direct removal, filling, hydrological interruption, or other means?

	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
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The project location is not on or in the area of identified federally protected wetlands (9).

d) Interfere substantially with the movement of any native resident or migratory fish or wildlife species or with established native resident or migratory wildlife corridors, or impede the use of native wildlife nursery sites?

	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
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This project will not interfere with the movement of any native resident or migratory fish or wildlife (1, 2, 5, 14)

e) Conflict with any local policies or ordinances protecting biological resources, such as a tree preservation policy or ordinance?

	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
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The project does not conflict with any local policies or ordinances protecting biological resources (9).

f) Conflict with the provisions of an adopted Habitat Conservation Plan, Natural Community Conservation Plan, or other approved local, regional, or state habitat conservation plan?

	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
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The project does not conflict with provisions of any habitat conservation plan or natural community conservation plan (9, 17, 18)

		Less Than Significant		
	Potentially Significant Impact	With Mitigation Incorporation	Less Than Significant Impact	No Impact

V. CULTURAL RESOURCES -- Would the project:

a) Cause a substantial adverse change in the significance of a historical resource as defined in §15064.5?

There are no identified historical resources at the project site (2, 6, 7, 8)

b) Cause a substantial adverse change in the significance of an archaeological resource pursuant to §15064.5?

There are no archaeological resources identified at this project location (2, 8). Additionally, there is no digging associated with this project. The injection of organic food grade substrate will be conducted by drilling a small, temporary, hole. Even if such resources are present (but unknown), the potential for encountering is extremely small.

c) Directly or indirectly destroy a unique paleontological resource or site or unique geologic feature?

There are no paleontological resources or unique geologic features at this project location (8). See V(b) above.

d) Disturb any human remains, including those interred outside of formal cemeteries?

No burial sites are known in the vicinity of the project site (1, 2, 8). In the unlikely event that any human remains are unearthed during the project, state law requires that the County Coroner be notified to investigate the nature and circumstances of the discovery. At the time of discovery, work in the immediate area would cease until the coroner permitted work to proceed. If the remains were determined to be prehistoric, the find would be treated as an archaeological site

	Less Than Significant			
	Potentially Significant Impact	With Mitigation Incorporation	Less Than Significant Impact	No Impact

VI. GEOLOGY AND SOILS -- Would the project:

a) Expose people or structures to potential substantial adverse effects, including the risk of loss, injury, or death involving:

i) Rupture of a known earthquake fault, as delineated on the most recent Alquist-Priolo Earthquake Fault Zoning Map issued by the State Geologist for the area or based on other substantial evidence of a known fault? Refer to Division of Mines and Geology Special Publication 42.

	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
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The project is located within the Rogers Creek Fault and is identified in an “area of violent ground shaking during an earthquake.” The project, however, will not have a direct impact or contribute any additional ramifications in the event of an earthquake. In the rare event that an earthquake strikes during the duration of the project, the project Health and Safety Plan will be utilized for further information (1, 2, 9).

ii) Strong seismic ground shaking?

	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
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The project will not cause strong seismic ground shaking (1, 2, 5)

iii) Seismic-related ground failure, including liquefaction?

	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
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The project will not result in seismic related ground failure, including liquification (1, 2, 5)

iii) Landslides?

	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
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The project will not result in landslides (1, 2, 5, 9, 20)

b) Result in substantial soil erosion or the loss of topsoil?

	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
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The project will not result in erosion or the loss of topsoil (1, 2, 5)

c) Be located on a geologic unit or soil that is unstable, or that would become unstable as a result of the project, and potentially result in on- or off-site landslide, lateral spreading, subsidence, liquefaction or collapse?

	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
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The project is not located on unstable soil, nor would the become unstable as a result of the project (1, 2, 5, 8).

d) Be located on expansive soil, as defined in Table 18-1-B of the Uniform Building Code (1994), creating substantial risks to life or property?

	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
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Table 18-1-B of the Uniform Building Code (1994) is an index of relative expansive properties of soil as determined through laboratory testing. Soil at the project site have not been tested, as this project does not include the construction of any buildings.

e) Have soils incapable of adequately supporting the use of septic tanks or alternative waste water disposal systems where sewers are not available for the disposal of waste water?

Soil suitability testing for waste water disposal systems has not been conducted and does not need to be conducted as part of this project (1, 2)

	Less Than Significant			
Potentially Significant Impact	With Mitigation Incorporation	Less Than Significant Impact	No Impact	

VII. HAZARDS AND HAZARDOUS MATERIALS –

Would the project:

- a) Create a significant hazard to the public or the environment through the routine transport, use, or disposal of hazardous materials?

The project is being conducted to remediate contaminated soil and groundwater. The project includes initially drilling twenty-two borings, which will result in the removal of soil potentially impacted with hazardous materials. Drill cuttings generated during the project will be properly handled, including proper disposal at the US Filter Recovery Services in Vernon, California. The amount of drill cuttings generated is minimal and will not create a significant hazard to the public or the environment. The project will also result in the generation of potentially contaminated groundwater from purging groundwater monitoring wells and decontamination water. Purge water and decontamination water will also be disposed of on-site using the existing groundwater extraction and treatment system. (1,2)

- b) Create a significant hazard to the public or the environment through reasonably foreseeable upset and accident conditions involving the release of hazardous materials into the environment?

Hydrogen Sulfide Gas and Vinyl Chloride Gas

The project site is impacted with a significant amount of contamination. The use of an organic food-grade substrate has proven to effectively remediate soil and groundwater contamination and not cause significant adverse environmental effects. The project can potentially generate hydrogen sulfide gas and vinyl chloride gas. Based on other case studies, the generation of hydrogen gas and vinyl chloride in the atmosphere is unlikely [see III (a)]. Air monitoring of hydrogen sulfide gas and vinyl chloride are required. In the event either hydrogen sulfide gas or vinyl chloride is detected above BAAQMD standards the detections will be referred to the BAAQMD.

Methane

Additionally, methane gas may also be generated during this project. Methane is not a constituent of concern in the BAAQMD air quality plan and therefore does not have an applicable standard. However, methane can potentially be produced at levels of explosive conditions and will be monitored for worker health and safety. Operations at the site will be conducted in accordance with the site Health and Safety plan.

Vinyl Chloride

Although it is anticipated vinyl chloride will result in groundwater as a by-product of dechlorination during the project, vinyl chloride itself will also be destroyed during the remedial activities. Therefore the generation of vinyl chloride in groundwater will be temporary and will not create a significant impact.

Mitigation Measure #1

Vinyl chloride will be analyzed in groundwater during pre- and post-injection events to determine any significant increases in concentrations or to determine significant migration. In the event vinyl chloride appears to be migrating or vinyl chloride concentrations seem to remain at elevated levels, the Discharger will

activate the existing groundwater extraction and treatment system (GETS) to control any unwanted migration.

Iron and Manganese

The project also has the potential to mobilize iron and manganese. The pilot study showed evidence of an increase in these metals. Continued sampling after the injection events indicated a decrease in iron and manganese to pre-injection conditions. Based on the pilot study results, the mobilization of these metals will be temporary and insignificant.

Mitigation Measure #2

Iron and Manganese sampling will take place during pre- and post-injection monitoring events to determine any significant increases in concentration or to determine significant migration. In the event iron or manganese appears to be migrating or concentrations seem to remain at elevated levels, the Discharger will activate the existing GETS for migration control.

c) Emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school?

The project is located within one-quarter mile of Santa Rosa High School. As described in section III and VII above, there is no significant impact to people or the environment as a result of potential air and water emissions of hazardous materials. The school, although recognized as a sensitive environmental area, will not be impacted as a result of the project.

d) Be located on a site which is included on a list of hazardous materials sites compiled pursuant to Government Code Section 65962.5 and, as a result, would it create a significant hazard to the public or the environment?

This project is being conducted on a hazardous materials site listed pursuant to Government Code Section 65962.5 (10). However, the project is anticipated to remediate identified hazardous materials and therefore will have a positive impact on the site, public and the environment.

e) For a project located within an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public use airport, would the project result in a safety hazard for people residing or working in the project area?

The project is not located within an airport land use plan (11).

f) For a project within the vicinity of a private airstrip, would the project result in a safety hazard for people residing or working in the project area?

The project is not located within the vicinity of a private airstrip (7).

g) Impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan?

The project will not interfere with the adopted emergency response plan (1, 2, 12).

h) Expose people or structures to a significant risk of loss, injury or death involving wildland fires, including where wildlands are adjacent to urbanized areas or where residences are intermixed with wildlands?

		Less Than Significant		
	Potentially Significant Impact	With Mitigation Incorporation	Less Than Significant Impact	No Impact

VIII. HYDROLOGY AND WATER QUALITY -- Would the project:

a) Violate any water quality standards or waste discharge requirements?

Draft Waste Discharge Requirements will be considered for adoption for this project. The draft Waste Discharge Requirements will be considered for adoption at the April 24, 2008 Regional Water Board meeting. No violations of water quality standards or the draft Waste Discharge Requirements are anticipated to result from the project (1, 2, 13).

b) Substantially deplete groundwater supplies or interfere substantially with groundwater recharge such that there would be a net deficit in aquifer volume or a lowering of the local groundwater table level (e.g., the production rate of pre-existing nearby wells would drop to a level which would not support existing land uses or planned uses for which permits have been granted)?

Extraction of groundwater proposed as part of this project is limited to purging groundwater monitoring wells and implementation of the GETS, if needed, for hydraulic control of contaminant migration off-site. The amount of water purged from each monitoring well is minimal and will not have an impact on the groundwater supply. The GETS is operated in accordance with the existing Regional Water Board NPDES permit, Order No. R1-2006-0048. Injection activities may temporarily result in an increase to the project areas groundwater elevation. Monitoring will include measurements of depth to groundwater. Any change in groundwater elevation will be temporary and insignificant. (1, 2)

c) Substantially alter the existing drainage pattern of the site or area, including through the alteration of the course of a stream or river, in a manner which would result in substantial erosion or siltation on- or off-site?

The project will not alter the exiting drainage pattern (1,2)

d) Substantially alter the existing drainage pattern of the site or area, including through the alteration of the course of a stream or river, or substantially increase the rate or amount of surface runoff in a manner which would result in flooding on- or off-site?

The project will not alter the existing drainage pattern (1,2)

e) Create or contribute runoff water which would exceed the capacity of existing or planned stormwater drainage systems or provide substantial additional sources of polluted runoff?

The project will not create or contribute runoff. (1,2)

f) Otherwise substantially degrade water quality?

Water quality at the site exceeds Water Quality Objectives. The project is designed to improve water quality. While the project will alter existing water quality, the project is designed to reduce groundwater toxicity and cleanup the aquifer (1, 2, 14, 15)

g) Place housing within a 100-year flood hazard area as mapped on a federal Flood Hazard Boundary or Flood Insurance Rate Map or other flood hazard delineation map?

The project does not include residential development (1,2). The project is not located within a 100-year flood hazard area (9, 16)

h) Place within a 100-year flood hazard area structures which would impede or redirect flood flows?

The project does not include the construction of any structures (1). The project is not located within a 100-year flood hazard (9, 16).

i) Expose people or structures to a significant risk of loss, injury or death involving flooding, including flooding as a result of the failure of a levee or dam?

People on the project site will not be exposed to flooding or the failure of a levee or dam (1, 2).

j) Inundation by seiche, tsunami, or mudflow?

The project site is not subject to seiche, tsunami, or mudflow (1, 2)

	Potentially Significant Impact	Less Than Significant With Mitigation Incorporation	Less Than Significant Impact	No Impact
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IX. LAND USE AND PLANNING - Would the project:

a) Physically divide an established community?

<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
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The project will not divide a community (1, 2).

b) Conflict with any applicable land use plan, policy, or regulation of an agency with jurisdiction over the project (including, but not limited to the general plan, specific plan, local coastal program, or zoning ordinance) adopted for the purpose of avoiding or mitigating an environmental effect?

<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
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The project will not conflict with any applicable land use plan, policy, or regulation (1, 9).

c) Conflict with any applicable habitat conservation plan or natural community conservation plan?

<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
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The project will not conflict with any applicable habitat conservation plan or natural community conservation plan (17, 18).

	Less Than Significant			
	Potentially Significant Impact	With Mitigation Incorporation	Less Than Significant Impact	No Impact

X. MINERAL RESOURCES -- Would the project:

a) Result in the loss of availability of a known mineral resource that would be of value to the region and the residents of the state?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
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There are no know mineral resources of value at the project site (2,8).

b) Result in the loss of availability of a locally-important mineral resource recovery site delineated on a local general plan, specific plan or other land use plan?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
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There are no known mineral resources of value at the project site (2,8)

	Less Than Significant			
	Potentially Significant Impact	With Mitigation Incorporation	Less Than Significant Impact	No Impact

XI. NOISE –

Would the project result in:

a) Exposure of persons to or generation of noise levels in excess of standards established in the local general plan or noise ordinance, or applicable standards of other agencies?

The project will not result in exposure of persons to or generation of noise levels in excess of standards. The noise from the project is limited to a drill rig, or similar injection technology, used during normal business hours for a limited number of days (9).

b) Exposure of persons to or generation of excessive groundborne vibration or groundborne noise levels?

The project will not generate excessive groundborne vibrations (1, 2, 15)

c) A substantial permanent increase in ambient noise levels in the project vicinity above levels existing without the project?

The project will not create a permanent increase in ambient noise levels. The project is proposed to be conducted over the course of a few days, once a year, for two years. (1, 2, 15)

d) A substantial temporary or periodic increase in ambient noise levels in the project vicinity above levels existing without the project?

The project involves the use of a drill rig to advance soil borings. Increase with ambient noise will be temporary and for a limited amount of time. Neighboring residents and businesses may be affected by increased noise. However, the project will be conducted according to the City of Santa Rosa’s noise requirements and will be temporary and limited due to the length of the project. (1, 2, 9)

e) For a project located within an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public use airport, would the project expose people residing or working in the project area to excessive noise levels?

The project is not located within an airport land use plan (11).

f) For a project within the vicinity of a private airstrip, would the project expose people residing or working in the project area to excessive noise levels?

The project is not located within the vicinity of a private airstrip.

	Potentially Significant Impact	Less Than Significant With Mitigation Incorporation	Less Than Significant Impact	No Impact
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XII. POPULATION AND HOUSING -- Would the project:

a) Induce substantial population growth in an area, either directly (for example, by proposing new homes and businesses) or indirectly (for example, through extension of roads or other infrastructure)?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
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The project will not have a direct or indirect effect on population (1, 6).

b) Displace substantial numbers of existing housing, necessitating the construction of replacement housing elsewhere?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
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No housing will be displaced by the project (1, 2)

c) Displace substantial numbers of people, necessitating the construction of replacement housing elsewhere?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
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No people will be displaced by the project (1, 2)

	Less Than Significant		
Potentially Significant Impact	With Mitigation Incorporation	Less Than Significant Impact	No Impact

XIII. PUBLIC SERVICES

a) Would the project result in substantial adverse physical impacts associated with the provision of new or physically altered governmental facilities, need for new or physically altered governmental facilities, the construction of which could cause significant environmental impacts, in order to maintain acceptable service ratios, response times or other performance objectives for any of the public services:

Fire protection?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
Police protection?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
Schools?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
Parks?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
Other public facilities?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

The project does not involve the increase in infrastructure and therefore will not have an impact to the increased need for public services (1, 2).

	Potentially Significant Impact	Less Than Significant With Mitigation Incorporation	Less Than Significant Impact	No Impact
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XIV. RECREATION –

a) Would the project increase the use of existing neighborhood and regional parks or other recreational facilities such that substantial physical deterioration of the facility would occur or be accelerated?

<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
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The project will not increase the use of existing neighborhood, regional parks, or any other recreational facilities (1, 2)

b) Does the project include recreational facilities or require the construction or expansion of recreational facilities which might have an adverse physical effect on the environment?

<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
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The project does not include recreational facilities or require the construction or expansion of such facilities (1, 2)

	Less Than Significant			
	Potentially Significant Impact	With Mitigation Incorporation	Less Than Significant Impact	No Impact

XV. TRANSPORTATION/TRAFFIC -- Would the project:

a) Cause an increase in traffic which is substantial in relation to the existing traffic load and capacity of the street system (i.e., result in a substantial increase in either the number of vehicle trips, the volume to capacity ratio on roads, or congestion at intersections)

The project will not cause a substantial increase in traffic (1, 2).

b) Exceed, either individually or cumulatively, a level of service standard established by the county congestion management agency for designated roads or highways?

The project will not exceed a level of service standard for designated roads or highways.

c) Result in a change in air traffic patterns, including either an increase in traffic levels or a change in location that results in substantial safety risks?

The project will not cause a change in air traffic patterns, including either an increase in traffic levels or a change in the location that results in substantial safety risks (1, 2),

d) Substantially increase hazards due to a design feature (e.g., sharp curves or dangerous intersections) or incompatible uses (e.g., farm equipment)?

The project will not include hazardous design features or incompatible uses (1, 2)

e) Result in inadequate emergency access?

The project will not result in inadequate emergency access (1, 2)

f) Result in inadequate parking capacity?

The project will not result in inadequate parking (1, 2)

g) Conflict with adopted policies, plans, or programs supporting alternative transportation (e.g., bus turnouts, bicycle racks)?

The project will not conflict with adopted policies, plans or programs supporting alternative transportation (1, 2)

	Less Than Significant			
	Potentially Significant Impact	With Mitigation Incorporation	Less Than Significant Impact	No Impact

XVI. UTILITIES AND SERVICE SYSTEMS –

Would the project:

- a) Exceed wastewater treatment requirements of the applicable Regional Water Quality Control Board?

The project will not exceed wastewater treatment requirements of the Regional Water Board (1, 2, 5).

- b) Require or result in the construction of new water or wastewater treatment facilities or expansion of existing facilities, the construction of which could cause significant environmental effects?

The project will not result in the construction of new water or wastewater treatment facilities or expansion of such facilities (1, 2).

- c) Require or result in the construction of new storm water drainage facilities or expansion of existing facilities, the construction of which could cause significant environmental effects?

The project will not require the construction of new storm water drainage facilities or expansion of such facilities (1, 2)

- d) Have sufficient water supplies available to serve the project from existing entitlements and resources, or are new or expanded entitlements needed?

The project does not include the need for water supply (1, 2)

- e) Result in a determination by the wastewater treatment provider which serves or may serve the project that it has adequate capacity to serve the project's projected demand in addition to the provider's existing commitments?

The project will not need to be served by the local wastewater treatment facility (1, 2)

- f) Be served by a landfill with sufficient permitted capacity to accommodate the project's solid waste disposal needs?

Soil drill cuttings will be stored on-site in 55-gallon drums pending characterization for disposal at the US Filter Recovery Services in Vernon, California. Decontamination water and purged well development groundwater will be disposed of on-site using the existing groundwater treatment system.

- g) Comply with federal, state, and local statutes and regulations related to solid waste?

All proposed disposal methods are in compliance with all regulations related to solid waste.

	Less Than Significant		
Potentially Significant Impact	With Mitigation Incorporation	Less Than Significant Impact	No Impact

XVII. MANDATORY FINDINGS OF SIGNIFICANCE –

a) Does the project have the potential to degrade the quality of the environment, substantially reduce the habitat of a fish or wildlife species, cause a fish or wildlife population to drop below self-sustaining levels, threaten to eliminate a plant or animal community, reduce the number or restrict the range of a rare or endangered plant or animal or eliminate important examples of the major periods of California history or prehistory?

<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
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b) Does the project have impacts that are individually limited, but cumulatively considerable? (“Cumulatively considerable” means that the incremental effects of a project are considerable when viewed in connection with the effects of past projects, the effects of other current projects, and the effects of probable future projects)?

<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
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The injection of organic, food-grade substrate associated with this project to remediate groundwater contamination, when viewed along with the other site activities, including past operations of the GETS, and other past soil and groundwater cleanup activities, and probable future cleanup activities, generates no significant cumulative impacts.

c) Does the project have environmental effects which will cause substantial adverse effects on human beings, either directly or indirectly?

<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
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1. Regional Water Board staff evaluation based on review of the project and project description.
2. Regional Water Board staff evaluation of impact based on past experience.
3. California Scenic Highway Mapping System.
4. Bay Area Air Quality Management Districts, 2000 Clean Air Plan.
5. Other sites where similar technologies are performed.
6. City of Santa Rosa's Historic Preservation Program.
7. City of Santa Rosa's GIS Maps, Historical Preservation Boundaries.
8. Regional Water Board files, Union Pacific Railroad, site file record, Volumes 1 through 12 and Correspondence records 1 through 35.
9. City of Santa Rosa, General Plan,.
10. California Environmental Protection Agency, Cortese List Data Resource
11. Sonoma County Airport-Master Plan
12. City of Santa Rosa, Emergency Operations Plan
13. Draft Waste Discharge Requirements Order No. R1-2008-0033
14. CH2MHill, *In-Situ Remediation Pilot Study Report*, May 14, 2007
15. CH2MHill, *Interim Remedial Action Work Plan*, August 24, 2007
16. FEMA maps
17. Sonoma County Water Agency, Water Conservation Plan
18. Santa Rosa Plain Conservation Strategy Team, Santa Rosa Plain Conservation Strategy-December 1, 2005.
19. California Agricultural LESA Worksheets
20. Soil Survey for Sonoma County