

California Regional Water Quality Control Board
North Coast Region

CLEANUP AND ABATEMENT ORDER NO. R1-2010-0036

for

Gerald Bendix,
Hi-Ridge Lumber Company
and
Cliff Brown, Doing Business as
Phillipe Lane Industrial Park, Incorporated

329 South Phillipe Lane
Yreka, California

Siskiyou County

The California Regional Water Quality Control Board, North Coast Region (hereinafter Regional Water Board), finds that:

1. Hi-Ridge Lumber Company formerly operated a sawmill and a planing mill facility at 329 South Phillipe Lane in Yreka. Several assessor parcels of property at this address were associated with Hi-Ridge Lumber Company's business operations. Assessor Parcel number 053-681-070 contained the majority of former business operations and is hereinafter referred to as the "Site." Hi-Ridge Lumber Company; Gerald Bendix, former owner and operator of Hi-Ridge Lumber Company; and Cliff Brown, current owner of the Site and doing business as Phillipe Lane Industrial Park, Incorporated are collectively hereinafter referred to as "Dischargers."
2. Wood treatment chemicals containing polychlorinated phenols were historically applied to lumber at the former green chain location of the Site. Pentachlorophenol (PCP) and tetrachlorophenol (TCP) were among the compounds contained in the wood treatment chemicals.
3. Polychlorinated phenols inherently contain persistent organic pollutants as impurities. The impurities include polychlorinated dioxin and furan congeners (collectively hereinafter referred to as "dioxins"), which are listed by the United States Environmental Protection Agency (US EPA) as "priority persistent bioaccumulative and toxic chemicals." The water quality objective for inland surface water identified by the California Toxics Rule for dioxin is $0.13E^{-7}$ parts per billion (ppb). The water quality objective for groundwater is $0.027E^{-7}$ ppb.
4. Storm water runoff from the Site historically contained wood treatment chemicals. The most recent water sampling data indicate contaminated storm water runoff continues to be discharged unabated during significant precipitation events. On March 20, 2003, surface water sample test results showed maximum concentrations of PCP and TCP at 150.0 ug/L and 88.0 ug/L, respectively. The surface water quality objective for PCP is 0.27 ug/L, and for TCP is 1.0 ug/L. Storm water from the Site discharges to a ditch at the eastern property boundary that leads to the Shasta River, approximately 1.3 miles northwest of the mill. Although Hi-Ridge Lumber

Company has been closed since 1999, Industrial Storm Water Permit No. 147S005403 remains active.

5. On October 3, 2002, the Executive Officer issued Cleanup and Abatement Order No. R1-2002-0097 (Order 97) requiring investigation and cleanup of the discharges at the Site. On June 13, 2003, in response to Order 97, the Dischargers submitted a workplan for investigation of contamination at the Site. An addendum to this workplan was submitted on August 18, 2003. The Dischargers then failed to implement the workplan and workplan addendum for the Site.
6. The presence of wood treatment chemicals in storm water discharge is a threat to surface waters and indicates a potential threat or impact to groundwater. Past subsurface investigations at the Site have encountered groundwater contaminated with wood treatment chemicals.
7. Hi-Ridge Lumber Company's historical business operations also included the storage and use of various chemicals or hazardous substances, including but not limited to diesel, gasoline, various oils, paint and related substances, and dielectric oil associated with polychlorinated biphenyls (PCBs).
8. The Regional Water Board adopted Waste Discharge Requirements Order No. 88-5 for Hi-Ridge Lumber Company on March 24, 1988. The portions of Order No. 88-5 that are being violated are:
 - "A. Prohibitions:
 2. There shall be no discharge of wood treatment chemicals or stain control fungicides to surface water or to groundwater."
 - "C. Receiving Water Limitation:
 1. The discharge shall not cause the receiving waters to contain toxic substances in concentrations that are toxic to, or that produce detrimental physiological responses in human, plant, animal, or aquatic life."
9. Cleanup and Abatement Order No. R1-2010-0036 supersedes all previous Cleanup and Abatement Orders issued for the Site. Waste Discharge Requirements Order No. 88-5 remains in effect.
10. The Water Quality Control Plan for the North Coast Region (Basin Plan) designates beneficial uses of the waters of the State, establishes water quality objectives to protect those uses, and establishes implementation policies to attain water quality objectives. The beneficial uses of areal groundwater include domestic, agricultural, and industrial supply.
11. The existing and potential beneficial uses of the Shasta River include:
 - a. Municipal and domestic supply
 - b. Agricultural supply

- c. Industrial service supply
 - d. Industrial process supply
 - e. Groundwater recharge
 - f. Freshwater replenishment
 - g. Navigation
 - h. Hydropower Generation
 - i. Water contact recreation
 - j. Non-contact water recreation
 - k. Commercial and sport fishing
 - l. Warm Freshwater habitat
 - m. Cold freshwater habitat
 - n. Wildlife habitat
 - o. Rare, threatened, and endangered species
 - p. Migration of aquatic organisms
 - q. Spawning, reproduction, and/or early development of fish
 - r. Aquaculture
12. The Basin Plan includes numeric water quality objectives for chemical constituents in groundwater and surface waters, which incorporate the state drinking water maximum contaminant levels. The Basin Plan also includes narrative water quality objectives for toxicity for surface waters and a narrative taste and odor water quality objective for surface waters and groundwater. The groundwater taste and odor objective states: "Groundwater shall not contain taste or odor producing substances at concentrations which cause nuisance or adversely affect beneficial uses."
13. Wood treatment chemicals are being discharged from stormwater leaving the site and entering waters of the state, and the applicable water quality objectives in the Basin Plan have been exceeded, which constitutes pollution, as defined by Water Code Section 13050(l). Where the Dischargers have caused or permitted, cause or permit, or threaten to cause or permit waste to be discharged or deposited where it is, or probably will be, discharged into the waters of the state and creates, or threatens to create, a condition of pollution, Water Code 13304 gives the Regional Water Board the authority to issue an order to the Discharger to clean up the waste and abate the effects of the waste.
14. The State Water Resources Control Board Resolution (State Water Board) has adopted Resolution No. 92-49, "Policies and Procedures for Investigation and Cleanup and Abatement of Discharges under Water Code Section 13304", setting forth the policies and procedures to be used during an investigation or cleanup of a polluted site and requires that cleanup levels be consistent with State Board Resolution 68-16, the "Statement of Policy with Respect to Maintaining High Quality of Waters in California". Resolution No. 92-49 requires cleanup and abatement of the effects of discharges in a manner that promotes attainment of either background water quality levels, or the best water quality which is reasonable if background levels of water quality cannot be restored, considering all demands being made and to be made on those waters and the total values involved, beneficial and detrimental, economic and social, tangible and intangible.
15. Alternative cleanup levels greater than background concentrations shall be permitted only if the discharger demonstrates that: it is not feasible to attain background levels; the alternative cleanup levels are consistent with the maximum benefit to the people of the State; alternative cleanup levels will not unreasonably affect present and anticipated beneficial uses of such water; and they will not result in water quality less

than that prescribed in the Basin Plan and Policies adopted by the State and Regional Water Board. In the event that the discharger demonstrates that it is not feasible to attain background levels, alternative cleanup levels have been identified in Attachment A, which are consistent with the maximum benefit to the people of the State because they protect the water for its beneficial uses, including domestic water supply, and protect human health and the environment; will not unreasonably affect present and anticipated beneficial uses of such water; and will not result in water quality less than that prescribed in the Basin Plan and Policies adopted by the State and Regional Water Board.

16. Section 13267(b) of the Water Code provides that “in conducting an investigation specified in subdivision (a), the regional board may require that any person who has discharged, discharges, or is suspected of having discharged or discharging, or who proposes to discharge waste within its region ... shall furnish, under penalty of perjury, technical or monitoring program reports which the regional board requires. The burden, including the costs, of these reports shall bear a reasonable relationship to the need for the report and the benefits to be obtained from the reports. In requiring these reports, the regional board shall provide the person with a written explanation with regard to the need for the reports, and shall identify the evidence that supports requiring that person to provide the reports.”
17. The findings in this order provide the evidence to require the Discharger to provide the technical reports required by this Order. The technical reports required by this Order are necessary to assure cleanup of the Site in compliance with Section 13304 of the Water Code. The burden of providing the required technical reports bears a reasonable relationship to the need for the report and the benefits to be obtained from the reports.
18. Based on the certainty that there is no possibility that the initial investigatory activities required by this order will have a significant effect on the environment, the issuance of this cleanup and abatement order is exempt from having to comply with the requirements of the California Environmental Quality Act (CEQA). (14 Cal. Code Regs 15061(b)(3).) This Order requires that the responsible parties identified herein undertake investigations of the Site to characterize the horizontal and vertical groundwater and soil contamination at the site. Because the investigation will be occurring in a previously disturbed area and will only involve vehicular and pedestrian traffic, and installation of soil borings, it can be seen with certainty that there is no possibility that such investigatory activities will have a substantial adverse effect on the environment. All investigatory work will be conducted at locations with established heavy industrial activity and therefore the investigation will have no greater impact than historical use of the immediate and surrounding area.
19. It is impossible at this time for the Regional Water Board to be able to identify potentially significant adverse environmental effects of actual clean up of the site. Because the Regional Water Board is unable, pursuant to Water Code section 13360, to direct the manner and method of compliance, the Regional Water Board will not have any plan for actual clean up of the site until the responsible parties have identified in a draft remedial action plan the proposed method of cleaning up the site. Once the discharger has submitted a remedial action plan, the Regional Water Board will ensure that prior to granting concurrence with the final remedial action plan, it has complied with the requirements of CEQA. Until the site has been investigated and a remedial action plan has been proposed, it is impossible for the Regional Water Board to identify and mitigate potentially significant adverse impacts associated with the cleanup of the site.

20. Because of the need to initiate investigation of the contamination of the site before the Regional Water Board is able to identify how the site will be cleaned up and any potentially significant impacts that could result to the environment from the cleanup, this CAO only requires immediate the investigation of the site, and defers actual cleanup until the Regional Water Board has concurred with a final remedial action plan and has complied with the requirements of CEQA.
21. Reasonable costs incurred by Regional Water Board staff in overseeing cleanup or abatement activities are reimbursable under Water Code section 13304(c) (1).
22. Any person affected by this action of the Board may petition the State Water Board to review the action in accordance with Water Code section 13320 and title 23, California Code of Regulations, section 2050. The petition must be received by the State Water Board within 30 days of the date of this Order. Copies of the law and regulations applicable to filing petitions will be provided upon request. In addition to filing a petition with the State Water Board, any person affected by this Order may request the Regional Water Board to reconsider this Order. To be timely, such request must be made within 30 days of the date of this Order. Note that even if reconsideration by the Regional Water Board is sought, filing a petition with the State Water Board within the 30-day period is necessary to preserve the petitioner's legal rights. If the Discharger chooses to appeal the Order, the Discharger is advised to comply with the Order while the appeal is being considered. The appeals process is enclosed as Attachment B.
23. This Order in no way limits the authority of the Regional Water Board to institute additional enforcement actions or to require additional investigation and cleanup at the facility consistent with the Water Code. This Order may be revised by the Regional Water Board Executive Officer as additional information becomes available.
24. Failure to comply with the terms of this Order may result in enforcement under the Water Code. Any person failing to provide technical reports containing information required by this Order by the required date(s) or falsifying any information in the technical reports is, pursuant to Water Code section 13268, guilty of a misdemeanor and may be subject to administrative civil liabilities of up to one thousand dollars (\$1,000.00) for each day in which the violation occurs. Any person failing to cleanup or abate threatened or actual discharges as required by this Order is, pursuant to Water Code section 13350(e), subject to administrative civil liabilities of up to five thousand dollars (\$5,000.00) per day or ten dollars (\$10) per gallon of waste discharged.

THEREFORE, IT IS HEREBY ORDERED that, except for the purposes of enforcement of past violations, Cleanup and Abatement Order No. R1-2002-0097 is hereby rescinded, and pursuant to Water Code sections 13267(b) and 13304, the Dischargers shall cleanup and abate the discharges and threatened discharges forthwith, and shall comply with the following provisions of this Order, including the submittal of technical and monitoring reports identified below:

1. The Dischargers shall submit a workplan by May 31, 2010, for the Site to investigate: a) the source of PCP, TCP and dioxin contamination in storm water discharges, b) the complete vertical and horizontal extent of PCP, TCP, PCBs, and dioxin contamination in soil and groundwater, and c) the complete vertical and horizontal extent of contamination from all constituents of concern in soil and groundwater from historical industrial operations. The Dischargers shall implement the workplan for the investigation of the Site within 30 days of Executive Officer's concurrence with the workplan.
2. The Dischargers shall submit a report presenting the information gathered pursuant to Provision 1 above to the Executive Officer within 120 days of concurrence with the workplan. The report shall describe the results of the investigation at the Site, and contain recommendations to abate discharges of contaminants to storm water and groundwater.
3. The Dischargers shall submit a Remedial Action Plan (RAP) by September 30, 2010. The RAP shall include, at a minimum, the results of a feasibility study that identifies and evaluates at least three alternatives for restoring or protecting the beneficial uses of groundwater and surface water at the Site. The RAP shall also include a proposal to implement the most cost-effective remedial action and a time schedule for RAP implementation.
4. The Dischargers shall cleanup and abate the effects of the unauthorized discharge in conformance with the deadlines set forth in the RAP after it has undergone compliance with CEQA and public review, pursuant to Water Code section 13307.5, and after the Regional Water Board Executive Officer has concurred with its proposal.
5. The Dischargers shall submit a report of findings for the RAP within 60 days of implementation of the fieldwork.
6. The Dischargers shall submit by May 31, 2010, a sensitive receptor survey that analyzes the area within 1,000 feet of the known extent of the discharge. The sensitive receptor survey must include identification of, at a minimum, locations of water supply wells, preferential pathways, sensitive environmental habitats, and the identification of any potential health and safety issues.
7. The Dischargers shall submit the following information electronically to the State Water Board's GeoTracker database, within 30 days of being generated:
 - a. All chemical analytical results for soil, water and vapor samples.
 - b. The latitude and longitude of any permanent sampling point for which data is reported, accurate to within 1 meter and referenced to a minimum of two reference points from the California Spatial Reference System, if available.
 - c. The surveyed elevation relative to a geodetic datum of any permanent sampling point.
 - d. The elevation of groundwater in any permanent monitoring well relative to the surveyed elevation.
 - e. A site-map or maps showing the location of all sampling points.

- f. The depth of the screened interval and the length of screened interval for any permanent monitoring well.
 - g. PDF copies of boring logs.
 - h. PDF copies of all reports, work plans, and other documents, including the signed transmittal letter and professional certification by a California Licensed Civil Engineer or a Registered Geologist.
8. The Dischargers shall conduct all work under the direction of a California registered civil engineer or professional geologist experienced in surface water, soil, and groundwater investigation and remediation. All work plans and technical reports submitted to the Regional Water Board shall be signed and stamped by a licensed professional.
9. If, for any reason, the Discharger is unable to perform any activity or submit any documentation in compliance with the directives contained in this order or submitted pursuant to this order and approved by the Executive Officer, the Discharger may request in writing, an extension of time. The extension request must be submitted five days in advance, if possible, of the due date and shall include justification for this delay, including demonstration of the good faith effort performed to achieve compliance with the due date. The extension request shall also include a proposed time schedule with new performance dates for the due date in question and all subsequent dates dependent on the extension. A written extension may be granted for good cause, in which case the order will be revised accordingly.

Ordered by: _____
Luis G. Rivera
Assistant Executive Officer

March 23, 2010

Attachment A: Groundwater Quality Objectives
Attachment B: Appeals Process

**Attachment A
 Groundwater Quality Objectives**

| Constituent of Concern | Practical Quantitation Limit¹ (µg/L) | Water Quality Objective (µg/L) |
|-------------------------------|--|---------------------------------------|
| Gasoline | 50 | 5.0 ² |
| Diesel | 50 | 100 ³ |
| Motor oil | 175 | 1.0 ⁴ |
| Benzene | 0.5 | 0.15 ⁵ |
| Toluene | 0.5 | 42 ⁶ |
| Ethylbenzene | 0.5 | 3.2 ⁷ |
| Xylenes | 0.5 | 17 ⁶ |
| MtBE | 0.5 | 5 ⁸ |
| 2,3,7,8-TCDD (Dioxin) | 0.0001 | 2.7 E-7 ⁷ |
| Pentachlorophenol | 0.2 | 0.4 ⁹ |
| 2,3,4,6-Tetrachlorophenol | 0.2 | 1.0 ⁶ |
| Polychlorinated Biphenol | | 6.4 E-5 ¹⁰ |
| | | |

¹Practical quantitation limits are based on current technology. For instances where technology cannot achieve the water quality objective the practical quantitation limit will be used.

²Published literature provides a taste and odor threshold of 5 µg/L which is applied to the narrative TASTE AND ODOR water quality objective of the Basin Plan.

³Published literature provides a taste and odor threshold of 100 µg/L which is applied to the narrative TASTE AND ODOR water quality objective of the Basin Plan.

⁴US EPA health advisory Suggested No Adverse Response Level (SNARL) of 0.1 µg/L to 1.0 µg/L applied to TOXICITY water quality objective in the Basin Plan.

⁵California Public Health Goal (PHG) in Drinking Water (Office of Environmental Health Hazard Assessment) applied to TOXICITY water quality objective in the Basin Plan.

⁶US EPA National Ambient Water Quality Criteria, Human Health and Welfare Protection applied to TASTE AND ODOR water quality objective in the Basin Plan

⁷Cal/EPA Cancer Potency Factor applied to GENERAL water quality objective in the Basin Plan

⁸California Department of Health Services Secondary Maximum Contaminant Level applied to the TASTE and ODOR water quality objective in the Basin Plan

⁹California Public Health Goal (PHG) in Drinking Water (Office of Environmental Health Hazard Assessment) applied to GENERAL water quality objective in the Basin Plan

¹⁰ US EPA National Ambient Water Quality Criteria, Human Health and Welfare Protection applied to GENERAL water quality objective in the Basin Plan