

California Regional Water Quality Control Board
Santa Ana Region

February 29, 2008

ITEM: 21

SUBJECT: Resolution Requesting Cleanup and Abatement Account Funds for Conducting a Regional Groundwater Study Related to Perchlorate [and Volatile Organic Compound](#) Contamination of Groundwater in the Rialto Area

DISCUSSION:

The Cleanup and Abatement Account (CAA) was created by Water Code Sections 13440-13443. Monies received from court judgments and the assessment of administrative civil liabilities fund the Account. The management of the CAA is the responsibility of the State Water Resources Control Board. Monies from the CAA are available for contract services to cleanup a waste or abate the effects of a waste discharge and to remedy an actual or potential unforeseen public health threat. The State Water Resources Control Board, the regional boards, or any governmental agency with the authority to cleanup or abate the effects of waste discharges are eligible for funding from the CAA. The State Water Resources Control Board allocates monies from the CAA for special projects and for emergency projects on a case-by-case basis.

[Pollution in the Rialto Groundwater Management Zone from perchlorate and volatile organic compounds \("perchlorate/VOC pollution"\)](#) poses a potential threat to public health. A significant source of this pollution is from an area generally referred to as the 160-acre site, located in the City of Rialto. The City of Rialto and the West Valley Water District submitted a request, dated February 6, 2008, for \$3 million of funding from the CAA. The work proposed in this request is related to the perchlorate/VOC pollution from the 160-acre site and is necessary to develop a remedial action plan for this pollution. The justification for this request and a description of the proposed use of the CAA funds is included in the attached request from the City of Rialto and the West Valley Water District. Regional Board staff reviewed this request and determined that the tasks proposed in the request would generally support the cleanup of perchlorate/VOC pollution that continues to migrate in the Rialto Groundwater Management Zone. The tentative resolution requests that the City of Rialto and the West Valley Water District submit a detailed scope of work and time schedule for approval by the Executive Officer. The tentative resolution further requests, and the City of Rialto and the West Valley Water District have agreed, that the funds be provided to the Regional Board to support the work proposed by the City of Rialto and the West Valley Water District. The Regional Board can then assure that the work performed with these funds is coordinated with, and is consistent with, other tasks that may be implemented by others in the area.

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RECOMMENDATION: Adopt Resolution No. R8-2008-0020 requesting the State Board to allocate \$3 million from the Cleanup and Abatement Account for conducting a

Agenda Item
Request for Cleanup and Abatement Account Funds

[February 29, 2008](#)

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| regional groundwater study related to perchlorate [VOC](#) contamination of groundwater in the Rialto area.

California Regional Water Quality Control Board
Santa Ana Region

RESOLUTION NO. R8-2008-0020

Resolution Requesting Cleanup and Abatement Account Funds for Conducting a Regional Groundwater Study Related to Perchlorate [and Volatile Organic Compound](#) Contamination of Groundwater in the Rialto Area

WHEREAS:

1. Sections 13440 through 13443 of the California Water Code established the State Water Pollution Cleanup and Abatement Account (Account) to be administered by the State Water Resources Control Board (State Board).
2. Grants to public agencies and regional boards are available from the Account. The State Board may order monies to be paid from the Account to assist a public agency or regional board to assist it in cleaning up waste or abating its effects on waters of the State.
3. The Rialto Groundwater Management Zone is beneficially used for municipal and domestic supply. A significant water quality problem that poses a potential threat to public health currently exists in the Rialto Groundwater Management Zone due to [pollution from perchlorate and volatile organic compounds \("perchlorate/VOC pollution"\)](#). A significant source of this pollution is an area generally referred to as the 160-acre site, located in the City of Rialto.
4. The Executive Officer has issued Draft Amended Cleanup and Abatement Order No. R8-2005-0053. That order would require that parties subject to the order conduct various investigation and cleanup work to address the perchlorate/[VOC](#) pollution from the 160-acre site.
5. A hearing on Draft Amended Cleanup and Abatement Order No. R8-2005-0053 was scheduled for August 2007, but a stay of that hearing was issued by the Los Angeles County Superior Court and continues in effect pending further proceedings. As a result, work that would be required by the order is not being conducted by any parties. The perchlorate/[VOC](#) pollution of groundwater from the 160-acre site continues to migrate since no remedial measures to address that pollution are currently in place.
6. The City of Rialto and the West Valley Water District submitted a request, dated February 6, 2008, for \$3 million of funding from the Account. The work proposed in this request is related to the perchlorate/[VOC](#) pollution from the 160-acre site and is necessary to develop a remedial action plan for this perchlorate/[VOC](#) pollution.

7. On April 4, 2003, the Board adopted Resolution No. R8-2003-0052 directing the Executive Officer to submit a request for \$2 million from the Account to support wellhead treatment projects to address perchlorate and volatile organic compounds in the Rialto/Colton/Fontana area. The Executive Officer submitted such a request on April 9, 2003. The State Board Division of Financial Assistance rejected the request in July 2003, due to lack of funds. Deleted:
8. The work proposed by the City of Rialto and the West Valley Water District will help to expedite the cleanup of a serious perchlorate/VOC plume in groundwater that continues to migrate. It is therefore appropriate for the State Board to consider this funding request as soon as possible.
9. The City of Rialto and the West Valley Water District have agreed that the funds should be provided to the Regional Board in order to assure that the work performed with these funds is coordinated with, and is consistent with, other tasks that may be implemented by others in the area.

THEREFORE, BE IT RESOLVED THAT:

1. The City of Rialto and the West Valley Water District are requested to submit a detailed scope of work. The details of this work shall be subject to the approval of the Executive Officer.
2. The Executive Officer is directed to submit a Request for Cleanup and Abatement Funds to the State Board for a total of \$3 million. This request shall supersede the City of Rialto and the West Valley Water District request to the State Board. The funds shall be requested to be provided to the Regional Board to support the approved scope of work submitted by the City of Rialto and the West Valley Water District or may be applied toward other investigation or cleanup activities in connection with perchlorate/VOC pollution in the groundwater in the Rialto area.
3. The Regional Board requests that the State Board consider this request at the earliest available opportunity.
4. The Executive Officer is directed to transmit a copy of this Resolution to the State Board.

I, Gerard J. Thibeault, Executive Officer, do hereby certify that the foregoing is a full, true and correct copy of a resolution adopted by the California Regional Water Quality Control Board, Santa Ana Region, on February 29, 2008.

Gerard J. Thibeault

Executive Officer

California Regional Water Quality Control Board
Santa Ana Region

February 29, 2008

ITEM: 21

SUBJECT: Resolution Requesting Cleanup and Abatement Account Funds for Conducting a Regional Groundwater Study Related to Perchlorate Contamination of Groundwater in the Rialto Area

DISCUSSION:

The Cleanup and Abatement Account (CAA) was created by Water Code Sections 13440-13443. Monies received from court judgments and the assessment of administrative civil liabilities fund the Account. The management of the CAA is the responsibility of the State Water Resources Control Board. Monies from the CAA are available for contract services to cleanup a waste or abate the effects of a waste discharge and to remedy an actual or potential unforeseen public health threat. The State Water Resources Control Board, the regional boards, or any governmental agency with the authority to cleanup or abate the effects of waste discharges are eligible for funding from the CAA. The State Water Resources Control Board allocates monies from the CAA for special projects and for emergency projects on a case-by-case basis.

Perchlorate pollution in the Rialto Groundwater Management Zone poses a potential threat to public health. A significant source of this pollution is from an area generally referred to as the 160-acre site, located in the City of Rialto. The City of Rialto and the West Valley Water District submitted a request, dated February 6, 2008, for \$3 million of funding from the CAA. The work proposed in this request is related to the perchlorate pollution from the 160-acre site and is necessary to develop a remedial action plan for this perchlorate pollution. The justification for this request and a description of the proposed use of the CAA funds is included in the attached request from the City of Rialto and the West Valley Water District. Regional Board staff reviewed this request and determined that the tasks proposed in the request would generally support the cleanup of perchlorate pollution that continues to migrate in the Rialto Groundwater Management Zone. The tentative resolution requests that the City of Rialto and the West Valley Water District submit a detailed scope of work and time schedule for approval by the Executive Officer. The tentative resolution further requests, and the City of Rialto and the West Valley Water District have agreed, that the funds be provided to the Regional Board to support the work proposed by the City of Rialto and the West Valley Water District. The Regional Board can then assure that the work performed with these funds is coordinated with, and is consistent with, other tasks that may be implemented by others in the area.

RECOMMENDATION: Adopt Resolution No. R8-2008-0020 requesting the State Board to allocate \$3 million from the Cleanup and Abatement Account for conducting a regional groundwater study related to perchlorate contamination of groundwater in the Rialto area.

California Regional Water Quality Control Board
Santa Ana Region

RESOLUTION NO. R8-2008-0020

Resolution Requesting Cleanup and Abatement Account Funds for Conducting a
Regional Groundwater Study Related to Perchlorate Contamination of
Groundwater in the Rialto Area

WHEREAS:

1. Sections 13440 through 13443 of the California Water Code established the State Water Pollution Cleanup and Abatement Account (Account) to be administered by the State Water Resources Control Board (State Board).
2. Grants to public agencies and regional boards are available from the Account. The State Board may order monies to be paid from the Account to assist a public agency or regional board to assist it in cleaning up waste or abating its effects on waters of the State.
3. The Rialto Groundwater Management Zone is beneficially used for municipal and domestic supply. A significant water quality problem that poses a potential threat to public health currently exists in the Rialto Groundwater Management Zone due to perchlorate pollution. A significant source of this pollution is an area generally referred to as the 160-acre site, located in the City of Rialto.
4. The Executive Officer has issued Draft Amended Cleanup and Abatement Order No. R8-2005-0053. That order would require that parties subject to the order conduct various investigation and cleanup work to address the perchlorate pollution from the 160-acre site.
5. A hearing on Draft Amended Cleanup and Abatement Order No. R8-2005-0053 was scheduled for August 2007, but a stay of that hearing was issued by the Los Angeles County Superior Court. As a result, work that would be required by the order is not being conducted by any parties. The perchlorate pollution of groundwater from the 160-acre site continues to migrate since no remedial measures to address that pollution are currently in place.
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7. On April 4, 2003, the Board adopted Resolution No. R8-2003-0052 directing the Executive Officer to submit a request for \$2 million from the Account to support wellhead treatment projects to address perchlorate in the Rialto/Colton/ Fontana area. The Executive Officer submitted such a request on April 9, 2003. The State Board Division of Financial Assistance rejected the request in July 2003, due to lack of funds.
8. The work proposed by the City of Rialto and the West Valley Water District will help to expedite the cleanup of a serious perchlorate plume in groundwater that continues to migrate. It is therefore appropriate for the State Board to consider this funding request as soon as possible.
9. The City of Rialto and the West Valley Water District have agreed that the funds should be provided to the Regional Board in order to assure that the work performed with these funds is coordinated with, and is consistent with, other tasks that may be implemented by others in the area.

THEREFORE, BE IT RESOLVED THAT:

1. The City of Rialto and the West Valley Water District are requested to submit a detailed scope of work. The details of this work shall be subject to the approval of the Executive Officer.
2. The Executive Officer is directed to submit a Request for Cleanup and Abatement Funds to the State Board for a total of \$3 million. This request shall supersede the City of Rialto and the West Valley Water District request to the State Board. The funds shall be requested to be provided to the Regional Board to support the approved scope of work submitted by the City of Rialto and the West Valley Water District.
3. The Regional Board requests that the State Board consider this request at the earliest available opportunity.
4. The Executive Officer is directed to transmit a copy of this Resolution to the State Board.

I, Gerard J. Thibeault, Executive Officer, do hereby certify that the foregoing is a full, true and correct copy of a resolution adopted by the California Regional Water Quality Control Board, Santa Ana Region, on February 29, 2008.

Gerard J. Thibeault
Executive Officer



City of Rialto

California

West Valley Water District

February 6, 2008

Mr. Allan V. Patton
Assistant Deputy Director
State Water Resources Control Board
1001 I Street
Sacramento, CA 95814

Re: City of Rialto and West Valley Water District Combined Request for Financial Assistance Related to Perchlorate Contamination of Groundwater Resources

Dear Mr. Patton,

The City of Rialto, the West Valley Water District (WVWD) and other neighboring water purveyors have been impacted directly by perchlorate contamination, an ingredient in rocket fuel and pyrotechnics. The source of much of the contamination impacting drinking water wells is a site located over the northern portion of the Rialto-Colton Groundwater basin once known as the Rialto Ammunition Storage Point (RASP). The former military base consists of two main parts, the former bunker complex and the 160-acre site. At these sites, The Army, defense contractors, and fireworks manufacturers utilized perchlorate in their manufacturing and material handling operations. It has been shown that many of these operators have discharged perchlorate containing chemicals to the ground thus allowing for its eventual contamination of the underlying aquifer.

Local water purveyors have been dealing with the perchlorate contamination since its discovery in the water supply more than ten years ago. To date, the Regional Water Quality Control Board and other regulatory agencies have issued at least 32 directives to various potentially responsible parties (PRP) requiring them to assess and remediate the subsurface pollution. While progress has been made, and a better understanding of subsurface conditions has emerged, it has occurred only grudgingly and in episodic fashion. After ten years of water supply well shut downs and four years of litigation, the PRP's have not yet completed the assessment of conditions at their sites nor have they initiated remediation of the groundwater.

At this time, the City of Rialto and the WVWD seek State financial support in order to offset costs impacting the local citizens and to take a leadership position in the investigation of the problem and the development of technical solutions. The request for State funding at this time is based on the following:

- *Time is of the essence* - Perchlorate continues to spread underground, leaving water supply wells shut down along its path. Migration rates of perchlorate contamination in the subsurface have been estimated as high as 5.7 feet per day, making this one of the fastest moving contaminant plumes seen in Southern California.
- *Outside funding is needed for fast action* – The Rialto perchlorate source areas have a 60-year operational history with more than 40 PRP's operating at different times and at different locations within the massive RASP complex. Unraveling "who polluted what and when" is difficult under any circumstances and is especially difficult when surface structures have changed and fingers are pointed back and forth between tenants of the various subdivided properties. State funding of assessment and remediation activities will allow scientists and technicians to focus on determining subsurface conditions and developing a long term remedy independent of the combative PRP's.

Total Requested Amount \$ 3,000,000

1. Development of a Rialto-Colton Basin perchlorate and chlorinated solvent remediation plan for soil and groundwater:

- State funding of this task will result in a sophisticated overall remediation plan for the Rialto-Colton Groundwater Basin. The plan and guaranteed cost estimate will provide crucial information for long-term perchlorate remediation planning.
- The plan's approach, schedule and cost estimate will be structured so that the project can be carried out in full compliance with all appropriate Federal EPA guidelines for completion of a Remedial Investigation (RI), Feasibility Study (FS), and Remedial Action Plan (RAP). It will provide for the control of contaminant spreading and the recovery of perchlorate and chlorinated solvent mass from the subsurface soils and aquifer so as to halt the continual leaching of these chemicals into the regional groundwater supply. The consultant will submit a guaranteed cost to implement the plan over 30 years including development of a probabilistic cost estimate along with backup cost details. The plan will also include third party insurance options and costs. The project will culminate with the presentation of a technical plan, the expected outcomes, and the detailed breakdown of the guaranteed cost for implementation.

\$ 200,000

2. A regional groundwater study will be performed to include the installation of three multi-port monitoring wells and three nested monitoring wells. Scope taken from Rialto's "Roadmap to Remedy Selection" posted on the Rialto website at www.ci.rialto.ca.us

- The location of wells will be determined after consultation with the USEPA and the Regional Water Quality Control Board, so that wells drilled under regulatory direction are not duplicative of work being performed by the City of Rialto and the WVWD.
- The three wells are intended to fill in data gaps and allow for the three dimensional mapping of the perchlorate plume along its six mile length.

- The scope of work will also include one round of groundwater monitoring, pump testing, slug testing, and the development of a groundwater fate and transport computer model. The model will be a critical tool for the development of a water supply pumping plan for the basin and for locating the optimum placement of a plume capture system down-gradient of the 160-acre site.

\$ 2,800,000

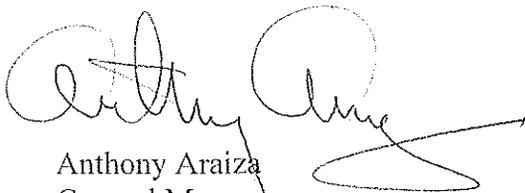
3. It is currently expected that PRP's will drill the following three nested monitoring wells at high probability source locations at the 160-acre site. If after six months, these borings are not agreed to by the PRP's or others, the City and WVWD will complete them using \$700,000 currently allocated in Task #2 of this request. Scope taken from Rialto's "Roadmap to Remedy Selection" posted on the Rialto website at www.ci.rialto.ca.us.
 - Evaluate Building #42 as a potential source of groundwater perchlorate contamination. Near surface soil sampling at this facility indicates that 12,000 ppb of perchlorate had been released near the surface. Upon discovery of this high concentration, the investigators excavated deeper with a backhoe and reported that the perchlorate was limited to the first few feet of depth. A Deep boring is the only definitive way to determine if this building is a source of perchlorate in the underlying groundwater.
 - Evaluate the Goodrich Burn Pit as a source of deep perchlorate contamination.
 - The third proposed drilling location is referred to as the Southwest Pit. This pit was used by Goodrich in the northern end and by others in the southern end.
4. The local water supply community is interested in the remediation of the Rialto-Colton groundwater basin and looks forward to implementing the scope of work outlined in Tasks #2 and #3 above. However, recognizing the possibility that either the USEPA or PRP's might also begin implementation of the described scope of work, the City of Rialto and the West Valley Water District request that any unused funds be eligible for treatment of perchlorate at the wellhead to help alleviate the cost of perchlorate remediation that these two water agencies routinely incur.

Please call (909) 421-7229 if you have any questions or require additional information.

Sincerely,



Ahmad R Ansari, P.E.
Public Works Director/City Engineer
City of Rialto



Anthony Araiza
General Manager
West Valley Water District