



EDMUND G. BROWN JR.
GOVERNOR

MATTHEW RODRIGUEZ
SECRETARY FOR
ENVIRONMENTAL PROTECTION

Los Angeles Regional Water Quality Control Board

July 20, 2012

Mr. Bruce Amig
Goodrich Corporation
Four Coliseum Centre
2730 West Tyvola Road
Charlotte, North Carolina 28217

REVISED MONITORING AND REPORTING PROGRAM NO. CI-9293 – FORMER MENASCO AEROSPACE FACILITY, 100 EAST CEDAR AVENUE, BURBANK, CALIFORNIA (FILE NO. 109.0842, ORDER NO. R4-2007-0019, SERIES NO. 024, CI-9293, GLOBAL ID. WDR100001639)

Dear Mr. Amig:

On July 31, 2007, Los Angeles Regional Water Quality Control Board (Regional Board) enrolled you under general Waste Discharge Requirements (WDR Order No. R4-2007-0019) with a Monitoring and Reporting Program (MRP) No. CI-9293 for a pilot test to inject calcium polysulfide and molasses for groundwater remediation of hexavalent chromium. The pilot test results indicated that molasses performed better than calcium polysulfide and is capable of reducing chromium levels substantially.

The *Perched Groundwater Feasibility Study/Remedial Action Plan Implementation Work Plan* (Work Plan), dated November 10, 2010 was prepared and submitted for expansion of the scope of remedial activities by AMEC Geomatrix, Inc. and Progressive Engineering & Construction, Inc. on your behalf. The Work Plan proposes in-situ bioremediation with delivery enhancement to address impacts by chromium and volatile organic compounds (VOCs) in the perched groundwater at the site. Approximately 28,500 gallons of 5% molasses (or sodium lactate or emulsified oil) solution will be injected into nineteen injection wells at depths from 30 to 60 feet below ground surface. The injection events are planned on a quarterly basis during the first two years and less frequently (semi-annually) thereafter. On April 17, 2012, the Regional Board staff approved the Work Plan.

The revised MRP, which reflects the additional molasses (or sodium lactate or emulsified oil) injection, is enclosed. Please do not combine other reports with your monitoring reports. Submit each type of report as a separate document.

The Discharger shall comply with the Electronic Submittal of Information (ESI) requirements by submitting all reports required under the MRP, including groundwater monitoring data, discharge location data, and pdf monitoring reports to the State Water Resources Control Board GeoTracker database under Global ID WDR100001639. ESI training video is available at: <https://waterboards.webex.com/waterboards/ldr.php?AT=pb&SP=MC&rID=44145287&rKey=7dad4352c990334b>

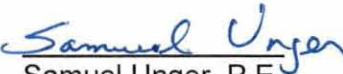
For all parties who upload electronic documents to State Database GeoTracker, it is no longer necessary to email a copy of these documents to losangeles@waterboards.ca.gov or submit hard copies to our office. The Regional Board will no longer accept documents (submitted by either hard copy or email) already uploaded to GeoTracker. Please see Electronic Submittal to the Los Angeles Regional Board for GeoTracker Users dated December 12, 2011 for further details at:

<http://www.waterboards.ca.gov/losangeles/resources/Paperless/Paperless%20Office%20for%20OGT%20Users.pdf>

To avoid paying future annual fees, please submit a written request for termination of your enrollment under the general WDR in a separate letter when the project is completed and the WDR is no longer needed. Be aware that the annual fee covers the fiscal year billing period beginning July 1 and ending June 30, the following year. You will pay the full annual fee if your request for termination is made after the beginning of the new fiscal year beginning July 1.

If you have any questions, please contact the Project Manager, Dr. Ann Chang at (213) 620-6122 (achang@waterboards.ca.gov), or the Chief of Groundwater Permitting Unit, Dr. Eric Wu at (213) 576-6683 (ewu@waterboards.ca.gov).

Sincerely,


Samuel Unger, P.E.
Executive Officer

Enclosure: Revised Monitoring and Reporting Program No. CI-9293 dated July 20, 2012

cc: Ms. Bridget Morello, Progressive Engineering & Construction, Inc.

STATE OF CALIFORNIA
CALIFORNIA REGIONAL WATER QUALITY CONTROL BOARD
LOS ANGELES REGION

REVISED MONITORING AND REPORTING PROGRAM NO. CI-9293
FOR
FORMER MENASCO AEROSPACE FACILITY
100 EAST CEDAR AVENUE, BURBANK, CALIFORNIA

ENROLLMENT UNDER REGIONAL BOARD
ORDER NO. R4-2007-0019 (SERIES NO. 024)
FILE NO. 109.0842

I. MONITORING AND REPORTING REQUIREMENTS

- A. Goodrich Corporation (hereinafter Discharger) shall implement this Monitoring and Reporting Program (MRP) on the effective date (July 20, 2012) under Regional Board Order No. R4-2007-0019. The next monitoring report under this program shall be received at the Regional Board by **October 15, 2012**. Subsequent monitoring reports shall be received at the Regional Board according to the following schedule:

<u>Monitoring Period</u>	<u>Report Due</u>
January – March	April 15
April – June	July 15
July – September	October 15
October – December	January 15

- B. If there is no discharge or injection, during any reporting period, the report shall so state. By March 1 of each year, the Discharger shall submit an annual summary report to the Regional Board. The report shall contain both tabular and graphical summaries of the monitoring data obtained during the previous calendar year. In addition, the Discharger shall discuss the compliance record and the corrective actions taken or planned, which may be needed to bring the discharge into full compliance with the waste discharge requirements.
- C. The Discharger shall comply with requirements contained in Section G of Order No. R4-2007-0019 "*Monitoring and Reporting Requirements*" in addition to the aforementioned requirements.

II. DISCHARGE MONITORING PROGRAM

The monitoring reports shall contain the following information regarding the injection activities:

1. Location map showing injection points used for the molasses (or sodium lactate or emulsified oil) solution.
2. Written and tabular summary defining depth of injection points, quantity of the molasses (or sodium lactate or emulsified oil) solution injected at each injection point, and total amount of the molasses (or sodium lactate or emulsified oil) solution injected at the Site.
3. Visual inspection at each injection point shall be conducted and recorded during the injection.

III. GROUNDWATER MONITORING PROGRAM

A groundwater monitoring program shall be implemented to evaluate impacts associated with the injection activity. Groundwater samples shall be collected from monitoring wells DEW-2, DEW-3, DEW-4, EW-5, EW-12, GW-1, GW-2, GW-3, PZ-6, and PZ-7 (Figure 1). The Discharger shall conduct a baseline sampling prior to the proposed injection, followed by specified schedules from all 10 monitoring wells for the following groundwater parameters:

CONSTITUENT	UNITS	TYPE OF SAMPLE	MINIMUM FREQUENCY OF ANALYSIS
Dissolved Oxygen	mg/L	grab	Baseline and quarterly
Oxidation-Reduction Potential	millivolts	grab	Same as specified above
pH	pH units	grab	Same as specified above
Specific Conductivity	mS/cm	grab	Same as specified above
Temperature	°C	grab	Same as specified above
Turbidity	NTU	grab	Same as specified above
Total Organic Carbon	mg/L	grab	Same as specified above

CONSTITUENT	UNITS	TYPE OF SAMPLE	MINIMUM FREQUENCY OF ANALYSIS
Total Dissolved Solids	mg/L	grab	Same as specified above
Sulfate	mg/L	grab	Same as specified above
Chloride	mg/L	grab	Same as specified above
Boron	mg/L	grab	Same as specified above
Nitrate and Nitrite	mg/L	grab	Same as specified above
Total Chromium and Hexavalent Chromium	µg/L	grab	Same as specified above
Volatile Organic Compounds	µg/L	grab	Same as specified above

All groundwater monitoring reports must include, at minimum, the following:

- a. Well identification, date and time of sampling;
- b. Sampler identification, and laboratory identification;
- c. Quarterly observation of groundwater levels, recorded to 0.01 feet mean sea level and groundwater flow direction.

IV. MONITORING FREQUENCIES

Specifications in this monitoring program are subject to periodic revisions. Monitoring requirements may be modified or revised by the Executive Officer based on review of monitoring data submitted pursuant to this Order. Monitoring frequencies may be adjusted to a less frequent basis or parameters and locations dropped by the Executive Officer if the Discharger makes a request and the request is backed by statistical trends of monitoring data submitted.

V. CERTIFICATION STATEMENT

Each report shall contain the following completed declaration:

"I certify under penalty of law that this document, including all attachments and supplemental information, was prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gathered and evaluated the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of a fine and imprisonment.

Executed on the _____ day of _____ at _____

(Signature)

(Title)"

VI. PUBLIC DOCUMENTS

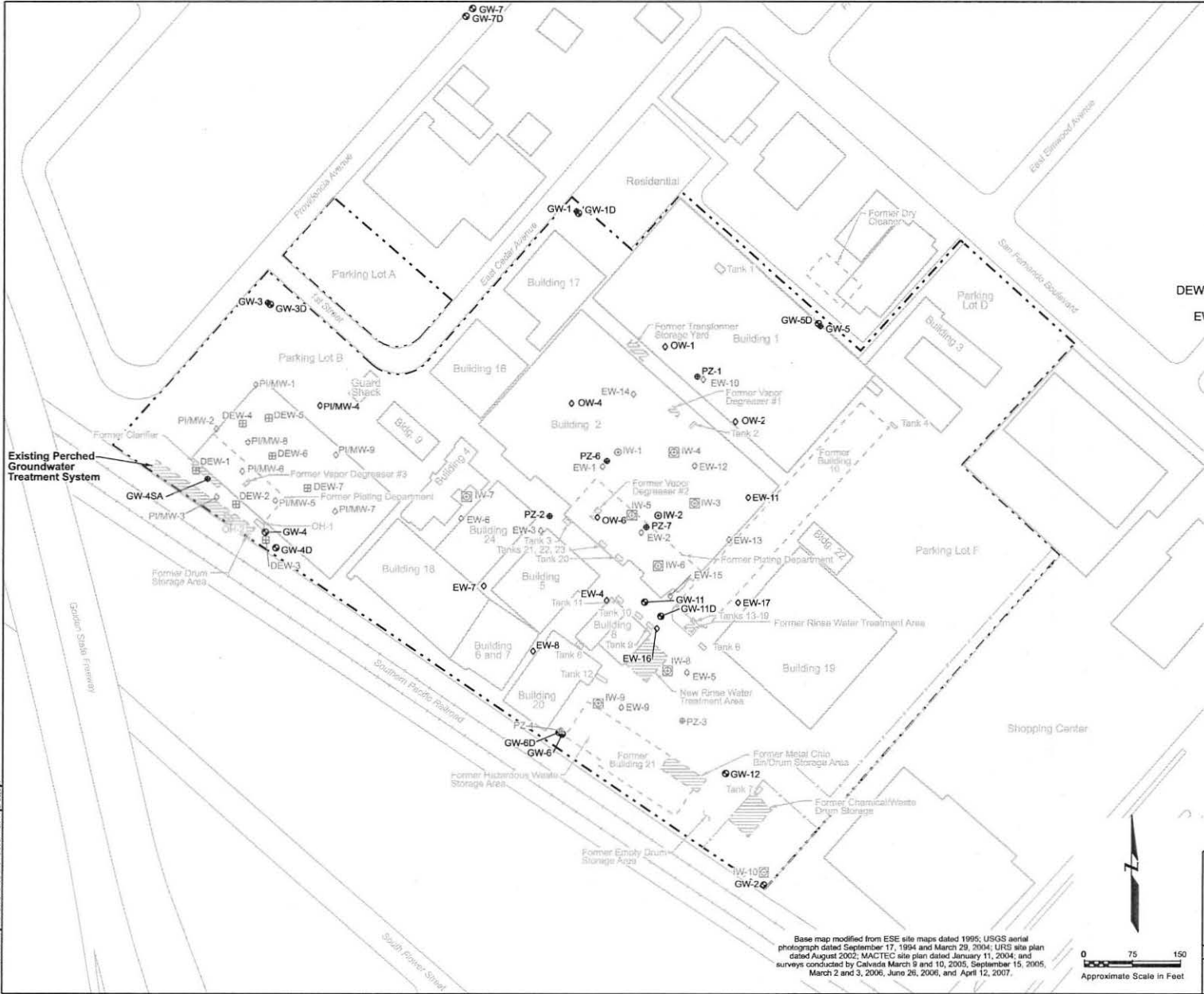
All records and reports submitted in compliance with Order No.R4-2007-0019 and Monitoring and Reporting Program No. CI-9293 are public documents and will be made available for inspection during business hours at the office of the California Regional Water Quality Control Board, Los Angeles Region, upon request by interested parties. Only proprietary information, and only at the request of the Discharger will be treated as confidential.

VII. ELECTRONIC SUBMITTAL OF INFORMATION

The Discharger shall comply with the Electronic Submittal of Information (ESI) requirements by submitting all reports required under the MRP, including groundwater monitoring data in Electronic Deliverable Format, discharge location data, and searchable Portable Document Format of monitoring reports to the State Water Resources Control Board GeoTracker database under Global ID WDR100001639.

Ordered by: Samuel Unger
Samuel Unger, P.E.
Executive Officer

Date: July 20, 2012



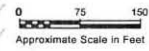
- Explanation**
- ◊ ◻ Proposed extraction location (existing wells)
 - ◊ ◊ Proposed injection location (existing wells)
 - ◻ ◻ Proposed injection location (new wells)
 - GW-11 ◊ Groundwater monitoring well (shallow URGZ zone)
 - GW-11D ◊ Groundwater monitoring well (deeper URGZ zone)
 - PZ-7 ◊ Groundwater monitoring well (perched zone)
 - IW-2 ◊ Pilot study injection well
 - DEW-6, PI/MW-9 ◻ Dual phase extraction well
 - EW-16, OW-4 ◊ Soil vapor extraction well or groundwater extraction well
 - ◻ Former storage tank location
 - - - Property line
 - - - Former building
 - - - Railroad right-of-way
 - - - Fence line

- Notes:**
1. All locations are approximate.
 2. The remedy involves injection of a reducing agent into 19 injection wells, including new and existing wells with 18 existing extraction wells used to distribute the injected solution across the areas of concern in the perched zone. Any recovered groundwater would be treated in the existing treatment system (i.e., carbon adsorption, filtration, and ion exchange) prior to discharge to the municipal sewer system.

**IN SITU BIOREMEDIATION
WITH DELIVERY ENHANCEMENT LAYOUT**
Former Menasco Aerospace Facility
100 East Cedar Avenue
Burbank, California

By: pah	Date: 11/10/10	Project No: 9442.004
AMEC Geomatrix		Figure 1

Base map modified from ESE site maps dated 1995; USGS aerial photograph dated September 17, 1994 and March 29, 2004; URS site plan dated August 2002; MACTEC site plan dated January 11, 2004; and surveys conducted by Calveda March 9 and 10, 2005, September 15, 2005, March 2 and 3, 2006, June 26, 2006, and April 12, 2007.



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