

STATE OF MICHIGAN

IN THE CIRCUIT COURT FOR THE COUNTY OF WASHTENAW

ATTORNEY GENERAL FOR THE STATE OF
MICHIGAN, ex rel, MICHIGAN DEPARTMENT
OF ENVIRONMENTAL QUALITY,

Plaintiffs,

File No. 88-34734-CE

v

Honorable Donald E. Shelton

GELMAN SCIENCES, INC.,
a Michigan corporation,

Defendant.

Celeste R. Gill (P52484)
Assistant Attorney General
Environment, Natural Resources and
Agriculture Division
P.O. Box 30755
Lansing, MI 48909
(517) 373-7540
Attorney for Plaintiffs

Michael L. Caldwell (P40554)
Fink, Zausmer & Kaufman, P.C.
31700 Middlebelt Road, Suite 150
Farmington Hills, MI 48334
(248) 851-4111

Alan D. Wasserman (P39509)
Williams Acosta, PLLC
535 Griswold St. Suite 1000
Detroit, MI 48226
(313) 963-3873
Attorneys for Defendant

**PLAINTIFFS' MOTION TO ENFORCE CONSENT JUDGMENT
AND REQUEST FOR ADDITIONAL RESPONSE ACTIVITY**

Plaintiffs, the Attorney General of the State of Michigan and the Michigan Department of Environmental Quality ("MDEQ"), as successor to Plaintiffs Michigan Natural Resources Commission, Michigan Water Resources Commission, and Michigan Department of Natural Resources under Executive Orders 1991-31 and 1995-18, by their undersigned counsel hereby

move this Court pursuant to MCR 2.119 and 3.310, to use its inherent powers, See, *St. Clair Commercial & Savings Bank v. Macauley*, 66 Mich App 210 (1975); *Schaeffer v Schaeffer*, 106 Mich App 452 (1981); *Cohen v Cohen*, 125 Mich App 206 (1983); and MCL 600.611., to enforce the Consent Judgment, as amended, between the Parties and the Court's Opinion and Order Regarding Remediation of the "Unit E" Aquifer, dated December 17, 2004 and/or require the Defendant to perform additional investigation and response activities pursuant to Section XVIII.E of the Consent Judgment, for the reasons set forth in the attached Brief in Support of Plaintiffs' Motion to Enforce Consent Judgment and Request for Additional Response Activity.

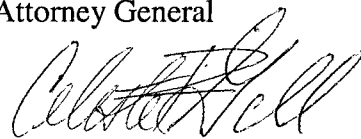
Relief Requested

The Plaintiffs request that this Court:

- A. Enter the Proposed Order, attached as Exhibit 1; and
- B. Grant Plaintiffs such further relief as the Court finds appropriate and just.

Respectfully submitted,

Michael A. Cox
Attorney General



Celeste R. Gill (P52484)
Assistant Attorney General
Environment, Natural Resources,
and Agriculture Division
P.O. Box 30755
Lansing, MI 48909
(517) 373-7540

Dated: August 14, 2009

LF:Gelman/Motion to Enforce Order

STATE OF MICHIGAN

IN THE CIRCUIT COURT FOR THE COUNTY OF WASHTENAW

ATTORNEY GENERAL FOR THE STATE OF
MICHIGAN, ex rel, MICHIGAN DEPARTMENT
OF ENVIRONMENTAL QUALITY,

Plaintiffs,

File No. 88-34734-CE

v

Honorable Donald E. Shelton

GELMAN SCIENCES, INC.,
a Michigan corporation,

Defendant.

Celeste R. Gill (P52484)
Assistant Attorney General
Environment, Natural Resources and
Agriculture Division
P.O. Box 30755
Lansing, MI 48909
(517) 373-7540
Attorney for Plaintiffs

Michael L. Caldwell (P40554)
Fink, Zausmer & Kaufman, P.C.
31700 Middlebelt Road, Suite 150
Farmington Hills, MI 48334
(248) 851-4111

Alan D. Wasserman (P39509)
Williams Acosta, PLLC
535 Griswold St. Suite 1000
Detroit, MI 48226
(313) 963-3873
Attorneys for Defendant

**ORDER TO ENFORCE CONSENT JUDGMENT AND TO PERFORM
ADDITIONAL REMEDIAL INVESTIGATION AND RESPONSE ACTIVITIES**

At a session of said Court, held in the Courtroom thereof, in the
City of Ann Arbor, County of Washtenaw, State of Michigan, this

PRESENT: _____

CIRCUIT COURT JUDGE

The Court, being fully advised in the premises, hereby orders Defendant, Pall Life Sciences, Inc. (PLS), to do the following with regard to the 1,4-dioxane groundwater contamination at and emanating from the Gelman Sciences Site:

A. Wagner Road Area.

1. PLS shall install an extraction well in the vicinity of MW-94s, screened at similar depths, by November 30, 2009, and begin extracting from the new extraction well by December 31, 2009. PLS shall obtain court ordered access, if necessary, to install, operate, and maintain the extraction well.

2. PLS shall submit a work plan, to determine the vertical and horizontal extent of 1,4-dioxane contamination greater than 85 ppb along Wagner Road, south of MW-105d and north of MW-94s, to the Michigan Department of Environmental Quality (MDEQ) for approval within thirty (30) days after entry of this Order. Within thirty (30) days after completion of the work plan, PLS shall submit a report of the investigation to the MDEQ.

3. PLS shall submit a feasibility study to MDEQ by April 15, 2010, analyzing the feasibility of capturing 1,4-dioxane contamination greater than 85 ppb at Wagner Road, including an evaluation of the effectiveness of the new extraction well in capturing 1,4-dioxane contamination greater than 85 ppb north of MW-94s.

4. If the entire width and depth of 1,4-dioxane contamination is not being captured at Wagner Road, and the feasibility study reveals that it is feasible to do so, PLS shall submit a work plan to MDEQ, upon its request, to capture the entire width and depth of 1,4-dioxane at Wagner Road. PLS shall install any extraction wells or other remedial systems within sixty (60) days after MDEQ's approval of the work plan. PLS shall obtain court ordered access, if necessary, to install, operate, and maintain the extraction well(s) or other remedial systems.

B. Evergreen Subdivision Area.

1. PLS shall submit a work plan to MDEQ by October 31, 2009 to complete the goals of the August 7, 2007 Stipulation and Order Regarding the AE-3 Dispute Resolution:

(a) determine if groundwater contamination from the south is being drawn into the Evergreen Subdivision area by operation of the Evergreen Subdivision area extraction wells; and (b) determine whether 1,4-dioxane contamination above 85 ppb is migrating past the capture zone of extraction wells LB-1 and LB-3. The work plan shall also include vertical profiling in the area of AE-3. PLS shall implement the work plan within thirty days (30) after MDEQ's approval.

2. If the investigation described in B.1 above, reveals that the groundwater contamination has migrated past the capture zone of the LB-1 and LB-3 extraction wells, PLS shall submit a work plan, to address that portion of the groundwater contamination, to MDEQ for review and approval, within thirty (30) days after written notice from MDEQ.

3. PLS shall submit a work plan within thirty (30) days after entry of this Order to: (a) determine the vertical and horizontal extent of 1,4-dioxane contamination greater than 85 ppb, north, west and south of 465 Dupont Circle and in the area of MW-100; (b) determine the migration pathway for 1,4-dioxane from the PLS property to 465 Dupont Circle; and (c) determine if LB-1 and LB-3 are capturing the entire vertical and horizontal extent of contamination in the Dupont Circle and the MW-100 areas.

4. If the investigation in B.3 reveals that 1,4-dioxane contamination greater than 85 ppb in the Dupont Circle and the MW-100 areas is not being captured by the LB-1 and LB-3 extraction wells, PLS shall submit a work plan, to address any contamination not being captured, to MDEQ for review and approval, within thirty (30) days after notice from MDEQ.

C. Maple Road Area. PLS shall install the third nested performance monitoring well, that MDEQ requested, in Veteran's Park approximately 100 feet north of boring PLS-07-09 within ninety (90) days after the entry of this Order.

D. Vertical Aquifer Sampling. PLS shall use vertical aquifer sampling, if requested by MDEQ, for the installation of monitoring and extraction wells. PLS shall use a methodology for vertical aquifer sampling that minimizes the introduction of water or drilling fluids into the subsurface, so as not to influence the chemical concentrations in the groundwater samples that are collected. Where fluids are introduced, the volume of fluids introduced must be removed, plus additional volume to assure that the sample ultimately collected is representative of groundwater in the aquifer.

Honorable Donald E. Shelton

Dated: _____, 2009

LF/Gelman/88-34734-CE/Order to Enforce

STATE OF MICHIGAN

IN THE CIRCUIT COURT FOR THE COUNTY OF WASHTENAW

ATTORNEY GENERAL FOR THE STATE OF
MICHIGAN, ex rel, MICHIGAN DEPARTMENT
OF ENVIRONMENTAL QUALITY,

Plaintiffs,

File No. 88-34734-CE

v

Honorable Donald E. Shelton

GELMAN SCIENCES, INC.,
a Michigan corporation,

Defendant.

Celeste R. Gill (P52484)
Assistant Attorney General
Environment, Natural Resources and
Agriculture Division
P.O. Box 30755
Lansing, MI 48909
(517) 373-7540
Attorney for Plaintiffs

Michael L. Caldwell (P40554)
Fink, Zausmer & Kaufman, P.C.
31700 Middlebelt Road, Suite 150
Farmington Hills, MI 48334
(248) 851-4111

Alan D. Wasserman (P39509)
Williams Acosta, PLLC
535 Griswold St. Suite 1000
Detroit, MI 48226
(313) 963-3873
Attorneys for Defendant

**BRIEF IN SUPPORT OF PLAINTIFFS' MOTION TO
ENFORCE CONSENT JUDGMENT AND REQUEST
FOR ADDITIONAL RESPONSE ACTIVITY**

Introduction

On October 26, 1992, the Plaintiffs, the Attorney General of the State of Michigan, and the Michigan Department of Environmental Quality (MDEQ), as successor to Plaintiffs, Michigan Natural Resources Commission, Michigan Water Resources Commission, and Michigan Department of Natural Resources under Executive Orders 1991-31 and 1995-18 and

the Defendant, Pall Life Sciences, Inc. (Defendant or PLS), (collectively, the Parties), entered into a Consent Judgment to address contamination at and emanating from Defendant's facility located at 600 S. Wagner in Scio Township, Michigan that extends eastward and north-eastward into the City of Ann Arbor, and westward and north-westward in Scio Township (the Site). The compound of concern is 1,4-dioxane, which Defendant used in the manufacture of medical filters. Toxicology testing has identified it as a probable human carcinogen (through long-term exposure to low doses.). The overall goal of the Consent Judgment was to clean up the area-wide groundwater contamination.

The Court has supplemented the Consent Judgment with several cleanup related orders, based on information about the nature and extent of contamination acquired after the Consent Judgment was entered. One such order is the Opinion and Order Regarding Remediation of the Contamination of the "Unit E" Aquifer ("Unit E Order"), dated December 17, 2004.

As described below and in the attachments, Defendant has repeatedly failed or refused to comply with the requirements of the Consent Judgment and the Unit E Order and Plaintiffs seek to enforce the Consent Judgment and the Unit E Order. Plaintiffs also believe that additional investigation and response activities are needed to carry out the goals of the Consent Judgment and the Unit E Order, and ask that the attached Proposed Order be entered requiring the Defendant, to: Perform additional investigation and response activities at Wagner Road; Submit a study analyzing the feasibility of capturing 1,4-dioxane greater than 85 parts per billion (ppb) at Wagner Road; Conduct or complete additional remedial investigations in the Evergreen Subdivision area (including with regard to the AE-3 dispute, the Dupont Circle Area, and the MW-100 Area); Install a third nested performance monitoring well in Veteran's Park, as more specifically described in the Proposed Order.

Factual and Procedural Background

The Consent Judgment required the Defendant to design, install, operate, and maintain several remediation systems to "contain the plumes of groundwater contamination emanating from the [Defendant's] property ... and to extract the contaminated groundwater from the aquifers at designated locations for treatment (as required) and disposal. It also required Defendant to implement a monitoring program to verify the effectiveness of these systems." Consent Judgment, p. 6. One of the groundwater remediation systems required by the Consent Judgment is the Evergreen System.

The objectives of this system shall be: (a) *to intercept and contain the leading edge of the plume of groundwater contamination detected in the vicinity of the Evergreen Subdivision area*; (b) *to remove the contaminated groundwater from the affected aquifer*; and (c) *to remove all groundwater contaminants from the affected aquifer or upgradient aquifers within the Site*. (Emphasis added.)

Consent Judgment Section V.A.I. Section.

The Evergreen System originally consisted of one extraction well, LB-1. Extraction well LB-2 was installed in 1998 to capture shallower contamination. Both are located along Evergreen Drive. Because that system could not contain the plume, another extraction well, AE-1, was installed along Allison Street to capture any 1,4-dioxane migrating past the LB wells. Exhibit 1, Mandle Affidavit ¶ 6.a. Based on representations by the Defendant, that the extent of contamination had been delineated and would be cleaned up within five years, the Court entered its Remediation and Enforcement Order (REO) on July 17, 2000 which required the Defendant to submit a detailed plan to "reduce the dioxane in all affected water supplies below legally acceptable levels within a maximum period of five years." An order adopting the Five Year Plan was entered by the Court on January 10, 2001. And, based on the record before it, the Court set

a minimum purge rate of 200 gallons per minute (gpm) for the LB-1, LB-2, and AE-1 purge wells that made up the Evergreen System.¹

In May 2001, as the result of a MDEQ requested and court ordered investigation of the Western System, the Parties determined that the groundwater contamination at the Site was deeper than originally thought, there was no confining layer of clay separating what was known as the Evergreen or "D2" aquifer from what was thought at the time to be a separate aquifer, designated as the "Unit E" aquifer, and that 1,4-dioxane contamination had migrated into the Unit E aquifer in an area east of the PLS property. The Unit E aquifer was generally believed to be located at lower depths than the Unit D2 aquifer (more than 200 feet below ground level). It has subsequently been determined that Units E and D2 communicate hydraulically and are not separate aquifers, although the extent of the communication and the contamination both on and off the PLS property is not fully known.

The Court held, in the Unit E Order, that the Unit E aquifer was part of the "Western System"² and therefore subject to the terms of the Consent Judgment, including its the overall objective of cleaning up the area-wide contamination. The Court agreed with MDEQ's rationale "that controlling groundwater contamination at or near its source is more efficient than trying to capture it later as it spreads through the aquifer, stating "there is ample support for that position." Unit E Order, p. 8. As a result the Court ordered the Defendant to submit a work plan to MDEQ which would, *to the maximum extent feasible, prevent further migration of groundwater*

¹ The Five-Year Plan provided for a minimum purge rate of 35 gpm for AE-1 well (subsequently reduced to 25 gpm, based on a Capture Zone Analysis (CZA) submitted by Defendant in November 2002 and approved by MDEQ on May 19, 2004). Extraction well AE-1 was subsequently replaced by AE-3, thus making the 25 gpm minimum extraction rate apply to the current Evergreen System extraction well AE-3. Extraction well LB-2 has also been replaced by LB-3, so as currently designed the Evergreen System consists of LB-1, LB-3 and AE-3.

² The Western System was broadly defined as encompassing groundwater contamination outside the "Core" and "Evergreen" System area. [Consent Judgment Section V.C.]

contamination above 85 ppb of 1,4 dioxane eastward into the Unit E aquifer." Unit E Order, p. 9. (Emphasis added).

On or about August 1, 2005, Defendant submitted its Work Plan for Groundwater Extraction, Wagner Road, Unit E Aquifer to MDEQ for review and approval. According to the Defendant, test well (TW-18) operating at 200 gpm would capture the Unit E plume along Wagner Road and therefore the Work Plan proposed using test well (TW-18) as an extraction well.³ Defendant made this assertion while at the same time recognizing that some uncertainty remained as to the southern boundary of the 85 ppb plume. Exhibit 2, pp. 4-5. By a letter dated November 16, 2005, MDEQ conditionally approved the Work Plan, noting that "[o]ur position remains that PLS must take all necessary steps to capture the entire width of the Unit E plume at Wagner Road and prevent further migration of groundwater contaminated above 85 ppb east of Wagner Road. PLS has not shown, nor do the current data establish, that it is not feasible to capture the entire width of the Unit E plume." See, Exhibit 3.

To resolve a dispute in 2007 between the parties regarding the Defendant's prolonged shutdown of the Evergreen System's AE-3 extraction well (which replaced the AE-1), and failure to operate it at the minimum 25 gpm extraction rate the Parties entered into a Stipulation that was approved by the Court on August 7, 2007, requiring Defendant to:

(A) submit an Amended Work Plan for installing an additional monitoring well in the Evergreen Subdivision near Valley Drive (generally between MW-107 and 400 Clarendon Drive) to determine if (i) groundwater contamination from the south (Unit E contamination) is being drawn into the Evergreen Subdivision area by operation of the Evergreen Subdivision extraction wells as asserted by PLS' Motion to Amend Consent Judgment and Petition for Dispute Resolution; and (ii) groundwater contamination has migrated past the capture zones of extraction wells LB-1 and LB-3.

³ Defendant also indicated that it would continue to use extraction wells TW-11 and TW-17 in conjunction with TW-18.

If the investigation revealed that the leading edge of groundwater contamination had migrated past the capture zone of the extraction wells LB-1 and LB-3, Defendant had to submit a work plan to address that portion of the contamination after written notice from MDEQ (and subject to its right to dispute the interpretation of the data or the need for additional work). The MDEQ reserved the right to request additional vertical profiling in the area of AE-3, if the investigation shows that groundwater contamination is migrating beyond the LB-1 and LB-3 extraction wells. Finally, the Stipulation provided that after the work described in the Amended Work Plan was completed, the Parties would meet to discuss the results and seek in good faith to reach a consensus on how to proceed with regard to the proper operation of the Evergreen System.

According to the Defendant, the results of the work done under the Amended Work Plan were inconclusive and neither issue identified in the Stipulation was answered. Exhibits 4 and 5. The Parties began discussing possible modifications to the remedial objectives at the Site, including the objective for the Evergreen Subdivision area, and the Defendant declined to discuss any follow up to the Amended Work Plan under the guise that it would be addressed in its proposed modifications to the Consent Judgment. Defendant submitted its Comprehensive Proposal to Modify Cleanup Program to MDEQ on May 4, 2009 (the "Proposal"). However, because of the Proposal failed to meet the requirements of Part 201 of the Natural Resources and Environmental Protection Act (NREPA)⁴ (as more specifically described in the attached letter from MDEQ dated June 15, 2009), the MDEQ denied the Proposal.⁵ Exhibit 6.

⁴ MCL 324.20101 *et seq.*

⁵ The denial letter also provided significant comments on the items the Defendant needed to address if it wishes to submit an approvable proposal. However, the purpose of this motion is not to argue for or against those modifications, the letter speaks for itself. Further, MDEQ

In a June 23, 2008 letter, sent to Defendant before the Parties began discussing possible modifications in earnest, MDEQ provided the Defendant with a comprehensive list of the items and issues that MDEQ determined needed to be addressed for the protection of public health, safety, welfare and the environment under the Consent Judgment. See Exhibit 7. While the Defendant provided a brief response to that letter in its August 7, 2008 letter, the Defendant focused on preparing a proposal to modify the Consent Judgment. Exhibit 8. Those issues remain unresolved and the Defendant has not provided MDEQ with modifications that comply with Part 201 of the NREPA. Therefore, the State is left with no option but to enforce the Consent Judgment as supplemented by the Court's orders.

Argument

There has been progress in addressing the area wide groundwater contamination associated with Site and conditions in parts of the Site have improved. Because of the complex geology at this Site, the Parties' understanding of the Site has evolved slowly over time. Since entry of the Consent Judgment the parties have discovered new areas of contamination such as the deep contamination in what has been termed the "Unit E" aquifer. Since entry of the Unit E Order, the Parties have also learned that the "Unit E" and "Unit D2" are not separate aquifers, but in fact, are part of the same formation, with substantial communication. While answering some questions, this evolution in knowledge also raises other questions about what needs to be done to ensure the remedial goals at the Site are met. As a result, there remain several significant areas where more investigation and/or response activities are needed to ensure and maintain the protection of public health, safety and welfare, and the environment.

reserves the right to respond to any motion or other request that the Defendant may file seeking the Court's approval of modifications without MDEQ's consent.

Gelman Sciences Inc.

Exhibits listed in 8/14/09 Attorney General Brief in Support of Plaintiffs' Motion to Enforce Consent Judgment and Request for Additional Response Activity

1. [DEQ Aug 2009 Affidavit of Richard Mandle](#)
2. [PLS August 2005 WP for Groundwater Extraction at Wagner Road](#)
3. [Nov 2005 DEQ response to Work Plan for Groundwater Extraction w/attachments](#) (Interoffice Communications from Richard Mandle, 11/3/05 and James Cogger, 11/10/05)
4. [PLS Aug 2007 WP for Well Installation S of Valley Drive](#)
5. [PLS April 2008 Valley Drive Area Investigation \(w/out attachments\)](#)
6. [DEQ June 2009 Response to PLS Proposal](#)
and
[DEQ June 2009 Memo from James Cogger](#)
and
[DEQ June 2009 Memo from Richard Mandle](#)
7. [DEQ June 2008 Letter from S. Kolon to F. Fotouhi et. al. re: Evergreen System and site wide issues\)](#)
and
[DEQ June 2008 Memo from Richard Mandle \(re: Valley Report and AE-3 Capture Analysis\)](#)
and
[DEQ June 2008 Memo from James Cogger \(re: Dupont Report\)](#)
8. [PLS August 2008 Letter from Michael Caldwell to S. Kolon \(re: Evergreen System and site wide issues\) w/out attachments](#)
9. [DEQ August 2009 Affidavit of James Cogger](#)
10. [DEQ Oct 2007 Letter from S. Kolon to F. Fotouhi et. al. \(re: Wagner Road Interim Response\)](#)
and
[DEQ Oct 2007 Memo from James Cogger \(re: Wagner Road Interim Response\)](#)
11. [DEQ March 2006 Response to Performance Monitoring Plan, Wagner Rd.](#)
and
[DEQ March 2006 Memo from James Cogger \(re: Wagner Rd. PMP\)](#)