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July 14, 2009

***VIA REGISTERED MAIL - -
RETURN RECEIPT REQUESTED***

Andrew N. Liveris, CEO and Chairman
Dow Chemical Company
2030 Dow Center
Midland, MI 48764-0001

Dow Chemical Company
Western Division Pittsburg Plant
901 Loveridge Road
Pittsburg, CA 94565-2811

**Re: Notice of Violations and Intent to File Suit under the
Resource Conservation and Recovery Act**

Dear Owner, Site Manager and other Responsible Parties:

NOTICE

On behalf of Northern California River Watch ("River Watch"), I am providing statutory notification to Dow Chemical Company (hereafter referred to as "Dow ") of its continuing and ongoing violations of the Federal Resource Conservation and Recovery Act of 1976 42 U.S.C. § 6901 *et seq.*, ("RCRA"), in conjunction with Dow's continuing operations of a chemical producing company, and in conjunction with inadequate site clean up requirements as described below. Dow is the current owner and operator of the site identified in the BACKGROUND section and other areas of this Notice, and has been for decades. River Watch contends Dow is responsible for ongoing contamination due to past and present releases of highly toxic substances at the site such as dioxin, or pursuant to the provisions of the RCRA by reason of Dow's ownership of the real property on which the hazardous contamination is generated, stored, discarded, and/or otherwise released into the environment.

The RCRA requires that 60 days prior to the initiation of an action for violation of a permit, standard, regulation, condition, requirement, prohibition or order effective under the RCRA, a private party must give notice of the violation to the alleged violator, the Administrator of the Environmental Protection Agency and the State in which the violation is alleged to have occurred. If the alleged violator is an individual or corporation, service of notice shall be accomplished by registered mail addressed to, or by personal service upon, the owner or site manager, with a copy sent to the registered agent of the corporation. (See 42 U.S.C. § 6972(b)(1)(A).)

The RCRA also requires that a private party provide 90 days prior notice to the alleged violator, the Administrator of the Environmental Protection Agency and the State in which the violation is alleged to have occurred before initiating an action which alleges violations resulting in imminent and substantial endangerment to human health or the environment. (See 42 U.S.C. § 6972(b)(2)(A).) However, such an action may be brought immediately after such notification when a violation of Subtitle C of the RCRA (subchapter III 42 U.S.C. §§ 6921 - 6939e) is alleged.

Subchapter III of the RCRA requires hazardous waste to be tracked from the time of its generation to the time of its disposal, and further requires that such waste not be disposed of in any manner that may create a danger to human health or to the environment. As discussed below, Dow operates a chemical manufacturing facility on the banks of New York Slough, the southern portion of San Francisco Bay. The primary materials manufactured include pollutants such as pesticides, fumigants, carbon tetrachloride, hydrochloric acid, latex, and plastics. Dow is releasing toxins to the ground, surface waters, groundwater, New York Slough, and to the air. Pollutants including dioxin, mercury, cyanide, lead, chromium, copper, and arsenic, are used or produced on site. Some of these regularly enter the environment above acceptable levels. A draft report released for public comment in September 1994 by the U.S. Environmental Protection Agency ("EPA") clearly describes dioxin as a serious public health threat. The public health impact of dioxin may rival the impact DDT had on the environment in the 1960's. According to the EPA report, there appears to be no "safe" level of exposure to dioxin.

Dow has either failed to properly label, track and/or report the type, quantity or disposition of waste from that facility, or has failed to use a manifest system to ensure the waste generated is properly handled, stored, treated or disposed of. Dow disposes of partially treated waste water to a sanitary sewer system which itself discharges to New York Slough and San Francisco Bay. The constituents of concern are not removed from the waste stream prior to leaving Dow's control or before entering the groundwater and New York Slough. Dow's mishandling of wastes in violation of Subchapter C of the RCRA has and is creating an imminent and substantial endangerment to human health and/or the environment.

River Watch alleges violations of Subchapter C (subchapter III) with regard to both a violation of a permit, standard, regulation, condition, requirement, prohibition or order effective under the RCRA, as well as for an imminent and substantial endangerment to human health or the environment.

Under the RCRA, notice to a violator regarding an alleged violation of a permit, standard, regulation, condition, requirement, or order which has become effective under the RCRA shall include sufficient information to permit the recipient of the notice to identify the permit, standard, regulation, condition, requirement, or order which has allegedly been violated, the activity alleged to constitute a violation, the person or persons responsible for the alleged violation, the date or dates of the violation (or reasonable range), and the full name, address, and telephone number of the person giving notice. River Watch therefore provides the following information:

1. The standard, limitation, or order alleged to have been violated.

The RCRA, enacted in 1976, is a Federal law of the United States contained in 42 U.S.C. §§ 6901-6992k. Its goals are: to protect the public from harm caused by waste disposal; to encourage reuse, reduction, and recycling; and, to clean up spilled or improperly stored wastes.

The EPA's waste management regulations are codified at 40 C.F.R. §§ 239-282. Regulations regarding management of hazardous waste begin at 40 C.F.R. § 260. Pursuant to the RCRA, the State of California has enacted laws and promulgated regulations that are at least as stringent as the federal regulations.

Dow's tracking, manifesting, labeling, use, disposal, treatment, and storage of waste at its facility identified in the BACKGROUND section of this Notice, and the disposal of those wastes as identified in this Notice has and continues to violate permits, standards, regulations, conditions, requirements and/or prohibitions effective pursuant to the RCRA regarding hazardous waste. [42 U.S.C. § 6972(a)(1)(A)].

Dow's operations at the facility identified in the BACKGROUND section of this Notice have caused contamination of soil, groundwater, surface waters and air, which contamination presents an imminent and substantial endangerment to human health and the environment. Dow owns or operates on-site dumps, discrete conveyances, preferential pathways or wells which have contributed to the transport, partial treatment, storage, or disposal of the wastes at the identified facilities. [42 U.S.C. § 6972(a)(1)(B)].

2. The Activity Alleged to Constitute a Violation

Narratives are set forth below describing with particularity the activities leading to the violations alleged in this Notice. In summary, the RCRA requires that the environment and public be protected from the hazardous wastes generated by Dow. Pollutants described herein found at the facilities identified in the BACKGROUND section of this Notice constitute hazardous waste under the RCRA, and are required to be managed so as to not cause endangerment to the public or the environment. The RCRA specifically protects groundwater.

The liability of Dow stems from either its ownership or operation of the identified facility, or activities conducted at the facilities by Dow which violate the RCRA and have contributed to the past or present handling, storage, treatment, transportation, or disposal of any hazardous waste which may present an imminent and substantial endangerment to health or the environment. River Watch also alleges Dow to be in violation of a permit, standard, regulation, condition, requirement, prohibition, or order which has become effective pursuant to the RCRA. Dow is guilty of open dumping, as that term is used in the RCRA, by discharging pollutants to the open ground, allowing these pollutants to discharge to both groundwater and surface waters. The facilities identified in this Notice do not qualify as a landfill under 42 U.S.C. § 6944, and do not qualify as a facility for the disposal of hazardous waste. Dow has no RCRA-authorized permit for disposal, storage or treatment of solid or hazardous waste of the type currently and historically discharged at the identified facility.

The liability of Dow also stems from its ownership or operation of discrete conveyances, preferential pathways or wells which have caused pollutants to be discharged to surface and groundwaters via Dow's conduits such as unlined dumps, release of partially treated waste water, inadequately closed dumps, pipes, sewer lines, storm drains, utilities and the like, facilitating pollutant migration and discharge to waters of the State of California and the United States, and contributing to the past or present handling, storage, treatment, transportation, or disposal of any hazardous waste which may present an imminent and substantial endangerment to health or the environment.

Dow's past and current operations at the chemical manufacturing site identified in this Notice violates the provisions of RCRA Subtitle C, subchapter III which governs the handling of hazardous wastes. River Watch contends Dow has inadequately maintained records of the manner in which its hazardous wastes have been treated, stored and/or disposed of; inadequately monitored, reported and/or complied with existing regulations concerning its wastes; inadequately provided storage facilities for its wastes; and in the past has not developed adequate contingency plans for effective action to minimize damage from the unauthorized releases of hazardous contaminants – all of which has presented a substantial endangerment to human health and to the environment. River Watch contends Dow does not possess RCRA-authorized permits for its handling of hazardous materials.

3. The discharger responsible for the alleged violation.

The discharger responsible for the alleged violations as described in this Notice are the addressees of this Notice and the entities identified herein, known to be Dow Chemical Company and collectively referred to as "Dow" throughout this Notice.

4. The date or dates of violation or a reasonable range of dates during which the alleged activities occurred.

RCRA is a strict liability statute with a statute of limitations of 5 years; therefore, although violations of RCRA by Dow have occurred for more than 5 years, the range of dates covered by this Notice is July 14, 2004 through the date of this Notice. River Watch will from time to time update and supplement this Notice to include all violations by Dow which occur after the date of this Notice. The majority of the violations identified in this Notice such as: discharging pollutants to groundwater and surface waters; failure to obtain RCRA-authorized permits; failure to implement the requirements of RCRA; failure to properly label, track or report the type, quantity or disposition of waste; failure to use a manifest system to ensure waste generated is properly handled, stored, treated or disposed of; and, failure to meet water quality objectives, are continuous. Therefore each day is a violation. River Watch believes all violations set forth in this Notice are continuing in nature or will likely continue after the filing of a lawsuit. Specific dates of the other violations are evidenced in Dow's own records (or lack thereof) or files and records of other regulatory agencies including, but not limited to the Regional Quality Control Board, GeoTracker, local health departments, sanitation districts County Health Department, Diablo Sanitation District, as well as local police and fire departments.

5. The full name, address, and telephone number of the person giving notice.

The entity giving notice is Northern California River Watch, 500 North Main Street, Suite 110, Sebastopol, CA 95472, telephone and facsimile 707-824-4372, E-mail US@ncriverwatch.org, referred to in this Notice as "River Watch".

River Watch is a non-profit corporation organized under the laws of the State of California. River Watch is dedicated to the protection and enhancement of the waters of the State of California including all rivers, creeks, streams and groundwater in Northern California.

River Watch has retained legal counsel with respect to the issues raised in this Notice letter as regards Dow and the facilities identified in the BACKGROUND section of this Notice letter.

All communications regarding the same should be addressed to:

Jack Silver, Esquire
Law Offices of Jack Silver
P.O. Box 5469
Santa Rosa, CA 95402-5469
Tel. 707-528-8175
Fax. 707-528-8675

BACKGROUND

A. Setting and Historic Use

The San Francisco Regional Water Quality Control Board has listed all segments of San Francisco Bay as impaired due to mercury pollution as of the year 2000. The Sacramento San Joaquin Delta which forms the Bay is listed as impaired for chlordane, DDT, dieldrin, dioxin compounds, furan compounds, exotic species, mercury, nickel, PCBs, dioxin-like PCBs, and selenium. The groundwaters affected by Dow are designated for municipal and domestic supply.¹ Surface waters are used for commercial and sport fishing, municipal supply, agricultural supply, fish spawning and migration, and water contact recreation. Dow's facility is located at 901 Loveridge Road, Pittsburg, Contra Costa County, California. The site is large, located adjacent to wetlands, and directly connected to creeks, canals, and a slough (tidal marsh), all of which are connected to Suisun Bay, San Francisco Bay and the Pacific Ocean.

Since 1939 Dow has operated a chemical facility on the banks of New York Slough a portion of San Francisco Bay. Since 1965, Dow has been required to clean up its site.² The facility sits at sea level and the groundwater beneath the site is at all times subject to tidal influences. The facility is classified as a major discharger. From 1939 to 1991, elemental mercury was used to produce chlorine at this facility. The plant also produced chlorinated solvents, carbon tetrachloride and tetrachloroethene. For the past 70 years, numerous highly toxic substances have been utilized, dumped, spilled, and manufactured on this site and released off this site. "As a result of spills and releases due to past chemical handling practices, groundwater beneath the site is extensively contaminated with chlorinated solvents and other volatile and semi-volatile organic chemicals (VOCs and SVOCs)"³ as well as mercury, dioxin, cyanide, lead, etc.

¹ WDR R2-2002-0007 ;San Francisco Regional Water Quality Control Board

² GeoTracker Site Summary tab, 901 Loveridge Road, Pittsburg, CA

³ San Francisco Regional Water Quality Control Board October 10, 2000. Administrative Civil Liability Amended complaint No. 00-073

B. Present Day Use

Currently, the site contains chemical manufacturing facilities, a groundwater treatment plant, one active Class II landfill, and a number of inactive or closed solid waste management units - or dumps, leaching contaminants into ground water.⁴ The contaminants migrate to the banks of Bundesen Bay and New York Slough, a portion of San Francisco Bay.

Dow manufactures agricultural chemicals, fumigants, fungicides, carbon tetrachloride, hydrochloric acid, latex, and plastics. Byproducts include cyanide, dioxin, copper, and mercury, just to name a very few of the toxic and hazardous chemicals associated with this large facility. Dow conducts chemical research, filters water withdrawn from the impaired water bodies and returns the pollutants back to those impaired water bodies as a part of its process. It discharges partially treated groundwater contaminated with dangerous constituents and storm water associated with industrial processes to a local sewage treatment plant that also discharges to New York Slough. Hollow fiber production and power plant operations are conducted on the site by non-Dow companies.

The Regional Water Quality Control Board attempts to regulate Dow Chemical by way of several permits. According to the U.S. EPA however, Dow non-compliance permits have issued each quarter from January 2006 to December 2008 (most recent quarter not reported at present).

Dow continues to operate and control a very contaminated site, to produce dangerous products, to utilize extremely hazardous ingredients in its manufacturing, and to generate concentrated polluted wastewater. Some of the wastewater is routed to a publicly operated sewage treatment facility that also has its disposal location in San Francisco Bay's New York Slough. Millions of gallons a week of the concentrated discharge from the filtration process is released directly into the Slough 25 feet below the water's surface.

C. Releases in Excess of Limits Protective of Human Health and the Environment

Releases by Dow from the site in excess of limits protective of human health and the environment include but are not limited to dioxin, methylmercury, vinyl chloride, copper, arsenic, cyanide, 1,2-dichloroethene, tetra-chloroethene, and chlorobenzene. Each sampling event represents only a moment in time, however the releases are occurring for many hours every day. Dow is a multinational corporation with facilities in Africa, India, Europe, Latin America and the Middle East. It maintains a website wherein it asserts a commitment to the planet, to water, to sustainability, and to enhancing the quality of life of current and future generations. Dioxin is a term that describes a group of chemicals which are highly persistent in the environment. The most toxic compound is 2,3,7,8-tetrachlorodibenzo-p-dioxin or

⁴ Report on Constituents of Concern, DOW 2003

TCDD. Dow was nonetheless granted a permit to release this chemical into New York Slough under the strict supervision of the Regional Water Quality Control Board. Dow exceeds those permit limits. As recently as July 2008 and January 2009, for example, dioxin was reported to exceed by many times, the limits deemed protective of the environment and humans (9 and 5.13 mg/l respectively).

Dioxin like many toxic chemicals and compounds bioaccumulate in wildlife. Marine life is especially susceptible to high levels of bioaccumulation, and much of the sea life is ingested by humans. Dioxins and furans are some of the most toxic chemicals known to science. A draft report released for public comment in September 1994 by the U.S. EPA clearly describes dioxin as a serious public health threat.⁵

The intake water used by Dow is taken from the significantly impaired water bodies. It is then filtered and the concentrated and undesirable pollutants, referred to as simply brine, are discharged back to the impaired New York Slough. Mixed in with the concentrated pollutants are the chemical additives and build up of materials in the towers, much of which is toxic, which is blown down and discharged to New York Slough. This discharge represents millions of gallons per week.

In May of 2008, cyanide sampling data from Dow exceeded the monthly limit set in the discharge permit.⁶

The total permitted discharge by Dow into New York Slough, a portion of Suisun is significant. It is permitted to dispose of copper, cyanide, and even dioxin into New York Slough. However, Dow continues to discharge these harmful chemicals and byproducts above the limit deemed protective of humans and the environment and has knowingly done so for many years.

D. Remediation Efforts

Some efforts have been made over recent years to remediate the pollution. The San Francisco Regional Water Quality Control Board has documented violations and issued formal and informal orders to Dow several times in the past three years requesting that Dow comply. Although a vital company, Dow continues to take an incremental approach to the serious and chronic situation that adversely affects public health and the environment in Northern California. The serious nature of the pollution and danger posed by Dow to

⁵ "The public health impact of Dioxin may rival the impact that DDT had on public health in the 1960's. According to the EPA report, there does not appear to be a 'safe' level of exposure to Dioxin."
environmentaljustice.net

⁶ Cease and Desist Order R2-2008-0031

humans and the environment requires that strict compliance with environmental laws be its first priority.

E. Continuing Violations

Dow continues to directly discharge dioxin into the enclosed estuary that is San Francisco Bay's New York Slough in amounts that exceed its permit limits. In addition to that direct, on-going unauthorized releases of hazardous material, Dow continues to discharge hazardous chemicals by virtue of the fact that its site is still highly contaminated after many years and the soils and groundwater co-mingle with surface waters of the Bay.

The minimum five-foot separation required between contaminated soils and groundwater, necessary to begin to protect the integrity of ground and hydrologically connected surface waters, is not maintained.⁷ This is significant insofar as the contamination in the soil is very extensive. Inadequate and piecemeal manner of treatment methods, pump failures, non aggressive remediation efforts, and other discharge violations, continue to result in releases of contamination from this site to surface waters.

In 2008 Dow reported that ground water separation minimum requirements were not met in at least 14 water level monitoring points.

The ground surface at this site is at sea level or below. Soils and groundwater contaminated with chemicals mingle, especially at higher tides, with the waters of the Bay less than fifty feet away. Groundwater migrates both vertically and horizontally. Seeps containing toxic chemicals have been documented at the banks of Bundesen Bay and near the historic chemical dump sites. Groundwater and tidal waters come into direct contact with untreated and extremely toxic substances byway of leaching and through actual contact with contaminated soils.

Investigations of mercury pollution occurred in 1999 and again in 2008. In the interim 9 years, mercury continued to be released into the estuary. As of July 2008, mercury readings in a monitoring well at a point where the site meets the shoreline, was found to be 240mg/kg or 240,000 ppb. In 2008, Dow reported, "high concentrations of mercury have been observed in shallow groundwater," in existing wells (204A).⁸ The semi annual sampling report for August 2008 reported mercury in the groundwater near the

⁷ Semiannual and Annual Reports 2005 and 2007--- "However, for sumps S-731 and S-734, the separation between the bottom of the waste and the water in the sumps was 4.56 and 4.65 feet, respectively.On June 25th, 2005 the on-site water treatment plant was shut down due to failure of a carbon bed, and hence extraction from the Monofill sumps was suspended in order to make treatment plant repairs.

⁸ Dow Chemical Company Mercury Investigation page 1-1 December 2008.

perimeter of the site at 0.459 μ /l and 0.508 μ /l. In 1997, the San Francisco Regional Water Quality Control Board sent a letter to Dow requiring Dow submit a plan to determine the unusually high concentrations of lead discharging from the site. The readings at that time were 770 parts per billion (ppb). The maximum contaminant level allowed for lead in this water body is 1.5 ppb (μ g/l).

Cyanide, copper, and dioxin are just a few of the other highly toxic chemicals that continue to be discharged the these facility. The facility takes in water from the slough and the canal adjacent to the site. It uses approximately half of the water before discharging the other half in the form of concentrated pollutants, or what Dow refers to as brine, (millions of gallons per week) back into the estuary.

After years of study, investigation, and monitoring, the levels of arsenic in the groundwater are very high. The site is adjacent to a tidal marsh and shares the groundwater with the slough and is hydrologically and hydraulically connected to waters of the United States. Arsenic readings in July of 2008 were 81 μ /l, 11 μ /l, and 400 μ /l. Mercury was 0.429 μ /l. It was reported that the average mercury concentrations in surface and sediment samples collected from the former Outfall Pond area on the site exceeded California's hazardous waste threshold.

With respect to other constituents of a highly toxic nature, chlorobenzene was detected as high as 600 μ /l in the year 2000 (limit is 70 μ /l.). Vinyl Chloride was as high as 20,000 μ /l and the maximum limit is 0.5 μ /l. The sampling again only represents a moment in time, however the contaminated soils leach and otherwise make contact with ground and surface waters repeatedly over time. Tetrachloroethene, trichloroethene, and methylene chloride were measured in the thousands of micrograms per liter; and maximum allowable limits for these are only 5 μ /l.

Sampling of the contaminated soils and groundwater in 2008 indicated that in many areas the contamination is the same or worse than it was in 2007. For example, 1,2-dichloroethene was at 4.09 μ /l in 2007 and 14.56 μ /l in 2008. 1,2-dichloropropane was 1,240 μ /l in 2007 and 2,010 μ /l in 2008.

Partially treated groundwater extracted from the soils and groundwater beneath the site which are highly contaminated with chemicals, is released to the publicly operated sewage treatment plant which also discharges to New York Slough. Sewage treatment plants are not designed to treat and neutralize hazardous and toxic substances.

Contaminated groundwater from Dow's facility discharges to New York Slough, a Regional Water Quality Control Board Basin Plan designated municipal water source, that is protected by several state and federal laws (described in detail in Dow's permit), created to protect sensitive and important habitats, food, sources, and other beneficial uses. Even

after chemical dumps are closed, they continue to leach contaminants for many years especially if rain is permitted to flow through the chemicals and soil. Closure of Dow's historic dumps has not prevented rain from entering the dump piles.⁹

Monitoring, the geomorphology of the area around the facility, as well as visual observations indicate significant migration of pollutants. The soil and groundwater contamination at the facility has been migrating for decades, contaminating waters of the State of California, waters of the United States, groundwaters and surface waters. River Watch believes remediation must be conducted proactively to remove existing threats both to the environment and to humans.

Pollutants have been discharged from the facility to the soil and surface waters and enclosed estuary for decades. Discharges by Dow continue to this day as do the adverse effects of prior discharges. As required by the RCRA and California's implementation of the RCRA, Dow has: failed to prevent a release; failed to properly detect and monitor releases; failed to properly report and keep records of releases; and, failed to take proper corrective action. Dow continues to discharge pollutants to groundwater and surface waters, and has failed to obtain RCRA-authorized permits, implement the requirements of the RCRA, meet water quality objectives, properly label, track or report the type, quantity or disposition of the waste or use a manifest system to ensure that the waste generated is properly handled, stored, treated or disposed of. All of these violations are ongoing.

Although Dow has caused and has known about the serious problems with its process and its contaminated site, the efforts to remediate have been piecemeal, involuntary, and extremely slow, especially when seen in comparison with the potential ability of Dow to properly clean up and manage this site. Monitoring and investigation have been drawn out for many years¹⁰ and have been conducted in a haphazard manner. Although the site is highly contaminated, studies are narrowly focused resulting in many chemicals being under monitored and not cleaned up. Each study of a chemical takes months and sometimes years to design and implement.

This site remains a substantial source of hazardous pollution threatening human population and the local area environment. River Watch believes Dow must work much more proactively to neutralize the soil and groundwater beneath and around this site by employing best available technology as required by the Basin Plan. Current levels of groundwater extraction may be insufficient for the size of the plume to be remediated. The seriousness of the continued pollution issues, exceedances of permitted limits of discharge and the large amount of time that has already elapsed, are indications that Dow has not devoted adequate resources to properly deal with its manufacturing processes or clean up

⁹ July through December 2007 Annual Report Vol. I

¹⁰ 1999, Evaluation of Mercury in shallow Groundwater; (Radian 2000); 2000 Additional Investigation of Mercury in Groundwater (URS Corp)

efforts. Available data on this site should include current estimates of contaminant plume mass, identification of the fastest remediation methods available, adoption of practices that result in zero discharge of pollutants, and commitment of adequate resources to protect humans and the environment.

F. Contaminated Storm water Discharge

As of 2008, storm water runoff associated with industrial processes have been routed to the treatment plant and then enter the publicly owned sewage treatment plant. That plant, Delta Diablo Sanitation District, also uses New York Slough as its disposal area. Prior to the disposal of storm water at the sewage treatment plant, the discharge of copper in storm water exceeded the limit deemed protective of beneficial uses on numerous occasions. Copper is now entering the sewage treatment plant and then being disposed of in the Bay. According to the U.S. Department of Health and Human Services, some of the ways in which copper enters the environment are through manufacturing operations and through waste water releases into rivers and lakes. Copper bioaccumulates in marine life which is ingested by humans. Some of the risks of breathing or ingesting high levels of copper are irritation to the nose and throat, nausea, vomiting and diarrhea, damage to liver and kidneys and even death.

REGULATORY STANDARDS

The goals of the RCRA are the protection of the public and the environment from harm caused by waste storage and disposal, and to mandate the proper remediation of soil and groundwater which has been contaminated by hazardous waste and hazardous products, including petroleum hydrocarbons and gasoline formula constituents. The RCRA is a strict liability statute with a statute of limitations of five years. Pursuant to the RCRA, California has enacted laws and regulations that must be observed in conjunction with the RCRA provisions.

California's "Water Quality Objectives" exist to ensure protection of the beneficial uses of water. Several beneficial uses of water exist, and the most stringent water quality objectives for protection of all beneficial uses are selected as the protective water quality criteria. Alternative cleanup and abatement actions need to be considered that evaluate the feasibility of, at a minimum: (1) cleanup to background levels, (2) cleanup to levels attainable through application of best practicable technology, and (3) cleanup to protective water quality criteria levels. Existing and potential beneficial uses of area groundwater include domestic, agricultural, industrial and municipal water supply.

The Regional Water Quality Control Board has adopted a Water Quality Control Plan or Basin Plan which designates all surface and groundwater within the North Coast and San Francisco Bay regions as capable of supporting domestic water supply. The Regional Board

has adopted Maximum Contaminant Levels (“MCLs”) and/or Water Quality Objectives (“WQOs”) for all the pollutants identified in this Notice.

A. Violations of Permits, Standards and Regulations - 42 U.S.C. § 6972(a)(1)(A)

Dow is in violation of provisions of the RCRA including, but not limited to, provisions governing general operating requirements for hazardous chemicals, release detection and prevention requirements, release reporting and investigation requirements, and release response and corrective action requirements. The contaminant levels in groundwater at the site identified in this Notice are significantly greater than the allowable MCLs and/or WQOs for said constituents. Dow has: failed to prevent a release; failed to properly detect and monitor releases; failed to properly report and keep records releases; and, failed to take proper corrective action.

1. Mishandling of Hazardous Waste - 42 U.S.C. § 6924 et seq.

Since 1939 Dow has operated a chemical facility on the banks of New York Slough, a portion of San Francisco Bay and has manufactured, disposed of, and stored hazardous chemicals and materials at the site in a manner which has allowed significant quantities of hazardous constituents to be discharged to soil and groundwater beneath the facility and into the marine environment. Contaminant levels in groundwater at the site are significantly greater than the allowable MCLs and/or WQOs for said constituents.

River Watch alleges that Dow has, at all times material, engaged in the following activities in violation of the RCRA’s waste handling provisions:

- a. Failed to adequately maintain records of hazardous wastes identified in this Notice which were treated, stored or otherwise disposed of on or offsite [42 U.S.C. §6924(a)(1)];
- b. Failed to satisfactorily monitor, inspect, and report in accordance with RCRA provisions [42 U.S.C. §6924(a)(2)];
- c. Failed to adequately treat, store or properly dispose of hazardous wastes found at the site identified herein [42 U.S.C. §6924(a)(3)];
- d. Failed to adequately locate, design and construct hazardous waste treatment, storage or disposal facilities [42 U.S.C. §6924(a)(4)]; and,
- e. Failed to properly implement contingency plans for effective action to minimize unanticipated damage from treatment, storage or disposal of hazardous waste found at the site identified herein [42 U.S.C. §6924(a)(5)].

2. Unpermitted Handling, Treatment, Storage, Transportation and/or Disposal of Hazardous Waste - 42 U.S.C. § 6925

River Watch alleges that Dow has, at all times material, engaged in the following activities in violation of RCRA's waste handling provisions:

- a. Dow's deposition and maintenance of hazardous waste as described herein causes and has caused the generation and discharge of hazardous waste to the environment;
- b. Dow has installed and maintained a system of conveyances to dispose of the hazardous generated and released from its facilities identified in this Notice;
- c. Dow does not possess permits for the handling, storage, treatment, transportation, and/or disposal of its hazardous or solid waste at the facilities identified in this Notice;
- d. Dow's unpermitted handling, storage, treatment, transportation and/or disposal of its hazardous waste is in violation of RCRA § 3005, 42 U.S.C. § 6925;
- e. Information currently available to River Watch indicates that Dow's handling, treatment, storage, transportation, and/or disposal of its hazardous waste in violation of RCRA § 3004 has occurred every day since at least July 14, 2004, or on numerous separate occasions, and, that those violations are continuing.

3. Prohibition Against Open Dumping - 42 U.S.C. § 6945

River Watch alleges that Dow has, at all times material, engaged in the following activities in violation of the RCRA's waste handling provisions:

- a. Dow has engaged in open dumping by its discharge of hazardous waste to open ground where it will and has contaminated the soils, groundwater and surface waters as described herein;
- b. Dow's facility does not qualify as a landfill under 42 U.S.C. § 6944, and does not qualify as a facility for the disposal of hazardous waste;
- c. Dow has no RCRA-authorized permit for the disposal, storage or treatment of solid or hazardous waste of the type currently and historically discharged at the identified facility;

- d. Information currently available to River Watch indicates that Dow's open dumping in violation of RCRA § 4005 has occurred every day since at least July 14, 2004, and on numerous separate occasions, and that those violations are continuing.

B. Violations Creating Imminent and Substantial Endangerment - 42 U.S.C. § 6972(a)(1)(B)

Dow is responsible for the high levels of dioxin, copper, mercury, cyanide, arsenic and many other dangerous chemicals in groundwater and its underwater discharge in amounts significantly greater than the allowable MCL and/or WQO for said constituents. Most of the chemicals and byproducts utilized and manufactured are known to harm both marine life and humans. The concentration of these pollutants at the facilities and site identified in this Notice is creating an imminent and substantial endangerment to public health and the environment.

The violations alleged in this Notice are knowing and intentional in that Dow has used, dumped, failed to clean up, discharged, and manufactured, these dangerous chemicals and byproducts, at its facility which are known to contain hazardous substances, and it has intended that such products will be sold to and used by the public. Dow has known of the contamination at its facilities for decades, and has also known that failing to promptly remediate the pollution allows the contamination to migrate through soil and groundwater into the San Francisco Bay and to continually contaminate and re-contaminate actual and potential beneficial uses such as municipal supply.

Violations of the RCRA of the type alleged herein are a major cause of the continuing decline in water quality, environmental degradation, and bioaccumulation of harmful toxins in wildlife and humans in Northern California. With every discharge, groundwater and estuarian waters are contaminated. These discharges can and must be controlled in order for the water supply to once again become safe.

In addition to the violations set forth above, this Notice is intended to cover all violations of RCRA evidenced by information which becomes available to River Watch after the date of this Notice.

CONCLUSION

The violations of Dow as set forth in this Notice affect the economic stability, physical health and aesthetic enjoyment of River Watch and its members who reside and recreate in the affected watershed areas. The members of River Watch use the watershed for domestic water supply, agricultural water supply, recreation, sports, fishing, swimming, shellfish harvesting, hiking, photography, nature walks and the like. Their health, use and

enjoyment of this natural resource are conditions specifically impaired by the violations of the RCRA described in this Notice.

River Watch believes that this Notice sufficiently states grounds for filing suit under the statutory and regulatory provisions of the RCRA as to the site and facilities referenced above. River Watch is willing to discuss effective remedies for the violations referenced in this Notice. If Dow wishes to pursue such discussions in the absence of litigation, it is encouraged to initiate such discussions immediately. River Watch will not delay the filing of a lawsuit if discussions have not commenced within a brief period of time following the receipt of this Notice, pursuant to the provisions of Subtitle C of the RCRA, subchapter III.

Very truly yours,



Jack Silver

JS:lh

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