COMMITMENT & INTEGRITY
DRIVE RESULTS

1520 Highland Avenue
Cheshire, Connecticut 06492
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October 23, 2008

Mr. Dennis McChesney
Ground Water Compliance Section, 20th Floor
United States Environmental Protection Agency
290 Broadway
New York, NY 10007-1866

Subject: Underground Injection Control Permit
Class V Wells for a Potassium Permanganate Application
Hangar D, Westchester County Airport
White Plains, New York

Dear Mr. McChesney:

Pursuant to our telephone conversation on October 22nd, this correspondence provides inventory information and a description of activities to implement a potassium permanganate application at Hangar D of the Westchester County Airport located in White Plains, New York. A work scope has been provided under separate cover to the New York State Department of Environmental Conservation (NYSDEC) for its approval. The following sections provide a summary of this proposed work scope.

1.0 PROPOSED ACTIONS

Woodard & Curran first plans to conduct a one day pre-application investigation to advance up to seven soil borings in the north corner of Hangar D (refer to Figure 1). Soil borings will be advanced continuously from the ground surface to the top of bedrock. Continuous soil samples will be collected in acetate sleeves, visually classified and screened for total volatile organic compounds (TVOCs) using a photoionization detector. One soil sample will be collected from each boring for VOC analysis from the interval with the highest TVOC reading or just above the water table. In addition, one soil sample will be collected from the southernmost boring for soil oxidant demand (SOD) testing. A 2-inch PVC test point will be completed within each bore hole. The points will be set at the top of bedrock (approximately 15 feet below the hangar floor) constructed of 10 feet of 2" dia. 10-slot PVC screen and #1 sand pack. Groundwater samples will be collected from each test point and analyzed for VOCs and field groundwater quality parameters (dissolved oxygen, oxidation-reduction potential, pH, temperature and conductivity).

Once the pre-application activities are complete, Woodard & Curran will conduct a one day potassium permanganate application. A Material Safety Data Sheet for potassium permanganate is included as Attachment A. Up to 175 kilograms (385 pounds) of potassium permanganate will be added to four locations in the area of well MW-01: three points proposed for the north (upgradient) corner of the hangar and to existing well MW-8S. Existing wells MW-02 and MW-7S, existing points GP-2B, GP-03, and the proposed new test point downgradient (south) of GP-2B will be available for post-addition monitoring. Local groundwater contours and relative elevations are included in Attachment B.

The potassium permanganate will be premixed in a mix tank and applied to the subsurface with a high-pressure grout pump. The mix tank will consist of a 125-gallon open topped drum. The powdered potassium permanganate will be mixed with water in the 125-gallon drum, which will be

placed on polyethylene sheeting to minimize the chance of spills. The solution will be pumped with a high pressure grout pump into the aquifer at a rate of 15-20 gallons per hour.

One month and three months following application activities, field groundwater quality parameters (dissolved oxygen, oxidation-reduction potential, pH, temperature and conductivity) will be monitored in all monitoring wells and test points and groundwater will be sampled and analyzed from up to 15 monitoring wells and any test points not used for potassium permanganate application. Groundwater samples will be analyzed for VOCs by EPA Method 8260. Thereafter, the prevailing quarterly groundwater monitoring plan for the site will resume.

Work will be conducted under the prevailing Health & Safety Plan for the site.

2.0 SCHEDULE

The pre-application and application activities are expected to take four field days and are planned for November 2008. Post-application groundwater sampling events are proposed one month and three months following application, in December 2008 and February 2009.

3.0 REPORT OF FINDINGS

Within sixty days of receipt of post-application laboratory analytical data, Woodard & Curran will summarize the results and findings in a letter to NYSDEC. The information presented in the letter will include:

- Summary of activities, field data, and laboratory results;
- Expanded understanding of the chemical distribution in subsurface media and a refined groundwater contour map below the hangar floor;
- Evaluation of the persistence of potassium permanganate in the subsurface; and
- Dissolved contaminant percent reductions observed as a result of application activities.

Please do not hesitate to contact me at (203) 271-0379 with if you need any additional information to facilitate your review and approval of this work scope. Thank you again for your time and assistance.

Sincerely,

WOODARD & CURRAN INC.

Anne E. Proctor, PE
Sr. Project Manager

cc: M. Lamarre – ExxonMobil
M. Tipple – NYSDEC
N. Walz – NYSDOH
M. Parletta - Westchester County Airport
M. DeGloria - GES

Attachments:

Inventory of Injection Wells Form
Figure 1: Site Plan
Attachment A: Material Safety Data Sheet for Potassium Permanganate
Attachment B: Dec. 2001 Remedial Investigation Report Figures 3-1 and 3-2

0206924.03.003

Type or print all information. See reverse for instructions. OMB No. 2040-0042 Approval Expires 4/30/07

INVENTORY OF INJECTION WELLS

UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
OFFICE OF GROUND WATER AND DRINKING WATER

(This information is collected under the authority of the Safe Drinking Water Act)

1. DATE PREPARED *(Year, Month, Day)*: 08-10-23

2. FACILITY ID NUMBER: NYS360037

PAPERWORK REDUCTION ACT NOTICE

The public reporting burden for this collection of information is estimated at about 0.5 hour per response, including time for reviewing instructions, searching existing data sources, gathering and maintaining the data needed, and completing and reviewing the collection of information. Send comments regarding the burden estimate or any other aspect of this collection of information, including suggestions for reducing this burden, to Chief, Information Policy Branch, 2136, U.S. Environmental Protection Agency, 401 M Street, SW, Washington, DC 20460, and to the Office of Management and Budget, Paperwork Reduction Project, Washington, DC 20503.

3. TRANSACTION TYPE *(Please mark one of the following)*

- [ ] Deletion
- [x] First Time Entry
- [ ] Entry Change
- [ ] Replacement

4. FACILITY NAME AND LOCATION

A. NAME *(last, first, and middle initial)*: Hangar D, Westchester County Airprot

B. STREET ADDRESS/ROUTE NUMBER: 184 Airport Road

C. LATITUDE

DEG	MIN	SEC
41	04	15 .

D. LONGITUDE

DEG	MIN	SEC
73	42	15 .

E. TOWNSHIP/RANGE

TOWNSHIP	RANGE	SECT	1/4 SECT
NA			

F. CITY/TOWN: White Plains

G. STATE: NY

H. ZIP CODE: 10604

I. NUMERIC COUNTY CODE: 119

J. INDIAN LAND *(mark "x")*: [ ] Yes [x] No

5. LEGAL CONTACT:

A. TYPE *(mark "x")*: [ ] Owner [x] Operator

B. NAME *(last, first, and middle initial)*: Lamarre, Michael A.

C. PHONE *(area code and number)*: (401) 434-7358

D. ORGANIZATION: ExxonMobil Environmental Services Co.

E. STREET/P.O. BOX: 1001 Wampanoag Trail

F. CITY/TOWN: Riverside

G. STATE: RI

H. ZIP CODE: 02195

I. OWNERSHIP *(mark "x")*

- [x] PRIVATE
- [ ] PUBLIC
- [ ] SPECIFY OTHER
- [ ] STATE
- [ ] FEDERAL

6. WELL INFORMATION:

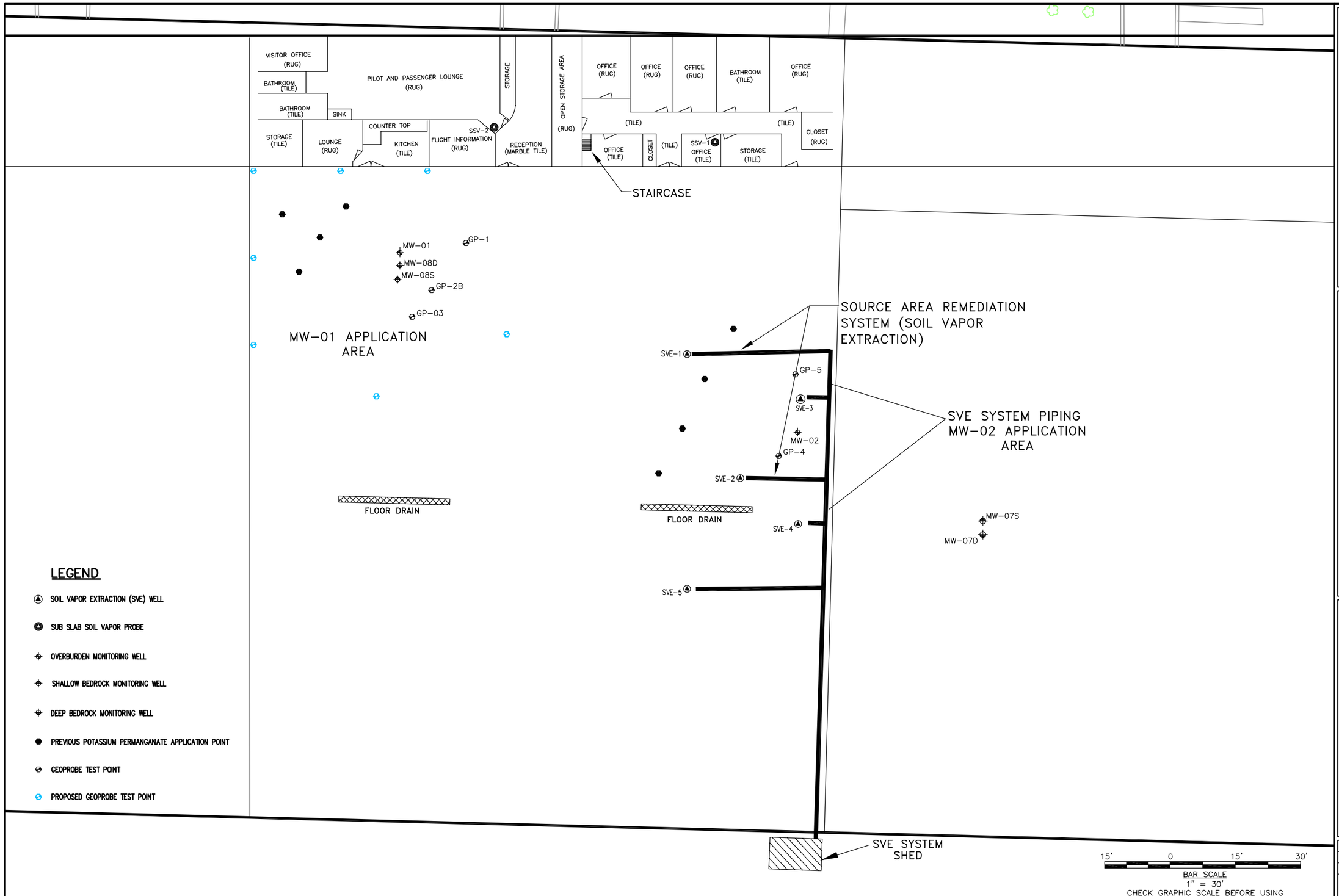
A. CLASS AND TYPE		B. NUMBER OF WELLS		C. TOTAL NUMBER OF WELLS	D. WELL OPERATION STATUS				
		COMM	NON-COMM		UC	AC	TA	PA	AN
5	B		4	4	3	1			
				0					
				0					
				0					
				0					
				0					
				0					

COMMENTS *(Optional)*: Wells include one well presently used for groundwater monitoring and three proposed test points.

KEY:

DEG = Degree
MIN = Minute
SEC = Second
SECT = Section
1/4 SECT = Quarter Section

COMM = Commercial
NON-COMM = Non-Commercial
AC = Active
UC = Under Construction
TA = Temporarily Abandoned
PA = Permanently Abandoned and Approved by State
AN = Permanently Abandoned and not Approved by State



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CHESHIRE, CONNECTICUT 06410
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COMMITMENT & INTEGRITY DRIVE RESULTS

WOODARD & CURRAN

SITE PLAN

DESIGNED BY: SH
DRAWN BY:
CHECKED BY: AP
206924_U1 0908.dwg

EXXONMOBIL REFINING & SUPPLY
INWOOD, NEW YORK

WESTCHESTER COUNTY AIRPORT

JOB NO: 206924
DATE: SEPT. 2008
SCALE: 1" = 30'

FIGURE 1

ATTACHMENT A – MATERIAL SAFETY DATA SHEET FOR POTASSIUM PERMANGANATE

RemOx®S
ISCO Reagent

EC- SAFETY DATA SHEET according to Regulation (EC) № 1907/2006 of the European Parliament and of the Council, of 18 December 2006 concerning REACH

MATERIAL SAFETY DATA SHEET

Section 1 Chemical Product and Company Identification

PRODUCT NAME: RemOx® S ISCO Reagent **TRADE NAME:** RemOx® S ISCO Reagent	**Revised Date: April 2008**
USES OF SUBSTANCE: RemOx® S ISCO Reagent is an oxidant recommended for applications that require a strong oxidant.	

COMPANY NAME (Europe): CARUS NALON S.L.	**COMPANY ADDRESS:** Carus Nalon S.L. Barrio Nalon, s/n 33100 Trubia-Oviedo Espana, Spain **INFORMATION:** (34) 985-785-513 (34) 985-785-513 www.caruseurope.com (Web) carus@carusnalon.com (Email) **EMERGENCY TELEPHONE:** (34) 985-785-513
COMPANY NAME (US): CARUS CORPORATION	**COMPANY ADDRESS:** 315 Fifth Street Peru, IL 61354, USA **INFORMATION:** (815)-223-1500 www.caruscorporation.com (Web) salesmkt@caruscorporation.com (Email) **EMERGENCY TELEPHONE:** (800) 435 –6856 (USA) (800) 424-9300 (CHEMTREC, USA) (815-223-1500 (Other countries)

Section 2 Hazards Identification

1. **EYE CONTACT**
   RemOx® S ISCO Reagent is damaging to eye tissue on contact. It may cause severe burns that result in damage to the eye.

2. **SKIN CONTACT**
   Contact of solutions at room temperature may be irritating to the skin, leaving brown stains. Concentrated solutions at elevated temperature and crystals are damaging to the skin.

3. **INHALATION**
   Acute inhalation toxicity data are not available. However, airborne concentrations of RemOx® S ISCO Reagent the form of dust or mist may cause damage to the respiratory tract.

4. **INGESTION**
   RemOx® S ISCO Reagent , if swallowed, may cause severe burns to mucous membranes of the mouth, throat, esophagus, and stomach.

Section 3 Hazardous Ingredients

MATERIAL OR COMPONENT	CAS NO.	EINECS	HAZARD DATA
Potassium Permanganate	7722-64-7	231-760-3	**PEL/C** 5 mg Mn per cubic meter of air
			TLV-TWA 0.2 mg Mn per cubic meter of air

HAZARD SYMBOLS:


O


Xn


N

RISK PHRASES:

8 Contact with combustibles may case fire.
22 Harmful if swallowed.
50/53 Very toxic to aquatic organisms, may cause long-term effects in the aquatic environment.

SAFETY PHRASES:

60 This material and its container must be disposed of as hazardous waste.
61 Avoid releases to the environment. Refer to special instructions / Safety data sheet.

Section 4 First Aid Measures

1. **EYES**
   Immediately flush eyes with large amounts of water for at least 15 minutes holding lids apart to ensure flushing of the entire surface. Do not attempt to neutralize chemically. Seek medical attention immediately. **Note to physician**: Soluble decomposition products are alkaline. Insoluble decomposition product is brown manganese dioxide.

2. **SKIN**
   Immediately wash contaminated areas with water. Remove contaminated clothing and footwear. Wash clothing and decontaminate footwear before reuse. Seek medical attention immediately if irritation is severe or persistent.

3. **INHALATION**
   Remove person from contaminated area to fresh air. If breathing has stopped, resuscitate and administer oxygen if readily available. Seek medical attention immediately.

4. **INGESTION**
   Never give anything by mouth to an unconscious or convulsing person. If person is conscious, give large quantities of water. Seek medical attention immediately.

Section 5 Fire Fighting Measures

NFPA* HAZARD SIGNS

Health Hazard	1	=	Materials which under fire conditions would give off irritating combustion products. (less than 1 hour exposure) Materials that on the skin could cause irritation.
Flammability Hazard	0	=	Materials that will not burn.
Reactivity Hazard	0	=	Materials which in themselves are normally stable, even under fire exposure conditions, and which are not reactive with water.
Special Hazard	OX	=	Oxidizer

***National Fire Protection Association 704 (USA)**

FIRST RESPONDERS:	Wear protective gloves, boots, goggles, and respirator. In case of fire, wear positive pressure breathing apparatus. Approach incident with caution.
FLASHPOINT	None
FLAMMABLE OR EXPLOSIVE LIMITS	Lower: Nonflammable Upper: Nonflammable
EXTINGUISHING MEDIA	Use large quantities of water. Water will turn pink to purple if in contact with RemOx® S ISCO Reagent. Dike to contain. Do not use dry chemicals, CO_2 Halon® or foams.
SPECIAL FIREFIGHTING PROCEDURES	If material is involved in fire, flood with water. Cool all affected containers with large quantities of water. Apply water from as far a distance as possible. Wear self-contained breathing apparatus and full protective clothing.
UNUSUAL FIRE AND EXPLOSION	Powerful oxidizing material. May decompose spontaneously if exposed to heat (150°C / 302°F). May be explosive in contact with certain other chemicals (Section 10). May react violently with finely divided and readily oxidizable substances. Increases burning rate of combustible material.

Section 6 Accidental Release Measures

PERSONAL PRECAUTIONS:

Ensure adequate ventilation. Avoid dust formation. Avoid inhalation and contact with eyes and skin. Personnel should wear protective clothing suitable for the task. Remove all ignition sources and incompatible materials before attempting clean up.

ENVIRONMENTAL PRECAUTIONS:
Do not flush into sanitary sewer system or surface water. If accidental release into the environment occurs, inform the responsible authorities. Keep the product away from drains, sewers, surface and ground water and soil.

STEPS TO BE TAKEN IF MATERIAL IS RELEASED OR SPILLED:
Clean up spills immediately by sweeping or shoveling up the material. Do not return spilled material to the original container – transfer to a clean metal drum. To clean contaminated surfaces or floors, flush with abundant quantities of water into sewer, if permitted by federal, state, and local regulations - if not, collect water and treat chemically (Section 13).

Section 7 Handling and Storage

WORK/HYGIENIC PRACTICES
Wash hands thoroughly with soap and water after handling RemOx® S ISCO Reagent. Do not eat, drink or smoke when working with RemOx® S ISCO Reagent. Wear proper protective equipment. Remove clothing, if it becomes contaminated.

VENTILATION REQUIREMETNS
Provide sufficient mechanical and/or local exhaust to maintain exposure below the TLV/TWA.

CONDITIONS FOR SAFE STORAGE
Store in accordance with NFPA 430 requirements for Class II oxidizers. Protect containers from physical damage. Store in a cool, dry area in closed containers. Segregate from acids, peroxides, formaldehyde, and all combustible, organic, or easily oxidizable materials including antifreeze and hydraulic fluid.

Section 8 Exposure Controls and Personal Protection

RESPIRATORY PROTECTION
In cases where overexposure to dust may occur, the use of an approved NIOSH-MSHA dust respirator or an air supplied respirator is advised. Engineering or administrative controls should be implemented to control dust

EYE
Faceshield, goggles, or safety glasses with side shields should be worn. Provide eyewash in working area.

GLOVES
Rubber or plastic gloves should be worn.

OTHER PROTECTIVE EQUIPMENT
Normal work clothing covering arms and legs, and rubber, or plastic apron should be worn.

Section 9 Physical and Chemical Properties

APPEARANCE AND ODOR	Dark purple solid with metallic luster, odorless
BOILING POINT, 760 mm Hg	Not applicable
VAPOR PRESSURE (mm Hg)	Not applicable
SOLUBILITY IN WATER % BY SOLUTION	6% at 20°C (68°F) and 20% at 65°C (149°F)
PERCENT VOLATILE BY VOLUME	Not volatile
EVAPORATION RATE	Not applicable
MELTING POINT	Starts to decompose with evolution of oxygen (O_2) at temperatures above 150°C (302°F). Once initiated, the decomposition is exothermic and self-sustaining.
SPECIFIC GRAVITY	2.7 at 20°C (68°F)
BULK DENSITY	Approximately 1.45 - 1.6 kg / l
VAPOR DENSITY (AIR=1)	Not applicable
OXIDIZING PROPERTIES	Strong oxidizer

Section 10 Stability and Reactivity

STABILITY	Under normal conditions, the material is stable.
CONDITIONS TO AVOID	Contact with incompatible materials or heat (150°C / 302ºF) could result in violent exothermic chemical reaction.
INCOMPATIBLE MATERIALS	Acids, peroxides, formaldehyde, anti-freeze, hydraulic fluids and all combustible organic or readily oxidizable inorganic materials including metal powders. With hydrochloric acid, chlorine gas is liberated.
HAZARDOUS DECOMPOSITION PRODUCTS	When involved in a fire, RemOx® S ISCO Reagent may liberate corrosive fumes.
CONDITIONS CONTRIBUTING TO HAZARDOUS POLYMERIZATION	Material is not known to polymerize.

Section 11 Toxicological Information

POTASSIUM PERMANGANATE:

1. ACUTE TOXICITY

INGESTION:
LD 50 oral rat: 780 mg/kg male (14 days); 525 mg/kg female (14 days).
Harmful if swallowed. ALD: 10g. Ingestion may cause nausea, vomiting, sore throat, stomach-ache and eventually lead to a perforation of the intestine. Liver and kidney injuries may occur.

SKIN CONTACT:
LD 5O dermal no data available.
The product may be absorbed into the body through the skin. Major effects of exposure: severe irritation, brown staining of skin.

INHALATION:
LC 5O inhalation: No data available.
The product may be absorbed into the body by inhalation. Major effects of exposure: respiratory disorder, cough.

2. CHRONIC TOXICITY
No known cases of chronic poisoning due to permanganates have been reported. Prolonged exposure, usually over many years, to heavy concentrations of manganese oxides in the form of dust and fumes may lead to chronic manganese poisoning, chiefly involving the central nervous system.

3. CARCINOGENICITY
Potassium permanganate has not been classified as a carcinogen by ACGIH, NIOSH, OSHA, NTP, or IARC.

4. MEDICAL CONDITIONS GENERALLY AGGRAVATED BY EXPOSURE
Potassium permanganate solution will cause further irritation of tissue, open wounds, burns or mucous membranes.

Section 12 Ecological Information

ENTRY TO THE ENVIRONMENT

Potassium permanganate has a low estimated lifetime in the environment, being readily converted by oxidizable materials to insoluble MnO_2.

BIOCONCENTRATION POTENTIAL

In non-reducing and non-acidic environments, MnO_2 is insoluble and has a very low bioaccumulative potential.

AQUATIC TOXICITY

The toxicity data for Potassium permanganate is given below:

Rainbow trout, 96 hour LC_{50}:	1.8 mg/L
Bluegill sunfish, 96 hour LC_{50}:	2.3 mg/L
Milk fish (Chanos Chanos)/ 96 hour LC_{50}:	>1.4mgl

Section 13 Disposal Considerations

Offer surplus and non-recyclable product or solutions to a licensed disposal company.

Reduce RemOx® S ISCO Reagent in aqueous solutions with sodium thiosulfate, a bisulfite or ferrous salt solution. The bisulfite or ferrous salt may require some dilute sulfuric acid (10% w/w) to promote reduction. Neutralize with sodium carbonate to neutral pH, if acid was used. Decant or filter and deposit sludge in approved landfill. Where permitted, the sludge may be drained into sewer with large quantities of water. Contact Carus Corporation for additional recommendations.

Packaging materials must be triple rinsed to remove all RemOx® S ISCO Reagent prior to re-cycling or disposal.

Section 14 Transport Information

USA (land, D.O.T.)	**Proper Shipping Name:**	49 CFR172.101….Potassium Permanganate
	Hazard Class:	49 CFR172.101….Oxidizer
	ID Number:	49 CFR172.101….UN 1490
	Packing Group:	49 CFR172.101….II
	Division:	49 CFR172.101….5.1
European Labeling in accordance Road/Rail Transport (ADR/RID)	**ID Number:**	UN 1490
	ADR/RID Class	5.1
	Description of Goods:	Potassium Permanganate
	Hazard Identification No.	50
European Labeling in accordance with EC directive (Water, I.M.O.)	**Proper Shipping Name:**	Potassium Permanganate
	Hazard Class:	Oxidizer
	ID Number:	UN 1490
	Packing Group:	II
	Division:	5.1
	Marine Pollutant:	No

Section 14 Transport Information (contd.)

European Labeling in accordance with EC directive (Air, I.C.A.O.)	**Proper Shipping Name:**	Potassium Permanganate
	Hazard Class:	Oxidizer
	ID Number:	UN 1490
	Packing Group:	II
	Division:	5.1

Section 15 Regulatory Information

EUROPEAN AND INTERNATIONAL REGULATIONS:

MARKINGS ACCORDING TO EU GUIDELINES:

The product has been classified and marked in accordance with EU directives/ordinances on hazardous materials.

CHEMICAL NAME	CAS NO.	EINECS	UN NUMBER
Potassium Permanganate	7722-64-7	231-760-3	UN 1490

CODE LETTER AND HAZARD DESIGNATION OF THE PRODUCT:

Oxidizer

Harmful

Dangerous to the Environment

RISK PHRASES:

8 Contact with combustibles may case fire.
22 Harmful if swallowed.
50/53 Very toxic to aquatic organisms, may cause long-term effects in the aquatic environment.

SAFETY PHRASES:

60 This material and its container must be disposed of as hazardous waste.
61 Avoid releases to the environment. Refer to special instructions / Safety data sheet.

Section 15 Regulatory Information (contd.)

US FEDERAL REGULATIONS:

CHEMICAL INVENTORY STATUS – PART 1

Ingredient	CAS. NO.	TSCA	EC	Japan	Australia
Potassium Permanganate	7722-64-7	Yes	Yes		

CHEMICAL INVENTORY STATUS – PART 2 --- CANADA---

Ingredient	CAS. NO.	Korea	DSL	NDSL	PHIL
Potassium Permanganate	7722-64-7	No	Yes		

This product has been classified in accordance with the hazard criteria of the Controlled Products Regulation (CPR, Canada) and the MSDS contains all of the information required by the CPR.

FEDERAL, STATE & INTERNATIONAL REGULATIONS – PART 1

		SARA 302		SARA 313	
Ingredient	CAS. NO.	RQ	TPQ	List	Chemical Catg.
Potassium Permanganate	7722-64-7	N/A	N/A	Yes (Manganese compounds)	Yes

FEDERAL, STATE & INTERNATIONAL REGULATIONS – PART 2

Ingredient	CAS. NO.	CERCLA	RCRA	TSCA 8(d)
Potassium Permanganate	7722-64-7	Yes (RQ =100 lbs)	D001	No

Ingredient	CAS. NO.	CWC	TSCA 12(b)	CDTA	SARA 311/312
Potassium Permanganate	7722-64-7	No	No		4545 Kg

Ingredient	CAS. NO.	Acute	Chronic	Fire	Pressure	Reactivity	Pure/Liquid
Potassium Permanganate	7722-64-7	Yes	Yes	Yes	No	No	Pure

Ingredient	CAS. NO.	Australian Hazchem Code	Poison Schedule	WHMIS
Potassium Permanganate				C, D2B

Section 16 Other Information

NIOSH	National Institute for Occupational Safety and Health
MSHA	Mine Safety and Health Administration
OSHA	Occupational Safety and Health Administration
NTP	National Toxicology Program
IARC	International Agency for Research on Cancer
PEL	Permissible Exposure Limit
C	Ceiling Exposure Limit
TLV-TWA	Threshold Limit Value-Time Weighted Average
CAS	Chemical Abstract Service
EINECS	Inventory of Existing Chemical Substances (European)

Chithambarathanu Pillai (S.O.F.)
April 2008

The information contained herein is accurate to the best of our knowledge. However, data, safety standards and government regulations are subject to change and, therefore, holders and users should satisfy themselves that they are aware of all current data and regulations relevant to their particular use of product. CARUS CORPORATION DISCLAIMS ALL LIABILITY FOR RELIANCE ON THE COMPLETENESS OR ACCURACY OR THE INFORMATION INCLUDED HEREIN. CARUS CORPORATION MAKES NO WARRANTY, EITHER EXPRESS OR IMPLIED, INCLUDING, BUT NOT LIMITED TO, ANY WARRANTIES OF MERCHANTIABILITY OR FITNESS FOR PARTICULAR USE OR PURPOSE OF THE PRODUCT DESCRIBED HEREIN. All conditions relating to storage, handling, and use of the product are beyond the control of Carus Corporation, and shall be the sole responsibility of the holder or user of the product.

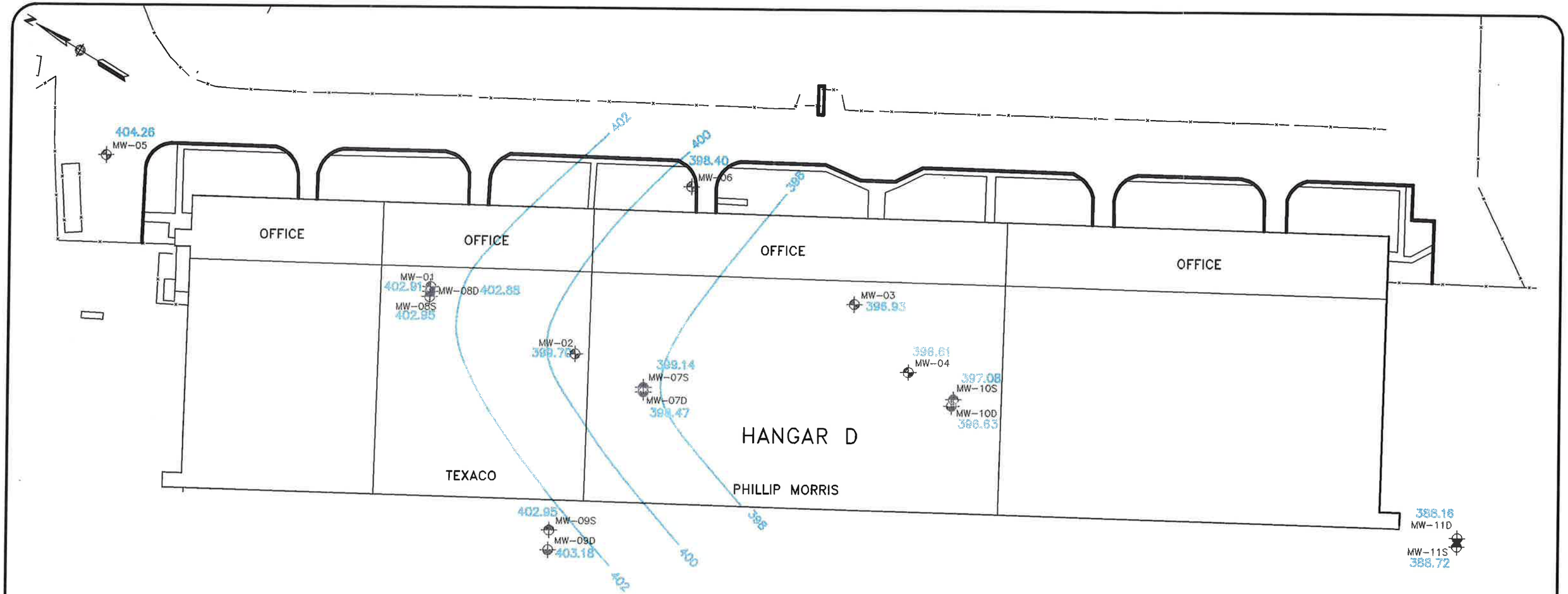
CARUS CORPORATION, 315 5TH STREET, PERU, ILLINOIS 61354
CARUS NALON S.L. IS A DIVISION OF CARUS CORPORATION, 315 5TH STREET, PERU, ILLINOIS 61354

Responsible Care®
Good Chemistry at Work

ATTACHMENT B – DECEMBER 2001 REMEDIAL INVESTIGATION REPORT

FIGURE 3-1: GROUNDWATER CONTOUR PLAN

FIGURE 3-2: GEOLOGIC CROSS SECTION A-A' REVISED TO INCLUDE EXISTING AND PROPOSED TEST POINTS



NOTES

1. ALL LOCATIONS & DIMENSIONS OF SITE FEATURES, PROPERTY LINES & SAMPLING LOCATIONS ARE APPROX.
2. BASE MAP PROVIDED ELECTRONICALLY FROM XDD, INC. IN FEBRUARY 2001.

LEGEND

MW-01 – OVERBURDEN MONITORING WELL

MW-08S – SHALLOW BEDROCK MONITORING WELL

MW-08D – DEEP BEDROCK MONITORING WELL

DES.BY: JWO	DR.BY: JWO	CK.BY: MED

WESTCHESER COUNTY AIRPORT
WHITE PLAINS, NY

REMEDIAL INVESTIGATION REPORT

FIGURE 3-1

GROUNDWATER CONTOUR PLAN

SCALE: 1"=60'		PROJECT NO: 205265
DATE: NOVEMBER 2001	FIGURE 1	RI FIGURE 2

WOODARD & CURRAN
Engineering · Science · Operations

A (North)

A' (South)

420
410
400
390
380
370
360
350
340

MW-05
PROPOSED TEST PT.
MW-01
MW-08D
MW-08S
GP-2B
PROPOSED TEST PT.
MW-02
MW-07S
MW-07D
MW-03
MW-04
MW-10S
MW-10D
MW-11S
MW-11D

Grade Surface

Organic Silt

Wellscreen

Organic Silt

Sand

8-10
5-6
10
12
20-25
25+
3-5
3-4
8-10
25
9-12
3-5
8-10
10
35-40
50+
20-25
20

Open Borehole

Mica Schist

Legend

- ▼ water level elevations from 7/00 sampling event
- — Signifies Groundwater Elevation Across Cross-Section
- — Signifies Bedrock Interface
- } Fracture Sample Interval With Number of Fractures

Notes:
Sand, with sporadic organic silt lenses, is encountered from grade level to the bedrock interface. Bedrock is Mica Schist.

0' 10' 20'
Vertical Scale in Feet

0' 70' 140'
Approximate Horizontal Scale in Feet

DES.BY: JWD	DR.BY: JWD	CK.BY: MED

WESTCHESER COUNTY AIRPORT
WHITE PLAINS, NY

REMEDIAL INVESTIGATION REPORT

FIGURE 3-2

GEOLOGIC CROSS SECTION A - A'

SCALE: 1"=60'	PROJECT NO: 205265
DATE: MARCH 2001	FIGURE 1 | HOLBROOK.DWG

WOODARD & CURRAN
Engineering · Science · Operations