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PETER MAGGIORE SECRETARY

PAUL RITZMA DEPUTY SECRETARY

#### **CERTIFIED MAIL - RETURN RECEIPT REQUESTED**

May 26, 2000

Richard D. Mico Sparton Technology Inc. 4901 Rockaway Blvd., SE Albuquerque, NM 87124-4469

## RE: Discharge Plan Modification, DP-1184, Sparton Technology Inc.

Dear Mr. Mico:

Pursuant to Water Quality Control Commission (WQCC) Regulation 3109, the application for modification of discharge plan DP-1184, for the discharge of up to 108,000 gallons per day (gpd) of treated ground water is hereby approved, subject to the conditions and requirements listed below. The application for modification was submitted by Gary Richardson of Metric Corp. on behalf of Sparton Technnology Inc. (Sparton). The total discharge for the facility after modification is 972,000 gpd, which includes 864,000 gpd from the previously approved off-site treatment system and 108,000 gpd from the new on-site treatment system. The facility is located in northwest Albuquerque in projected Section 7, T11N, R3E, Bernalillo County. In approving this discharge plan, the New Mexico Environment Department (NMED) has determined that the requirements of WOCC Regulation 3109.C have been met.

The original discharge plan approved in a letter dated June 26, 1998 for the off-site Sparton treatment and disposal system is described in part as follows:

Up to 864,000 gpd of contaminated ground water will be pumped from an off-site extraction well (CW-1) to an air stripper to remove chlorinated solvents. Treated ground water will be piped to an infiltration gallery located beneath the Calabacillas Arroyo channel for infiltration. Ground water below the infiltration gallery is at a depth of approximately 119 feet and has a total dissolved solids concentration of approximately 400 to 500 milligrams per liter.



The modification to the Sparton treatment and disposal system is briefly described as follows:

Up to 108,000 gpd of contaminated ground water will be pumped from an on-site extraction well (CW-2) to an air stripper to remove chlorinated solvents. Treated ground water from the on-site treatment system will be discharged to a series of six rapid infiltration ponds adjacent to the Sparton Technology Coors Road facility. In addition, a chromium treatment system will be added to the off-site treatment system. Ground water below the rapid infiltration ponds is at a depth of approximately 69 feet and has a total dissolved solids concentration of approximately 400 to 750 milligrams per liter.

The approved discharge plan modification consists of the materials submitted by Sparton dated December 7, 1999 and April 28, 2000. In addition, the discharge plan includes information and materials submitted as part of the original discharge plan approved on June 26, 1998. The discharge shall be managed in accordance with the approved plan of June 26, 1998 and this plan is subject to the conditions and requirements of this letter as listed below.

However, approval of this discharge plan modification does not relieve Sparton of its responsibility to comply with any conditions or requirements of the June 26, 1998 discharge plan, DP-1184, attached to this letter, the New Mexico Water Quality Act, WQCC Regulations, any other applicable federal, state and/or local laws and regulations, such as zoning requirements and nuisance ordinances.

#### CONDITIONS FOR APPROVAL

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This discharge plan modification incorporates the terms which are Conditions and Specific Requirements in the discharge plan approval letter dated June 26, 1998 attached to this letter, and the additional Conditions listed below:

## In addition to the monitoring outlined in Specific Requirement # 3 below, Sparton shall implement the following monitoring plan for the on-site system:

1) Sparton shall record the volume of effluent discharged to the rapid infiltration ponds and the volume of Aqua Mag added on a monthly basis and submit reports which include these volumes to NMED on a quarterly basis. Quarterly monitoring shall be submitted to NMED on or before January 31, April 30, July 31, and October 31 of each year.

The reason for this condition is to comply with WQCC Regulation 3107.

## In addition to the contingency plan outlined in Specific Requirements # 4 and # 5 below, Sparton shall implement the following contingency plan:

2) In the event of a spill or discharge of contaminated water at the CW-2 well head, piping, or rapid infiltration ponds, Sparton shall comply with WQCC Regulation

1203. This includes taking the necessary corrective actions to contain or mitigate the damage caused by any spill or discharge as soon as possible, notification of NMED within 24 hours, and submittal of a corrective action plan for NMED approval within 15 days.

The reason for this condition is to comply with WQCC Regulation 1203.

3) If NMED determines that the chromium levels in effluent from CW-2 are a threat to groundwater quality, continued operation of CW-2 while chromium treatment is installed as required in Specific Requirement # 4 below, shall be at the discretion of NMED.

The reason for this condition is to comply with WQCC Regulation 3109.

# In addition to the closure plan outlined in Specific Requirement # 6 below, Sparton shall implement the following closure plan:

4) Upon completion of post closure monitoring as determined by the Consent Decree, Sparton shall plug and abandon all monitor wells associated with the rapid infiltration ponds in accordance with NMED Monitor Well Construction and Abandonment Guidelines (copy enclosed) and any applicable laws. Notice to NMED shall be provided within a reasonable time prior to plugging and abandoning monitor wells.

The reason for this condition is to comply with WQCC Regulation 3107 and the Consent Decree.

## SPECIFIC REQUIREMENTS

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This discharge plan modification incorporates the terms which are Conditions and Specific Requirements in the discharge plan approval letter dated June 26, 1998 attached to this letter, and the additional Specific Requirements listed below:

#### Sparton will implement the following operational plan:

## 1) On-site (source) containment system:

- a) Sparton will pump up to 108,000 gpd of contaminated ground water from CW-2 to an air stripper to remove chlorinated solvents. Contaminated ground water will be treated to below WQCC standards and discharged to a series of six rapid infiltration ponds located adjacent to the Sparton Technology Coors Road facility.
- b) Sparton will add up to 4 ppm of Aqua Mag at the CW-2 well head to inhibit precipitation of calcium carbonate and other scaling compounds in the air stripper

and rapid infiltration ponds.

- c) Sparton will operate the rapid infiltration ponds as outlined in Attachments E and F of its discharge plan modification application dated December 7, 1999. This includes rotation of the ponds receiving water to allow frequent wet/dry cycles to control mosquito and algae growth, and to inhibit development of a clogging layer.
- d) In the event a chromium treatment system is added to the source containment system as provided for in Specific Requirement # 4 below, Sparton will operate it such that monthly average chromium concentrations in effluent discharged to the rapid infiltration ponds remains at or below 0.044 mg/l.

#### 2) Off-site containment system:

- a) Sparton will provide chromium treatment for a minimum of 50 gpm until the monthly chromium concentration in monitoring wells MW-74, 75, and 76 is at or below 0.044 mg/l for two consecutive months
- b) After monthly chromium concentrations in MW-74, 75, and 76 have been reduced to at or below 0.044 mg/l for two consecutive months, Sparton may reduce the volume of flow that is subject to chromium treatment to a level below 50 gpm while insuring that the chromium concentration in any effluent discharged at any time to the infiltration gallery remains at or below 0.044 mg/l.
- c) Sparton will not reduce the volume of flow subject to chromium treatment by more than 12.5 gpm in any 30 day period.

#### Sparton will implement the following monitoring plan:

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Sampling Location	Parameters	Frequency	
CW-2 Effluent	trichloroethylene (TCE) 1,1,1-trichloroethane (TCA) 1,1-dichloroethylene (DCE) methylene chloride chromium, iron, manganese	Daily the first week of operation, CW-2; Weekly the first month; Monthly after first month	
Rapid Infiltration Ponds	Water Levels	Twice per week	
MW-17, MW-77, MW-78	trichloroethylene (TCE) 1,1,1-trichloroethane (TCA) 1,1-dichloroethylene (DCE) methylene chloride chromium, iron, manganese	MW-77 and MW-78 twice prior to discharge to rapid infiltration ponds; Quarterly first two years of operation, semi-annualy thereafter	

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Sampling Location	Parameters	Frequency	
MW-17, MW-77, MW-78	Water Levels	Prior to each sampling event	
CW-1 Effluent	Chromium	Weekly, first two months Monthly thereafter	
MW-74, MW-75, MW-76	Chromium	Monthly until chromium concentration below 0.044 for two consecutive months, quarterly thereafter	

#### Sparton will implement the following contingency plan:

#### 4) On-site (source) containment system:

- a) Sparton will install an automatic shutdown switch which will turn off CW-2 in the event the air stripper fails.
- b) The rapid infiltration ponds will be equipped with overflows such that if the water depth exceeds one foot in any pond, it will overflow into the next pond in series. The easternmost (final) pond will be equipped with a high level switch which will turn off CW-2 if the water level in the pond exceeds one foot depth.
- c) Sparton will contain the first 8,000 gallons of water pumped from CW-2 in a portable tank. Water from the tank will be sampled and analyzed prior to discharge to the rapid infiltration ponds for total chromium. If total chromium concentration is greater than the WQCC ground water standard of 0.05 mg/l, no water will be discharged to the rapid infiltration ponds until a chromium treatment system is in place. If total chromium concentration is less than 0.050 mg/l, naturally or as a result of treatment, the on-site source containment system will be placed into operation.
- After operation commences, if the initial monthly average chromium concentration, based on four weekly samples as required in Specific Requirement # 3 above exceeds 0.05 mg/l, Sparton will install a chromium treatment process within 90 days of receipt of the analyses which confirm such exceedence.
- e) After the initial month of operation, if a monthly sample indicates chromium concentrations in excess of 0.05 mg/l, Sparton will resume weekly sampling for four consecutive weeks following receipt of the analytical results which indicate chromium concentrations in excess of 0.05 mg/l. If the monthly average chromium concentration exceeds 0.05 mg/l, Sparton will install a chromium treatment process within 90 days of receipt of the analyses which confirm exceedence.

#### 5) Off-site containment system:

a) In the event that the monthly average chromium concentration in the effluent from CW-1 exceeds 0.044 mg/l during the initial chromium treatment phase (Specific Requirement # 2.a) Sparton will provide additional chromium treatment such that the chromium concentration remains at or below 0.044 mg/l.

#### Sparton will implement the following closure plan:

- 6) <u>On-site containment system:</u>
  - a) Upon closure of the on-site containment system, Sparton will disassemble the air stripper and dispose of the components properly.
  - b) Upon closure of the on-site containment system, Sparton will regrade the rapid infiltration ponds to provide positive drainage.
  - c) Upon closure of the on-site containment system, Sparton will sample and analyze MW-17, MW-77, and MW-78 for the constituents defined in Specific Requirement #3 above until eight consecutive quarterly analyses indicate WQCC standards are not being exceeded and provisions of the Consent Decree are met.

#### GENERAL DISCHARGE PLAN REQUIREMENTS

In addition to any other requirements provided by law, approval of this discharge plan modification, DP-1184, is subject to the General Requirements as specified in the discharge plan approval letter dated June 26, 1998 attached to this modification. Refer to the attached approval for specific information on the following General Requirements:

Monitoring and Reporting Record Keeping Inspection and Entry Duty to Provide Information Spills, Leaks and Other Unauthorized Discharges Retention of Records Enforcement Modification and/or Amendments

#### **OTHER REQUIREMENTS**

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Please be advised that the modification of this plan does not relieve Sparton of liability should your operation result in actual pollution of surface or ground water which may be actionable under other laws and/or regulations.

#### **RIGHT TO APPEAL**

If Sparton is dissatisfied with this action taken by NMED, Sparton may file a petition for hearing

before the WQCC. This petition shall be in writing to the Water Quality Control Commission within thirty (30) days of the receipt of this letter. Unless a timely request for hearing is made, the decision of the NMED shall be final.

#### **TRANSFER OF DISCHARGE PLAN**

Pursuant to WQCC Regulation 3111, prior to any transfer of ownership, the discharger shall provide the transferee a copy of the discharge plan, including a copy of this approval letter and shall document such to the NMED.

#### PERIOD OF APPROVAL

Pursuant to WQCC Reg. 3109.G.4., this modification approval expires on June 26, 2003, the same day as the expiration of the discharge plan approved June 26, 1998. You must submit an application for renewal for the discharge plan at least 120 days before the expiration date and in accordance with the WQCC Regulations.

Sincerely,

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Marcy Leavitt, Chief Ground Water Quality Bureau

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Enclosures: Discharge Plan Renewal Letter, DP-1184, June 26, 1998 Discharge Plan Summary NMED Monitor Well Construction and Abandonment Guidelines

 xc: L. William Bartels, Dist. Manager, NMED Dist. 1 Baird Swanson, NMED Albuquerque Field Office
Ana Marie Ortiz, Assistant General Counsel, NMED Office of General Counsel
Gary Richardson, P. E., Metric Corporation, 8429 Washington Place NE., Albuquerque, NM
Mark Schmidt, City of Albuquerque, Public Works Department, P. O. Box 1293, Abq, NM
Michael A. Hebert (6EN-HX), Compliance Assurance and Enforcement Division, U. S. EPA Region 6, 1445 Ross Avenue, Dallas, Texas 75202-2733
Carl Will, NMED HRMB