



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY

August 3, 2010

Enbridge Energy, Limited Partnership  
c/o Tom Fridel  
1500 West Main Street  
Griffith, Indiana 46375

**Re: U.S. EPA Notice of Rejection of Enbridge Energy, Limited Partnerships' Sampling and Analysis Plan (SAP) in response to the Removal Administrative Order issued by U.S. EPA on July 27, 2010, pursuant to §311(c) of the Clean Water Act in Docket No. CWA 1321-5-10-001**

Dear Mr. Fridel:

The United States Environmental Protection Agency (U.S. EPA) has completed its review of the Sampling and Analysis Plan (SAP) as that Enbridge Energy, Limited Partnerships (Enbridge or you) submitted on August 2<sup>nd</sup>, 2010.

U.S. EPA recognizes that Enbridge has put forth significant effort over these last few days with respect to both the response and the finalization of the SAP, U.S. EPA must remain confident that our interests and authority are retained with our approval of this document. However, U.S. EPA rejects the draft SAP due to remaining deficiencies and requests that a revised version be submitted to the U.S. EPA Incident Commander for review no later than 7 pm on August 4<sup>th</sup>, 2010. General and specific comments on the SAP are attached.

If you have any specific questions regarding these comments, please refer them to the Environmental Unit.

Sincerely,

*J. H. Kimble Dep IC for R. Dollhopf IC*

Ralph Dollhopf  
Federal On-Scene Coordinator and Incident Commander  
U.S. EPA, Region 5

cc: L. Kirby-Miles, U.S. EPA, ORC  
J. Kimble, U.S. EPA, Dep. IC, FOSC  
S. Wolfe, U.S. EPA, FOSC  
M. Durno, U.S. EPA, Dep. IC, Section Chief  
Records Center, USEPA, Reg. V

**General Comments:**

- Provide a Table of Contents for text, tables, figures, and appendices.
- Include the appendices, figures and tables referred to in this document.
- Include an acronym page for the many abbreviations used in the document.
- Additional information should be included in the document to address documentation, records, and data management actions. The plan does not explain current or interim systems being used for consolidating results, and presenting to various agencies and residents. Specifically, the following items must be addressed:
  - Field data collection procedures. Specifics should be included regarding methodologies for logging sample collection locations in the field (ex: global positioning systems, which latitude/longitude units are being used).
  - Field data download procedures and data fields
  - Data base (“Scribe”) procedures
  - The procedure for submittal of Scribe data to EPA-GIS team
  - The plan should include the protocols and procedures for data evaluation, and specify criteria comparisons.
- Attach detailed Standard Operating Procedures (SOPs) and methods to the Sampling and Analysis Plan (SAP) which describe the proposed sampling collection procedures. Examples of sample procedures can be provided.
- Detection limits should be specified for the proposed analyses and methods.
- It is unclear whose activities will be covered by the sampling plan. Section 3.0 or 4.0 should describe roles and responsibilities of Enbridge and its contractors.
- Include equipment calibration SOPs as an appendix to this plan.
- References to sections and page numbers in the QAPP referenced in the SAP should be checked for accuracy.
- The plan will provide an explanation of the current sample identification nomenclature.
- The document does not include human health considerations relating to direct contact with impacted media.
- The SAP will include procedures for recording and reporting calibration information for review as part of the sample record.
- Surface water and sediment background sample(s) will be collected from unimpacted (upgradient) areas for all sample matrices.
- Analytical parameters for all sample matrix will be consistent.
- The plan will include reusable equipment decontamination procedures.

- The title of the document will be consistent with the title of other documents produced.
- Include figures showing historic and proposed sampling locations.
- Please check spelling throughout the document and correct incomplete sentences.
- Please provide references to documents mentioned in this document.

**Specific comments:**

**Page 1, 1<sup>st</sup> Paragraph:** Please include additional information about the history of the spill, estimated volume of material release and estimated area impacted. Please attach a map of the site.

**Page 2, Current Conditions, 1<sup>st</sup> Paragraph:** The paragraph should include the current conditions at the site with regards to the response to the spill and the activities that have occurred since the beginning of the response.

**Page 2, Current Conditions, 2<sup>nd</sup> Paragraph:** This section should include additional detail regarding the samples that have been collected by Enbridge to date. Please provide sample volumes and analyses conducted for the samples listed in this section. Provide additional description of the on-site screening samples that are being conducted.

**Page 3 Project Organization:** Include an organization chart in this section.

**Page 4, Roles and Responsibilities, Paragraph 6:** URS is mentioned here for the first time. The full company name should be spelled out and additional information should be provided here regarding their role in the sampling and creation of the plan.

**Page 6, Field Precision Objectives:** Precision objectives are stated to be met with collection of duplicates. Please provide a rationale or a reference for the decision to collect 10 duplicates per matrix.

**Page 6, Field Accuracy Objectives:** Please include additional quality assurance (QA) samples to demonstrate accuracy. Field accuracy should be determined in several ways. Provide additional detail for other QA samples that are to be collected. For example, please provide detail about equipment blanks, field blanks, media blanks or other blanks that are necessary for QA criteria.

**Page 7, Sampling Rationale:** The SAP must describe how sample locations will be determined and prioritized and the proposed sampling frequency. We recommend that a statistically based sampling design be implemented as part of the sampling plan.

Include in this discussion a rationale for the proposed drinking water and potable water and sediment sampling locations.

The sampling locations must assess downgradient municipal water supplies along the Kalamazoo River corridor and downgradient sensitive environments.

**Decision Criteria:** The revised SAP must include a discussion of data quality objectives and the decision criteria (e.g. State of Michigan Rule 323.1057, water quality standards) used to make decisions. Response actions typically include phases with varying objectives and QA requirements, such as assessing immediate threats to human health and the environment, response assessment, characterization of extent of contamination, and monitoring clean-up and restoration progress.

**Page 7, Field Methods and Equipment:** This section describes water quality criteria that have been collected to date. Provide additional information regarding the rationale and additional detail for the collection of water quality criteria. Provide additional detail regarding when water quality criteria samples are collected and how the information will be utilized.

**Page 7, Crude Oil Characterization Sampling, Paragraph 1:** Additional analysis is required. Sample methods references should be provided in full, with reference to the source of the method (NIOSH, EPA [SW-846], or OSHA). We request that the routine total petroleum hydrocarbon analysis is used. In addition, GRO, DRO and ORO analyses should reference the range of carbons covered in the analyses. The list of analyses should include the oil range organics (ORO) range (extended range) and a sulfur/sulfide analyses.

**Page 7, Crude Oil Characterization Sampling, Paragraph 2:** Change wording in this paragraph to reflect that any decision to reduce the parameters for sampling would be a joint decision between Enbridge with the input of the Incident Commander (IC).

**Page 8, Chemical and Physical Characterization of Soil, Paragraph 2 :** Additional analyses will be included to parallel the analyses conducted on the crude oil samples. It is recommended that analyses initially include: a full list of volatile organic compound list, semi-volatile organics, total petroleum hydrocarbon (DRO, GRO, and ORO), PCBs and metals.

**Page 9, Chemical Characterization of Sediments, Paragraph 2:** Provide procedures and documents that you are using with the sample collection equipment listed in this section. Please provide reference for these pieces of equipment and detailed procedures, as we are unfamiliar with these pieces of equipment.

**Page 9, Chemical Characterization of Surface Water, Paragraph 3:** Additional analyses will be included to parallel analyses conducted on the crude oil and soil samples. Please include a full list of volatile organic compounds, semi-volatile organics, total petroleum hydrocarbon (diesel range organics (DRO), gasoline range organics (GRO), and ORO), dissolved oxygen (DO), total organic carbon (TOC), PCBs and metals.

**Page 10, Potable Well Samples, Paragraph 2:** Recommend additional analyses be included to match more closely the analyses conducted on the crude oil and soil samples. Please include a full list of volatile organic compound list, semi-volatile organics, total petroleum hydrocarbon (DRO, GRO, and ORO), and metals.

**Page 12, Soil, Sediment, and Water Sampling Locations, Paragraph 1:** This document will include a map of current and proposed sample locations. Provide more detail on the proposed locations. This comment also applies to all media types discussed in the sections below.

**Page 12, Soil, Paragraph 1:** A rationale for selecting sample locations may be based on a visual evaluation of the samples and the extent of contamination both vertically and horizontally (not based on access). The samples that are necessary to fully evaluate the site will be collected as part of any sample regime.

**Page 12, Section Soil, Surface Water, and Potable:** Add more detail in each of these sampling sections. Provide information regarding how many samples have been collected. Include a map of the sample locations for each section.