DEPARTMENT OF THE NAVY
CRANE DIVISION
NAVAL SURFACE WARFARE CENTER
300 HIGHWAY 361
CRANE INDIANA 47522-5001

IN REPLY REFER TO
5090/S4.7.1
Ser RP3/5136
21 APR 2005

U.S. Environmental Protection Agency, Region V
Waste, Pesticides, & Toxics Division
Waste Management Branch
Corrective Action Section
77 West Jackson Blvd.
Chicago, IL 60604

Dear Mr. Ramanauskas:

Crane Division, Naval Surface Warfare Center submits the final responses to U. S. EPA comments dated February 24, 2005 on the Old Burn Pit (OBP), Solid Waste Management Unit (SWMU) 5, Ecological Risk Assessment (ERA) as enclosure (1). Enclosure (2) contains the corresponding change pages for the Final RCRA Facility Investigation (RFI) Report for McComish Gorge, OBP, Pesticide Control Area-R150 Tank, and Rockeye (SWMUs 4, 5, 9, & 10, respectively) dated December 2004. Please note that two non-technical changes are included in the provided tables. The first change is to reflect dioxins and furans as Chemicals of Concern for the Future Adult and Child Resident Receptors at SWMU 5. The second change corrects the typographical error for Well Number 05-19. The permit required Certification Statement is provided as enclosure (3).

If you require any further information, my point of contact is Mr. Thomas J. Brent, Code RP3-TB, at 812-854-6160, email thomas.brent@navy.mil.

Sincerely,

James M. Hunsicker

JAMES M. HUNSICKER
Manager, Environmental Protection
By direction of the Commanding Officer

Enclosures: 1. SWMU 5 Response to ERA Comments
2. SWMUs 4, 5, 9, & 10 RFI Change Pages
3. Certification Statement

Copy to:
ADMINISTRATIVE RECORD
SOUTHNAVFACENGCOM (Code ES31) (w/o encl)
IDEM (Doug Griffin)
TTNUS (Ralph Basinski) (w/o encl)

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations.

SIGNATURE

Manager, Environmental Protection — 4/21/05

TITLE — DATE

Enclosure (1)

Responses to
Ecological Risk Assessment Comments
for
SWMU 5
(Old Burn Pit)

RESPONSES TO
U.S. EPA REGION 5 COMMENTS
RECEIVED VIA E-MAIL ON FEBRUARY 24, 2005
SWMU 05 (OLD BURN PIT) ECOLOGICAL RISK ASSESSMENT
NSWC CRANE

1. **Comment: In Step 3a, many of the alternative screening values for plants were still lower than the maximum concentration for various constituents. The presence of vegetation was used as a justification for concluding that there did not appear to be a significant impact to the plant community. Is there any way to clarify this with information on the quality of the plant community? My concern is that the community may not necessarily be representative of a typical plant community for the area but could consist of more pollution tolerant species.**

   Response: The only quantitative way to address the concern would be to conduct a plant community survey. However, a review of the aerial photograph and site photographs for SWMU 5 (Figures 1-7 and 1-9 in the RFI report) shows that the forested area at SWMU 5 is indistinguishable from the surrounding forested area and that the site is heavily vegetated. While it is possible that the actual plant community may consist of more pollution tolerant plants, the presence of more pollution tolerant plants in a small part of the larger forested plant community is not expected to significantly affect the overall ecology of the area.

   No changes will be made to the SWMU 5 ERA to address this comment.

2. **Comment: Possible typo: Section 5.7.1, P-5-57 last paragraph refers to SWMU 4 rather the SWMU 5.**

   Response: The reference paragraph will be changed as follows:

   Bald eagles (as discussed in Section 1.3.7) and ospreys are not expected to occur at SWMU 5 due to the absence of preferred foraging habitat (large open waters). Similarly, the Virginia rail and king rail are found in marshes and mudflats, the Henslow's sparrow is found in damp fields, and the yellow crowned night heron is primarily a bird of swamps. Some aquatic habitat and potential wetlands are present at SWMU 5 so the presence of these species can not be ruled out. The loggerhead shrike prefers open fields with scattered trees, but is occasionally found in open woodlands. Thus, use of the site by the loggerhead shrike would be occasional at most. The prime timber rattlesnake habitat is forested land on higher dry ridges with a south or southwestern exposure. Part of SWMU 5 is located on a small ridge so it is possible that the timber rattlesnake is present at the SWMU.

3. **Comment: Section 5.7.6.1.2. Sediment. Although the aquatic habitat in the vicinity of SWMU #5 may not be significant, there is no discussion on potential pathways to aquatic receptors downstream. Is there a potential for constituents to migrate during periods of high surface runoff?**

   Response: Although there is a potential for chemicals to migrate during periods of high flow, it is difficult to estimate downstream chemical concentrations for the following reasons:

   - The chemical concentrations in sediment will be attenuated after mixing with less contaminated sediment and eroded soil

- Other non-site related sources of contamination (i.e., road runoff) may add chemicals to the sediment

At SWMU 5, the sediment sample 05SD050006 had the overall greatest chemical concentrations of any of the sediment samples. This sample in particular, had very little aquatic habitat (see Photograph 6 in Figure 1-9 and the attached photograph 1 which was taken during the June 23, 2004 site visit with U.S. EPA). The sediment from this area drains to a concrete culvert along the road, and then crosses the road and discharges to a small drainage way across the road. No sediment samples were collected in that area so a conclusion regarding the chemical levels in the sediment cannot be made. However, as shown on Figure 5-12, the chemical concentrations in the sediment samples collected from the drainage ditches west of Route 192 were lower than the concentrations in the sediment samples collected in the drainage ditches east of Route 192, closer to the burn pit area and main gully. In fact, with the exception of dioxins, the chemical concentrations in the sediment samples collected from the drainage ditches west of Route 192 were less that the EDQLs. As discussed in the ERA for SWMU 5, the concentrations of dioxins are not likely to impact benthic invertebrates. Therefore, although a discussion of potential downstream migration of chemicals was not specifically presented in the ERA for SWMU 5, the potential downstream migration of chemicals will not change the conclusions of the ERA.

No changes will be made to the SWMU 5 ERA to address this comment.

4. **Comment: Section 5.7.6.1, P-5-75. The Eco-SSL cited for the threshold for lead in plants is 115 mg/kg and should be 210 mg/kg. The last sentence on page 5-75 reads "The maximum lead concentration is less than the eco SSL for plants". The maximum lead concentration was found in sample 05SB060002 and was 16,900 mg/kg. This value exceeds the plant eco SSL of 210 mg/kg.**

Response: Based on Table 3.1 in the November 2003 Eco SSL document (http://www.epa.gov/ecotox/ecossl/pdf/eco-ssl_lead.pdf), the threshold for lead for plants is 115 mg/kg. The text in the Eco SSL document cites values of 110 mg/kg and 120 mg/kg but those appear to be rounding errors. The 210 mg/kg value cited in the comment may be the value in the draft document.

The referenced sentence was a typographical error and the word "less" will be replaced with the word "greater." The remainder of the paragraph is not affected.

05SD05 (taken during a June 23, 2004 Site Visit)

ENCLOSURE (2)

RFI CHANGE PAGES
FOR
SWMUs 4, 5, 9, & 10
(MCCOMISH GORGE, OLD BURN PIT, PESTICIDE CONTROL AREA-
R150 TANK, AND ROCKEYE)

5090/S4.7.1
Ser RP3/5136

21 Apr 2005

The letter Ser RP3/5136 was for the final response to comments and the replacement pages for the Final RCRA RFI for SWMU 4, 5, 9 and 10. Replacement pages added to report dated 5/29/2002 making it the final report.