

**Response to EPA Comments on the
25 Sites Feasibility Study, Revised April, 2010
Picatinny Arsenal, NJ
July 1, 2010**

USEPA Region 2 – General Comments

Comment 1.

Comment: The FS must be modified to reflect EPA's letter from Walter Mugdan to Irene Kropp, NJDEP Assistant Commissioner, dated May 12, 2010 on the New Jersey Soil Remediation Standards (NJSRSs). Per the referenced correspondence, EPA does not recognize the soil cleanup standards based on the inhalation criterion. However, as pointed out in a June 17, 2010 e-mail from Bill Roach to Ted Gabel the inhalation pathway must still be considered when developing soil cleanup standards.

Response: The revised final FS has been modified to discuss the USEPA position toward the NJDEP SRS as explained in the May 12, 2010 letter. The discussion of the SRS has been expanded to explain which standards the USEPA does not recognize (i.e. those standards based on inhalation, the lead standards and in the case of future recreational use) and which standards are potential ARAR (i.e. standards calculated for the dermal/ingestion pathway). This additional explanation ensures consistency with the USEPA position and should allow the USEPA to approve the FS.

The FS document has remained unchanged with regard to how the soils data was screened against Levels of Concern (LOCs) in Section 2, selection of COCs and selected remedial alternatives. The data was screened against the NJDEP SRS inclusive of all criteria including those based upon inhalation and lead standards. However, as discussed in the response to many of the specific comments below, the document now states that the USEPA does not recognize the soil standards based on the inhalation criterion. In section 2 the NJDEP SRS are only referred to as LOCs and no determination regarding the potential use of the standards as ARAR is made. This approach is consistent with CERCLA and the newly written USEPA Region 2 letter.

The FS document submitted in April 2010 does not refer to the NJDEP SRS as ARAR in any section of the document. Given the new USEPA position stated in the May 12, 2010 letter, the FS has been revised to reflect that the NJDEP SRS calculated for the dermal/ingestion pathway are potential ARAR and that the selected remedies comply with these chemical specific ARARs through existing engineering controls and land use controls. The revised FS also explains that the NJDEP SRS calculated for the inhalation pathway are not ARAR but that the Army has used them as information to be considered. All of the compliance with ARARs sections throughout the document have been expanded to explain this.

USEPA Region 2 - Specific Comments

Comment 1. - Section 2.3.3.1, Surface Soil, second paragraph, page 2-6 –

Comment: Please refer to the General Comment regarding the NRSRS for beryllium.

Response: The data is being compared to the NRSRS for beryllium as an LOC. The Army is aware that the beryllium NRSRS is based on the inhalation pathway and as such this criterion is not considered to be a potential ARAR by the USEPA. The text has been revised to explain that the LOCs used for comparison in Section 2 include all of the NJDEP SRS including values the USEPA considers potential ARAR and values that it does not consider potential ARAR. The revised document explains that within Section 2 these values are being used as Levels of Concern (LOCs) and that the use of these values

does not infer any determination regarding the ARAR status of the NJDEP NRSRS.

Comment 2. Section 2.8.2.1, Dames and Moore Phase I 1995 RI, second paragraph, page 2-16 –.

Comment: The NRSRS for thallium is 79 mg/kg.

Response: The value for thallium has been corrected in the text.

Comment 3. Section 2.8.4, Summary of Risk Assessment, third paragraph, page 2-18 –

Comment: Please refer to the General Comment 1 regarding the NRSRS for manganese.

Response: As stated in the response to General Comment #1, the FS has been revised to explain the USEPA position regarding the NRSRS calculated for the inhalation exposure route. However, the use of this value as an LOC and the text in Section 2.8.4 is correct and does not require modification.

Comment 4. Section 2.9.3.1, Surface Soil, second paragraph, page 2-22 -

Comment: Please refer to the General Comment regarding the NRSRS for manganese.

Response: As stated in the response to General Comment #1, the FS has been revised to explain the USEPA position regarding the NRSRS calculated for the inhalation exposure route. However, the use of this value as an LOC and the text in Section 2.9.3.1 is correct and does not require modification.

Comment 5. Section 2.10.2.2, Dames and Moore Phase I RI, 1998, second paragraph, page 2-25 –

Comment: Please refer to the General Comment regarding TCE and beryllium.

Response: As stated in the response to General Comment #1, the FS has been revised to explain the USEPA position regarding the NRSRS calculated for the inhalation exposure route. However, the use of this value as an LOC and the text in Section 2.10.2.2 is correct and does not require modification.

Comment 6. Section 2.10.3.1, Surface Soil, second paragraph, page 2-26 –

Comment: Please refer to the General Comment regarding PCE.

Response: As stated in the response to General Comment #1, the FS has been revised to explain the USEPA position regarding the NRSRS calculated for the inhalation exposure route. However, the use of this value as an LOC and the text in Section 2.10.3.1 is correct and does not require modification.

Comment 7. Section 2.11.2.3, Dames and Moore Phase I RI, 1998, second paragraph, page 2-29 –

Comment: Please refer to the General Comment regarding mercury.

Response: As stated in the response to General Comment #1, the FS has been revised to explain the USEPA position regarding the NRSRS calculated for the inhalation exposure route. However, the use of this value as an LOC and the text in Section 2.11.2.3 is correct and does not require modification.

Comment 8. Section 2.11.3.1, Surface Soil, second paragraph, page 2-30 -

Comment: Please refer to the General Comment regarding mercury.

Response: As stated in the response to General Comment #1, the FS has been revised to explain the USEPA position regarding the NRSRS calculated for the inhalation exposure route. However, the use of this value as an LOC and the text in Section 2.11.3.1 is correct and does not require modification.

Comment 9. Section 2.14.3.2, Subsurface Soil, second paragraph, page 2-35 -

Comment: Please refer to the General Comment regarding methylene chloride.

Response: As stated in the response to General Comment #1, the FS has been revised to explain the USEPA position regarding the NRSRS calculated for the inhalation exposure route. However, the use of this value as an LOC and the text in Section 2.14.3.2 is correct and does not require modification.

Comment 10. Section 2.16.3.2, Subsurface Soil, third paragraph, page 2-38 -

Comment: Please refer to the General Comment regarding methylene chloride.

Response: As stated in the response to General Comment #1, the FS has been revised to explain the USEPA position regarding the NRSRS calculated for the inhalation exposure route. However, the use of this value as an LOC and the text in Section 2.16.3.2 is correct and does not require modification.

Comment 11. Section 3.1.3.1, Surface and Subsurface Soils, ARARs, page 3-2 -

Comment: This section should be updated to reflect the promulgation of the New Jersey Soil Remediation Standards and the subsequent EPA letter regarding those standards dated May 12, 2010.

Response: The April FS had already been updated to reflect the promulgation of the NJDEP SRS. The document uniformly calls the NJDEP SRS promulgated criteria throughout the text. The revised FS has added explanation of the USEPA position as presented in the May 12, 2010 letter.

Comment 12. Section 2.10.5, Facility-Wide Investigation of Dry Wells and Sumps, page 2-28 -

Comment: It is requested that the second to last sentence that was deleted be reinserted into the FS as follows: "LUCs will be put in place at Building 3518 to ensure the building continues to serve as an effective cap over the contaminated soil."

Response: Agreed. The text has been revised as requested.

Comment 13. Table 3.2 -

Comment: Revise Table 3.2 to reflect EPA's letter regarding the NJSRSs dated May 12, 2010.

Response: Table 3.2 has been modified to footnote which of the NJDEP SRS are recognized by the USEPA and which are not.

Comment 14. Table 3.9 -

Comment: Revise Table 3.9 to reflect EPA's letter regarding the NJSRSs dated May 12, 2010.

Response: Table 3.9 has been modified to footnote which of the NJDEP SRS are recognized by the USEPA and which are not. This table will be expanded to show both the ingestion dermal criterion and the inhalation criterion.

Comment 15. Table 3.10 -

Comment: Revise Table 3.10 to reflect EPA's letter regarding the NJSRSs dated May 12, 2010.

Response: **Table 3.10 has been modified to footnote which of the NJDEP SRS are recognized by the USEPA and which are not.**

Comment 16. Section 4.4.2.2, Evaluation of Screening Criteria, Compliance with ARARs, page 4-15 –

Comment: The language used in this section is no longer valid since the issuance of EPA's letter regarding the NJSRSs dated May 12, 2010.

Response: **The section has been re-written to indicate that the NJDEP SRS calculated for dermal/ingestion (with the exceptions noted in the USEPA May 12, 2010 letter) are chemical specific ARAR and that the preferred remedial alternatives comply with chemical specific ARARs through the maintenance of existing engineering controls and the implementation of land use controls.**

Comment 17. Section 4.4.2.2, Evaluation of Screening Criteria, Long-Term Effectiveness and Permanence, page 4-16 –

Comment: In the first sentence change "provides" to "provide".

Response: **The sentence has been corrected as requested.**

Comment 18. Section 4.4.2.2, Evaluation of Screening Criteria, Implementation, page 4-16 –

Comment: Change "is" to "are".

Response: **The sentence has been corrected as requested.**

Comment 19. Section 4.4.3.2, Evaluation of Screening Criteria, Compliance with ARARs, page 4-15 –

Comment: The language used in this section is no longer valid since the issuance of EPA's letter regarding the NJSRSs dated May 12, 2010.

Response: **The section has been re-written to indicate that the NJDEP SRS calculated for dermal/ingestion (with the exceptions noted in the USEPA May 12, 2010 letter) are chemical specific ARAR and that the preferred remedial alternatives comply with chemical specific ARARs through the maintenance of existing engineering controls and the implementation of land use controls.**

Comment 20. Table 4-3, Comparative Analysis of Remedial Alternatives –

Comment: The site analyses under the column heading Compliance with ARARs will have to be revised based on consideration of the General Comment.

Response: **The column has been revised to specify which sites have chemical specific ARARs and which do not.**