U-005-1006.3

4982

DECONTAMINATION AND DISMANTLEMENT OF BUILDINGS AND STRUCTURES AT FERNALD FACT SHEET FOR THE PROPOSED PLAN/ENVIRONMENTAL ASSESSMENT FOR INTERIM REMEDIAL ACTION DECEMBER 1993

12/15/93

DOE-FN/PUBLIC
12
FACTSHEET
OU3

United States
Department of Energy
Fernald Environmental Management Project

Fernald Field Office
P.O. Box 398705
Cincinnati, Ohio 45239-8705

-4982

Fact Sheet for the Proposed Plan / Environmental Assessment for Interim Remedial Action

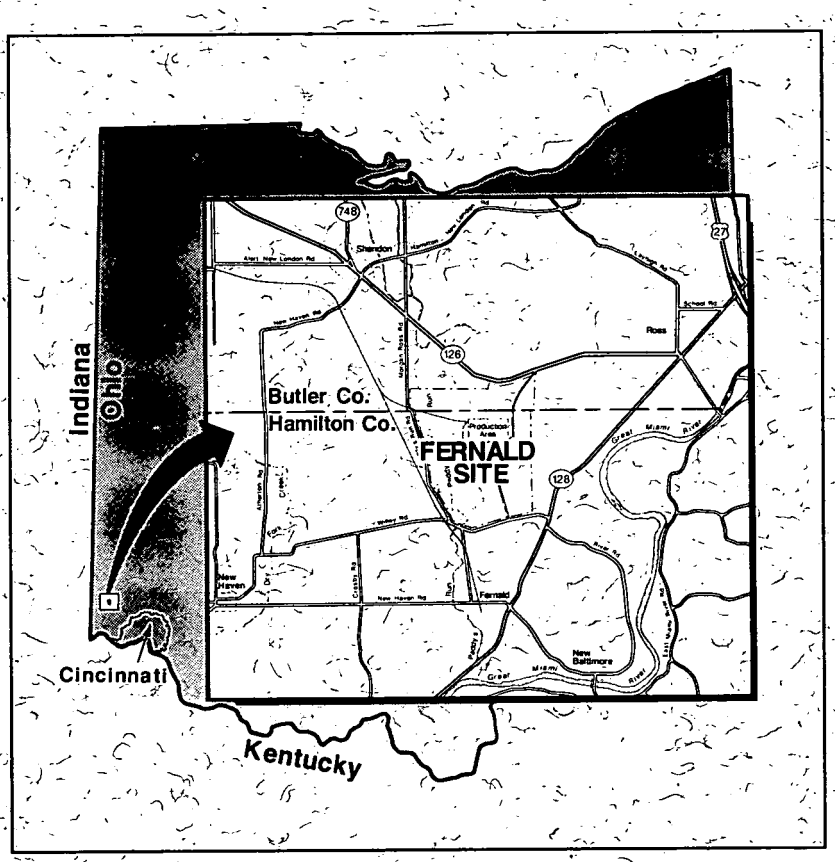
Decontamination and Dismantlement of Buildings and Structures at Fernald

DECEMBER 1993

This Fact Sheet Will Describe for You:

- The background of Operable Unit 3;
- The benefits of pursuing an interim remedial action;
- The cleanup alternatives being considered;
- DOE's preferred alternative for interim remedial action;
- How to participate in the selection/modification of the preferred alternative; and
- Where to get more information.

You are invited to a public meeting to discuss the alternatives being considered for the cleanup of Operable Unit 3 at the Fernald Environmental Management Project. The U.S. Department of Energy (DOE), together with the U.S. and Ohio Environmental Protection Agencies (EPA), encourage public participation in the decision-making process for the remediation of the Fernald site. Representatives from DOE and U.S. and Ohio EPAs will be present to discuss the alternatives, including the preferred alternative, answer questions, and accept comments. The meeting is scheduled for 7:00 p.m. on Wednesday, January 5, 1994, at The Plantation in Harrison, Ohio.



INTRODUCTION

This Fact Sheet discusses the U.S. Department of Energy's (DOE's) proposal for the removal of contaminated structures at the Fernald site. This Fact Sheet also describes how the public can participate in the selection or modify the preferred alternative and describes how to get additional information.

SITE DESCRIPTION

The Fernald site, formerly known as the Feed Materials Production Center, is a Federal facility that produced high purity uranium metal products for the DOE and its predecessor agencies from 1952 to 1989. Thorium products were also manufactured on a smaller scale and are stored on-site with various uranium materials and process residues. The 1,050-acre site is located in a rural agricul-

0001

tural area about 17 miles northwest of downtown Cincinnati, Ohio.

All production activities at Fernald stopped in July 1989 to allow the site to concentrate on environmental cleanup and restoration. Congress officially closed Fernald in June 1991, formally ending the 37-year production mission. To reflect the site's new mission of environmental cleanup, DOE changed the name of the facility to the Fernald Environmental Management Project. In December 1992, the Fernald Environmental Restoration Management Corporation (FERMCO) assumed responsibility for the cleanup under the first Environmental Restoration Management Contract with the DOE.

The Fernald site was placed on the **National Priorities List** in 1989; therefore, all cleanup actions, sometimes referred to as **remedial actions**, are being conducted in accordance with the requirements of the **Comprehensive Environmental Response, Compensation and Liability Act** of 1980 (CERCLA), as amended by the Superfund Amendments Reauthorization Act (SARA).

*Note: terms in **bold** have been defined in the glossary on page 10 of this Fact Sheet.*

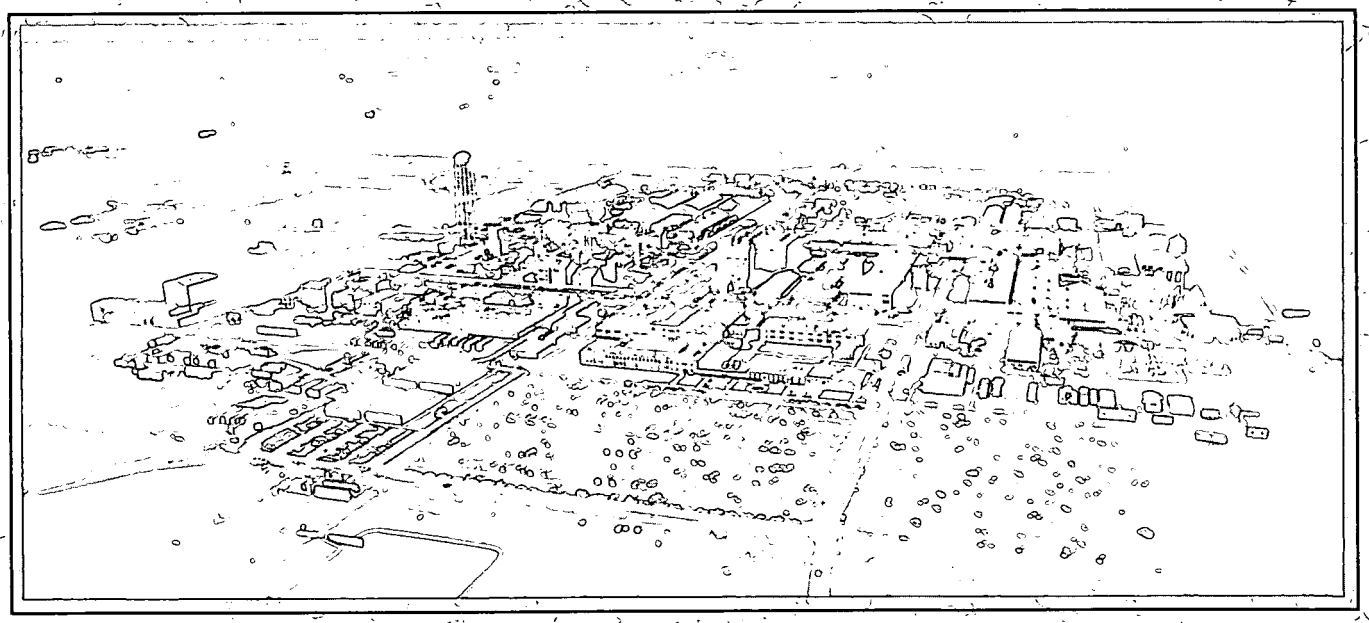
UNDERSTANDING OPERABLE UNIT 3

The Fernald site is divided into five separate **operable units**. Operable Unit 3 (OU3) consists of all man-made structures at Fernald, whether above or below ground, that are not included in the other four operable units, such as the K-65 silos. OU3 structures include all buildings, storage pads, roads, sewer and electrical systems, railroads, fences, inventory, drums, material piles, etc. Most of these lie within the former production area, which occupies about 136 acres near the center of the Fernald site. OU3 does not include environmental media, such as soils and groundwater.

No future use has been identified for the man-made structures which make up OU3, other than interim activities related to environmental cleanup. Further, the majority of the structures were built in the early 1950s and are at or beyond their design lives. Most facilities show signs of significant deterioration due to the age of the structures and the nature of the former processing operations. Because of these reasons and others, DOE proposes in this document that all structures and facilities be dismantled.

SUMMARY OF CURRENT SITE RISKS

OU3 structures currently contain contaminants associated with the former production mission of the site. The full nature and extent of contamination of OU3 structures is not known at this time, since field characterization has only recently started. However, contaminants existing in structural materials and processing equipment may pose risks to workers, the public, and the environment if not confined or removed. Uranium and its radioactive decay products are expected to be the primary concerns; however, trace metals, solvents, PCBs, and asbestos



1993 AERIAL PHOTO OF THE FERNALD SITE

contamination may also be present at levels of concern. These contaminants are expected to be primarily concentrated in the former process buildings and in waste materials.

To prevent direct contact by the public with these hazards, DOE currently maintains active access controls, such as border fences and a security force. DOE also continues an active maintenance program to minimize the potential release of contaminants due to deterioration of the aging facilities.

Although these administrative controls assist in lowering potential exposures to contaminants, more significant releases of contaminants and resulting exposures could occur in the future. The major concern is the potential for increased future risks as the buildings further age and deteriorate, increasing the chances for the release of contaminants. If the potential for releases of hazardous substances from OU3 are not addressed, these hazards may present a current or potential threat to public health, welfare, or the environment.

WHY DEVELOP A PROPOSED PLAN?

DOE is proposing to implement an **interim action** to further reduce or eliminate the potential for releases of hazardous substances from the OU3 facilities. The *Proposed Plan / Environmental Assessment for Interim Remedial Action*, also referred to simply as the Proposed Plan, was prepared to document the various interim action alternatives available to DOE for reducing potential risks quickly and to support earliest initiation of cleanup of OU3. The Proposed Plan was established as a way to request public participation and incorporate public input into the decision-making process on the proposed interim action.

A second purpose of the Proposed Plan is to provide the evaluation necessary to satisfy the requirements of the **National Environmental Policy Act** (NEPA) pertaining to the proposed interim action. The evaluation, called an Environmental Assessment, addresses the proposed interim action and related site activities that could potentially impact human health or the environment.

DOE envisions that an Interim **Record of Decision** will be developed for OU3. A Record of Decision is a legal document, signed by EPA and DOE, that gives DOE approval to go ahead with a specified cleanup action. The final Record of Decision for OU3 will not be submitted to EPA until 1997, which would allow cleanup to begin in the year 2000. An Interim Record of Decision would allow an earlier response to potential human health and environmental risks. The interim action was pursued because of concerns with the increased potential for releases from the deteriorating structures which could be a potential risk to human health and the environment.

This Fact Sheet summarizes the results of evaluating the four alternatives considered for interim action. Included are a description of each alternative and a comparative analysis examining the trade-offs between the alternatives. DOE's preferred alternative for interim action is identified for possible selection in the OU3 Interim Record of Decision.

DESCRIPTION OF THE ALTERNATIVES

Four alternatives have been developed for the Proposed Plan and are summarized below:

Alternative 0 -- No Action
Under this alternative, OU3 would be abandoned and allowed to further deteriorate. This action would increase the probability for releases of radioactive and chemical contaminants to the environment. This alternative would not protect human health and the environment. Because this is unacceptable to DOE, EPA, and other stakeholders, this alternative has not been further evaluated.

Alternative 1 -- No Interim Action
This alternative represents the continuation of current cleanup programs and **removal actions** within OU3. Early initiation of site remediation would not occur under this alternative. Cleanup decisions for OU3 would be addressed in the final Record of Decision, presently scheduled for submittal in draft form to EPA in April 1997.

Alternative 2 -- Surface Decontaminate Only
This alternative is the same as Alternative 1 with the addition of interior and exterior surface decontamination of OU3 structures. Additional removal actions may be undertaken to further reduce risks to people and to the environment. As with Alternative 1, final cleanup decisions for OU3 would await the final Record of Decision.

Alternative 3 -- Decontaminate and Dismantle
This alternative would involve the decontamination and dismantlement (tearing down and removing) of all OU3 structures and related facilities. Alternative 3 includes placing the bulk of the debris and rubble generated before the final Record of

Decision into temporary storage. Treatment and final disposition decisions for the waste and rubble would await the final Record of Decision. The actions under this option would include:

(1) decontaminating over 200 structures in OU3 by removing loose contamination;
(2) dismantling the structures;
(3) removing foundations, storage pads, ponds, basins, and underground utilities;
(4) constructing and operating multiple temporary storage facilities in or near the former production area;
(5) shipping some of the nonrecoverable waste and debris generated by dismantlement before the final Record of Decision to an approved, off-site disposal site; and
(6) storing the remaining waste and debris in the temporary storage facilities until a final decision is reached concerning their treatment and disposal.

HOW ALTERNATIVES ARE EVALUATED

To provide a basis for selecting the preferred remedial action alternative, each alternative is evaluated against specific EPA criteria (see shaded box). Regardless of which alternative is selected, DOE proposes to eventually remove the site structures. If the *No Interim Action Alternative* (Alternative 1) or the *Surface Decontamination Only Alternative* (Alternative 2) is selected now, DOE proposes that structure removal would occur after the final Record of Decision for OU3. For the reasons mentioned in the previous section, the *No Action Alternative* (Alternative 0) has been eliminated from further evaluation as an acceptable option. The primary difference between the remaining three alternatives is the time frame in which cleanup would take place.

Overall Protection of Human Health and the Environment

Because it is anticipated that decontamination and dismantlement of site structures would eventually occur under each of the three alternatives, each alternative would provide overall protection of human health and the environment.

Compliance with ARARs

Assuming the structures are eventually decontaminated and dismantled, each alternative would comply with ARARs during the action. During the period before the final ROD, the *No Interim Action Alternative* and the *Surface Decontamination Only Alternative* would allow the buildings to

EVALUATION CRITERIA

The following criteria are based on guidance published by the U.S. EPA and are used to evaluate each of the possible interim alternatives. The first seven criteria are discussed more thoroughly in this Fact Sheet along with how the criteria apply to each alternative. The last two criteria, State and community acceptance, will be addressed during the public comment period.

1. *Overall protection of human health and the environment* addresses whether an alternative eliminates, reduces, or controls threats to public health and the environment.

2. *Compliance with **Applicable or Relevant and Appropriate Requirements** (ARARs)* addresses whether an alternative meets Federal and State environmental laws and regulations.

3. *Short-term effectiveness* considers the time needed for an alternative to achieve remedial response objectives and the risks posed to workers, residents, and the environment during the remedial action.

4. *Long-term effectiveness* considers the ability of an alternative to protect public health and the environment long after remedial action is complete.

5. *Reduction of toxicity, mobility, or volume through treatment* evaluates an alternative's use of treatment to reduce the harmful nature of contaminants, their ability to move in the environment, and the amount, or volume, of contamination present.

6. *Implementability* addresses the feasibility of an alternative, both from a technical and an administrative standpoint.

7. *Cost* considers the amount of money it will take to design, construct, operate, and maintain the alternative.

8. *State acceptance* addresses comments made by the Ohio EPA concerning the alternatives considered.

9. *Community acceptance* addresses the formal comments made by the public on the alternatives being considered. One opportunity for you to voice your opinion as a member of the public is to complete the attached comment sheet and send it to DOE. At the end of the public comment period, DOE will respond to every relevant question and comment. These responses will become part of the Interim Record of Decision document.

continue to age, weather, and deteriorate, resulting in potential exposures to the public and contaminant releases to the groundwater. For the *Decontaminate and Dismantle Alternative*, the action would comply with identified ARARs.

Short-term Effectiveness

The evaluation of short-term effectiveness considers the time required to achieve remedial response objectives. Regardless of which alternative is chosen, it is anticipated that OU3 structures will eventually be dismantled, treated, and disposed of.

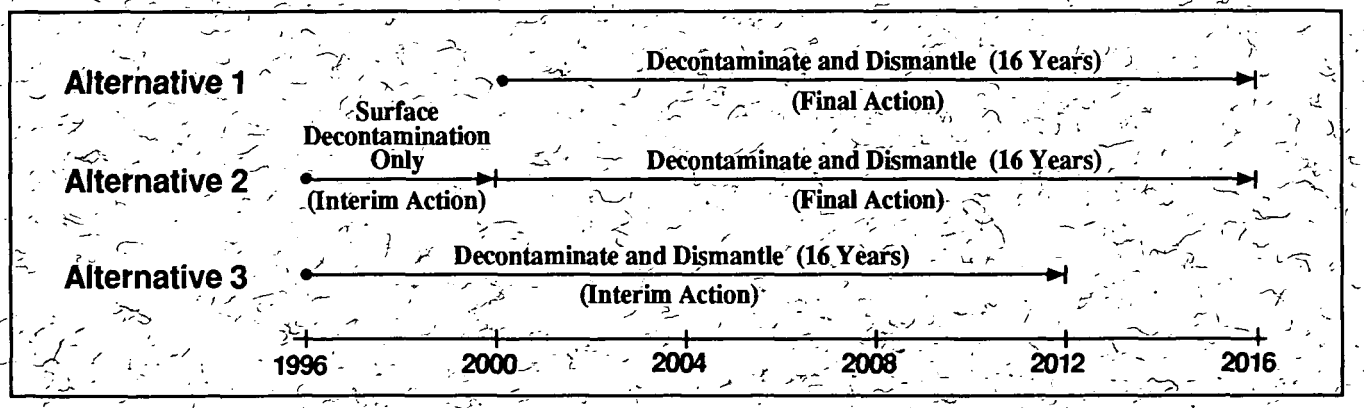
The significant difference between the alternatives is the time that remedial response objectives are achieved as shown in the figure below. The *No Interim Action Alternative* would leave sources of contamination in place for four years longer than the *Decontaminate and Dismantle Alternative* before cleanup activities would begin. During this time, releases to the environment and exposure of on-site and off-site receptors could occur due to continued deterioration of the aging facilities and exposure of contaminants to wind and rain.

For the *Surface Decontaminate Only Alternative*, surfaces of structures would be decontaminated to remove significant levels of removable contamination. However, without removing equipment, piping, and utilities, complete decontamination of the buildings could not be performed. As a result, some contaminants would still remain in the structures. Similar to the *No Interim Action Alternative*, leaving some contamination in place continues the potential for exposing the public, site workers, and the environment to contaminants.

The *Decontaminate and Dismantle Alternative* would support early initiation of the cleanup process by an estimated four years, allowing completion around 2012 (under current plans). This alternative would protect human health and the environment better than the *No Interim Action Alternative* and the *Surface Decontamination Only Alternative*, since the action results in removing all sources of contamination and initiates the cleanup process of OU3 earlier. Additionally, this alternative would enable earlier cleanup of soils and groundwater associated with Operable Unit 5.

During cleanup activities associated with the *Surface Decontaminate Only Alternative* and the *Decontaminate and Dismantle Alternative*, levels of airborne contaminants would be increased in work areas. Remediation workers would be directly exposed to radiation as a result of their activities and would inhale some of the airborne contaminants, although respiratory protection would be provided and would greatly reduce the quantity of contaminants inhaled. The general public and on-site workers not directly involved with cleanup activities may be exposed to very small quantities of these airborne contaminants that would leave the work areas after passing through high-efficiency air filters.

The construction of temporary storage facilities for the *Decontaminate and Dismantle Alternative* would disturb about 12 acres of ungrazed, managed fields, which currently provide minor habitat and/or food sources for wildlife. Implementation of the *Decontaminate and Dismantle Alternative* would also result in the disruption of about 1.2 acres of wetlands near the former production area of OU3. The alternative, however, would have overall positive environmental effects because removal of the contaminated structures would reduce the potential for releases of contaminants to the environment.



COMPARISON OF SCHEDULES FOR THE ALTERNATIVES

Long-Term Effectiveness and Permanence

Because the proposed alternatives are for an interim action only, none of the alternatives provide a permanent solution, and therefore an evaluation of their effectiveness in the long-term (100 years or more after the completion of the action) is not appropriate. Therefore, the *long-term effectiveness and permanence* criterion is not used to evaluate the alternatives. A permanent solution will be provided by the final remediation of OU3 conducted after the final Record of Decision.

Reduction in Toxicity, Mobility, or Volume through Treatment

Because it is anticipated that OU3 structures will eventually be torn down and the resulting materials treated and dispositioned, each alternative would eventually result in reduction of the mobility of contaminants. However, for the *No Interim Action Alternative* and the *Surface Decontaminate Only Alternative*, cleanup actions delayed until the final Record of Decision could potentially result in interim releases from structures. These releases could cause further soil and groundwater contamination, which would increase the volume of contaminated material. Although the *Surface Decontaminate Only Alternative* would perform gross surface decontamination, a second decontamination effort would eventually be required if dismantlement occurs under the final ROD, as discussed in the description of the alternative. This added decontamination effort would result in an increased volume of waste.

The *Decontaminate and Dismantle Alternative* would reduce the potential increase in volume of contaminated material caused by the migration of contaminants. The *Decontaminate and Dismantle Alternative* would minimize the amount of waste generation compared to the other alternatives. Recycling of materials would occur when possible.

Implementability

The *No Interim Action Alternative* would be the easiest and most direct to implement. However, continuing without using an interim action and using removal actions to proceed with cleanup requires duplication of multiple studies, documents, regulatory reviews, and public comment periods to accomplish similar actions. The *Surface Decontamination Only Alternative* and the *Decontaminate and Dismantle Alternative* would use proven and reliable technologies. Assuming that decontamination and dismantlement of OU3 structures would eventually occur, implementability issues would be similar for all three alternatives.

Cost

Two methods are used to present costs associated with implementing each of the alternatives. As shown in the "Summary Table for the Evaluation of Alternatives" on page 8, the first method illustrates the costs in current fiscal year (1994) dollars. In other words, if the entire cost of the alternative was paid during the 1994 fiscal year, then that cost would be considered to be in current year dollars. However, because of inflation, work performed in the future will undoubtably cost more than work performed today.

To account for this, a second cost estimating approach is used, called present worth analysis. Present worth analysis calculates the amount of money that would have to be invested today in order to pay for the cleanup over the years of implementation. The real interest rate applied in the present worth analysis is determined by the Federal Government's Office of Management and Budget to be 4.4 percent based on an investment interest rate minus the rate of inflation.

The costs for each alternative reflect the costs for performing the alternative itself plus the eventual decontamination, dismantlement, and interim site maintenance and monitoring. The differences in overall costs for the alternatives are mainly the result of the four-year difference in implementation schedules. The difference results from four additional years of costs associated with the maintenance and monitoring of the structures and related facilities while they remain in place (including security forces, utilities, etc.).

The *No Interim Action Alternative* would have an estimated overall cost of $2,520 million in current year dollars, which is equivalent to a present worth cost of $1,548 million. These cost estimates assume that the final Record of Decision involves the eventual decontamination and dismantlement of OU3 structures and facilities.

The *Surface Decontaminate Only Alternative* has the highest estimated overall cost ($2,602 million in current year dollars, which is equivalent to a present worth cost of $1,619 million) because it is assumed that, in addition to the cost associated with the four-year delay, the decontamination effort would have to be repeated at the time of final cleanup, because of the probability that contaminants would migrate from inaccessible areas. Surface decontamination would not remove, for example, uranium dust and residues that have gathered under a piece of equipment over

the last 30 years. However, during the dismantlement of the structure, once the piece of equipment has been removed, the floor and equipment would be decontaminated.

The *Decontaminate and Dismantle Alternative* would have an estimated overall cost of $2,164 million in current year dollars. This equates to a present worth cost of $1,476 million. Because this alternative would save about four years of building maintenance and monitoring costs, the estimated overall cost of the *Decontaminate and Dismantle Alternative* would be the smallest and would, in 1994 money, be $356 million less than the overall cost of the *No Interim Action Alternative* and $438 million less than the overall cost for the *Surface Decontamination Only Alternative*.

State Acceptance

State acceptance or concerns regarding the Proposed Plan will be addressed during the public comment period and during the development of the Interim Record of Decision document. These concerns will be incorporated in the Interim Record of Decision and included in the final version of the Proposed Plan.

Community Acceptance

By either filling out and returning the attached comment sheet or by verbally commenting on the Proposed Plan during the public meeting, interested members of the public can voice their opinion on which parts of the alternative they support, which parts they have reservations about, and which parts they oppose. Community acceptance will be assessed after the public comment period and will be addressed in the Interim Record of Decision document.

SELECTION OF THE PREFERRED ALTERNATIVE

The *Decontaminate and Dismantle Alternative* is DOE's preferred alternative. It supports early initiation of the cleanup process, provides the quickest mechanism for reducing risks, and is the cheapest alternative overall.

SUMMARY OF RISKS FOR THE PREFERRED ALTERNATIVE

The proposed action was analyzed for potential health effects on the general public and workers and for general environmental impacts. Potential health impacts were analyzed for three types of receptors: workers involved in the proposed action and the Safe Shutdown action (referred to as "action workers"), other on-site workers not involved in either of the actions, and off-site residents. An assessment of both radiological and chemical contaminants was performed to support this summary. Risks from exposure to chemical contaminants are expected to be less than the risks due to exposures to radiological contaminants. The potential risks to the general public, the workers, and the environment are summarized in the following sections.

Health Effects: General Public

Based on the assessment of radiological and chemical contaminants, it is estimated that the total annual risk to an off-site individual, if the preferred alternative is implemented, is expected to be lower than the EPA acceptable risk range of 10^{-4} (one in ten thousand) to 10^{-6} (one in a million). For comparison purposes, an average individual in the United States receives an annual radiation dose of about 300 millirem from natural background and other sources, or about 5,000 times larger than that estimated for the proposed action. In addition, the annual dose to the public from the proposed action is well below the applicable DOE control limit of 100 millirem.

Health Effects: Workers

Exposures to the maximally exposed decontamination worker as a consequence of the proposed interim action are estimated to be well below the DOE administrative control level of 2,000 millirem per year and the limit for occupational workers of 5,000 millirem per year specified in DOE Order 5480.11. Because of worker protection including engineering, administrative, and monitoring controls, that would be used during the implementation of the preferred alternative, exposures would remain within acceptable levels. The total annual risk to a remediation worker would be about 10^{-4}, which represents a one in ten thousand chance of additional cancer incidence.

Other workers at the site not directly involved in the proposed action could be exposed to airborne contaminants released during project activities. The actual exposure to these workers would depend on their proximity to the releases. It is estimated that the total annual risk to other workers is equivalent to the risks to the off-site individual. This risk is lower than the EPA acceptable risk range of 10^{-4} (one in ten thousand) to 10^{-6} (one in a million).

-4982

SUMMARY TABLE FOR THE EVALUATION OF ALTERNATIVES

Evaluation Criteria	Alternative 1 No Interim Action	Alternative 2 Decontaminate Surfaces Only	Alternative 3 Decontaminate and Dismantle
Overall protection of human health and the environment	Provides overall protection of human health and the environment.	Provides overall protection of human health and the environment.	Provides overall protection of human health and the environment.
Compliance with ARARs	Before final remediation, the action may result in exposures to the public and releases to the environment.	Would comply with ARARs during the action. Before final remediation, the action may result in exposures to the public and releases to the environment.	Would comply with ARARs.
Long-term effectiveness and permanence	Evaluation not performed for interim actions.	Evaluation not performed for interim actions.	Evaluation not performed for interim actions.
Short-term effectiveness	Would not accelerate site remediation. Also, before final remediation, the migration of contaminants into soils and ground water and airborne releases may occur.	Would not accelerate site remediation. Also, before final remediation, the migration of contaminants into soils and ground water and airborne releases may occur.	Accelerates site remediation. Achieves remedial action objectives earlier.
Reduction in toxicity, mobility, or volume through treatment	Provides no treatment before final remediation. Releases to the environment may increase the volume of contaminated material.	Releases to the environment from final remediation and repeat decontamination effort may increase volume of contaminated material.	Removes contaminants to controlled storage and would minimize waste generation as compared to Alternatives 1 and 2.
Implementability	Easier and more direct to implement in the short-term than Alternatives 2 or 3. However, requires duplication of studies, regulatory reviews, and public comment periods.	Easier and more direct to implement in the short-term than Alternative 3.	Technically and administratively feasible to implement.
Current year (1994) cost (in millions)	$2,520	$2,602	$2,164
Present worth cost (in millions)	$1,548	$1,619	$1,476
State Acceptance	Will be documented in the Interim Record of Decision document and included into the final version of the Proposed Plan.	Will be documented in the Interim Record of Decision document and included into the final version of the Proposed Plan.	Will be documented in the Interim Record of Decision document and included into the final version of the Proposed Plan.
Community Acceptance	Will be addressed when comments are received from the public.	Will be addressed when comments are received from the public.	Will be addressed when comments are received from the public.

0008

Environmental Effects

The preferred alternative would produce overall positive environmental impacts because removal of the contaminated structures would reduce the potential for releases to the environment. Decontamination and dismantlement of structures would reduce the potential for impacts to surface water, groundwater, and air quality because contaminant sources would be removed to better storage configurations. Cleanup activities would facilitate future beneficial use of the site.

All soils that would be affected by the implementation of the *Decontaminate and Dismantle Alternative* have been disturbed by previous construction and operation at the site. The construction of the temporary storage facilities would disturb approximately 12 acres of ungrazed, managed fields, which currently provide minor habitat or food sources for wildlife. Implementation of the preferred alternative would result in the disruption of about 1.2 acres of wetlands associated with drainage ditches constructed at the site.

STATUTORY FINDINGS

On the basis of currently available information, the preferred alternative provides the best balance of trade-offs among the alternatives with respect to the evaluation criteria. DOE and EPA believe the preferred alternative would protect human health and the environment to the maximum extent possible. It would also be cost-effective and would comply with Federal, State, and local ARARs.

Because this proposal pertains to an interim action instead of a final action, the preferred alternative does not utilize permanent solutions or consider alternative technologies. It does not satisfy the statutory preference for remedial actions that employ treatment to reduce toxicity, mobility, or volume as a principal element of the action. However, permanent solutions will be utilized in the final remedial action and alternative treatment (or resource recovery) will be utilized to the maximum extent possible. The final remedial action will satisfy the statutory preference for treatment as a principal element or will provide justification for not meeting the preference.

COMMUNITY PARTICIPATION

DOE encourages public participation in the selection of the preferred alternative for the cleanup of OU3. Community comments on the preferred alternative and other alternatives will be evaluated and documented as part of the subsequent Interim Record of Decision. Based on public comments or new information, DOE may modify the preferred alternative or select another.

THE NEXT STEP

Following the public comment period, and assuming public acceptance of the preferred alternative, the DOE and EPA will sign an Interim Record of Decision for OU3. The Interim Record of Decision will describe the selected interim action and include the responses to comments received during the public comment period. After the document is signed, a design plan for performing the interim remedial action will be prepared. Once the design is complete, the interim remedial action can begin.

Opportunities for Public Involvement

Public Comment Period: DOE will hold a 30-day public comment period for the *Proposed Plan / Environmental Assessment for Interim Remedial Action* from December 8, 1993 to January 7, 1994. The comment period provides an opportunity for local residents and interested parties to express their views and concerns on the remedial alternatives being considered. A copy of the Proposed Plan is available in the **Administrative Record**, located at the **Public Environmental Information Center**, JAMTEK Building, 10845 Hamilton-Cleves Highway, Harrison, Ohio 45030, (513) 738-0164 or 738-0165.

Public Meeting: DOE, in coordination with the U.S. and Ohio EPAs, will also hold a public meeting during the public comment period to discuss the alternatives and answer questions. The meeting is scheduled for 7:00 p.m. on Wednesday, January 5, 1994 at The Plantation in Harrison, Ohio. Written and oral comments will be accepted during the meeting.

This publication was printed on paper that is manufactured with at least 50% reclaimed fiber.

0009800

GLOSSARY

Administrative Record: The Administrative Record contains documentation of CERCLA-related activities for each operable unit. The documents in the Administrative Record are used to make decisions in Fernald's remediation program, as well as for short-term protective measures (removal actions) implemented until a final remediation plan can be put into effect. The Administrative Record is made available for public review so that community members have the opportunity to provide comments to the DOE on proposed cleanup activities at the Fernald site. The Administrative Record for the Fernald site is located at the Public Environmental Information Center (PEIC). Details on the PEIC are provided below.

Applicable or Relevant and Appropriate Requirements (ARARs): Federal and State (usually included if they are more strict) standards that are legally applicable, or relevant and appropriate, at a Superfund site. ARARs, specifically, are cleanup standards, controls, and other measures which are borrowed from existing regulations to protect the environment.

Comprehensive Environmental Response, Compensation and Liability Act (CERCLA) and Superfund Amendments and Reauthorization Act (SARA): CERCLA is a Federal law, passed in 1980 and modified in 1986 (called SARA), that created a special tax to be placed in a trust fund. This trust fund, generally referred to as Superfund, is used to investigate and remedy abandoned or uncontrolled hazardous waste sites. Under this legislation, the U.S. EPA can carry out one of two possible actions: (1) pay for site remediation if those responsible for generating the waste cannot be located or are unwilling or unable to perform the work; or (2) use legal action to force those responsible for generating the waste to remediate the site or pay the government for the cost of remediation. At Fernald, the DOE is the responsible party, and is remediating the site with oversight from the U.S. EPA. The relevance of SARA to the Fernald site is that SARA contains provisions for setting up the Administrative Record as a vehicle for public involvement in cleanup activities.

Dose: Dose is a term to describe the amount of exposure to a contaminant an individual receives. Exposures include inhalation (breathing), ingestion (swallowing), and external contact (touching).

Interim Action: Also referred to as interim remedial actions, interim actions are courses of action that may be pursued in the short-term before a final Record of Decision in order to quickly reduce existing risks at a Superfund site.

National Environmental Policy Act of 1969 (NEPA): This law was signed in 1970, declaring a national environmental policy and promotes consideration of environmental concerns by Federal agencies. NEPA has had a pervasive effect on the Federal decision-making process as a result of thousands of judicial decisions construing the statute's meaning in concrete situations.

National Priorities List (NPL): The NPL is EPA's list of the most serious uncontrolled or abandoned hazardous waste sites identified for possible long-term remedial action under Superfund. A site must be on the NPL to receive money from the trust fund for remedial action. EPA is required to update the NPL at least once a year.

Operable Unit: An operable unit (OU) can represent a number of separate activities undertaken as part of a Superfund site cleanup. At Fernald, five operable units make up the site for the purposes of cleanup. Each operable unit is defined based on a reasonable grouping or area of problems. The five operable units at Fernald are briefly summarized as: OU1 - waste pits; OU2 - ash pile, sanitary landfill, and lime sludge ponds; OU3 - all buildings and associated facilities (roads, railroads, drummed waste, inventory, fences, telephone poles, electrical and sewage lines, etc.); OU4 - K-65 silos; OU5 - contaminated environmental media (soil, perched water, etc.).

Public Environmental Information Center (PEIC): The PEIC is an information repository located about 1.5 miles south of the Fernald site on Route 128. In addition to the Administrative Record, the PEIC contains additional materials to help the public understand cleanup activities at the site, such as the Annual Environmental Report, news clippings, fact sheets and textbooks. For additional information about the PEIC, call (513) 738-0164 during normal operating hours.

Record of Decision (ROD) and Interim Record of Decision (IROD): RODs and IRODs are public documents that explain which cleanup alternative(s) will be used at CERCLA sites.

Remedial Action: A remedial action is the implementation of the action determined in the Record of Decision and represents the last phase of a Superfund site cleanup.

Removal Action: A removal action is a short-term, immediate action taken to address releases of hazardous substances that require a quick response.

Risk: The conversion of a dose value to an expected effect on living organisms is reported as a risk. Under CERCLA, risk is generally meant to indicate the probability for specific health effects as a result of dose.

COMMENT SHEET

DOE is interested in your comments on the cleanup alternatives being considered in the *Proposed Plan / Environmental Assessment for Interim Remedial Action* of Operable Unit 3, including the preferred alternative to decontaminate and dismantle the former production area at the Fernald site. Please use the space provided below to write your comments, then fold, staple or tape, and mail this form. We must receive your comments on or before the close of the public comment period on January 7, 1994. If you have questions about the comment period, please contact Ken Morgan, the DOE Public Information Officer at Fernald, at (513) 648-3131.

Name:

Address:

City: **State/Zip:**

Phone:

MAILING LIST ADDITIONS:

Please add my name to the Fernald Mailing List to receive additional information on the cleanup progress at the Fernald Environmental Management Project:

YES ___ **NO** ___

-4982

For More Information

Additional information or related cleanup documents are available to the public at the following location:

Public Environmental Information Center
JAMTEK Building
10845 Hamilton-Cleves Highway
Harrison, Ohio 45030
(513) 738-0164 or 0165

fold here

fold here

Name _____

Address _____

_____

Place Stamp Here

Mr. K. L. Morgan
Public Information Officer
DOE Field Office, Fernald
U.S. Department of Energy
P.O. Box 398705
Cincinnati, Ohio 45239-8705

0012