MEMORANDUM

SUBJECT  Response Actions at Sites with Contamination Inside Buildings

FROM  Henry L Longest II, Director
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TO  Director, Waste Management Division
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Director, Emergency and Remedial Response Division
Region II
Director, Hazardous Waste Management Division
Regions III, VI, IX
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Region X
Director, Environmental Services Division
Regions I, VI, VII

PURPOSE

This directive transmits guidance on the use of authority under §104(a) of the Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA), as amended, to conduct response actions to address releases of hazardous substances, pollutants, or contaminants that are found within buildings. Use of this guidance may assist Regional Decision Teams (RDTs) in implementing early actions under the Superfund Accelerated Cleanup Model (SACM).

BACKGROUND

CERCLA §104(a) provides EPA with the authority to conduct response actions whenever there is a release or threat of release of a hazardous substance, pollutant, or contaminant into the environment. Section 101(22) of CERCLA defines "release" to include "any spilling, leaking, pumping, pouring, emitting, or disposing into the environment." CERCLA §101(8) defines "environment" to include "navigable waters, any surface water, ground water, drinking water supply, land surface or subsurface..."
strata, or ambient air " A discharge of a hazardous substance, pollutant, or contaminant that remains entirely contained within a building is not a "release" under CERCLA unless it subsequently enters the environment. It may be a threatened release and, thus, subject to CERCLA response authority (50 FR 13462, April 4, 1985).

There are currently a number of sites throughout the nation where buildings are contaminated with hazardous substances, pollutants, or contaminants, and where the release or threat of release of these substances may pose a substantial threat to human health. However, CERCLA expressly limits, under §104(a)(3), any response actions taken in response to a release or threat of release:

- of a naturally occurring substance in its unaltered form, or altered solely through naturally occurring processes or phenomena, from a location where it is naturally found,

- from products which are part of the structure of, and result in exposure within, residential buildings or business or community structures, or

- into public or private drinking water supplies due to deterioration of the system through ordinary use.

CERCLA §104(a)(3) therefore limits responses in certain situations, such as releases of radon or asbestos from building products or from in situ natural sources, but §104(a)(4), entitled Exception to Limitations, identifies specific circumstances that, if present, would allow CERCLA response in such situations.

Removal actions involving substances or releases that are subject to statutory exclusions or limitations in CERCLA are explicitly listed in OSWER Directive 9360 0-19, "Guidance on Non-NPL Removal Actions Involving Nationally Significant or Precedent-Setting Issues" (March 3, 1989). A copy of the Guidance is attached to this directive. As noted in the Guidance, written concurrence must be received from Headquarters prior to formal approval of the Action Memorandum by the Regional Administrator (RA), except in situations where a response must be initiated within hours (i.e., except in true emergency situations).

1Note that the statute defines the term "release" to mean a release of a substance "into the environment." However, for purposes of clarity, this memorandum distinguishes between a "release," which may be indoors or into the environment, and a "release into the environment."
Responses to indoor releases, such as at a contaminated chemical processing facility, are not expressly limited in CERCLA, and response actions may be appropriate in such situations where there is a release or threat of release into the environment. Such responses, however, have the potential of being nationally significant or precedent-setting because response to indoor contamination is not the primary focus of CERCLA, and because it may be difficult to show that a release or threat of release from indoor contamination poses a threat to public health or welfare or the environment.

OBJECTIVE

This directive clarifies that CERCLA §104 authority should be used only when there is a release or threat of release of a hazardous substance (and, if there is also a finding of imminent and substantial endangerment, of a pollutant or contaminant) into the environment, and only when such a release or threat of release poses a hazard to public health or welfare or the environment. If it can be shown that there is a release or threat of release into the environment, a SACM early action responding to indoor contamination related to that release or threat of release may be taken under certain circumstances as defined below. Of course, any early actions undertaken pursuant to this directive must be conducted in accordance with the NCP.

IMPLEMENTATION

If the indoor contamination involves one of the three scenarios specified in CERCLA §104(a)(3), as identified above, a response action may be taken pursuant to the exceptions of §104(a)(4) only if all of the following three criteria are met:

- there must be a release or threat of release of a hazardous substance, pollutant, or contaminant into the environment,

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2It should be clarified that in CERCLA §101(22) the phrase "release into the environment" refers to the location of the release itself, the phrase does not address the location of the hazard that the release poses. Thus, response actions under the National Oil and Hazardous Substances Pollution Contingency Plan (NCP) to remedy, for example, radium wastes that have been disposed of in subsoil, which may in turn cause indoor hazards from migration and accumulation of radon gas in nearby homes, are not excluded under CERCLA §104(a)(3), whereas radium wastes incorporated into building materials and used in a structure may be excluded.
• the release must constitute a public health or environmental emergency, and no other person with the authority and capability to respond to the emergency will do so in a timely manner, and

• Headquarters must assess the national significance and precedent-setting nature of the response and concur in the response action

Regardless of whether or not a potential response action involving indoor contamination is addressed explicitly in CERCLA §104(a)(3), several steps should be followed by Regional response personnel prior to initiating a response action. These steps are summarized below and illustrated in Figure 1.

**Determination of a Release or Threat of Release into the Environment**

To appropriately use CERCLA authority, there must be adequate documentation to show that the indoor contamination results in a release, or a threat of release, of a hazardous substance, pollutant, or contaminant into the environment. (In addition, for releases involving pollutants or contaminants, there must also be a determination of an imminent and substantial endangerment.) The issue of whether a release or threat of release into the environment exists, however, can be ambiguous when addressing sites with indoor contamination or where contamination stems from the structure itself. Regardless of the nature of the indoor contamination, however, a release or threat of release must be substantiated prior to taking response action.

In general, authority to respond to a release or threat of release from a building exists if at least one person or the environment outside of the building may be exposed to the release. For example, if the hazardous substance, pollutant, or contaminant can migrate through a window or through the foundation or building structure into the soil, creating exposures to persons or hazards to the environment, a sufficient basis may exist to show that there is a threat of release into the environment requiring the cleanup of the interior of the building. It also may be possible to show that there is a threat that contaminated articles, clothing, or even parts of the structure itself may be inadvertently removed from the building and, thus, a release or threat of release of a hazardous substance, pollutant, or contaminant may exist.

Another situation involving indoor contamination may be contamination that is the direct result of a release into the environment from a non-natural source that migrates into a building or structure. For example, contamination in a yard may
be tracked into a building on the feet of the residents or workers, or may migrate into the building through an open window or basement walls. In this situation, a release into the environment is occurring and has caused a building to become contaminated with the hazardous substance, pollutant, or contaminant.

**Determination of Need to Respond**

Once it has been determined that there is a release or threat of release into the environment, the nature of the public health or environmental threat resulting from the release should be established. Depending upon whether the release situation is expressly limited in CERCLA §104(a)(3), the standard is slightly different:

- For responses to releases expressly limited in CERCLA §104(a)(3) (e.g., indoor releases of radon, asbestos, or a deteriorating drinking water system), there must be a finding that the release is causing a public health or environmental emergency and no other person with the authority and capability to respond to the emergency will do so in a timely manner.

- For response actions that are not specifically limited in CERCLA §104(a)(3), the release should pose a threat to public health or welfare or the environment, an emergency situation does not need to exist.

**Consultation**

Once it has been determined that a CERCLA response action may be necessary, in most cases, Regional offices should consult with Regional Coordinators at Headquarters (pursuant to OSWER Directive 9360 0-19, March 3, 1989) to determine whether CERCLA authority can and should be used to respond to the problem. Headquarters will assist the RDT in considering the national significance and precedent-setting nature of the problem. Generally, written concurrence from the Office Director, OERR, must be received prior to formal approval of the Action Memorandum by the RA.

The one exception to this rule is a situation where response action must be initiated immediately, and there is no time to discuss the situation with Headquarters. In such compelling cases, Regions may initiate a response action without Headquarters concurrence, however, only those actions that are necessary to mitigate the emergency or stabilize the site should be taken. The appropriate Regional Coordinator should then be informed of the response on the next working day following initiation of the emergency action.

Attachment
Figure 1
INDOOR CONTAMINATION STEPS FOR ACTION

Is there a release or threatened release into the environment of a hazardous substance, pollutant, or contaminant?

Yes

- Is the response expressly limited in CERCLA §104(a)(3)?
  - (A) Naturally occurring substances in their unaltered form,
  - (B) Products that are part of the structure of a building or
  - (C) Deterioration of public or private drinking water supplies

No

Is there a threat to public health or welfare or the environment that can be documented?

Yes

- Must emergency action be initiated immediately?
  - Yes

- Consult With HQ Prior To Response Action

  - NO

- Initiate Response Action Prior to HQ Consultation

No

- No Response Action Under CERCLA

- If responding to a release of a pollutant or contaminant there must be a showing of imminent and substantial danger to the public health or welfare.