

UNITED STATES  
NUCLEAR REGULATORY COMMISSION  
OFFICE OF NUCLEAR REACTOR REGULATION  
OFFICE OF NUCLEAR MATERIALS SAFETY AND SAFEGUARDS  
WASHINGTON, D.C. 20555-0001

October 3, 2002

**NRC REGULATORY ISSUE SUMMARY 2002-12I,  
REVISION 1  
TRANSPORTATION OF SPENT NUCLEAR FUEL  
GREATER THAN 100 GRAMS —  
NRC THREAT ADVISORY AND PROTECTIVE MEASURES SYSTEM**

**ADDRESSEES**

All U.S. Nuclear Regulatory Commission (NRC) specific power reactor licensees, research and test reactor licensees, independent spent fuel storage installation licensees, and special nuclear material licensees, who possess spent nuclear fuel; and general licensees under 10 CFR 70.20a who transport spent nuclear fuel greater than 100 grams.

**INTENT**

The NRC is issuing Revision 1 to Regulatory Issue Summary (RIS) 2002-12I, "Transportation of Spent Nuclear Fuel Greater than 100 Grams — NRC Threat Advisory and Protective Measures System," dated August 19, 2002, to inform addressees of changes to the threat advisory conditions and protective measures system for their use in preplanning graded protective measures to respond to changes in the threat environment. Revision 1 supersedes RIS 2002-12I in its entirety. The NRC uses a RIS to communicate with the nuclear industry and other stakeholders on a variety of matters for which no response or action is required. However, this RIS communicates actions the NRC considers appropriate at each threat level. In the interest of expediency, the Commission has determined that a RIS is the most efficient mechanism to align the Office of Homeland Security, NRC, and licensee expectations with respect to licensees' response to threat advisories.

**ML022740603**

## BACKGROUND

The Office of Homeland Security (OHS) has developed a Homeland Security Advisory System (HSAS) to provide a comprehensive and effective system to disseminate information regarding the risk of terrorist attacks to Federal, State, and local authorities and the public. The HSAS implements Homeland Security Presidential Directive 3 (HSPD-3), March 11, 2002 [Attachment 1]. Additional information on HSPD-3 can also be found at the White House web site at: <http://www.whitehouse.gov/news/releases/2002/03/20020312-1.html>. The HSAS system includes five color-coded threat conditions with a description of corresponding actions at each level. These conditions are:

- Green (Low Condition)            Low risk of terrorist attack
- Blue (Guarded Condition)        General risk of terrorist attack
- Yellow (Elevated Condition)      Significant risk of terrorist attack
- Orange (High Condition)         High risk of terrorist attack
- Red (Severe Condition)           Severe risk of terrorist attack

## DISCUSSION

The HSAS provides a consistent national framework for allowing government officials and citizens to communicate the nature and degree of terrorist threats. The advisory system characterizes appropriate levels of vigilance, preparedness, and readiness for each threat condition and describes associated actions that should be taken to counter and respond to terrorist activities.

In declaring threat conditions, the Attorney General, in consultation with the Assistant to the President for Homeland Security will consider, but not be limited to, the following factors:

- To what degree is the threat information credible?
- To what degree is the threat information corroborated?
- To what degree is the threat specific and/or imminent?
- How grave are the potential consequences of the threat?
- To what degree is the target vulnerable to the threat?

HSAS advisories regarding threat conditions may be declared for the entire nation or for a specific geographical area, or functional or industrial sector, and will be sent to local, State, and Federal government agencies as appropriate. In general, the threat conditions escalate as the likelihood or imminence of an attack increases.

Although the threat condition will be determined by the Attorney General, the NRC has the obligation under HSPD-3 to establish the appropriate protective measures. In addition, the NRC has the obligation to respond to risks, threats, incidents, and events at NRC-regulated facilities, or involving NRC-regulated materials.

Upon a declaration of an HSAS threat condition, the NRC will promptly notify affected licensees of the threat condition and of the appropriate protective measures. In addition, the NRC may

find it appropriate to notify affected licensees to establish certain protective measures in the absence of an HSAS declaration. The NRC could take such a step, for example, to respond to an emergency or a site-specific situation.

The NRC is using this RIS to announce its threat advisory and protective measures system to implement the HSAS for licensees transporting irradiated reactor fuel (i.e., spent nuclear fuel) greater than 100 grams. The NRC will relay information relating to the threat conditions using the color-coded system defined by the HSAS. The NRC has also defined protective measures in five levels [Attachment 2] (contains Safeguards Information), which generally correlate with the five color-coded conditions of the HSAS. Protective measures at each level build upon the actions defined in the lower levels. For example, measures at level III will include those measures taken at levels I and II.

- The level I (Low) protective measures, which generally correspond to the green threat condition, are considered to be the routine level of operation and are satisfied by licensees maintaining the security programs required by the regulations, individual licenses, and Orders. Measures to enhance security need to be available so that they can be readied or implemented in higher threat conditions when called upon.
- The level II (Guarded) protective measures, which generally correspond to the blue threat condition, warrant more action by the licensees, but will generally not involve significant action beyond the routine level of operation. These actions would typically relate to readiness, e.g., notifying personnel to standby, or bringing in additional security officers to prepare for an enhanced response. Actions taken at level II will include those taken at level I.
- The level III (Elevated) protective measures, which generally correspond to the yellow threat condition, warrant enhanced security measures and additional resources, perhaps on a sustained basis, but would be based on hardware and personnel already at the licensee's disposal. (Note: When the HSAS was first announced on March 12, 2002, OHS also announced that the country was then considered to be in a Yellow threat condition.) Actions taken at level III will include those taken at levels I and II.
- The level IV (High) protective measures, which generally correspond to the orange threat condition, assume that the licensee's security organization is at its highest sustainable level and that the licensee will request augmentation by local and State, and possibly Federal, resources to provide additional defensive capabilities to the extent such resources can be made available. (Note: NRC advisories will provide additional specific information to the licensee(s) as information about the threat develops. Any additional licensee actions will be based upon threat specific information). Actions taken at level IV will include those taken at levels I, II, and III.
- The level V (Severe) protective measures, which generally correspond to the red threat condition, assume that the licensee will request augmentation by Federal

resources beyond State and local resources to provide additional defensive capabilities to the extent such resources can be made available to enhance the security of the activity. NRC will facilitate implementation of this added Federal presence. (Note: It is expected that this condition will be limited to one or a very small number of licensees for a limited period of time. Any additional specific actions will be based on an ongoing assessment of the threat by the NRC and other Federal agencies.) Actions taken at level V will include those taken at levels I, II, III, and IV.

When the Attorney General of the United States makes a change in threat condition that affects NRC licensees, the NRC will issue a threat advisory notifying its licensees of the change. The NRC will refer licensees to the recommended protective measures outlined in Attachment 2 to this RIS. Regardless of the current threat condition, licensees are required to comply with existing regulations, licenses, and Orders. Attachment 2 is designed to provide a clear description of the basic actions appropriate to achieve the desired level of protection. The NRC may tailor the protective measures to be implemented based on the nature of the threat, including specific instructions regarding protection against a specific mode of attack.

In some cases, the circumstances of a particular threat may warrant that additional security measures be implemented beyond those provided in Attachment 2. For example, such additional measures may be necessary depending upon the type of licensee affected, the safeguards risks associated with various licensed activities, the specific vulnerabilities at a given activity, the suspected mode of attack, and the likelihood and nature of the threat. Although most terrorist attacks occur without specific warning, whenever possible, the NRC will provide information about the nature and projected time frame of the threat.

The protective measures in Attachment 2 are assigned to particular threat levels, reflecting the seriousness of the threat and the need for timely action to address the threat. Therefore, prompt implementation of the measures is essential if the steps are to be effective in protecting the facility.

The Commission may need to direct additional measures to deal with a fast-moving situation in the transition period before a formal declaration of a threat escalation by the Attorney General. HSPD-3 makes clear that agency heads "...retain the authority to respond, as necessary, to risks, threats, incidents, or events at facilities [or activities] within the specific jurisdiction of their department or agency...." In these cases, the NRC threat advisory will include additional specific guidance beyond what is generically prescribed in Attachment 2 for a particular threat level.

NRC will update Attachment 2 to this RIS as necessary to reflect changes in protective measures for various threat levels and to reflect results from its current review of security matters. In addition, this RIS will be reviewed at least once a year and revised as necessary consistent with requirements to report changes to the Office of Homeland Security by August 1 of each year. Licensees seeking to provide input to the RIS and possible revisions should forward comments to the contact listed below.

## **BACKFIT DISCUSSION**

The NRC uses a RIS to communicate with the nuclear industry on a variety of matters for which no response or action is required. This RIS communicates actions the NRC considers appropriate at each threat level, but these actions are not requirements. A backfit analysis has not been performed.

## ***FEDERAL REGISTER NOTIFICATION***

A notice of opportunity for public comment was not published in the *Federal Register* because this RIS is informational. The Commission also plans to issue additional regulatory issue summaries in this series to cover additional classes of licensees, or NRC-licensed activities, as NRC's review progresses. Any specific comments should be forwarded to the contact listed below.

## **PAPERWORK REDUCTION ACT STATEMENT**

This RIS does not request any information collection; therefore, this RIS is not subject to the Paperwork Reduction Act of 1995 (44 U.S.C. 3501, *et seq.*)

If you have any questions about this matter, please telephone or e-mail the technical contact listed below.

**/RA/**

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Attachments: (1) HSPD-3, Homeland Security Advisory System  
<http://www.whitehouse.gov/news/releases/2002/03/20020312-1.html>  
(2) Threat Conditions and Specific Actions for the Transportation of Spent  
Nuclear Fuel Greater than 100 Grams (U)

Note: Attachment 1 Presents the Office of Homeland Security's Homeland Security Advisory System (HSAS). A link to the HSAS is provided above.

Attachment 2 will not be released to the public because it contains Safeguards Information and must be accorded the protection required under 10 CFR 73.21