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Criteria for Emergency Radiological Field Monitoring, Sampling, and Analysis

Secretariat
American Nuclear Society

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Foreword

(This foreword is not a part of American National Standard Criteria for Emergency Radiological Field Monitoring, Sampling, and Analysis, ANSI/ANS-3.8.5-1992.)

All nuclear power plant owner organizations are required by federal regulations to have a detailed emergency response plan. The plant operators are required to perform routine, abnormal, and emergency actions in a manner that minimizes the likelihood of any particular event developing into an emergency condition. An objective of sound operations is to prevent emergency conditions. The objective of an emergency response program is emergency mitigation. The plant operators are the key to emergency prevention and mitigation at all times.

If a situation arises that activates the emergency response plan, the plant operators identify developing trends and take the appropriate action to prevent or mitigate a radiological release. The plant operators identify the need for emergency support, make initial contact with emergency response organizations, and activate the emergency response plan. As the emergency develops, the administrative, notification, and coordinating functions are transferred from the plant operators to other individuals within the emergency organization as defined in the emergency response plan. Regardless of the functions shifted from the plant operators to the emergency organization, the responsibility for placing the plant in a safe configuration remains with plant operators.

In the event of an actual radiological release, one essential response function is the determination of the magnitude and the extent of the release through actual measurement in the environment. This response function is encompassed in the Emergency Radiological Field Monitoring Program, the components of which are described in this standard.

The ANS-3.8 series of standards provides guidance to nuclear power plant utilities pertaining to emergency response plan preparation based on the experience of the licensed nuclear facilities. The American National Standards in this series are as follows:

ANSI/ANS-3.8.1 — Criteria for Emergency Response Functions and Organizations

ANSI/ANS-3.8.2 — Criteria for Functional and Physical Characteristics of Emergency Response Facilities

ANSI/ANS-3.8.3 — Criteria for Emergency Response Plans and Implementing Procedures

ANSI/ANS-3.8.4 — Criteria for Maintaining Emergency Response Capability

ANSI/ANS-3.8.5 — Criteria for Emergency Radiological Field Monitoring, Sampling, and Analysis

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