

# REGULATORY ANALYSIS

## TERRESTRIAL ENVIRONMENTAL STUDIES FOR NUCLEAR POWER STATIONS

(Proposed Revision 2 of Regulatory Guide 4.11, dated August 1977)

### Statement of the Problem

The U.S. Nuclear Regulatory Commission (NRC) last revised Regulatory Guide 4.11 in 1977. Most terrestrial conservation regulations affecting license applicants and holders have been implemented or substantially changed since that time. Furthermore, many new terrestrial ecology protocols and methodologies have been published since 1977. Therefore, revision of this regulatory guidance is necessary to provide users with updated direction.

### Objective

The objective of this regulatory action is to provide NRC license applicants and holders with updated direction on performing terrestrial environmental studies and analyses.

### Alternative Approaches

The NRC staff considered the following alternative approaches:

Do not revise Regulatory Guide 4.11.

Revise Regulatory Guide 4.11.

#### Alternative 1: Do Not Revise Regulatory Guide 4.11

Under this alternative, the NRC would not revise Regulatory Guide 4.11, and the current guidance would be retained. If the NRC does not take action, there would not be any changes in costs or benefit to the public, licensees, or the NRC. However, the “no-action” alternative would not address the need for updated guidance. The NRC staff would have to assume that license applicants are familiar with current relevant regulations and practices in terrestrial ecology. The availability of updated guidance could reduce the number of requests for additional information needed to obtain terrestrial ecology data. This alternative provides a baseline condition from which any other alternatives will be assessed.

#### Alternative 2: Revise Regulatory Guide 4.11

Under this alternative, the NRC would revise Regulatory Guide 4.11, Revision 1. This action would provide license applicants with updated technical direction on performing terrestrial environmental studies and analyses.

The impact to the NRC would be the costs associated with preparing and issuing the revision. The impact to NRC licensees, applicants, prospective applicants, and the public would be the voluntary costs associated with reviewing and providing comments to the NRC during the

public comment period. Although the revision of Regulatory Guide 4.11 would clarify the expectations of the NRC when reviewing terrestrial environmental studies, it does not establish new requirements. The value to the NRC staff, regulated entities, and the public would be the benefits associated with enhanced efficiency and effectiveness in using an updated common guidance document as the technical basis for license applications and other interactions between the NRC and its regulated entities.

## **Conclusion**

Based on this regulatory analysis, the NRC staff recommends revision of Regulatory Guide 4.11. The staff concludes that the proposed action will lead to more thorough and efficient terrestrial environmental studies and analyses, better terrestrial ecology data in license applications, and fewer requests for additional information. It could also lead to cost savings for the industry by reducing technical rework and costs associated with responding to requests for additional information.