



# Explanation of the Biennial Decommissioning Funding Report Analysis Process

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**Date: August 20, 2009**

# Overview

- **Background**
- **Determining “Minimum Decommissioning Funding Assurance” (DFA) via formula at 10 CFR 50.75**
- **Determining reasonable assurance**
- **What happens if decommissioning funding assurance is insufficient**
- **NRC expectations of licensees**

# The Difference Between

## Decommissioning Funding

**VS.**

## Decommissioning Funding Assurance

## Decommissioning Means...

**To the NRC, removing a facility or site safely from service and reduce residual radioactivity to a level that permits:**

- unrestricted use**
- restricted use**

**in order to terminate the license**



NRC File Photo

# How Does The NRC Check DFA

- **Biennial Decommissioning Funding Reports**
- **Spot Checks**
  - **SECY-07-0197 dated 01/10/2008**
- **Review at license transfer**
- **Review new application**

# Focus On

## Biennial Decommissioning Funding Reports 10 CFR 50.75



# 10 CFR 50.75

10 CFR 50.75(c): Table of minimum amounts (January 1986 dollars) required to demonstrate reasonable assurance of funds for decommissioning by reactor type and power level, P (in MWt); adjustment factor.

**Millions**

**(1)(i) For a PWR:**

greater than or equal to 3400 MWt.....\$105  
 between 1200 MWt and 3400 MWt  
 (For a PWR of less than 1200 MWt, use P=1200 MWt)..... $$(75+0.0088P)$

**(1)(ii) For a BWR:**

greater than or equal to 3400 MWt.....\$135  
 between 1200 MWt and 3400 MWt  
 (For a BWR of less than 1200 MWt, use P=1200 MWt)..... $$(104+0.009P)$

## 10 CFR 50.75 (Continued)

10 CFR 50.75(c)(2): An adjustment factor at least equal to  **$0.65 L + 0.13 E + 0.22 B$**  is to be used where L and E are escalation factors for labor and energy, respectively, and are to be taken from regional data of U.S. Department of Labor Bureau of Labor Statistics and B is an escalation factor for waste burial and is to be taken from NRC report **NUREG-1307, “Report on Waste Burial Charges.”**

# **Biennial Decommissioning Funding Reports: 10 CFR 50.75(f)(2) Requirements**

- **Estimated “target” funds**
- **Actual \$\$\$**
- **Future principal payments**
- **Assumed escalation rates**
- **Assumed rates of interest**
- **Contracts**
- **Change in method/trust**

## Financial Mathematics

- **(i) 2.00% real rate of return (on actual dollars)**
- **(N) Remaining life of license to the time of permanent cessation of operations**
- **(F) Future lump sum of money**
- **(P) Present lump sum of money**
- **Example:  $F/P (i\%, N) = (1+i)^N$**

# Determining DFA

Projected \$\$\$

(-) Estimated “Target” Funds

*If “+,” then Assurance*

*If “-,” then Shortfall*



# NRC and Licensee Interactions

- **Phone Calls:**
  - Review staff findings
  - Clarify procedures
  - Establish schedule
- **Letters:**
  - Summarize phone calls
  - Follow-up

## What Is Not Allowed

- **Market recovery**
- **> 2.00% real rate of return without authorization**
- **Pending license renewal**
- **SAFSTOR without a site specific study**

# QUESTIONS??