IN ALLOCATION OF THE RISK OF CONSTRUCTING ELECTRIC POWER PLANTS


In allocating the loss caused by the cancellation of a utility's power plant construction, the Michigan Public Service Commission (PSC) adopted a standard that inadequately protects consumer and investor interests. In deciding who should bear the cost of a cancelled construction project, the PSC failed to consider whether investors were being paid to bear the risk of cancellation and instead looked only to the foreseeability of the event causing the loss.¹

Relying on its demand forecast for 1980,² Detroit Edison, an electric utility company, began planning construction in 1971 for a nuclear power plant.³ After spending $6,810,199 for planning, the company decided to cancel the project⁴ in 1974, because it could not raise satisfactory financing in the depressed financial markets; new forecasts lowered the expected demand for 1980; and subsequent Atomic Energy Commission regulations added $300,000,000 to the projected cost of the new plant.⁵ An administrative law judge approved Detroit Edison's request to treat the cost of the cancelled project as an extraordinary property loss, an account charged to consumers.⁶ The PSC heard exceptions, affirmed, and held: If unforeseeable events cause the cancellation of a reasonable and prudent utility construction project, the utility may, for accounting purposes, amortize and charge the cost of the project to operating expenses as an extraordinary property loss.⁷

Public utilities are natural monopolies.⁸ State commissions with

2. Id. at 16,221.
3. Id. at 16,222.
4. Id. at 16,221.
5. Id. at 16,222, 16,225.
6. Id. at 16,221-22.
7. Id. at 16,223-24.
jurisdiction over utilities engaged in intrastate sales establish rates and regulate utilities to insure that investors receive a fair return on their investments and consumers do not pay oppressive rates. The commission first selects a test period during which it compiles information to determine the utility's operating expenses and rate base. In addition to variable costs such as fuel and labor, operating expenses include capital-related costs such as depreciation, which represents the amount of long-lived assets used up during the year, and—if applicable—amortization of extraordinary property loss. The primary component in the rate base is property-in-service, which represents the net fixed investment in the utility. The commission then sets the maximum rate of return a utility may earn on its rate base. The rate of return should be sufficient to enable the utility to maintain financial integrity, attract new


12. See notes 25-35 infra and accompanying text.

13. 1 A. PRIEST, supra note 11, at 139.
capital, and compensate its investors for the use of their capital and for assuming risks.\textsuperscript{14} Operating expenses added to the product of the rate base multiplied by the rate of return equals the maximum allowable revenue for the future operating period.\textsuperscript{15}

The process of setting just and reasonable rates requires a careful balancing of the adverse interests of investors and consumers.\textsuperscript{16} Increasing the value of the utility's property-in-service benefits investors by increasing, in two ways, the utility's maximum allowable revenue. Since property-in-service is included in the rate base, the return on investment, \textit{i.e.} the dividend,\textsuperscript{17} will increase as the value of property-in-service increases. Furthermore, a larger property-in-service account will increase the utility's return of investment, \textit{i.e.} the depreciation expense.\textsuperscript{18} Conversely, consumers attempt to limit the value of property-in-service and decrease the utility's earnable revenues, thereby reducing consumer rates.

Each commission adopts and requires utilities to use a uniform system of accounts\textsuperscript{19} to ensure that the financial information used at rate

\begin{itemize}
\item \textsuperscript{14} Permian Basin Area Rate Cases, 390 U.S. 747, 792 (1968); FPC v. Hope Natural Gas Co., 320 U.S. 591, 602-03 (1944); Bluefield Water Works & Improvement Co. v. Public Serv. Comm'n, 262 U.S. 679, 692-93 (1923); 1 A. Priest, \textit{supra} note 11, at 191-93.
\end{itemize}
hearings is consistent and accurate. Some accounts record extraordinary transactions, such as extraordinary property loss, and cannot be used absent the commission's approval. A commission will issue an accounting order approving the use of such an account if the transaction meets the technical requirements of the uniform system of accounts, and use of the account would adequately balance adverse interests.

Michigan's uniform system of accounts permits the use of an extraordinary property loss account upon satisfaction of three conditions. First, the property must be property-in-service, owned and used by the utility to produce electricity. Property-in-service includes only reasonable and prudent investments, leaving investors to suffer the loss on unreasonable investment decisions. In general, the property must also be "used and useful" in order to qualify; investments no longer "used and useful" cannot remain in the property-in-service account.

26. Id. § 460.3101 (Supp. 1960).
On the other hand, state commissions often include construction work in progress in the rate base without determining whether it is property-in-service. The Michigan PSC includes work in progress on the ground that the funds "are by definition already committed to providing service, even though the plant may not actually be in service . . . ." The second requirement is that the utility must retire property from service, either partially or completely. Finally, the event responsible for retirement must be one that management could not have reasonably foreseen and provided for.

A utility which suffers an extraordinary property loss must eliminate the investment from the rate base, but can amortize and charge the loss to operating expenses. Although investors lose the right to a further return on investment, the utility passes the loss on to consumers and retains the right to a return of investment. Consumers


32. Id.


34. See notes 17-18 supra and accompanying text.
seek to deny utilities the use of an extraordinary property loss account and force them to absorb the loss in their capital surplus.\textsuperscript{36} 

State commissions are responsible for balancing these adverse interests of consumers and investors.\textsuperscript{36} Several commissions have adopted a risk compensation standard to accomplish this task.\textsuperscript{37} This standard recognizes that a portion of the rate of return\textsuperscript{38} compensates investors for assuming the risks of doing business, including unforeseen cancellation of reasonable projects.\textsuperscript{39} To the extent investors have been paid to


38. See note 14 supra and accompanying text.

take such risks, they should assume the occasional loss. Commissions applying this standard to extraordinary obsolescence have allocated loss entirely to the investor, evenly between the consumer and the investor, and fully to consumers when they had benefited from lower rates. The Michigan PSC, however, has not applied a risk compensation analysis to losses caused by extraordinary obsolescence or extraordinary property loss of construction work in progress. Instead, the commission has considered primarily the foreseeability of the loss.

In In re Detroit Edison Co., a succinctly worded opinion, the Michigan PSC found that the events which caused the cancellation of the construction project were highly extraordinary and unforeseeable. The PSC held that management's decisions to build and later to cancel the construction were reasonable, and concluded that Detroit Edison could treat the project as an extraordinary property loss and amortize the cost.

The Michigan PSC's decision in Detroit Edison was legally and conceptually flawed. The PSC's legal analysis permitted extraordinary property loss treatment for construction work in progress without discussing whether the construction investment constitutes property-in-service, a necessary prerequisite for such treatment.


42. Minneapolis St. Ry. v. City of Minneapolis, 251 Minn. 43, 63, 86 N.W.2d 657, 671 (1957).


48. Id. at 16,223.

49. Id.

50. Id. at 16,224.

construction work in progress in the rate base is not dispositive; the rationale for that result is that construction funds are necessarily committed to providing future service, a rationale plainly inapposite to extraordinary loss incurred by cancellation of a project. In calculating the rate base, it is reasonable to assume that a construction project will be completed; the question is not whether consumers should pay, but when. By contrast, when utilities seek extraordinary property loss treatment for abandoned projects that will never be completed, the problem is not one of timing but of allocating the loss between consumers and investors. The PSC did not consider this distinction in allowing extraordinary property loss treatment for cancelled construction, even though consumers must pay only for extraordinary loss to property-in-service.

The PSC's decision to focus on the foreseeability of the event causing the property loss, rather than the risk compensation standard, was also conceptually inadequate. The risk of extraordinary property loss must be allocated between the consumer and the investor. Investors have a right to compensation for assuming the risks of doing business; they should bear the loss to the extent that the rate of return compensates them for having done so. The foreseeability requirement and the risk compensation standard will not necessarily allocate the risks in the same way. The rate of return may be so low that it fails to compensate investors for assuming all of the foreseeable risks, or it may be high enough to compensate them for assuming unforeseeable risks. Regardless of how high the commission sets the rate of return, however, the PSC would still require consumers to bear unforeseeable risks. Accordingly, the foreseeability requirement would often allocate the risk to the wrong party. This approach protects neither investors nor consumers and should be abandoned.

The risk compensation approach is theoretically appealing, since it strikes a balance between the adverse consumer and investor interests. The PSC first calculates the risk of loss and determines what rate of

53. See notes 34-35 supra and accompanying text.
54. See notes 44-46 supra and accompanying text.
55. See notes 37-40 supra and accompanying text.
return would adequately compensate investors for having assumed it. It must then isolate the actual compensation corresponding to this risk from the return on investment paid to investors. If the actual compensation is as great as the adequate compensation, the investor must bear the loss; if not, it falls upon the consumer. Unfortunately, the risk allocation approach presents difficulties in application. Commissions may find it impossible to determine accurately in retrospect what portion of the rate of return was attributable to the investor's assumption of risk.

A possible solution would be to identify and allocate the risk prospectively before it is assumed. Before beginning a given construction project, the PSC could inform the financial markets that investors would bear any loss caused by changes in the demand for electricity (or any other risk). The PSC could note how the financial market discounts this additional risk and then use the information in calculating the rate of return at subsequent rate hearings. Prospective risk allocation, however, may also present difficulties in application since it assumes that all public utilities will have access to large financial markets, that these markets will efficiently perceive and discount additional risks as they are introduced, and that management will abandon unprofitable projects knowing that cancellation will cause certain loss to investors. Despite these practical difficulties, prospective risk allocation is preferable to a foreseeability approach because it attempts to balance risk and compensation.

Longer construction lead times and increased governmental regulation have introduced more uncertainties into utility construction. Since construction costs are higher, the utility stands to lose more. If the PSC intends to allocate these risks between consumers and investors, it must develop a standard that protects the interests of both consumers and investors, and is amenable to practical application. The foreseeability requirement fails to protect and balance these adverse interests. The commission must develop a practical method of applying the risk compensation approach.

60. The risk compensation approach need not be limited to cancelled construction
If these practical difficulties cannot be overcome, commissions should consider abandoning attempts to allocate risk between consumers and investors. The consumers could bear all risk of loss and pay to the investor only the lowest, risk-free rate of return.\textsuperscript{61}

projects. It is a conceptually attractive method for treating any property-in-service held by a utility subject to extraordinary loss or obsolescence.

61. The risk-free rate of return is that return on an investment paid by a business having no risk of default on its payments. A United States government security is a risk-free investment.