“Nuclear Follies” by Amory B. Lovins

James Cook (“Nuclear Follies”) vividly describes a tragedy many of us predicted and tried to avert for over a decade. He mistakes only its causes and alternatives.

Mismanagement and premature commitments to immature technologies were indeed horrific. But if they were the root causes of U.S. nuclear power’s plight, foreign programs (where they exist—many countries have none) would all be flourishing. They’re not. In every market economy in the world, they’re collapsing about as fast as here—even where utilities are unregulated, as in West Germany, or where nuclear regulation poses no obstacle, as in Canada. Nuclear commitments persist only in the centrally planned economies, notably France and the USSR; and even those programs are in deep economic trouble, with cost escalation now approaching U.S. rates. French reactors did look relatively cheap until about 1983, but they’ve still cost enough to create a fifth of France’s huge foreign debt and to drive Électricité de France into profound financial crisis.

The real problem, then, lies deeper: nuclear plants, like coal plants, are *fundamentally uneconomic*. Their stiffest competitors are new electricity-saving technologies—now able to save three-fourths of our electricity, more cheaply than just *running* nuclear plants. Such technologies can save utilities billions of dollars’ operating costs. As I showed before the Maine and New Hampshire PUCs, those savings can pay off the sunk costs of an abandoned Seabrook plant while *lowering* the rates.

Much small power production can also compete today. During I981–84, 12 GW (12 huge plants’ worth) of coal power and zero nuclear plants were ordered in the U.S., while 77 GW of coal and nuclear plants were cancelled. But meanwhile, 20+ GW of cogeneration and 20+ GW of renewables, mainly small hydro and windpower, were ordered. By September 1984. 14.6 GW of privately financed small power production was on offer in California alone—all cheaper than central plants, over half renewable, and 4.7 GW added in a single quarter.

Only such cheap, fast, small options can tolerate the risks of uncertain demand. Utilities that buy or finance such options will prosper. Those that continue to project demand growth, build big plants to meet it, and raise rates to pay for those plants will disappear—priced right out of the energy-service market.

Nuclear power was made possible not by “the private enterprise system” but by its perversion via intense government pressure and $75+ billion (1983 $) in federal subsidies. To prevent a rerun, we should not sacrifice our open society but restore our market system, by stopping the subsidies (still $10+ billion per year) that seduced utilities into such folly. In a free market, nuclear investments—equal just in 1982 to twice the total investment in the car, truck, iron, and steel industries—would never have begun.

This 8 February 1985 unpublished letter to Forbes *magazine was in response to James Cook’s cover-story article of the same name.*