
Nuclear Energy

Power blackouts loom in New England

by Marjorie Mazel Hecht

When the lights go out in New England, Massachusetts Gov. Michael Dukakis can take full credit. The governor launched his 1988 presidential campaign boasting that he had presided over unprecedented growth in his state and ranting against nuclear power—which supplies 30% of the region's electricity—as unsafe. The problem is, that electricity from nuclear power is what helped make the economic growth possible, and that even given moderate growth rates in electricity demand, New England is going to run out of electric power in the near future. In fact, the predicted gap between demand and supply is so great, that even if the stalled Seabrook nuclear station in New Hampshire comes online immediately, there will still be an electricity shortfall.

Seabrook is a 1,150-megawatt nuclear plant located on the coast near the Massachusetts border and owned by a consortium of 12 nuclear utilities in New England. The largest share, 35.6%, is held by Public Service Company of New Hampshire, which has just announced a restructuring similar to a Chapter 11 bankruptcy. The plant has been ready to go online since summer 1986, but was stalled by Dukakis, who refused to process the emergency evacuation plan prepared by his own Civil Defense Department last September. The emergency plan is required by the Nuclear Regulatory Commission (NRC) for a 10-mile radius around the plant.

Dukakis's anti-nuclear maneuver, calculated to win him support for his campaign from solar-granola liberals nationally, is costing the Seabrook owners \$50 million per month—of which \$40 million is interest. The reason the utility is in financial trouble has nothing to do with the nuclear reactor per se; it simply reflects the success the anti-nuclear movement has had in its attempts to put the nuclear industry out of business. The total bill for Seabrook came to \$4.5 billion, of which \$3.6 billion is due to delays related to environmentalist challenges and regulatory changes.

The hard facts about New England's power supply shortfall have been put forward by three independent studies in the past two years. The Rudden Report, commissioned by the New England Governors' Conference and issued in June 1986, demonstrated that electrical capacity could fall below the necessary 20% reserve margin (a safety margin for emergencies such as storm damage or equipment failure) this year,

if the Seabrook plant were not online. Rudden Associates, the consulting firm that prepared the report, assumed a growth rate of 4% in demand—which is conservative, considering the fact that electricity in the region in the previous five years rose 120% faster than the demand increase nationwide and averaged nearly 5% in 1986.

As predicted, the shortfall arrived this summer. After a few days of hot weather, on July 24, there was a 5% voltage reduction and in Connecticut and Maine, the utilities asked customers to unplug their air conditioners. This was the first time in 14 years that the utilities had to institute voltage reductions.

Dukakis and his anti-nukes look at the shortfall figures and blithely say that they'll just use the reserve capacity if things get tough. But in the face of a demand surge, that option won't work. And what about the next few years, if the demand for power continues to grow, as predicted, at close to 5%?

The Rudden report predicted that New England would need an additional 2,000-7,000 megawatts by the year 2001, noting that reducing demand through conservation would not be enough to meet the shortfall. This figure assumed that an additional 690 megawatts would be available by 1990, from a power sharing arrangement with Hydro-Quebec, but last month the Canadian government nixed the agreement because Hydro-Quebec had not consulted with other Canadian provinces about their possible needs for power. So far, the New England governors have not come up with a solution, except to suggest that the region's utilities could build 14 new gas turbine plants in a hurry—a suggestion the utilities have don't see as feasible.

Demise of the nuclear industry?

Keeping the Seabrook plant out of operation could spell the demise of the nuclear industry nationally and a huge loss to the financial community, according to a recent analysis by Prudential-Bache.

Dukakis's fellow-traveler, Rep. Edward Markey, apparently invigorated by this prospect, added a rider to a congressional appropriations bill that would deny funds to the NRC to implement its proposed rule change that would allow the Seabrook plant (and the Shoreham plant in New York) to go to full power, as long as the utility had an acceptable emergency evacuation plan, even if the local government would not cooperate.

The NRC rules change, which would circumvent the Dukakis roadblock, was made public in the spring by the NRC. Public comment was invited, giving Dukakis and New York Gov. Mario Cuomo an opportunity to grandstand on the evils of nuclear technology. After the NRC staff reviews the comments, they will make recommendations to the NRC commissioners, who will then decide. Meanwhile, keeping Seabrook closed will continue to cost the utilities \$1.8 million a day.