Risk Management in Liberalized Electricity Markets

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Abstract

Restructuring and liberalization of wholesale and retail markets for electricity has been undertaken in some countries (especially the U.S.) with little attention to ensuring that risk bearing is allocated efficiently among suppliers, retailers (especially investor-owned utilities), and customers. Some markets suffer now from financial distress of generators and retailers, higher costs of capital, and higher and more volatile rates for customers. Perhaps the greatest loss from complete retail liberalization has been impaired ability of regulators to ensure intertemporal smoothing of retail rates to recover the amortized cost of basic service by utilities. In keeping with Karl Borch's important contributions to the theory and practical aspects of risk, this year's Lecture will (1) review some of the history and motives for restructuring, successes and failures of liberalization, (2) examine a middle path between the extremes that retains a significant role for utilities to provide basic services for core customers, and (3) describe practical procedures for performance-based regulation of utilities within liberalized wholesale markets and competition from competing retailers.