

ENERGY EFFICIENCY AND THE ELECTRIC UTILITY INDUSTRY:
RECOMMENDATIONS FOR RESOURCE PLANNING

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May, 1981

CHAPTER I

THE ELECTRIC UTILITY INDUSTRY: A LEGAL, REGULATORY AND ECONOMIC PROFILE

Introduction

The electric utility industry is undergoing fundamental and substantial changes in the ways and means by which the production and consumption of electrical energy are conceptualized and valued. The industry, at present, is in the midst of great turmoil and strife. The investor-owned electric utilities of this country must meet projected demand growth with reliable service and financial integrity, while paradoxically addressing themselves to stockholder needs, regulatory impediments and ratepayer demands.

The amiable relationships that once existed between the utilities and their investors, regulatory agencies and ratepayers have significantly deteriorated over the past decade. The trend of a steadily increasing consumption of a progressively less costly electrical energy supply ended abruptly with the OPEC control of oil prices in the 1970's. Astronomical increases in fuel, construction, and capital costs have halted an era typified by declining average production costs, low consumer rates, easy financing and high dividend payments to investors. As a result, the same energy supply is viewed today as an increasingly costly resource, with no end in sight to the rise in producer costs and consumer prices.

This economic reversal has forced the industry and its ratepayers to reevaluate their patterns and modes of production and consumption. In light of national security, financial stability and personal survival,

Current utility economics have prompted decision makers across the board to desire the most energy out of every dollar, whether it be in kilowatts, heat, light or motion. Ever-increasing costs can no longer be tolerated and, thus, waste no longer rationalized. Whereas increased consumption and expansion of production capacity were the heralded industry cost cutters of the past, conservation in end-use and efficiency in production are the ways for the future.

The current demand for efficiency and conservation in energy production and utilization has placed the utilities in an unprecedented and dichotomous situation. The industry expertise in the financing, building and operating of large-scale plants is no longer sufficient. Research, development and marketing talents must be found in order properly to regard conservation and efficiency as desired, rather than neglected, commodities.

PART A: THE HISTORY OF UTILITY REGULATION

Prior to the 20th Century, public policy towards the fledgling electric utility industry was derived from competitive rather than monopoly theories; that is, local charters were given to numerous companies within a single area. From 1882, when Edison opened up the Pearl Street Station in New York, until approximately 1907, competitive franchises were granted at will, often in the attempt to lower rates the municipalities considered excessive. In this period, when competition and laissez faire represented national economic policy, the notion of regulated "natural" monopolies producing more efficient, and less costly service, had not emerged.

Competitive franchising was doomed as one company would eventually seize the entire service area. This movement abrogated all efforts to