
NATURAL RESOURCES JOURNAL

Volume 32
Issue 2 *Spring 1992*

Spring 1992

Current Utility Regulatory Practice from a Historical Perspective

Robert L. Swartwout

ROBERT L. SWARTWOUT*

Current Utility Regulatory Practice from a Historical Perspective

THUCYDIDES (460?-400? B.C., philosopher, historian) said in the introduction to his *History of the Peloponnesian Wars:*

> **I shall be content if those shall pronounce my history useful who desire to give a view of events as they really did happen, and as they are very likely, in accordance with human nature, to repeat themselves at some future time—if not exactly the same, yet very similar.**

ABSTRACT

This paper was written to show as concisely as possible the history of the development of regulation by government of utilities in this country. How that history provides a picture of how our system of utility regulation is supposed to work, how some current regulatory and other trends affecting utilities related to that history and to the public interest, and how and why caution is advisable in the movement to change how we treat utilities within our free market economic system if we are to assure reasonable and adequate protection of the public interest.

I. INTRODUCTION

The electric gas and water utilities that are the subject of this paper compose a special category of business in the United States. Utility services have been and still are a necessity for the grand majority of their customers. It has been said that the nature of the business of utilities is such that, if that business for whatever reason did not exist, it would have to be created by government to satisfy the needs and convenience of the people. As a result of their close relationship to the public interest, utilities are granted certain rights by our various levels of government and have special obligations associated with those rights. That set of rights and obligations makes up what has become known as the regulatory

*Mr. Swartwout is a registered engineer in New Mexico and New York. He has nearly 30 years experience in the utility industry including both government regulation of utilities and work directly for the industry. Mr. Swartwout is currently serving as president of a small investor owned utility in New Mexico.

compact. The regulatory compact is the keystone of the structure that supports our unique system of regulation by government of investor owned public utilities. Utilities in most other industrialized countries are either nationalized or are otherwise directly controlled by government.[1]

Investor owned public utilities have operated under essentially the same form of government regulation for nearly a century in this country and, under that system, the utilities and the economy for which they are a significant element of support has, for the most part, thrived nicely to the benefit of all. Beginning in the late 1960s, however, many factors began to adversely affect utilities and our economy as a whole. Those factors included things such as the energy crisis, rampant inflation, tighter capital markets, greater environmental controls, et cetera. The electric utilities experienced higher fuel costs, rapidly increasing construction costs, declining growth rates and excess capacity.[2]

The utilities and their regulators have been struggling with an onslaught of rapidly occurring changes that, in general, have combined to cause rapidly increasing customer rates for utility services. As a result, there has been a spate of searching for who should be blamed for the unsurprisingly unpopular escalating costs for utility services. The popular wisdom has centered that blame on the regulatory process, with some justification. The regulators were asked to respond quickly to major problems for which they were frequently ill-prepared by their recent experience and which also usually resulted in at least the potential for very unpopular rate increase decisions.

Whereas the reformers who designed our utility regulatory process 100 years or so ago intended it to be apolitical, it is certainly no longer so (if it ever really was so to any great extent). Further, the public profile of the regulators has been greatly increased in recent years thereby exacerbating the political and the pressure cooker aspects of their jobs. One result has been a very rapid increase in the rate of turnover of regulatory commissioners and staff. That turnover has had the effect of decreasing the continuity of decisionmaking and reducing the dampening effect of institutional memory thereby providing a condition conducive to less than ideal, impartial decisionmaking.

The frequency of utility requests for rate hikes increased at a fantastic rate and they kept coming in waves during the 1970s and early 1980s. The complexity of rate case issues, the number of issues, and their dollar

1. C. Phillips, Jr., The Regulation of Public Utilities 5, 6 (1984); A. Kahn, The Economics of Regulation 2 (1970); D. Jones, *Regulation and the Traditional Social Contract*, 11 NRRI Q. Bull. (Sept. 1990).

2. Competition in Electricity: New Markets and New Structures 441 (J. Plummer & S. Troppman eds., 1990) [hereinafter Competition in Electricity].

impact also increased by orders of magnitude. The cases before the commissions were also accompanied by an increase in intervention by many new parties to the proceedings coming from an aroused consumer movement represented both by private consumer organizations, government agencies, and business and industrial customers and organizations. As a result, it is generally reasonable to claim that the regulatory process did not perform as well as it should have during what have been very troubled times.

In the past few years, purportedly as a result of dissatisfaction with the effectiveness of regulation, there has been a rediscovery of the concept of competition in the context of utilities. It has become popular wisdom that we can solve most if not all of the perceived ills of the utility industry by the simple act of deregulating the industry and thereby causing the operation of self-regulating competition.[3] The notion that Adam Smith's "invisible hand" of self-regulating competition[4] in and among the providers of utility services precludes the need for government regulation is not a new idea in the United States. It has been tried before, in fact, as early as over a century ago. Competition in the utility sector, however, has failed to perform as expected by its proponents every time it has been tried so far.[5] Being a practical folk, we found our own better way with a compromise that combined the concepts of free enterprise to the extent practicable for our utilities with regulation by government. That better way is the unique utility regulatory system that we now seem to be rushing to scrap as soon as we can.[6]

It is not necessarily reasonable to assume that things are so different now from when previous attempts at reliance on competition to self-regulate utilities failed and that the disappointments of the past won't recur. Further, it was to a great extent those failures that brought about the reform that is our current regulatory system. People and their usually unpredictable "human nature" are unavoidably linked with the economics of anything and everything, and people have not changed all that much.[7] It is that same human nature that creates the degree of want for, and therefore the perceived scarcity of, technological commodities such as electric and gas utility service.[8] If economic theory can be expected to

3. The commentary in the last few paragraphs is based on my personal experience including nearly 16 years in the government regulation of utilities (beginning in 1963) and 10 years as an independent consultant in the utilities field.

4. A. Smith, An Inquiry into the Nature and Causes of the Wealth of Nations (1776).

5. D. Jones, *Regulatory Concepts, Propositions, and Doctrines: Casualties and Survivors*, 22 J. Econ. Issues (Dec. 1988).

6. The history and occurrences supporting these statements will be fully developed herein.

7. W. Hudson, Business Without Economists 69, 70 (1987).

8. R. Heilbroner, The Making of Economic Society (1962).

model history before it can be asked to predict the future, then it is reasonable to expect that its practitioners first view any intended application of economic theory to public policy in the full light of history.

It is also important to recognize that the technological and economic sphere of influence in which utilities now operate has increased by orders of magnitude over the last few decades. The manufactured gas plant corporations which began operation in the early 1800s and continued through the expansion of natural gas service following World War II generally served one community or just a part of one community. The same applied to the early electric utilities. In more recent times, however, the utility sphere of influence has been dramatically increased as a result of the development of long transmission lines for natural gas and transmission grids for electricity.

In other words, whereas things today may appear different from what they were in the "old days," they are really not so different. They are just larger now, representing an even greater potential hazard and the fall will be that much harder if the pattern that history has shown us should repeat itself as regards the economic performance of utilities under competition.

Our utility industry is both a large and a critical component of our national economy and has become an absolutely necessary element of the way we all live, and expect to live. Our electric utilities require more capital than does any other single industry. In fact, over the two years ending in 1987, electric utility investment in plant and equipment exceeded the total invested by the combination of all of our airline, railroad, mining, aerospace and steel industries. The current total (original cost) invested by our electric utility industry is in the neighborhood of 300 billion dollars ($300,000,000,000.00).[9] It goes without saying that we could not run either our households or our businesses and industries without adequate, reliable and reasonably priced utility services. There is no question that utilities are still clothed with the public interest which is and always has been the principal justification for regulation and the true foundation for the regulatory compact.

It must be asked whether it is a good idea to tear down the nature of the utility industry in order to save it from what may be transient problems. It is also reasonable to be concerned that if the current reform movement should destroy or adversely affect the utility industry as we now know it, the subsequent (re-)reform after failure of the proposed reforms may not be re-regulation but could rather be municipalization or nationalization

9. Competition in Electricity, *supra* note 2, at 333.

of our utilities. Based on observation of the rest of the industrialized world, the latter potential outcome is not necessarily good.[10]

The United Kingdom (UK) nationalized many of its industries, including utilities, after World War II. The intent was to deal with those industries where it was felt that, for reasons such as economies of scale, monopoly was inevitable. It was also assumed that public ownership would better provide assurance of the protection of the public interest than could private ownership. However, the desired result was not achieved and the Thatcher administration began actively pursuing a policy of privatization of industry in the UK, which policy is still on-going. France has also been privatizing its industries in recent years.[11]

Privatization as it is being applied to utilities in the UK, however, is not a clean break from all government regulation or intervention, even though that concept has been a large part of the rhetoric supporting the British privatization movement. So-called stopgap regulation was put in place in the privatized telecommunications industry, purportedly to protect domestic and small business customers until effective competition is developed. Regulation for water service is considered permanent because it is recognized that it will remain monopolistic. In natural gas regulation is intended to be permanent for all customers other than large commercial and industrial customers who negotiate special contracts for their service.[12]

The regulation that is being imposed on privatized utilities in the UK is claimed to be market surrogation "to achieve the same 'market place' goals of allocative and productive efficiency—in other words to keep costs and prices low and service and quality high."[13] The basic structure and procedure of the new utility regulation applications in the UK are based primarily on the United States regulatory model which is the subject of this paper. There is, then, even in this recent and ongoing reform movement, recognition that the market place is not an entirely adequate protection for the public interest of most utility customers.[14]

We as a nation cannot afford to charge into a new way of dealing with our utilities without greater assurance than that provided by economic or any other theory. If we choose to experiment with the reapplication of economic theory to our utilities we must do so cautiously and with a preplanned path for retreat. It has not been demonstrated that our long-

10. Salvaging Public Utility Regulation 1 (W. Sichel ed., 1976); Capitalism, Culture and Economic Regulation 158 (L. Hancher & M. Moran eds., 1989) [hereinafter Capitalism].

11. Capitalism, *supra* note 10, at 142-44.

12. *Id.*

13. *Id.* at 142-43.

14. *Id.* at 142-44.

standing utility regulatory process cannot work—only that during some very difficult times it did not work very well. Regulatory performance during the past few years may have been only a transitory and reversible phenomenon. It has not been shown that the regulators cannot improve their performance and act more impartially and more wisely.[15]

Both regulation and deregulation of utilities are discretionary acts, and whatever we do must be founded on the protection of the public interest. Economic theory does not and cannot tell us precisely just how much competition is the right amount. One reason is that real world businesses and markets seldom if ever precisely fit classical economic models.[16] Another is that government intervention itself has and will continue to alter the operation of economic market mechanisms.[17]

The basic question, then, is whether undoubtedly imperfect and at least historically destructive competition among utilities is preferable to imperfect regulation. Competition among utilities or components of utilities neither will nor can be realistically expected to conform to the classic competitive model of the social science of economics. The atomistic competition originally conceived by Adam Smith and carried forward into modern economic theory does not exist for our capital intensive utilities, especially considering the depth of the public interest which is inextricably entwined with our public utilities.

But that certainly does not and cannot speak against maximizing the traditional free enterprise nature of our economy whenever and wherever it can practically be expected to work reasonably well with assurance that the public interest will be served. Our utility regulatory system is a hybrid based on experience that recognizes the fact that utilities are affected with the public interest while keeping utilities within the private sector of business, albeit in modified form from businesses that can better function under classical economic models.

Further, even after deregulation, it is generally recognized that government will not be able to just sit back and let competition take its course. Continual government intervention will be required if workable utility markets are to exist indefinitely. In other words, even to the extent that utility industries, or portions of industries, are deregulated, some government economic regulation in some form will still be required. This should not be surprising because, even in the laissez faire concept of the classical model of competition, it is recognized that guidelines must be set by government.[18] In order to understand our utility regulatory system

15. D. Jones, *What's Right with Utility Regulation*, Pub. Utils. Fort. (Mar. 1986).

16. S. Miller, The Economics of Nuclear and Coal Power 107 (1976).

17. G. Bach, Economics—An Introduction to Analysis and Policy 498 (1960); Capitalism, *supra* note 10, at 139.

18. Bach, *supra* note 17, at 489 (1960); R. Heilbroner, The Worldly Philosophers 52-53 (1953); Capitalism, *supra* note 10, at 139.

this paper will trace the history of its development in order to show how the system is supposed to work and why it is supposed to work that way. Further, in order to understand the potential implications of recent and proposed regulatory and de-regulatory actions this paper will to relate them to how the regulatory process was designed to work and why it was so designed.

II. THE HISTORY OF UTILITY REGULATION IN THE UNITED STATES

A. The Beginnings and Sources

The theory and structure of the utility regulatory system that grew in the United States had its beginnings long before the United States even existed. Governments had involved themselves with the regulation of private businesses long before North America was even colonized.[19]

The Romans had developed in their law the theory of a "natural price;" that being the price that a willing buyer would pay to a willing seller. Controversy then developed over the Roman doctrine and St. Augustine and the Roman Catholic Church expressed the opinion that a more correct doctrine was that of a "just price." A just price was defined as where the seller only added just so much to his price to be enough to provide for his customary economic support but so as to not provide for his "unjust enrichment."[20] Thomas Aquinas wrote that "it is wholly sinful to practice fraud for the express purpose of selling a thing for more than its just price, inasmuch as a man deceives his neighbor to his loss."[21] Another concept behind the just price doctrine was the general suspicion of the motives of business and enterprise as well as the desire to avoid price abuses that might occur under special circumstances of coercion that could exist to the benefit of the seller.[22]

Western European countries also began the practice of chartering or franchising business monopolies as much as 200 years before the United States came into existence. As early as the sixteenth century France granted royal charters of monopoly to plantations and to trading companies and later England established the well known Hudson Bay and East India Trading Companies.[23] Those royal charters were the predecessors to the modern certificate of public convenience and necessity (CCN)[24] and the reasons for their granting are somewhat parallel because they are both intended to be an incentive for investment and for the

19. Phillips, *supra* note 1; M. Glaeser, Public Utilities in American Capitalism 196 (1957).
20. Glaeser, *supra* note 19, at 196.
21. Heilbroner, *supra* note 8, at 39.
22. Glaeser, *supra* note 19, at 196.
23. Phillips, *supra* note 1.
24. The origins and purpose of the modern CCN will be explained in detail later in this paper.

assumption of risks as a result of the protection from competition by government.[25]

Much of the legal system in the United States has its origins in the English system of common law.[26] As a direct example, in the 1600s Lord Chief Justice Sir Matthew Hale of England wrote a treatise entitled "De Portibus Maris" in which he stated:

> A man, for his own private advantage, may, in a port or town, set up a wharf or crane, and may take what rates he and his customers can agree for cranage, wharfage, housellage, pesage; for he doth no more than is lawful for any man to do, viz., makes the most of his own. . . . If the King or subject have a public wharf, unto which all persons that come to that port must come and unlade or lade their goods as for the purpose, because they are the wharfs only licensed by the king . . . or because there is no other wharf in that port, as it may fall out where a port is newly erected; in that case there cannot be taken arbitrary and excessive duties for cranage, wharfage, pesage, et cetera, neither can they be enhanced to an immoderate rate; but the duties must be reasonable and moderate, though settled by the king's license or charter. For now the wharf and crane and other conveniences are affected with a public interest and they cease to be juris privati only; as if a man set out a street in new building on his own land, it is now no longer bare private interest, but is affected by a public interest.[27]

Lord Hale's treatise was quoted by the United States Supreme Court in *Munn v. Illinois* (1877).[28] This landmark decision is reputed to be a root source of the regulation of utilities in the United States.[29] The English Parliament in Lord Hale's time began to regulate certain businesses as "common callings" because they were deemed to be affected with the public interest. Those occupations included wharfingers, bakers, brewers, cab drivers, ferrymen, innkeepers, millers, smiths, surgeons and nailors.[30]

The British colonies in North America and the United States in its early years attempted to apply the same regulation of private businesses.[31] The United States, however, began in the early 1800s to pursue a more laissez faire approach in relations between government and business and much of such government regulation was either dropped or ignored. But even then, laissez faire did not mean that government should do nothing—

25. Glaeser, *supra* note 19, at 201; Phillips, *supra* note 1, at 76.
26. Phillips, *supra* note 1, at 76.
27. Phillips, *supra* note 1, at 76.
28. Munn v. Illinois, 94 U.S. 591 (1877).
29. R. Hofstadter & B. Hofstadter, Great Issues in American History 129 (1982).
30. Phillips, *supra* note 1, at 77; L. Hyman, America's Electric Utilities, Past, Present and Future 125 (1985).
31. Phillips, *supra* note 1, at 77-78.

it was understood that while government should minimize its interference with private business enterprise, government still had an obligation to provide a structural framework of basic guidelines within which business must operate for the protection of the general public interest.[32]

Shortly after the Civil War, however, the reliance on the protection afforded by the then relatively new economic theory of competition broke down, particularly with respect to the railroads. Adam Smith's seminal *Inquiry into the Nature and Causes of the Wealth of Nations,* which is the foundation for the economic theory of competition, was not published until 1776, the same year we declared our independence. Competition as envisioned by Smith was relied on by various levels of our government to protect the public interest having to do with virtually all businesses in the beginning of our industrial expansion. Railroads were among those businesses, but railroads were found not to compete as expected under Smith's theories.[33] Significant abuses occurred, the competition turned destructive, cartelization ensued, and de facto monopoly was the outcome.[34] At that time, the Grangers and others began to accelerate movement down the path toward our utility regulatory system.[35]

Three methods of government regulation of investor owned utilities were used during the 1800s which also led us down the path to the commission system we know today. Although the timing varied somewhat across the country, there was a natural progression that occurred in the movement from judicial, to legislative, to local government or municipal regulation and, finally, to state commission regulation of utilities in the early twentieth century.

B. Judicial Regulation

The first step down the path, judicial regulation, was based on two surviving common law principles: (1) that uncontrolled monopolies were contrary to the public interest, and (2) that certain occupations were "common callings."[36] Judicial regulation could only begin with the litigation that occurs when a party claims to be wronged. As a result, the only type of action available to the courts was negative and it was not possible to set rates for the future because to do so would usurp a function appropriate for the legislatures. Further, the courts could not be responsive in a timely manner to changed economic conditions nor did the courts have any particular expertise in the business and economic situations that came before them.[37]

32. Bach, *supra* note 17, at 498.
33. E. Troxel, Economics of Public Utilities 5 (1947).
34. *Id.*; Bach, *supra* note 17, at 489.
35. Hofstader, supra note 29, at 123-24.
36. Phillips, *supra* note 1, at 77-78.
37. *Id.* at 110-14.

Judicial regulation was for these reasons passed over for legislative, then municipal, and then ultimately, for commission regulation. It should be noted, however, that commission decisions are still reviewable by the courts when differences arise.

C. Legislative Regulation

The next step was regulation by the state legislatures. Some states granted monopoly charters or franchises (pre-cursor CCNs) by enactment of a law, and some of the grants placed limits on customer rates for service, on the yield on common stock, declared service standards, and established organizational and administrative requirements. In fact, many of the early utility enterprises were directly incorporated by the state legislatures.[38,39]

The legislative process, however, proved to be inflexible, impractical, untimely and burdensome on the legislatures.[40] Rate limits and other elements or conditions of the grants (laws) could not be changed without new legislation or amendment. It was found to be impossible for the state legislatures to react quickly enough to altered economic and business circumstances.[41] And, also as was found to be a problem with regulation by the courts, the legislatures found that they did not have the specialized knowledge or experience to deal effectively with the difficult and complex economic and business issues of the utilities.[42]

It is for these sound reasons that the state legislatures ultimately chose to pass on some of their functions to what were originally created to be nonpolitical, expert and impartial commissions for the regulation of utilities. However, this generally did not occur before local governments and municipalities had already attempted to perform that difficult and controversial function.

D. Municipal or Local Government Regulation

The last step before commission regulation was municipal or local government regulation of investor owned utilities. This was, if not the least effective, certainly the messiest step of all. There are documented cases of all sorts of political abuses including preferential and discrimi-

38. Bound volume prepared by counsel for Consolidated Gas Company of New York, Franchises of Consolidated Edison Company of New York, Inc. and Affiliated Companies (Mar. 24, 1936) (unpublished, on file with Mr. Frank Leonard, Esq. of Consolidated Edison Company; Consolidated Gas Company was predecessor to Consolidated Edison Company) [hereinafter Franchises of Consolidated Edison].

39. Phillips, *supra* note 1, at 110-14.

40. *Id.*

41. *Id.*

42. *Id.*

natory treatment of both utilities and their customers, cream skimming, by-pass, and all nature of ill-considered actions at the municipal level. Municipal franchises were even bought by speculators to be sold to the highest bidder and multiple franchises were handed out with the intent that competition would be self-regulating and would, therefore, protect against all potential problems that might arise (it didn't).[43] There were a few attempts at straightforward and practical regulation to establish provision for monopoly entry control, rate setting, service standards and accounting rules. On the whole, the municipal regulation era was a disaster for all concerned.[44]

The municipal governments were also counting on competition to protect the interest of the public, and this era was probably the nearest we have ever come to full and free competition among utilities. Even though multiple franchises were handed out, and duplicative utility systems came into being, the nature of the competition was ruinous and short lived.[45] There were 45 mostly overlapping franchises granted for electric utility operation in Chicago between 1882 and 1905. By 1905, however, the monopoly entity of Chicago Edison and the merged Commonwealth Edison had risen from the chaos.[46]

New York City granted six overlapping franchises to electric utilities in 1887, but again, by 1907 the Consolidated Gas Company of New York (owned in great part by the Standard Oil interests) dominated the gas and electric utility business in that city. Today's Consolidated Edison Company of New York, Inc. (Con Ed) was first formed under that name from the Consolidated Gas Company of New York on March 24, 1936. At that time, Consolidated Gas Company was made up of 17 affiliated companies and the predecessors to those companies included 92 companies. There had been a total of 140 franchises granted to those companies, five having been granted by the state legislature and 135 by municipalities. The first gas franchise was a legislative incorporation and granted to the New York Gas Light Company on March 26, 1823. The first electric franchise was granted by New York City to Thomas A. Edison's Edison Electric Illuminating Company of New York on April 19, 1881. The last of the Con Ed municipal grants (as of 1936) was to the Peekskill Lighting and Railroad Company on March 24, 1906, almost a year before the State of New York passed its Public Utility Act, which included CCN authority, on March 6, 1907.[47]

43. Troxel, *supra* note 33, at 49 (1947).
44. Electric Power; Deregulation and the Public Interest 292 (J. Moorhouse ed., 1986).
45. B. Behling, Competition and Monopoly in Public Utility Industries 23, 54 (1938).
46. Electric Power, *supra* note 44, at 292.
47. Franchises of Consolidated Edison, supra note 38.

Along with the political abuses of the era, the competition between the utilities that was supposed to protect the public interest turned cut-throat; abuses included price discrimination, price undercutting and price fixing. Cartelization and combination resulted and the utility type monopoly emerged anyway. Customer rates wound up higher than ever. To a great extent, it was the era of municipal regulation that precipitated the need for the public utility regulatory reforms that occurred in the late 1800s and early 1900s.[48]

Finally, as with the first two steps down the path, municipal regulation was untimely, unresponsive, and local government and municipal officials had no more specifically applicable expertise than did the judges or the legislators.

While the problems of judicial, legislative and municipal regulation were being played out, certain actions of the United States Supreme Court established further groundwork along the route to commission regulation. The court in *Munn v. Illinois* (1877)[49] paved the way for regulation of utilities and other businesses in the United States.[50] Munn operated a grain elevator in Chicago which the Court found to be monopolistic and clothed with the public interest, and, as a result, government regulation was therefore found to be acceptable. The Smyth v. Ames decision of the United States Supreme Court in 1898 clearly stated that the path to commission type regulation was the best way to go.[51] The decision stated that the determination of proper compensation with due process ". . . could be more easily determined by a Commission composed of persons whose special skill, operation and experience qualifies them to handle so great problems. . . ."[52]

E. Development of the State Commissions

The first state regulatory commission was established in Rhode Island in 1839. There were a total of 25 state commissions in place by 1887, but their authority was very limited and mostly related to railroads. New York did create the Office of the Inspector of Gas Meters in 1859 and extended the jurisdiction of that office to electric meters in 1861. In 1885 Massachusetts enacted legislation establishing a Board of Gas Commissioners having authority over rates and entry of new companies into gas utility markets and in 1887 the Board's power was extended to include electric utilities. The first state utility regulatory commissions with full

48. Behling, *supra* note 45, at 54.
49. Munn v. Illinois, 94 U.S. 591 (1877).
50. Hofstader, *supra* note 29, at 123-24.
51. A. Priest, Principles of Public Utility Regulation 26 (1969); F. Welch, Cases and Text on Public Utility Regulation 395 (1968).
52. Smyth v. Ames, 169 U.S. 466 (1898).

regulatory authority were created in 1907 in New York and Wisconsin.[53]

Charles Evans Hughes spearheaded commission development in New York. Hughes, then known as a "trust buster" attorney, was appointed counsel to a legislative committee in 1905 to investigate gas and electric utility abuses. The nature of the abuses were those associated with the era of municipal regulation. That committee recommended the creation of a commission to be appointed by the governor with the advice and consent of the senate with authority over the quality of utility service, CCNs, rates, financing, accounting methods, reporting, and utility books and records. The commission's actions were to be structured so as to be subject to suitable review by the courts upon appeal.[54]

Mr. Hughes was elected Governor of New York in 1906, primarily on the issue of utility regulation. He was opposed in that race by William Randolph Hearst whose campaign was based on municipal or government ownership of utilities. Governor Hughes signed the bill creating the Public Service Commission in New York on March 6, 1907. There was a parallel development in Wisconsin led by Governor Robert La Follette. The essentially similar Wisconsin law creating their Public Service Commission was signed into law about two months later than New York. California followed in 1911. It became clear that one reason for the pioneer development of our system of utility regulation was to keep our utilities in the private business sector.[55]

Between 1907 and 1914 27 states created public utility regulatory commissions. Nearly every state had established utility commissions by 1920.[56] The last states to establish commissions were Alaska (1960), Iowa (1963), Minnesota (1975), South Dakota (1976) and Texas (1976).[57] Nebraska does not have a commission because all of its utilities are publicly owned. The state laws generally follow the models of the New York, Wisconsin and California laws with Wisconsin being most used.[58]

It is interesting to examine the manner in which the reformers perceived the need for, and designed controls into, the commission system. The universally essential elements were maximizing the independence, impartiality and nonpolitical nature of the commissions. The following is a summary of those controls as originally designed:

53. W. Jones, *Origins of the Certificate of Public Convenience and Necessity, Developments in the States, 1870-1920,* 79 Colum. L. Rev. 426, 447 (1979).

54. Report prepared by the staff of the New York Public Service Commission, The Politics of Regulation—A History of the Public Service Commission 19 (1982) (unpublished, on file with Mr. Robert Swartout, Santa Fe, N.M.) [hereinafter The Politics of Regulation].

55. *Id.* at 21, 22, 43, 44, 53, 54, 68; Priest, *supra* note 51, at 27.

56. Priest, *supra* note 51, at 28, 31.

57. Competition in Electricity, *supra* note 2, at 25.

58. Priest, *supra* note 51, at 28.

1. An uneven number of commissioners were to be appointed by the governor with the advice and consent of the senate. Commissioners were intended to be persons having specifically useful knowledge and experience, and the commissions were given the ability to employ staff with specialized training and expertise.

2. In some states there could be no more than a simple majority of commissioners from any one political party.

3. Commissioners could only be removed from office for malfeasance, incompetence, neglect of duty or upon proof of other improper actions. It was believed by the reformers that a Commissioner could not act independently if his position was dependent on the opinion or whim of a governor or anyone else. The United States Supreme Court in 1935 expressed this concern stating that ". . . it is quite evident that one who holds his office only during the pleasure of another cannot be depended upon to maintain an attitude of independence against the latter's will."[59]

4. Commissioners were appointed and not elected because it was felt that, should a campaign for election be run on an issue such as consumerism or on a pro-utility platform, a commissioner could not be fairly expected to be impartial.

5. The terms of the commissioners were designed to be longer than the terms of elected officials, and the commissioner's terms were to be staggered in time so as to cause the term of a sitting commission to be longer than the term of a single political administration. The purpose was to foster independence of and minimize politicization of the commissions.

6. The commission's decisionmaking functions were designed to be quasi-judicial in nature operating under rules of civil procedure parallel to those of the courts in order to avoid improper influence on the commissioners and to assure that all parties would have equal rights in the process.[60]

Utility regulation has attracted controversy since its beginning. An early disagreement was over the quasi-judicial aspect of public utility regulation. A major continuing public argument on that subject occurred in 1930 between then New York Governor Franklin Delano Roosevelt and William A. Prendergast who was the Chairman of the Public Service Commission at the time. FDR felt that commissions could not be "merely a court" but that they should be "rather intended to represent [only] the public interests."[61]

59. Humphreys Executor v. United States, 295 U.S. 602, 609 (1935).

60. These six criteria are my interpretation of material obtained from a large number of sources that I have read and reviewed over the past 25 years.

61. The Politics of Regulation, *supra* note 54, at 43-44.

It appears to me, however, that the matter had already been put in perspective some 16 years before in 1914 by Milo R. Maltbie, who FDR later appointed to the chairmanship of the commission after Prendergast resigned. Mr. Maltbie wrote that:

> It is apparent that some of these [commission] functions are legislative, others quasi-judicial and others administrative. If the [New York] Commission were to abandon its quasi-judicial function, and become the fearless champion of the people against the utilities, that would not end the matter. Controversies now generally composed by the Commission would simply be shifted to the courts. . . . Who can tell how many cases would be appealed, and how much litigation would ensue, if the Commission were to attempt to act merely as a public prosecutor.[62]

Mr. Maltbie's comments are, in my opinion, still applicable today.

A standard part of the original and the current public utility laws is the expression that the regulators have the obligation and duty to protect three interests in the pursuit of their duties. Those interests are: (1) the interests of utility customers, (2) the interests of the investors in the utility, and (3) the interest of the general public. The New Mexico statute is fairly typical, stating the following:

> It is the declared policy of the state that the public interest, the interest of consumers and the interest of investors require the regulation and supervision of such public utilities to the end that reasonable and proper services shall be available at fair, just and reasonable rates, and to the end that capital and investment may be encouraged and attracted so as to provide for the construction, development and extension, without unnecessary duplication and economic waste, of proper plants and facilities for the rendition of service to the general public and to industry.[63]

The New Mexico law is one of the later among the states having been passed in 1941.

Once a commission has granted a CCN establishing a monopolistic service territory for a utility, the underlying structure of the intended commission process is the replication of or surrogation for the absent competitive market for the utility's commodity so made available to customers within their certified territory.[64]

Utilities obtained services, labor, materials, equipment, supplies, money and other commodities in the same markets as did all other businesses.

62. *Id.* at 53-54.
63. N.M. Stat. Ann. § 62-3-1(B) (1978).
64. Electric Power, *supra* note 4, at 46, 240; A. Kahn, The Economics of Regulation 20 (1970).

The commissions, therefore, were found to have no need to substitute for such existing markets but only in the monopolistic market in which the sale to their customers of the particular utility commodity occurs. The reformers determined, however, that Commissions must have the obligation to assure that the utilities act prudently in those other markets so as to avoid utility customer rates reflecting the costs of imprudent management.

Unregulated markets send signals to the enterprises within such markets indirectly by way of decreased sales or even by the ultimate failure of one or more enterprises. The intended device by which the commissions provide market type signals to the utilities they regulate operates through regulatory disallowance of imprudent expenses and costs as well as by means of the end result of and opinions expressed in their final rate and other official orders issued.[65] In this manner, the government regulation of utilities operates as a substitute or surrogate for an unregulated free market.

The newest public utility act, which was enacted in Texas in 1976, states its purpose as follows:

> This Act is enacted to protect the public interest inherent in the rates and services of public utilities. The Legislature finds that public utilities are by definition monopolies in the area they serve; that therefore the normal forces of competition which operate to regulate prices in a free enterprise society do not operate; and that therefore utility rates, operations and services are regulated by public agencies, with the objective that such regulation shall operate as a substitute for such competition. The purpose of this Act is to establish a comprehensive regulatory system which is adequate to the task of regulating public utilities as defined by this Act, to assure rates, operations, and services which are just and reasonable to the consumers and to the utilities.[66]

Surrogation for the competitive market is the guiding principle for the rate regulation component of the utility regulatory process. But, as with everything else in the process, it is not a purely mechanistic concept. How can it be when the market place for which it surrogates is characterized by uncertainty and is therefore neither purely mechanical nor predictable? Also, the system of utility regulation is not a system based solely on quasi-scientific principles. It necessarily includes, and must allow for, discretionary considerations associated with the rights and obligations contained and implied in the process. However, the market

65. Kahn, *supra* note 64.

66. Texas Public Utility Regulatory Act; Article 1, Legislative Policy; sec. 2

surrogation principle must always be considered in full and must be used to police the function of utility rate regulation.[67]

In addition, albeit generally provided somewhat later along the path, commissions were provided authority by their legislatures to authorize the issuance of securities by utilities associated with utility assets that could affect the financial integrity of the utilities to the detriment of their customers. This regulatory function does not require and should not involve any attempt at market surrogation by the commissions in the financial markets. It was designed to protect the asset base of utilities and to regulate utility activity in the money markets just as regulation was designed to deal with potential imprudence by utilities when participating in other non-utility competitive markets.

Also, commissions were given the authority by their legislatures to assure that the service provided by utilities is of reasonable quality. Quality of service issues are not considered in depth in this paper because of the concentration on economic and rate regulation.

F. Regulatory Process Development

The three basic elements of the economic regulation of utilities are the CCN, rate regulation, and the regulation of utility securities and finance. In general, they came about sequentially and approximately chronologically in that order in what can be interpreted as a natural progression. That progression is described below:

1. THE CCN:

The CCN was the first element, and its purpose was to provide control over entry into monopolistic utility markets. Chief Justice Brandeis, in his 1932 dissent in New State Ice v. Liebmann, stated that:

> If the business is, or can be made, a public utility, it must be possible to make the issue of a certificate a prerequisite to engaging in it. . . . The limitation that is set by the due process clause . . . requires that the regulation shall not be unreasonable, arbitrary or capricious . . . while, ordinarily, free competition . . . has been encouraged, the public welfare may . . . demand that monopolies be created. Upon this principal is based our whole modern practice of public utility regulation. . . . The certificate of public convenience and necessity is the device . . . through which the monopoly is kept under effective control by vesting in a commission the power . . . to curtail the right to enter the calling.[68]

67. Capitalism, *supra* note 10, at 143-44.

68. New State Ice v. Liebmann, 285 U.S. 262 (1932).

The overall purposes of CCN market entry control were intended to (1) avoid duplication of facilities, (2) to avoid economic waste, to avoid the use of unnecessary capital, (3) to protect the necessarily significant utility investment (from incursion by utility competitors), (4) to avoid ruinous and destructive competition, and (5) to avoid the public inconvenience that results from the installation of, and ultimate maintenance activities associated with, duplicative facilities including overhead lines and underground pipes and conduits.[69]

The CCN was a good beginning, but, by itself, the CCN could not avoid abusive pricing by the certified utilities for their monopolistic utility commodity.

2. Rates:

Rate abuses were the primary casus belli for the 1907 public utility laws in New York. The regulation of utility rates was difficult to structure because the reformers desired to keep the investor owned utilities to be regulated within the American tradition of private sector business rather than causing or allowing them to become municipal or otherwise government owned. This structural goal was not only difficult to achieve in the reform, but it has also been very difficult to maintain over the years of actual regulatory practice. Martin Shapiro summarized the problem when he said that "[i]n short, regulatory statutes represent an uneasy compromise between laissez faire and government control visions of the economy."[70]

3. Securities and Financing:

Even with the CCN and rate regulation, utilities still found ways to abuse their rights by using their utility assets to support nonutility investment and by other even more imaginative methods. Until 1930 only five states, California, Massachusetts, New York, Texas and Wisconsin were exercising any authority over utility financing and securities.

The holding company era of high-flying utility finance and associated questionable activities by utility executives such as the Samuel Insull occurred in the years before and resulted in the passage of the Public Utility Holding Company Act of 1935.[71] Beginning in 1930, most of the states also amended their public utility laws to provide for regulatory supervision of utility securities and financing.

The three elements, the CCN, rates, and securities, are each necessary elements of the whole of our delicately balanced system of economic regulation of utilities. The process is adversely affected if any part is ignored or is in some manner subverted. The threshold element without which the entire process is meaningless is the CCN. The CCN serves to establish the monopoly and to provide the nec-

69. Jones, *supra* note 53, at 514.
70. M. Shapiro, The Supreme Court and Administrative Agencies 260-61 (1968).
71. 15 U.S.C. §77-79Z (1935).

essary protections that are needed as an incentive for the large capital investments and long term commitments that are inherent and absolutely needed for the effective and efficient operation of utilities. Without CCN market entry control, rate regulation would, in theory, be superfluous because competition would be allowed to exist for utility territories and customers. Of course, history has shown us that such utility competition has not worked as economic theory said it should. The same applies to regulation of securities.

G. Related Historical Developments

There are a few additional historical details that are relevant to this discussion as described below:

1. The Holding Company ERA

The electric utilities were most involved in the holding company practices that culminated in the 1920s and the early 1930s. By 1932, 16 electric utility holding companies controlled 75 percent of the electricity produced in the United States. In fact, 49 percent was controlled by three holding companies: the Electric Bond & Share Group (the predecessor of General Electric), the Insull Empire, and the United Corporation (sponsored by J. P. Morgan & Company). Eleven gas pipeline systems controlled 80 percent of total pipeline mileage in that industry.[72]

The business practices of these utility holding company systems are some of the most blatant examples of insider control and self-seeking. In the 1930s Howard Hopson had managed to maintain control of the huge Associated Gas & Electric holding company system with only $100,000 of voting stock. The structures of the utility holding company "empires" of the era were fantastically complex. For example, the Georgia Power Company was controlled by the Seaboard Public Service Company, which was controlled by the National Public Service Corporation, which was controlled by the Middle West Utilities Company, which was controlled by Insull Utility Investments, Inc. which was controlled by the Corporation Securities Company of Chicago which was, in turn, controlled by Insull Utility Investments which, presumably, it controlled. Of this entire pyramid of companies, only the Georgia Power Company actually produced and sold electricity as a utility. The other companies existed only for the purpose of financial speculation and profit. The investors in the Insull empire ultimately lost every cent in the early 1930s.[73]

Of the myriad abuses of utility holding companies, three general categories can sum up the worst of them: pyramiding, write-ups, and intercompany transactions. Combined and associated with these abuses,

72. D. Hawes, Utility Holding Companies 2.03 (1987); Electric Power, *supra* note 44, at 66.
73. Bach, *supra* note 17, at 319; Heilbroner, *supra* note 8, at 39.

however, were deceptive accounting practices, exaggerated profits (especially from excessive service fees paid by subsidiary companies in the pyramids), disbursement of unearned dividends, speculation in associated equity stocks, and inattention to the day-to-day management and operation of the subsidiary operating companies.[74]

The utility holding company era provided some of the most interesting of questionable business practices and examples of financial gamesmanship. Utility regulation, as a result, was honed to an even finer edge. For example, the regulatory principle of the acquisition adjustment was refined and further developed to preclude one of the many abusive practices of the holding companies. Utility property had been sold and resold within the holding companies between the subsidiary utilities. Its value was inflated at each transaction thereby increasing the rate base and, under the regulatory practice of the era, the return thereon, with the result of artificially increasing the profitability of each subsidiary and of the entire holding company.[75]

The Public Utility Holding Company Act of 1935,[76] one of the strictest federal laws ever created, was passed to correct the many abuses. It performed its intended function very well and the problematic holding companies were soon broken up or restructured. As of 1983, electric utilities within registered holding companies amounted to about 20 percent of the industry and for gas utilities amounted to approximately 8 percent.[77]

Disallowance Theory

The ability of a commission to disallow proven imprudent or excessive expenses and costs of a utility in the determination of the utility's revenue requirement for the setting of rates is a critical element of the rate regulation process. One way to express the nature of this authority is to say that whereas a utility may spend its money any way it chooses, i.e., it is utility management's prerogative to set the level of its expenses, it is the regulator's duty to determine what expense burden the ratepayer must bear.

This concept logically follows the regulatory market surrogation function in rate regulation. A competitive market does not publish or otherwise transmit specific instructions to businesses setting out how they should run their operations in order to be efficient and profitable. Competitive businesses must observe, analyze, interpret, and react to the market as

74. Phillips, *supra* note 1, at 551-53.

75. Ratemaking Trends in the 1980s at 51 (B. Radford ed., 1988); J. Bonbright, A. Danielson & D. Kamerschen, Principles of Public Utility Rates 236 (1988).

76. 15 U.S.C. § 79-79Z (1935).

77. Hawes, *supra* note 72, at 2.06.

it actually operates to obtain guidance. If they make a mistake, they are informed by the marketability of their product.

A commission cannot, if it is to perform as a surrogate for a competitive market, tell utility management how to run its operation before the fact of management decisions. Were commissions to do so, they would be substituting for management, not surrogating for the market. The commission's final orders in rate cases provide market-like incentives for utilities. A commission could not very well disallow an expense or cost as imprudent before the expense is incurred nor can a commission determine, before the fact of a transaction, which transaction will be the prudent one (unless commissions are somehow omniscient). To do so a commission would be acting in real time as the utility's manager or as some sort of special second level board of directors. That is not and cannot be a function of government.

The United States Supreme Court in 1923 in *Missouri ex rel. Southwestern Bell Telephone Company v. the Missouri Public Service Commission* declared that:

> The Commission is not the financial manager of the corporation and it is not empowered to substitute its judgment for that of the directors of the corporation; nor can it ignore items charged by the utility as operating expenses unless there is an abuse of discretion in that regard by the corporate officers.[78]

The Court also decided in 1935 in *West Ohio Gas Company v. the Public Utilities Commission of Ohio* that "[t]o disallow an expenditure, . . . a commission must prove 'an abuse of discretion' on the part of management. Such an abuse, in turn, results from 'a showing of inefficiency or improvidence.' "[79]

3. Allowed Rate of Return

There are two landmark Supreme Court cases that are critical to the determination of the rate of return that should and must be allowed to regulated utilities. They are commonly known as *Bluefield* and *Hope* as quoted below:

BLUEFIELD WATERWORKS v. PUBLIC SERVICE COMMISSION

> "A public utility is entitled to such rates as will permit it to earn a return on the value of the property which it employs for the convenience of the public equal to that being made at the same time

78. Missouri *ex rel.* Southwestern Bell Telephone Co. v. Mo. Pub. Serv. Comm'n, 262 U.S. 276, 289 (1923).

79. West Ohio Gas Co. v. Pub. Utils. Comm'n of Ohio, 294 U.S. 63 (1935).

> and in the same general part of the country on investments in other business undertakings which are attended by corresponding risks and uncertainties; but it has no constitutional right to profits such as are realized or anticipated in highly profitable enterprises or speculative ventures. The return should be reasonably sufficient to assure confidence in the financial soundness of the utility and should be adequate, under efficient and economical management, to maintain and support its credit and enable it to raise the money necessary for the proper discharge of its public duties. A rate of return may be reasonable at one time and become too high or too low by changes affecting opportunities for investment, the money market and business conditions generally."[80]

FEDERAL POWER COMMISSION v. HOPE NATURAL GAS CO.

> "From the investor of the company point of view it is important that there be enough revenues not only for operating expenses, but also for the capital costs of the business. These include service on the debt and dividends on the stock. By that standard the return to the equity owner should be commensurate with returns on investment in other enterprises having commensurate risks. That return, moreover, should be sufficient to assure confidence in the financial integrity of the enterprise so as to maintain its credit and to attract capital."[81]

Controversy still exists over whether a utility's allowed rate of return is really a guaranteed rate of return. Francis X. Welch very neatly explained the fallacy of the guaranteed rate of return notion as follows:

> The Commission's function is simply to determine a rate of return which will have the result of permitting a company to earn a fair return, if the utility's earning power and other circumstances are such that it can do sufficient business so as to permit it to cover its expenses and obtain a reasonable return, over and above them. . . . In other words, the utility's return allowance might be compared with a fishing or hunting license with a limit on the catch. Such a license does not guarantee that the holder will catch anything at all; it simply makes the catch legal (up to a specified limit) provided the holder is successful in his own efforts.[82]

The source of the controversy that resulted in the Bluefield and Hope cases came about in an interesting manner representative of the persistently changeable character of utility economics and relates back to the seminal *Smyth v. Ames* case (1898) previously mentioned here.[83] That

80. Bluefield Waterworks v. Pub. Serv. Comm'n, 262 U.S. 679 (1923).
81. Federal Power Comm'n v. Hope Natural Gas Co., 320 U.S. 591 (1944).
82. Welch, *supra* note 51.
83. Smyth v. Ames, 169 U.S.466 (1898).

case came about, among other reasons, as a result of problems stemming from the economic deflation that occurred during the late 1800s. Because of the deflation, the reproduction cost of utility assets was less than the original cost of the assets. As a result, ratepayers advocated valuation for ratemaking based on reproduction cost while the utilities advocated original cost.

The issue was met in *Smyth v. Ames* where the Court held that valuation must be based upon fair value considerations including both original and reproduction costs. However, the Court did not set out how fair value should be determined or how either original or reproduction cost must be used in the determination of fair value. The adversaries changed their respective positions, however, when the inflation brought about by World War I turned the tables and reproduction cost became higher than original cost. The ratepayers then began to advocate original cost and the utilities advocated reproduction cost. The adversaries haggled for over 40 years until the Court decided in Hope as follows:

> We held that the Commission [FPC] was not bound to the use of any single formula . . . in determining rates. . . . And when the Commission's order is challenged in the courts, the question is whether that order "viewed in its entirety" meets the requirements of the act. Under the statutory standard of "just and reasonable" it is the result reached, not the method employed, which is controlling.[84]

The Hope decision resulted in movement toward the nearly universal acceptance of original cost as the valuation standard. Further, the "end result" doctrine established by Hope caused the primary emphasis in utility rate cases to begin to shift from valuation to the determination of fair rate of return.

4. The Monopoly Nature of Utilities

Many in the field still claim as a necessary premise for the regulation of utilities that they are a monopoly and a natural monopoly. In fact, since 1934 when the United States Supreme Court decided *Nebbia v. New York*, such has not been the case in the United States. Justice Roberts said in *Nebbia* that;

> [t]he dairy industry is not . . . a public utility . . . there is . . . no suggestion of any kind of monopoly . . . in no way dependent upon public grants or franchises. . . . The phrase "affected with a public interest" can . . . mean no more than that an industry, for adequate reason, is subject to control for the public good.

84. Federal Power Comm'n v. Hope Natural Gas Co., 320 U.S. 591 (1944)

> "If . . . the conditions or practices in an industry make unrestricted competition an inadequate safeguard of the consumer's interest, produce waste harmful to the public, or portend the destruction of the industry itself, appropriate statutes . . . may not be set aside . . . regulation . . . is unconstitutional only if it is arbitrary, discriminatory, or demonstrably irrelevant to the policy the legislature is free to adopt. . . ."[85]

Further, the matter of the natural monopoly characteristic of utilities, that being when unit costs decrease with increasing production, had been brought into question as early as 1961 by James C. Bonbright when he said that

> "a natural monopoly results and . . . is due . . . to severely localized and hence restricted markets for utility services—markets limited because of the necessarily close connection between the utility plant on the one hand and the customers' premises on the other. . . . Were it compelled to share its limited market with two or more rival plants owning duplicate distribution networks, the total cost of serving the city would be materially higher. . . even if the unit cost of supplying a given area with a given type of public utility service must increase with an enhanced rate of output, any specified required rate of output can be supplied most economically by a single plant or system."[86]

Many experts also claim that utilities are less of a monopoly than they used to be. To some extent, that is true. There is greater opportunity today for fuel switching by gas and electric utility customers, and there is a greater possibility that a customer could simply substitute self generation for electric utility service. Other factors which have been brought about artificially by government, such as cogeneration under the Federal Public Utilities Regulatory Policies Act of 1978 (PURPA)[87] and small power systems and legislated open access transportation and by-pass possibilities for gas service, are claimed to affect the monopoly status of utilities. But even with all of this, the distribution monopoly certainly still exists, and, if the history of our utilities does repeat itself, the rest of the vertically integrated monopoly will likely return to wherever it was before anyway. In 1985, Leonard S. Hyman said that "if competition comes, it will not be through the radical measures proposed by academics. . . ."[88]

85. Nebbia v. N.Y., 291 U.S. 502 (1934).

86. Bonbright, *supra* note 75, at 20.

87. PURPA is one of the five following acts which made up the National Energy Acts of 1978: The Public Utilities Regulatory Policies Act (PURPA), Public Law 95-617; The Energy Tax Act (ETA), Public Law 95-618; The National Energy Conservation Policy Act (NECPA), Public Law 95-619; The Powerplant and Industrial Fuel Use Act (FUA), Public Law 95-620; The Natural Gas Policy Act (NGPA), Public Law 95-621.

88. Hyman, *supra* note 30, at 282.

H. The Regulatory Compact

The critical and dominating public interest characteristic of private businesses such as public utilities that justifies their regulation by government dates all the way back to Lord Hale in the 1600s. The same justification was clearly stated in the *Munn v. Illinois* decision in 1877, and was reaffirmed by *Nebbia* in 1934. Utilities are still affected with the public interest and it is upon that bedrock that the regulatory compact was and still is founded.

The regulatory compact is the expression of the end result of the cumulative actions that make up the history and development of the economic regulation of utilities in the United States. The roots and sources of the regulatory compact, therefore, go back to the earliest of economic times and, even in the relatively youthful United States, its gestation took over a century. It has allowed the majority of our utilities to remain in the private sector of our economy, it has allowed our utilities to offer their most essential contribution to the health and growth of our economy, and it has provided utility customers with the most reliable and most economic utility service available anywhere in the world.

Whereas the term "regulatory compact" is used frequently regarding the regulation of private utilities by government in the United States, there is no standard definition. It will be defined in this paper as the expression of the nature and intent of the relationship between the regulated utilities and their investors, and the utilities' customers and the general public. It is the set of mutual rights, benefits, and obligations that exist for both the utilities and the public in the regulatory scheme. As with every just and reasonable interaction, for every right or benefit granted, there is a concomitant obligation.

The regulatory compact provides that (1) utilities give up certain rights for the benefit of a monopoly territory granted by government, and that (2) the customers of the utilities give up the right to choose the supplier of the utility commodity within that territory for the assurance of government regulation of the price the utility may charge for that commodity.

Further, the regulatory compact is an ongoing mutual relationship between the customers of utilities and the general public, and utility managers and investors. That relationship is one of sensitive balance that must be maintained under the long standing and common sense standards of justness and reasonableness. As is the nature of such a compact, each party, both the utilities and their customers, is obliged to accept the costs as well as the benefits that can occur from time to time. Neither the utilities nor their customers can pick and choose when it is convenient to operate under the compact and then, later, choose to go back into the compact with everything being forgiven.

The regulatory compact is not a switch that may be turned off every now and then and then turned back on with the expectation of easy and

immediate return to the former condition. When it is switched off, there can be expected many and unpredictable dislocations and disturbances that may not be readily correctable, if correctable at all. In order for the regulatory compact to remain operable and effective, the sensitive balance of its associated rights, benefits, and obligations must be maintained.

Government is the administrator, mediator, judge, and overseer of the regulatory compact and, therefore, government has the primary responsibility for its maintenance. Most important, then, is the manner in which government, through its regulatory commissions, state legislatures, the Congress, and the courts, administers and assures the balanced continuation of the compact.

Finally, history shows that public interest based regulatory compact is the foundation for the unique utility regulatory process found in the United States. The social science of economics, the applied science of engineering, the practical discipline of accounting, and all manner of theories, analyses, methods and practices are necessary in the actual practice of the regulation of investor owned utilities, but such are the tools of application and not the reason and basis for utility regulation under the regulatory compact. If this most basic lesson of history is lost sight of, the tail of technocracy and academia will wag the dog of the primary need to protect the public interest as expressed in the regulatory compact.

III. COMMENTARY ON CURRENT REGULATORY PRACTICES

A. Introduction

This section of this paper is intended to place certain current regulatory trends in the context of history, the traditional regulatory process, and the regulatory compact. In probably every instance of the trends discussed there will be important issues not addressed because of the historical approach taken. In such instances, it is not meant to indicate that the other issues are not important. Rather, it is simply that the subject of this paper is limited. Also, this section contains the opinions of the author with respect to interpretation of the history previously presented in Section II., to the manner in which our regulatory system is intended to operate, and to the positive or negative nature of the current regulatory practices discussed.

B. Selected Current Regulatory Practices

1. Open Access Natural Gas Transportation

Federal and state[89] action at both the legislative and commission levels have established or allowed open access for the transportation of natural

89. N.M. Stat. Ann. § 62-6-4.1 (1978, 1990 Supp.).

gas in regulated interstate pipelines, intrastate pipelines and local distribution systems. Ultimate customers (at least the big ones) and those other than the regulated utility providing them with a supply of gas have access to the piping systems of the regulated utilities for the transportation of their gas.

Underlying these government actions is the assumption that their action will better replicate or allow for the performance of the classical economic theory of competition and thereby all necessary protection of the public interest will be virtually automatically assured as a result. It is further claimed that competition so fostered will not only provide adequate protection, but that it will also assure a more economic and presumably less costly but adequately reliable natural gas utility service.

A few already experienced results of open access is that it allows "cream skimming" of the regulated utility systems—it is usually the larger and better customers of the regulated entities that are "skimmed off" and lost by the distribution utilities as a result of open access. In addition, however, as is also allowed in many jurisdictions, the ultimate bypass of the regulated utility system has occurred where the utilities lose their revenue from transportation of the gas and where duplicative facilities are constructed. In both instances, the currently remaining customers of the utilities and, should the phenomenon of competition disappear as it has in the past, future utility customers will bear the cost of underused and unnecessary facilities.

History indicates that cream skimming and bypass are undesirable with respect to utilities. How and why are the circumstances of today different than they were when the same actions were found to be something that should be avoided—and to the extent that changes may have occurred, are they truly important or may they even be undesirable? Further, have the underpinnings of how economics really operates changed, or is it that the theories have changed (but does changing a theory change the realities?), or are we simply applying again the same theories that haven't worked before?

Another aspect of open access that must be considered is its relationship to the regulatory compact. Open access significantly upsets the delicate balance of the regulatory compact by having the effect of taking away some of the rights and benefits of the regulated companies without adding anything back for counterbalance. Similarly but compounding in effect, it adds rights and benefits for customers (and potential customers) without imposing any associated obligations. We are already seeing the manifestations of that imbalance in the skimming off of regulated utility customers and the residual adverse effects on both the remaining utility customers and the utilities and their investors. We are also seeing attempts by legislatures and commissions to correct for these predictable manifestations.

Should the apparent current natural gas supply abundance disappear, and should duplicative facilities that will result from bypass become no longer useful to anyone, it is likely that there will be an attempt to reestablish the regulatory compact so as to restore order and reasonableness for both utility customers and the utility industry.

2. Electric Transmission Wheeling

Electric transmission wheeling, the transportation of electricity for others, absent some of the obvious differences having to do with both the physical system in place and the physics of the two commodities, can be thought of in essentially the same way as open access to natural gas transportation systems. The same basic questions as to the potential modifications to regulatory practice are, therefore, also applicable and there is no need to repeat them here.

3. Load Retention & Economic Development Rates

Load retention and economic development rates are rates[90] lower than standard rates available to other similar customers, which lower rates are intended to retain load (a customer or customers) that would otherwise leave the system and no longer be customers of the system at all. The need for load retention rates can arise from at least three sources. They are (1) that there is greater availability of alternatives to utility commodities today, (2) that self-supply of utility commodities is frequently more economically feasible than it was in the past, and (3) because of the manifestations of the imbalance in the regulatory compact that was brought about by open access for natural gas.

The first two instances demonstrate that utilities live in a more competitive business world than they did in the past. But that competition does not cause their certified territory to be other than monopolistic as regards their utility commodity. It does, however, function as an incentive for utilities to optimize their efficiency so that their commodity can remain economically marketable within their territory. The natural growth of the real competition that exists without any more government "help" will operate to maximize economic efficiency for all concerned without artificial government action such as special load retention rates for utilities.

The effect of government-initiated open access or wheeling is to allow utility customers to seek lesser cost supply and for nonutility producers to skim the cream off the utility's market territory with the attraction of lower cost gas or electricity. Such access would not be allowed under the traditional regulatory compact. Utilities must necessarily plan for long-

90. N.M. Stat. Ann. § 62-6-26 (1978, 1990 Supp.).

run supply requirements to be able to meet their statutory obligation to provide adequate and reliable service to all who require it in their certified territory. As a natural result, there will likely be periods when, for the short-run, alternate supplies may be cheaper. The ultimate beneficiary, if there are short-run aberrations during which the regulatory compact is suspended, will be neither the utility customers nor the utility. They are the ones who will have to pick up the pieces when the bubble bursts.

Review of the literature seems to indicate that load retention rates and economic development rates are considered to be synonymous terms. They are not the same. Load retention rates are intended to retain existing customers and load while economic development rates are intended to attract new customers or expanded service to existing customers, i.e., economic development.

The current trend toward electric utility economic development rates appears to be the result of two circumstances. One is the matter, certainly not new, of the relative cost of utility commodities to potential large commercial and industrial customers between different utility service territories. Differing utility costs between utilities can affect decisions to locate, or to relocate, industrial and commercial facilities. The other is the current excess capacity in some parts of the country. The net result is the expressed desire to be able to offer special, and presumably lower, rates to certain prospective or expanding customers for the purpose of economic development.

Regarding the regulatory compact, the unavoidable result of such lower rates for selected customers, even for the purpose of economic development, is discrimination against the remaining unselected customers. The justifications are based on benefiting the unselected customers through greater future economies of scale. It is, however, "betting on the come" of a presumed result. It must be assumed that proposed (or current) discriminatory economic development rates are acceptable because of the possible future benefits that may result if the economic development really does happen, and happens in a manner that allows for such future benefits to be passed on to the then current ratepayers (who may not be the same ratepayers who suffered from the initial discriminatory rates).

It seems unquestionable that load retention and economic development rates are discriminatory. They are available to some similarly situated customers and not to others. But utility regulatory statutes do not preclude all discrimination; they just preclude undue discrimination. It is generally accepted that rates are unduly discriminatory if they are at less than variable costs of service. But the matter of undue discrimination does not lend itself only to formulistic or calculable considerations.

Economic development rates, in particular, can result in unfair treatment not only to competitors within a utility's territory, but can also result

in unfair treatment of other utilities competing for the same new business. If one utility is allowed a special economic development rate and another is not, either by the same or different regulatory bodies, fairness cannot be the result.

Economic development and load retention rates are an expedient which can be hoped to be a temporary phenomenon. They are not representative of any classical concept of competition—they are a highly administered pricing mechanism agreed to between the government and industry bureaucracies.

Further, investor owned utility businesses are not the proper vehicle for use by government to foster economic development any more than utility or any other free enterprise businesses are the proper vehicle for the pursuit of social welfare goals. Utilities and other private businesses are not supposed to be directly manipulated by government for the redistribution of wealth. If the Congress, legislature, or local government sees fit to do such things, let it be done within their own special bailiwicks—taxation and social welfare.

4. Deregulation of Electric Generation

Whereas it is the common belief that electric distribution systems will probably have to be dealt with under traditional utility regulation, it has become popular wisdom that certainly the generation component of vertically integrated electric utilities and, if the mandatory transportation of electricity for others (transmission wheeling) can be brought into being in some manner, electric transmission as well ought to be deregulated. Again, the trend is based on the notion that competition will do all that is needed to protect the public interest.

Utilities have had and do have the characteristic of being capital intensive as well as being affected with the public interest, and the generation of electricity for or by utilities is no exception. History seems to indicate that, when such industries function in a competitive mode, they tend to return to or toward monopolistic operation.

Stated in human terms, utility executives can understandably get fidgety when the huge investment in their utility plant is threatened by price competition. A natural reaction appears to start with price undercutting when sales are lost to another's lower prices. That initial action then similarly threatens their competitors who react in the same manner, the ultimate motivation of both probably being an attempt to assure coverage of their unavoidable fixed costs, and in particular, their debt service and dividends for their investors. The next step is price fixing or cartelization for mutual protection, and the final step is combination or merger which establishes, or reestablishes, something like a monopoly.

Stated in other terms, what has happened and what probably will happen to deregulated generation can be described by the theory of oligopoly. The two important requirements for oligopoly are the need for large-scale production relative to the size of the market and the need for low cost output, and barriers (financial or otherwise) against the entry of new firms, which barrier can be simply the size needed for efficient production. All of this seems to fit deregulated generation very nicely. If what has been called in the past destructive or ruinous competition should recur among the unregulated generators, the likely result will be price fixing and market sharing agreements which will ultimately result in de-facto cartels and the same old movement toward de-facto monopoly.

Unfair price cutting, which can reasonably be expected in an oligopoly, is illegal—but can unfair price cutting be easily distinguished from price cutting reflecting truly more efficient operation? How is the line between positive aggressive price competition and agreements to stabilize price in the case of such cartel-like operation identified? The operation of such a cartel is not very different from the characteristics of a monopoly as regards the setting of price and the control of the market. In fact, it may be argued that it would demonstrate the worst characteristics of monopolies without any of the possible benefits.[91]

What has been described above in common sense and human terms has happened before—the tendency for utilities and other capital intensive business affected with the public interest to move toward oligopoly and monopoly—and there seems to be a dearth of studies, analyses or investigations attempting to prove that it won't happen again. In fact, the phenomenon previously described, that is the concentration of competing capital intensive businesses into oligopoly, appears to be happening right now among the deregulated airlines (which deregulation occurred in the late 1970s). Also, airline fares are not down on other than the major and most profitable routes which, in my opinion, results in the neglect of the interest of the public who either do not live on those major routes or who must for whatever reason travel those neglected routes to and within the hinterlands. The availability of flights on other than the profitable routes and the quality and safety of service in general also appears to have declined dramatically.

Whereas it may be arguable that there has been some overall cost reduction to a segment of the flying public, there has also been imposed increased congestion and delay costs. There has also emerged a clear and obvious trend toward little functional price competition (many of the "special" low rates are the same for all airlines serving the same routes),

91. Bach, *supra* note 17, at 482-88.

consolidation, merger, and the return toward the oligopoly/monopoly. Further, there is increasing pressure in the press and in Congress toward what can only be described as reregulation.[92]

The observations regarding the airlines can also be related back to the history of the railroads. The New York to Chicago railroad market of a century ago is an example. There were four main routes in the market area. They all had very large fixed investment and fixed costs of operation, and the variable costs of adding a few more cars or even scheduled trains were minimal compared to those fixed costs. Those owning and operating those competing routes began price-cutting and cut-throat competition. But, all the while, each maintained their short haul rates along their own routes where there were no practical alternatives for the shippers. It usually cost more to ship lesser distances within an operator's route than to ship all the way between New York and Chicago. The result was similar to today's unregulated airlines—"special" fare price-undercutting; low fares between major centers and high fares to less popular destinations. The final result was combination of companies and fewer operators.

If the hoped for benefits of utility competition among electric generators and transmitters doesn't happen as expected, will it be possible to retrace our path so as to cause the least harm to utility customers, the utilities, and our industrial economy as a whole?

Elements of the regulatory compact are also affected. A historical reason for the development of the CCN is the protection of investment in utility plant from competitors. That protection for existing utility transmission and generation plant would be lost with deregulation. Further, there is no reason why generating companies will not fail resulting in the possibility of duplicative facilities thereby wasting our precious capital and resurrecting the concern over economic waste. In fact, a basic presumption of classical competition implies that very result because intrinsic in that theory is that competition will drive out those operators who are less competitive. The only alternative, then, is to assume that all unregulated generation firms will be nearly perfectly efficient and operating in a nearly perfectly efficient market—an unlikely assumption.[93]

Also, the matter of concern over the inconvenience to the public, and the unnecessary environmental degradation as well, that can result from such duplication is given short shrift. What will happen to electric generation businesses who cannot meet the assumption of economic perfection? Who will pay for the waste of capital and the unnecessary and possibly deleterious environmental impacts? In all likelihood it will be

92. E. Kahn, *Structural Evolution in the Electric Utility Industry*, 125 No.1 Pub. Utils. Fort. 9 (1990).

93. Blake, *Examining the Dark Side of Competition*, Pub. Utils. Fort. 25 (Dec. 1990).

the general public by means of reregulation, nationalization or municipalization.

5. Excess Capacity

Excess electric generation capacity has attracted much regulatory attention in the sections of the country where it exists. How that excess capacity came about and how it can be dealt with under the regulatory compact needs also to be explored.

One reason for the current capacity excesses is faulty forecasts for the future demand for electricity, which forecasts were made in the 1970s. There are two relevant aspects to the matter of the electricity demand forecasts of the late 1970s. They are the nature of the forecasting that was later found to be problematic, and, a traditional form of regulatory response to that problem.

The need for electric generating capacity had grown at a rate of nearly eight percent during the 1960s and at nearly seven percent in the early 1970s. Electric utilities were still projecting demand growth at between five and six percent in the late 1970s, although experienced growth rates were already declining rapidly. Installed generating capacity was increased significantly as a result of plant construction that was begun during the 1970s, but no new nuclear plants have been ordered since 1978, and most that were ordered are now completed and in service. A critical factor affecting the decision to build new base station generation, nuclear or otherwise, is the fact that the lead time from the decision to construct and actual operation can be ten years or more.[94]

Regarding the nature and methodology used in the forecasts back in the 1970s, it is interesting to note that the then new field of "econometrics" came into prominence in the early years of that decade. Econometrics, or the application of mathematical and statistical methods to economic modeling, was the supporting methodology for many of the utility load forecasts of the era.[95]

Another way of looking at the problem of demand forecasting is to recognize that the new and very mathematically complex and computer-supported econometric forecasts represented a picture of the future which was difficult for anyone to refute. When the forecasts proved to be wrong, it is arguable that the problematic outcome was not the fault of the analyses, but rather because the real world markets refused to cooperate with the myriad assumptions inherent in the forecasting methodology.[96]

94. C. Studness, *The Electric Utilities During the 1970s and 1980s*, 125 No. 4 Pub. Utils. Fort. 40 (1990); M. Yokell, *The Decline and Fall of the Regulated Electric Utility Industry*, 125 Pub. Utils. Fort. (1990).

95. Hudson, *supra* note 7, at 11.

96. Miller, *supra* note 16, at 107.

Even the United States Supreme Court had to deal with the matter of the advancing technology of analysis as early as the 1940s when it said, in Colorado Interstate Gas Company v. the Federal Power Commission that "[a]llocation of costs is not a matter for the slide rule. It involves judgment on a myriad of facts. It has no claim to an exact science."[97]

The slide rule of that era was not nearly as intimidating as the computer of today to those not intimately familiar with either. Of course, with respect to forecasting demand for electricity, it is true that the demand decreased at a rate that hardly anyone expected anyway, whether the basis for their speculation was complex econometrics or just the seat of the pants.[98]

Excess capacity also has to do with the regulatory compact and the compact affects the matter of regulatory response to the problem. The regulatory compact sets up an ongoing and mutual relationship between the utilities and their consumers. It cannot be treated as a fair weather agreement by either party, or more importantly, by the regulators who are the caretaker of the regulatory compact.

The initial regulatory determination must be whether or not the forecasts and the utility management decisions, from which resulted the now excess capacity, were made in good faith and with the use of the prudent wisdom and judgment of the time when the decisions were made. If, for instance, it cannot be proven that the decisions were imprudent and an abuse of discretion by the utilities when they were made, a commission cannot then inject its current judgment as a substitute for the prior judgment of the utility executives and directors.

The regulator must, however, under the regulatory compact, employ its impartial and knowledgeable judgment to reasonably allocate the resultant costs of excess capacity between the investors in the utility and the customers. Neither will be satisfied, but neither can expect fair weather treatment in such instances—they must somehow each be treated by the regulator as evenhandedly as possible in such a manner that they fairly share the bad with the good. The customers cannot expect perfection from the utilities that serve them and the utility investors cannot expect to benefit from unsatisfactory outcomes even when the cause was neither improper or imprudent on their part. Again, history never did tell us that the regulation of utilities was supposed to be easy. It is never likely that some realistic magic formula will pop up to avoid the need for difficult, and frequently uncomfortable, informed and impartial judgment by utility regulators.

97. Colorado Interstate Gas Co. v. Fed. Power Comm'n, 324 U.S. 581 (1945).

98. Hudson, *supra* note 7, at 5, 15, 16, 23, 41; K. Nagatani, Political Macroeconomics 76, 77 (1989).

6. An Unintended Combination & Conflict; Social versus Economic Regulation

It is now recognized that there will be the need for the development of significant new electric generating capacity beginning in the 1990s. Along with that recognition there has been much concern expressed over the problems that arose out of the development of new generating capacity during the 1970s and early 1980s. Again, the utility regulatory process has been blamed as a major cause for the problem. As a result, there have been many proposals for structural changes in the regulatory process combined with organizational changes for the industry, nearly all of which involve the deregulation of all or portions of the electric utility industry.

A part of the regulatory process component of the problem may have been to a great extent brought about by a well meaning but unintentionally problematic change in the regulatory process. During the late 1960s and over the next ten years or so, the purpose and application of the CCN was amended so as to provide for more efficient and timely "one stop shopping" for government approval of new generating and transmission capacity.

That goal was certainly admirable, but a probably inadvertent outcome of the amended approval process was the mixing of the economic regulatory function of the CCN with social regulation functions. Utility economic and rate regulation is economic, not social regulation. Economic regulation as applied to utilities has to do with market entry control and utility commodity pricing. Social regulation, on the other hand, has to do directly with the public safety, public health, and the environment. This mixing of different regulatory functions led to misunderstandings and difficulty with, in particular, the economic regulatory function.

The attention of the economic regulators was diverted from the primary purposes of the CCN and its critical nature in the process for which it was originally created. The name for the product of the amended regulatory approval process was still the CCN, but its function was radically changed. It became a common perception that the granting of a CCN was a licensing procedure rather that its originally intended market entry control function.

The primary purpose for the economic regulation of public utilities is the protection of the public interest from potential monopolistic abuses. Social regulation in this context involves health, safety, environmental regulation and location control for generating and transmission facilities. The public utility laws, however, were amended to include health, safety and environmental regulation as extensions of the historical requirements associated with the CCN, hence, the mixing of regulatory functions. This mixing usually provided for no particular recognition of the fact that a

particular facility could satisfy all health, safety and environmental concerns while failing to meet the traditional economic regulatory standards, and vice-versa.

With respect to electric generating and transmission facilities, the five original purposes as previously identified herein for the CCN can be related as follows:

> (1) The threshold market entry purpose is usually not applicable in consideration of new electric generating or transmission facilities for an already existing and certified utility.
>
> (2) The matter of duplication and economic waste with respect to generating plants can be applicable with the development of transmission grids and power pooling along with the potential for alternatives to traditional utility central station electricity generation. This issue does, as well, demonstrate the need for more regional consideration in electric utility planning and in the approval consideration process.
>
> (3) The issue of protection of incursion by other providers of the already certified utility service is usually not particularly applicable because such planned facilities usually do not affect a utility's right to serve in a certified territory and because the facility under consideration will likely be considered in relation to the facilities of others that are already in place, already approved or already under consideration within the existing or planned grid.
>
> (4) The matter of cutthroat competition is one of the principal historical reasons that our regulatory system came into existence. That issue does not surface under traditional regulation, but it may reappear if elements of the industry are deregulated.
>
> (5) The "inconvenience" of duplicative facilities can be logically extended to include the issue of the associated potential for unnecessary environmental degradation. But that particular environmental concern is limited to the matter of duplication—it does *not* include or provide for consideration as to the environmental aspects of where a necessary, and not duplicative, facility should be located.

It is in this fifth area, which now includes the location control of necessary facilities, where the amended laws extended the function of the CCN outside of its intended economic regulatory bounds and created the mixing of regulatory purposes. The most serious outcome of the resulting diversion of purposes was the manner in which the CCN was thought about with respect to the investment associated with the facility under consideration. The CCN was never intended to provide any form of regulatory approval of the amount or even, necessarily, the particular purpose of the utility investment in such facilities. The regulation of securities and rates, which necessarily and structurally include the matter of the propriety of investment by utilities, can only come after, and not

within, the consideration of the CCN. Further, the CCN never was intended to be and can not be a device by which *all* risk is removed from investment decisions made by utilities.

As a result of the mixing of regulatory functions and the resultant diversions, the new hybrid CCN became potentially interpretable by both those in the utility industry and by regulators, to be an approval of investment in addition to the appropriate functions of a CCN. Neither the industry nor the regulators should have allowed this misconception to arise. The electric utility industry, under other circumstances, would not be likely to invite their regulators into their boardrooms as a partner in their investment decisions. To do so is to open the door for ultimate control, not regulation, of the industry by government. Neither would regulators want to so limit their ability to perform their proper functions in the security and rate regulatory aspects of their job. Two wrongs can't be expected to produce a right.

To state the effect of the problem of mixing regulatory functions another way, whereas it may not have been a direct cause of the problems we are facing today, it did contribute to *allowing* the problems to happen. If it came, inadvertently or not, to be believed that a CCN did somehow and should approve the amount and nature of the investment by a utility in a facility, how then could the regulators or other affected parties rationally consider the rate regulatory aspects and impacts of such a facility?

The resulting confusion of purpose contributed to the virtual panic of public and political pressure, and ultimately intervenor pressure in hearings, that was imposed on the regulators to (frequently) entirely disallow associated facility costs. It surely did not tend to provide an atmosphere that would foster coolly and impartially considered regulatory decisions on such difficult matters. Certainly regulation could not function in its intended market surrogate role in rate regulation if it was somehow believed that the utility's investment had already been "approved" in the granting of a CCN for a facility. The confusion may have provided for a regulatory over-reaction of disallowance as a compensation for the perceived "errors" of prior CCN approvals.

The confusion of purposes was also probably contributed to by the fact that many of the amended state laws caused the decision making on CCN approvals for new electric facilities to be "by committee." By that I mean that in many instances the CCN decision was no longer made by the utility economic regulatory agency alone, but included other agencies in the decision making process, which other agencies had no reason to be familiar with the economic regulatory purposes of the CCN. The other agencies participating in the decision were probably, and understandably, primarily concerned with their own provincial interests. The mixing of purposes placed highly specialized environmental concerns as to facility

location into the hands of usually unprepared economic regulators, and, on the other hand, placed economic regulatory concerns, assuming they were recognized at all, into the hands of equally unprepared non-economic social regulators.

7. Prudence Reviews

The subject of prudence reviews, albeit orders of magnitude larger, essentially similar to any other potential disallowance of a utility cost or expense. Review of management actions by regulators after the fact of management action is in accordance with and, in fact, has always been a necessary and primary structural element of the utility regulatory process and the regulatory compact. A principle objective of the economic regulation of utilities by government is to limit cost recovery from ratepayers to prudently incurred costs plus a fair return.

It has been claimed that prudence reviews associated with large investments such as nuclear generating plant construction is new thing and came as a surprise to the industry. The magnitude of expense or investment is irrelevant to the economic regulators obligation to assure that rates only include prudently incurred costs. The fact of prudence review should not have been a surprise to anyone. The tremendous magnitude of investment in such as base station nuclear plants was, however, new to the regulatory process in the 1970s. Until the 1960s, the cost of the development of generating capacity came in much smaller increments and the potential for disallowance was, therefore, much smaller as well.

Larger investments, however, caused the long-standing regulatory obligation for assuring that only prudent costs and expenses be allowed in customer rates to become much more complex, much more difficult, and caused it to attract much more public attention as well. The regulator's job of finding a reasonable and fair balance of treatment of potential disallowance under the regulatory compact became monumental. The regulatory compact requires a long-term view of impacts on utility customers, the investors in the utilities, and the public-at-large that can be affected by such regulatory decisions.

Emphasis must be made on the after the fact nature of regulatory prudence review. If it were to be before the fact, it would not be substitution by the regulator for the market in which the utility's commodity is sold, but rather substitution by the regulator for the function of management. It is utility management's job to operate efficiently and prudently within the existing unregulated and other markets in which a utility procures labor, services, equipment, materials, et cetera. As previously stated here, if it cannot be proven that a utility's decision was imprudent and an abuse of discretion at the time made, a regulatory body cannot properly

later apply its current judgment with twenty-twenty hindsight in support of a prudence disallowance.[99]

There was, however, a critical departure from traditional regulatory practice that accompanied the large disallowances that have and still are occurring associated with major utility generation facility investment. That departure is a shift in the burden of proof from the regulatory staff and intervenors to the utility. Historically, alleged instances of imprudent utility expenditure and investment were introduced into regulatory proceedings either by the regulatory staff or by intervenors. That makes perfect common sense because it is not very likely that a utility would introduce claims of its own imprudence into a proceeding. Once introduced, those parties claiming imprudence bore the burden of proving the imprudence. However, in recent practice, that burden has been shifted to the utility who now bear the primary burden, when such allegations are made by another party, of proving that their actions were not imprudent.[100]

Further, even the definition of imprudence seems to have been shifted as well so that any decision or isolated component of a decision that is less than optimal may be considered imprudent. The shifting of the burden of proof and the shifting of the definition of imprudence created what in practical reality is a self-fulfilling prophecy. Recognizing that investment in electric generation facilities can run into billions of dollars, common sense alone dictates that no utility will be able to prove that no part of their investment was less than optimal and, by that standard, imprudent.[101]

The magnitude of the disallowances associated with prudence reviews during the last decade, especially as it relates to nuclear power generation plants, is noteworthy. There are now 111 nuclear units operating in 33 states which are generating nearly 20 percent of all electricity used in the United States. Eight nuclear generating units are still under construction, but only two of them have projected operating dates. There have been, however, more than 100 cancellations or indefinite deferrals of planned nuclear units since the 1970s and there have been no new nuclear plants ordered since 1978. Of the plants in operation or nearing operation, there have been regulatory prudence disallowance associated with 19 plants. Some $9,922,500,000 has been disallowed of a total investment of $82,876,000,000 which amounts to 12 percent having been disallowed.[102]

99. J. Anderson, *Are Prudence Reviews Necessary,* 127 No.3 Pub. Utils. Fort. 23, 24 (1991).

100. C. Studness, *The Regulatory Compact that Never Was,* 128 No. 5 Pub. Utils. Fort. 34, 35 (1991).

101. *Id.*

102. M. Yates, *Nuclear Energy: A Failed Promise or a Promising Future,* 126 Pub. Utils. Fort. 12 (1990) Anderson, *supra* note 99.

It is the very magnitude of nuclear plant disallowances that has caused the utility industry to become very leery and hesitant about investment in new generating plants. As a result, there is reason for concern about electric generating capacity shortages in some regions of the country during the 1990s.

A prudence review, in the context of a rate proceeding, is an appropriate and necessary expression of the regulatory prerogative and duty to investigate the actions of utility management. It is in its regulatory application, the determination and treatment of the amount of disallowance of costs or expenses found to be imprudent, that the informed and impartial judgment of the regulator in light of the regulatory compact becomes critical. Again, an elusive balance must be achieved so that the purpose and continuity of the regulatory compact is maintained and the job of finding that balance lies with the regulator. As Mr. Paul L. Gioia, former chairman of the New York Public Service Commission, said "[t]he traditional regulatory compact provided great benefits to the public and for that system to work it must be balanced. It cannot be followed when it is beneficial to ratepayers and discarded when it is politically inconvenient."[103]

8. Competitive Bidding

Competitive bidding for the supply of electricity is another example of the rediscovery of the theoretical benefits of competition in and among the providers of utility commodities and services. In general, the same comments are applicable as have been made previously regarding open access natural gas transportation, electric transmission wheeling and the deregulation of electric generation.

The need for more laws and rules in the attempt by government to create another artificial competitive market is questionable. If such a market is artificially created (as was PURPA[104] cogeneration and small power production), how can its operation be said to prove anything regarding economic theory. In fact, it seems entirely contrary to basic theory because the rules (not guidelines) of a government established market are not created by the market itself, but are rather established exogenously by a non-market entity—the government. I again refer to Mr. Leonard S. Hyman who said "if competition comes, it will not be through the radical measures proposed by academics. . . ."[105]

103. P. Gioia, *The Prudence Standard: Recent Experience and Future Relevance*, 123 No. 9 Pub. Utils. Fort. 11, 16 (1989).

104. The Public Utilities Regulatory Policies Act of 1978, Pub. L. No. 95-617.

105. Hyman, *supra* note 30, at 282.

Further, to the extent that it may in some instances make good economic sense for utilities to participate in the markets for electricity associated with the movement toward government initiated competitive bidding in electricity markets, it has never been shown that it is possible to legislate good sense. Nothing now prevents utilities from so participating in such markets if they find it to be advisable and good business to do so.

9. Municipalization

Another current trend, although one not initiated within or by the regulatory community, is the matter of municipalities attempting to use their franchise power regarding utilities to shop for suppliers of electricity or even to take over the ownership and operation of investor owned utility facilities located within a municipality. These actions are frequently referred to as "municipalization" and are similar in concept to the "nationalization" of private enterprise, including utilities, as it occurred in the United Kingdom and France after World War II. This trend can have dramatic effects on the regulatory compact and on the CCN, especially in instances where the municipality makes up only a part of the territory served by the incumbent utility.

Municipalization is an obvious departure from the regulatory compact. There is reason to be concerned that municipalization will be a fair weather departure from the regulatory compact where, in a few years, there would be as much and probably more pressure to return to the traditional regulated monopoly as there is now to take advantage of attractive, but possibly short-run, benefits.

I will employ the State of New Mexico as an example to develop a discussion of the problems associated with municipalization. A number of cities in New Mexico are currently considering municipalization where a portion of an incumbent utility's system would be affected. First, municipalization can destroy the integrity of the CCNs granted by the State of New Mexico through its Public Service Commission (NMPSC) to the currently serving utilities. Second, the value of affected regulated utilities as business entities could be greatly reduced. Third, the remaining customers on the utility systems from which a portion is taken could be adversely affected.

All investor owned utilities in New Mexico must have CCNs which are granted and administered by a State agency, the NMPSC. It is logical to conclude that the NMPSC is obliged to prevent interference by local government entities such as a city into the NMPSC's area of jurisdiction because it is clear that the Legislature in New Mexico vested in the NMPSC the exclusive power to regulate and supervise public utilities,

and that exclusive power includes the CCN for the purpose of market entry control.

The matter of municipalization is further complicated by the fact that utilities, in addition to a CCN, must also obtain a franchise from each local government jurisdiction in which they operate. The New Mexico State Constitution precludes the possibility of the granting of exclusive franchises by local governments. The local franchise only establishes the utility's right to locate its facilities in the streets, alleys and public rights-of-way controlled by the local government. Further, in New Mexico the NMPSC has no regulatory jurisdiction over municipal utilities—NMPSC jurisdiction is, with some specific exceptions, essentially limited to investor owned utilities. In some states the state utility commission has full regulatory jurisdiction over municipal utilities and other states the state utility commission at least has jurisdiction over CCN territorial matters including municipal utilities.

Even recognizing the state constitution's preclusion of exclusive local government franchises, the matter of the effect of the CCN as regards the value of the rights and privileges granted thereby cannot be ignored. An investor owned utility has, through the CCN granted by the state, been granted a vested property right and that such property right could not be usurped by a governmental entity without payment of just compensation. Such an action would amount to a taking for public use without compensation in violation of both the federal and state constitutions.

Further, should a municipality be able to take such utility property, it would result in the use of such authority as a governmental unit to place itself in a position where it could pick and choose among the state certified utility company's lawful customers and territories which would constitute "cream skimming" or "cherry picking" of the lawfully certified customers and certified territory of an investor owned utility by a municipality. Such a taking by a municipality of certified utility territory, even when such territory is located within the boundaries of the municipality, would be improper without just compensation. The same applies to instances where a municipality currently operating a municipal utility annexes territory being served by an investor owned utility. The serving investor owned utility has a state-granted CCN and the act of annexation by a municipality does not void that CCN and its associated property right.

Also, the policy of the State of New Mexico, as expressed in its Public Utility Act (NMPUA), is to avoid unnecessary duplication and economic waste among utilities when it is stated in the Declaration of Policy in the NMPUA that:

> . . . to the end that capital and investment may be encouraged and attracted so as to provide for the construction, development and

> extension, *without unnecessary duplication and economic waste*, of proper plants and facilities for the rendition of service to the general public and to industry. (emphasis added)[106]

Although the NMPSC has no jurisdiction over municipal utilities, it would be illogical and contrary to the stated policy of the State if the preclusion of unnecessary duplication and economic waste among utilities were not to be somehow applicable to all utilities, including municipal utilities as well as to investor owned utilities. Particularly in the case of a threat to the CCN of an NMPSC regulated utility, it would seem, then, that the NMPSC must be obliged to pursue whatever action available to it to maintain that State policy, even to the extent of challenging the actions of non-jurisdictional utilities when that policy would be subverted thereby.

A principal historical reason that CCNs exist is to protect an incumbent utility's investment as well as that needed for the future. The investors in the certified serving utilities did rely on and have the right to rely on the condition of and on the exertion of NMPSC authority. The affected utility's economic future, represented by its growth potential, must necessarily include its entire territory as certified by the NMPSC. Should a city take some of a serving utility's certified territory, particularly without the NMPSC having exercised its obligation to protect the CCN they granted, the investor's reliance on the authority of the NMPSC would be adversely affected. The NMPUA, again in its Declaration of Policy, states that "[i]t is the declared policy of the state that the public interest, the interest of consumers and the interest of investors require the regulation and supervision of such public utilities. . . ."[107]

Also, should it result that a certified serving utility does lose certified territory as a result of a taking by a city, there could be adverse effects on the remaining ratepayers of the currently serving utility. A critical and long standing element of utility rate regulation is that the investors in a utility must be assured of an allowed rate of return at least equal to that earned by enterprises of similar risk. The loss of a portion of certified territory will go to increase the perceived risk (by way of lost growth potential) of its current and future investors thereby increasing the cost of the utility's capital and its customer rates. The cost of capital is an element of the cost of utility service which is covered by the payment of rates by its customers.

Finally, should a city take any of a utility's certified territory, it should not be able to do so without compensating the utility for the value of any

106. N.M. Stat. Ann. § 62-3-1(B) (1978).
107. N.M. Stat. Ann. § 62-3-1(B) (1978).

affected land, property, plant, equipment, rights and lost earnings associated with the territory lost. Even when it is as yet undeveloped, such territory represents to the certified utility future earnings when it is developed and the utility exercises its CCN right to provide utility service to the area.

As a minimum, a city so taking a utility's property or property rights must have the burden to fairly compensate the utility for the present value of the loss of all reasonably expected future earnings. That compensation must reflect not only the specific lost earnings in the territory specifically taken, but also the impacts of the remaining utility system including any land, plant, equipment and rights adversely affected by the taking. To reiterate, just compensation does not include simply the fair market value of the specific property taken within the municipality, it is rather the difference between the fair market value of the entire utility system before and after the taking, including all severance effects and consequential damages. Without just compensation, there would be adverse effects on both the customers of and the investors in the affected utility. Just compensation in the instance of such a municipal taking must result in the utility's customers and investors being indifferent to the taking.

In addition, any claim that municipal utility services will necessarily be cheaper than the same services provided by an investor owned utility may not true. Such claims are usually based on three elements; lower taxes, lower debt costs, and no profit requirement for municipal utilities.

With respect to taxes, such a claim can only rely on income taxes. Plain common sense dictates that a municipality is not going to give up local taxes when it acquires or operates a utility in lieu of a privately owned, and taxable, utility. In fact one almost always finds a line item in a municipal utility's cost of service entitled "in lieu of taxes." That line item provides for the collection of "lost taxability" from the municipal utility's consumers for such as ad valorem and other local taxes. It even makes sense to do so—if such municipal revenue should be collected from utility consumers, it shouldn't matter who owns or operates the utility.

Municipal utilities do not pay income taxes. However, there is also a broader issue that affects the matter of avoidance of income tax in such as an instance where a municipality takes over the operation of an income tax paying utility. The argument that the tax won't be paid by the municipality associated with its utility operations is factual, but it is essentially provincial and usually ignores that fact the true outcome is that a different ox winds up getting gored. To sum the issue up simplistically, somebody's going to have to come up with the avoided income tax revenue for the government, state and federal. The government's requirement for

income tax revenue doesn't go away, it just gets shifted to someone else—and it may get shifted to the wrong taxpayers.

With regard to lower debt costs, municipalities may, under certain circumstances, have access to tax-free debt instruments. It is not necessarily true, however, that the ultimate debt service cost of municipalities as it affects the rates paid by its utility consumers will result in lower rates than would result for a privately owned utility. It is dependent on many factors such as the relative financial rating of the entities, the market at the time of issue, the indenture requirements of the debt issues, the accounting conventions used, the rate development analyses employed, and other policies of the entities.

As to the profit requirement, sometimes a rose by another name will smell just as sweet. In an article in a recent issue of "Public Power" which is the journal of the American Public Power Association (APPA) it is stated that "[i]t is generally accepted that it is appropriate to transfer a portion of utility revenues to the municipal general fund. . . ." The APPA is the national association of municipal electric utilities. The article goes on to state that "most agree that the owners of a utility are entitled to a fair and reasonable return on investment . . . (and that) . . . the general fund transfer can be viewed as a dividend to the municipal owners." Dividends to the owners of an enterprise can only come from profits generated by the enterprise. Therefore, although it may at first blush appear otherwise, municipal utilities also have an incentive to earn a profit on their investment in utility plants.[108]

It is not uncommon that ordinances creating municipal utilities include a requirement that the utility generate enough revenue to pass on a certain amount or percentage to the general fund of the municipality each year. The result is simply profit by another name. In many instances the same result comes about without a requirement therefor in an ordinance. When such utility generated revenue is passed on to a municipality's general fund, it can be used for all manner of non-utility purposes. It becomes, in effect, a substitute for taxation and a hidden tax.

When a municipal utility does, whether by ordinance, by design, or by accident, generate more in utility revenues than its cost of providing utility service, it is an unlikely circumstance that such excess would be returned to the municipal utility consumers—it is transferred to the general fund of the municipality—again, profit by another name. Further, municipal utility rate, line extension and expansion cost policies are more likely to include cross-subsidizations than are privately owned utilities

108. C. Revell, *General Fund Transfers—Are There Limits?*, 48 Pub. Power 16 (1990).

because state utility regulatory laws require that investor owned utility rates and charges be cost based.

A conclusion that municipal electricity customers will pay lower rates if a city should develop a municipal electric utility to replace a portion of an investor owned utility is questionable even by applying common sense to the circumstance of the separation of a small piece of an operating utility to be operated as a separate entity. Considering the basic components of the cost of providing electric utility service, it is reasonable to conclude that it would be very difficult for a new utility formed by taking over a small portion of a much larger incumbent utility's operation to achieve any savings. The incumbent utility's system plant costs and investments are the blended result of plant and operating systems that were installed in prior years. It is unreasonable to assume that the incumbent would sell those assets for their book value without any incentive in the form of an appropriate premium over that book value. The ownership related costs of any such new municipal utility acquiring another utility's system or a portion thereof, then, will be higher than the same costs for the incumbent utility. The same would apply if the new utility chose to build its own new distribution system rather than acquire facilities from the incumbent utility. The new facilities, which would be entirely funded by debt, would cost more than the blended historical book value of the incumbent utility's facilities that are being replaced, and that would be compounded by the debt service thereon.

With respect to operating costs, consideration of economies of scale also make it unlikely that a new utility taking over a portion of an incumbent utility's system will be able to operate the acquired smaller portion of the system at a lower cost. There will unavoidably be some duplicative basic managerial, supervisory, administrative, physical infrastructure, and operating costs associated with the operation of the new smaller utility. That being the case, it is likely that the new utility's system operating costs would be higher than the incumbent's.

In such a case, the greatest potential for savings to the customers of the new smaller utility must arise from lower system input power costs. However, even if lower input power costs could be achieved, that lowering of cost must be of sufficient magnitude to overcome any increases in cost potentially incurred for the ownership and operation of the basic distribution system, transmission facilities and interconnections, and other physical infrastructure and administrative operations. Therefore, even a lowered input power cost cannot, alone and without significant further economies, assure lower rates to a new utility taking over a portion of an incumbent utility's system.

The same applies whether the new smaller utility's input power costs arise from the purchase of wholesale power or if the new utility chooses

to install its own generating facilities. In the case of new generating facilities, the cost of the achievement of adequate interconnection facilities for the market sale of surplus generated power and the cost of providing for back-up and emergency power supplies for purposes of reliability must be accounted for. Regarding the potential for development of "QF" status cogeneration facilities under the Public Utilities Regulatory Policy Act of 1978 (PURPA), the costs associated with the possible need to develop a thermal host facility must be considered and factored into both the direct utility and overall project cost.

Another argument frequently heard in favor of municipal utilities is that a local city council can do a better and more responsive job for its citizens than can a state level utility regulatory commission. The supporting concept is generally expressed by the claim a municipal utility is self-regulated by its city council. Exploration of that notion, however, generates significant questions.

Again, it must be remembered that some of the principal reasons for the establishment of the institution of state utility regulatory commissions shortly after the turn of this century involved problems with municipal regulation of utilities. One of those reasons was that there was usually inadequate expertise in complex utility financial matters available within municipal governments. The United States Supreme Court decision in Smyth v. Ames in 1898 stated that the determination of proper compensation for utilities ". . . could be more easily determined by a Commission composed of persons whose special skill, operation and experience qualifies them to handle so great problems. . . ."[109] The NMPSC deals with utility problems every day and it is reasonable to assume that the Commissioners and staff will, in the main and over the long haul of time, be better prepared to make fair and reasonable decisions on utility related matters than will any city council who only deals with such matters occasionally.

Another comparison between municipal utilities controlled only by the city council and state regulated investor owned utilities has to do with the potential for the shifting of risk in the case of imprudent management. There is no reason to assume, to begin with, that lesser experienced municipal officials can do a better job of either managing or regulating a utility operation than can, respectively, professional investor owned utility managers or state public utility regulators. But, assuming the instance of an imprudent action in the management of a utility, the potential for the shifting of risk for such imprudence away from the ratepayers is significantly different in the case of a municipal utility.

109. Smyth v. Ames, 169 U.S. 466 (1898).

In the case of a state regulated investor owned utility, there is the potential that the state regulator will shift at least some of the risk of imprudent management from the ratepayer to the shareholders in an investor owned utility. In the case of a municipal utility, on the other hand, there are no shareholders, investors, or anyone else to shift such risk to—the municipal ratepayers are stuck with it. Municipal utility ratepayers may be able to vote imprudent decisionmakers out of office, but even that does not provide them any relief as regards the fact that the risk of imprudent management cannot be transferred away—the municipal ratepayers will still be saddled in their utility bills with the effect of any imprudent management by a municipal utility.

It is interesting to note that municipal franchise problems are not entirely a new consideration in utility regulation. In 1905 the National Civic Federation, an organization of business and labor leaders and independent reformers, published papers indicating that it was desirable to have the locus of utility regulatory power shifted from the local municipal level to the state level because local officials, using franchise powers, could "blackmail" the utilities into accepting unjust terms. Another reason given was the need to reduce the intrusion of party politics into utility regulation.[110]

This situation of varying benefit and disbenefit among the affected parties relates to the regulatory compact, for which the state regulatory commission, not the city government, is the responsible administrator. The state commission is statutorily charged with looking out for the interest of all of the customers of the utilities they regulate and also for the general public interest and for the interest of the investors in the utility as well. The ultimate questions associated with municipalization must, then, be answered at the state, not the municipal level, which is something history has already taught us in any case. Can a commission allow the customers of a city to obtain benefits at the expense of all of the other customers of the utility and of the investors in the utility as well? Whereas such an outcome might not be counter to classical economic theory, it is counter to a significant component of the public interest justification for the regulation of utilities.

10. Affiliate Transactions

Another problematic trend in regulatory practice has to do with situations where a utility is involved in transactions with affiliated businesses or individuals. There is a trend among regulators to, in effect, consider unregulated affiliates of utilities to be one and the same business entity

110. Jones, *supra* note 53, at 453.

with the utility and, as a result, to apply regulatory principles of economic regulation to the services, products, labor, equipment, et cetera of the unregulated affiliates. This is an example of regulators extending their market substitution function and duty beyond the market for the utility commodity within the utility's certified territory.

The regulatory determination should be whether or not the utility management decision to purchase whatever it might have purchased from the affiliate was made in good faith and with the use of prudent wisdom and judgment at the time when the decision was made. The determination, then, is similar to the concepts previously expressed with regard to load forecasts in the section on excess capacity and with respect to regulatory disallowance of utility costs and expenses. If it cannot be proven that the decision to purchase something from an affiliate was imprudent and an abuse of discretion by the utility—if it cannot be shown that the price paid was not reasonable as regards the market for the particular commodity—a commission cannot then employ its current judgment as a substitute for the prior judgment of the utility's management.

It is certainly tempting to simply extend regulatory jurisdiction to the unregulated affiliates of utilities—it would appear to be simpler and easier to administer. But caution must be exercised to avoid the proliferation of unnecessary regulation and government interference into markets that are already competitive and require no additional government interference to protect the public interest. This goes back to the notion that history never did tell us that the regulation of utilities was supposed to be easy.

The regulator must, under the regulatory compact, employ its impartial and knowledgeable judgment, however difficult, and, assuming that the record in the case provides adequate substantial evidence, determine if all or certain portions of such costs and expenses should be disallowed for the purposes of setting fair, just, and reasonable rates.

The process described is, and must be, the same as that previously described in the section on disallowance—and no more. To do otherwise would be an interference by the government regulator into an unregulated market to the unfair disadvantage of the utility affiliate. Further, to do otherwise could result in confiscation of the affiliate's property. Utilities have no special rights to the property and commodities belonging to their unregulated affiliates or to their owners.

There may be found in actual practice circumstances where no identifiable competitive market exists with respect to a particular utility transaction. In such an instance the regulators must do everything within their power to maintain the critical policy of non-interference with unregulated competitive markets. Their decision in such an instance must unavoidably be based on their just and reasonable judgment. But, since regulatory orders are an integral part of the process of providing signals to those

they regulate, the order in such a case should clearly indicate that the decision was purely judgmental because no applicable competitive market could be identified and the order should re-state the policy of non-interference with transactions within existing competitive markets.

11. Integrated Resource Planning

Integrated resource planning (IRP) and least cost planning (LCP), which is essentially a synonym of IRP, are among the newest of the many utility regulatory "buzzwords" that came into being over the last few years. Inextricably associated with IRP and LCP are demand side management (DSM) and supply side management (SSM). IRP and LCP in plain English simply mean that utility managers ought to plan in the most effective manner so as to maximize the efficiency and cost-effectiveness of utility operations. It amounts to placing a label on common sense—one should certainly not expect managers of any business, utility or otherwise, to operate in any other manner. Clearly, then, the intent and purpose of IRP and LCP are within the prerogative of the management as to how those goals and objectives are to be achieved.

Currently, however, many state regulatory agencies around the country either have or are considering the development of rules and regulations frequently requiring that utilities in some manner prepare, file for regulatory approval, and thereafter comply with IRP, LCP, DSM and SSM plans. The likely result of such regulatory action is pre-approval of utility management actions which will result in self-capture by the regulatory agency. Once a regulatory agency gives its imprimatur to a utility management action or plan for action before the fact, the regulator is captured with respect to that action because, if a utility carefully complies with the management plan approved by the regulator, the regulator cannot, should the plan not perform as expected, make a case in an ensuing rate proceeding that the utility management was imprudent. The utility will have done as it was told or ordered by the regulatory agency.

A related buzzword in current use in regulatory practice associated with IRP, and many other regulatory activities as well, is the expression of the need for regulators to be "proactive." It is most productive for regulators to be proactive in the sense of causing themselves to be well informed and "on top" of matters that are and will be issues in cases that will come before them. However, regulatory pro-activity can be counterproductive if it extends to not only becoming well-informed but also includes the regulatory agency in any way participating in the process of utility management before the fact of utility management action.

The existing regulatory process already includes all of the elements needed to achieve the goals of IRP and LCP. The well-established regulatory process of assessing the prudence (which is not synonymous with

optimization) of utility management action in a fair and reasonable manner in rate proceedings can achieve those goals in the manner most appropriate and prudent for the regulator. The problem that regulators are trying to deal with by being pro-active in IRP and LCP stems from the issues that have arisen from regulatory prudence actions taken, in particular, in the case of nuclear generating plant development. It is felt by many that if the regulators would have somehow participated in nuclear plant decisions, they could have avoided the need to make decisions after the fact as to the prudence of the decisions. However, as previously discussed, the problems with nuclear plant prudence decisions were not necessarily caused by the traditional regulatory process itself, but rather by the manner in which it was employed.

Further, there is not and was not any reason to assume or conclude that regulators would be in a position to assure better decisionmaking than are the utility managers. The only source of information for the regulators and the utility managers (or anyone else for that matter) upon which to make a before-the-fact decision is the utility industry. There is no reason to assume that regulators will make better utility management decisions than will the utility managers themselves. Further, as previously stated, once a regulator has either made or participated in a utility management decision, the result is self-capture by the agency causing the regulator's hands to be tied when the time comes to make an after-the-fact decision as to the prudency of the decision. Some have proposed a process or sequenced or "rolling" regulatory approvals and prudence reviews, but the same self-capture will occur at any point in time that a regulator might take such an action where they have in any manner formally blessed a utility management action before-the-fact. The only difference is that the self-capture would occur in smaller increments.

The nature of the judgments required of utility regulators in today's world are extremely complex and difficult. Regulatory rules and regulations that result in direct governance of utility actions are not the answer. Fairness and reasonableness in regulatory decisionmaking based on complete and well considered information within the traditional regulatory process still remains the best solution. That is why, going all the way back to the Smyth v. Ames case which was decided in 1898, the Supreme Court said that such difficult matters involving utilities ". . . could be more easily determined by a Commission composed of persons whose special skill, operation and experience qualifies them to handle so great problems. . . ."[111]

Things really haven't changed in that regard for nearly a century nor are they likely to change in the foreseeable future. As former General

111. Smyth v. Ames, 169 U.S. 466 (1898).

Counsel for the New York Public Service Commission Kent H. Brown wrote in 1955 with respect to the operation of the provisions of public service law; "The fundamental standards—justness and reasonableness—are as appropriate today as they were fifty years ago."—and I believe they are still appropriate today.[112] Those common sense standards must be applied by common sense regulators who are fully informed and able to sort out the factual circumstances, theoretical economic principles, technical matters, and, most importantly, the public interest aspects of the issues before them, all in the perspective of our history and the regulatory compact.

All of the areas of current regulatory practice discussed are examples of where there has been or there is under consideration movement away from traditional regulation under the regulatory compact.

IV. CONCLUSIONS

If the regulatory trends discussed herein continue unchecked, we may not have available in the future the same level of safe, adequate, reliable, and reasonably priced utility service that has so far provided so much necessary support for the growth and health of our total economy and our personal standard of living.

The basic thrust of current regulatory reform is to replace regulation to the very greatest extent possible with competition. However, the intended purpose, function and method of our regulatory process seems to be imperfectly understood by some of the current reformers. For instance, it is frequently claimed that regulators are two-faced because they both regulate and protect the utilities. This conclusion is easily reached, but it is logically inadequate and incomplete.

Regulation by government necessarily requires the taking away of rights from the utility business being regulated which then requires concomitant obligations by the government. Therefore, regulation and protection are inextricably linked. To do otherwise would be blatantly unfair. Further, the abrogation of the regulatory compact which provides for the protection by its husbandmen, the regulators, is frequently claimed as the underlying reason for the criticism of regulation. Such criticism, then, is an example of illogical and circular reasoning. In fact, the imperfection of regulation during, in particular, the last two decades is the primary justification expressed for deregulating or partially deregulating the utility industry. It is further argued that utilities are less monopolistic than they were and that they are certainly no longer a natural monopoly. In fact, what is being concluded is that utilities are not perfect monopolies and certainly

112. Priest, *supra* note 51, at 31.

not perfect natural monopolies. That is another easy conclusion to reach—utilities have never been perfect in any regard including their monopoly nature—but they are still and in the foreseeable future they still will be monopolistic and history tells us that even after deregulation they will most likely return toward a monopolistic structure—which will also most likely be imperfect. Any justification assuming failure based upon the expectation of perfection is a self-fulfilling prophecy, but common sense says it is also probably wrong.

However, the proposed deregulation does not mean that there will no longer be economic regulation by government, even of the deregulated utility industries or portions thereof. Government will always have to be the establisher of guidelines for such induced competition and, as well, will undoubtedly have to intervene directly in order to assure the maintenance of workable competitive forces.

A longtime criticism of utility regulation in the United States is the matter of capture of the regulators by the industry. Capture is thought to occur when there is undue influence exerted by the regulated industry on the government regulators. Such undue influence can occur as a result of either the intentional or unintentional co-option of the regulators by the regulated. It can also result from industry control of the data and information provided by the industry to its regulators.

The ultimate effect of capture, whatever the reasons therefor, is a convergence of the interest of the industry with the interest that is the intended responsibility of the regulator—the public interest. That convergence is not necessarily a bad thing. It is possible that the two interests could truly converge and everyone would benefit as a result. Of course, the opposite can occur should there be improper convergence. But whatever the case, concerns regarding capture cannot be a true justification for any of the proposed schemes of deregulation because government intervention, and therefore the potential for capture, will exist both before and after deregulation.

Current actions moving toward partial and possibly complete deregulation are based primarily on the classical economic theory of competition and the associated premise that the public interest will be as well or better served by replacing government regulation of utilities by the government arranging instead for what is hoped to be self-regulating competition. A major problem stems from the need to use the word "arranging." Such government arranged competition cannot be Adam Smith's "invisible hand" of competition. It can better be described as some sort of robotic device invented, and probably frequently reinvented, by the government. It would seem reasonable, then, to question just how perfect or even workable such government arranged and controlled competition can be.

The word competition has become the rallying cry of the movement to deregulate our utilities—and with respect to the grand majority of our business and industrial economy, well it should. It seems, however, to go unrecognized, or at least unstated, that the competition being put forward for utilities is not the classical model of competition where there is free and easy entry and numerous market participants—i.e., the atomistic competition envisioned by Adam Smith. Mr. Joseph C. Swidler, former Chairman of the Federal Power Commission and the New York Public Service Commission, said in a recent article that "Adam Smith himself, if he were with us today, would be puzzled by the concept of applying open market doctrine to electric utilities."[113] Also, with respect to our utilities, how can we know, especially considering the history of our utilities, that any competition that may result will be of a positive nature?

Finally, and most importantly, the elemental reason for regulation of any business by government, utility or otherwise, is the public interest, and it has been so since the time of Lord Chief Justice Hale over 300 years ago. Boiled down to reality, economic theory, including that of self-regulating competition, is just one mechanism by which the protection of the public interest is sometimes achieved. It cannot be the end-all and be-all of the formation of public policy in this most critical area. The regulatory compact under which our utilities have operated never could be and never will be able to be reduced to a quasi-scientific system of plug-in formulas or theories that do not require frequently very difficult and controversial informed judgment by the makers and implementers of public policy.

This reasoning brings us again to the conclusion that the current choice for our utilities is truly between imperfect regulation and imperfect competition. Basic logic, however, tells that whereas the justifications for utility deregulation being generally put forth may be necessary elements of analysis, they have not been shown to be sufficient to support the conclusion.

The utility industry affects each of us every day of our lives including both our home lives and our working lives. If we are going to change the structure of the utility industry, through deregulation or whatever, we must have reasons both clearly necessary and sufficient to do so. Current regulatory trends appear to be a combination of risky cut-and-try experimentation and a repeat of the failed policies of the not so distant past. Further, there seems to be little consideration given to a workable path for retreat if the experiments fail.

113. J. Swidler, *An Unthinkably Horrible Situation*, 128 Pub. Utils. Fort. 14 (1991).

The policymakers in the regulatory community, the state legislatures, the Congress and the courts, as well as those in the utility industry, must always consider changes in the utility regulatory process in the light of our history. Most critically, all such changes must recognize the regulatory compact which is the ultimate expression and result of the history and development of our unique utility regulatory system. It should be remembered that history is not a dead issue—it tends to repeat itself.