Distribution Category UC-95d

MASTER

COMMUNITY ENERGY SYSTEMS
AND THE LAW OF PUBLIC UTILITIES

Volume Fifty

WEST VIRGINIA

Final Report of
A Study of the Impacts of Regulations
Affecting the Acceptance of
Integrated Community Energy Systems

DUANE A. FEURER

CLIFFORD L. WEAVER

Program Managers

KEVIN J. RIELLEY

KEVIN C. GALLAGHER

SUSAN B. HARMON

DAVID T. HEJNA

Professor Edmund W. Kitch, Consultant

January, 1981

ROSS, HARDIES, O'KEEFE, BABCOCK & PARSONS
One IBM Plaza, Suite 3100
Chicago, Illinois 60611
Telephone: (312) 467-9300

Prepared For

UNITED STATES DEPARTMENT OF ENERGY

Division of Buildings and Community Systems
under Contract No. DE-AC02-78CS20289

This report was prepared as an account of work sponsored by an agency of the United States Government. Neither the United States nor any agency thereof, nor any of their employees, makes any warranty, expressed or implied, or assumes any legal liability or responsibility for any third party's use or the results of such use of any information, apparatus, product, or process disclosed in this report, or represents that its use by such third party would not infringe privately owned rights.

DISCLAIMER

This book was prepared as an account of work sponsored by an agency of the United States Government. Neither the United States Government nor any agency thereof, nor any of their employees, makes any warranty, express or implied, or assumes any legal liability or responsibility for the accuracy, completeness, or usefulness of any information, apparatus, product, or process disclosed, or represents that its use would not infringe privately owned rights. Reference herein to any specific commercial product, process, or service by trade name, trademark, manufacturer, or otherwise, does not necessarily constitute or imply its endorsement, recommendation, or favoring by the United States Government or any agency thereof. The views and opinions of authors expressed herein do not necessarily state or reflect those of the United States Government or any agency thereof.

DISTRIBUTION OF THIS DOCUMENT IS UNLIMITED

MGW

DISCLAIMER

This report was prepared as an account of work sponsored by an agency of the United States Government. Neither the United States Government nor any agency Thereof, nor any of their employees, makes any warranty, express or implied, or assumes any legal liability or responsibility for the accuracy, completeness, or usefulness of any information, apparatus, product, or process disclosed, or represents that its use would not infringe privately owned rights. Reference herein to any specific commercial product, process, or service by trade name, trademark, manufacturer, or otherwise does not necessarily constitute or imply its endorsement, recommendation, or favoring by the United States Government or any agency thereof. The views and opinions of authors expressed herein do not necessarily state or reflect those of the United States Government or any agency thereof.

DISCLAIMER

Portions of this document may be illegible in electronic image products. Images are produced from the best available original document.

TABLE OF CONTENTS

	<u>Page</u>
ABSTRACT	
PREFACE	i
ACKNOWLEDGEMENTS	vi
CHAPTER 1: EXECUTIVE SUMMARY	1
CHAPTER 2: REGULATION OF PUBLIC UTILITIES	7
Footnotes	16
CHAPTER 3: SITING OF ENERGY FACILITIES	18
Footnotes	22
CHAPTER 4: FRANCHISING OF PUBLIC UTILITIES	23
Footnotes	28
CHAPTER 5: REGULATION OF PUBLIC UTILITY RATES.	29
Footnotes	49
CHAPTER 6: SUMMARY OF IMPEDIMENTS TO IMPLEMENTATION OF ICES	53
CHAPTER 7: OVERCOMING IMPEDIMENTS TO ICES -- A SUMMARY	62

ABSTRACT

This report contains a detailed description of the laws and programs of the State of West Virginia governing the regulation of public energy utilities, the siting of energy generating and transmission facilities, the municipal franchising of public energy utilities, and the prescription of rates to be charged by utilities including attendant problems of cost allocations, rate base and operating expense determinations and rate of return allowances. These laws and programs are analyzed to identify impediments which they may present to the implementation of Integrated Community Energy Systems (ICES). This report is one of fifty-one separate volumes which describe such regulatory programs at the federal level and in each state as background to the report entitled "Community Energy Systems and the Law of Public Utilities -- Volume One: An Overview." This report also contains a summary of a strategy described in Volume One -- An Overview for overcoming these impediments by working within the existing regulatory framework and by making changes in the regulatory programs to enhance the likelihood of ICES implementation.

PREFACE

One response to current concerns about the adequacy of the nation's energy supplies, in addition to reducing consumption of energy, is to make more efficient use of existing energy resources. The United States Department of Energy (DOE) has funded research, development and demonstration programs to determine the feasibility of applying proven cogeneration technologies in centralized energy systems, known as Integrated Community Energy Systems (ICES), to provide heating, cooling and electrical services to entire communities in an energy conserving and economic manner.

The relevant "community" which will be appropriate for ICES development will typically consist of a combination of existing or potential energy "wasters" -- i.e., installations with large energy conversion facilities which, when operated in a conventional manner, exhaust usable amounts of waste heat or mechanical energy -- and existing and potential energy users -- i.e., industrial, commercial, institutional or residential structures which obtain electricity and gas from a traditional central utility and convert part of it on site to space heating and cooling purposes.

In most current applications, energy conversion facilities burn fuels such as coal, oil or natural gas to produce a

single energy stream such as process steam or electricity for various industrial processes or for sale to other parties. In the conversion process, substantial amounts of energy may be wasted. For example, it has been estimated that from 60 to 75 percent of the potential energy available in fuel burned to generate electricity is lost in the process of generating and delivering the electricity.

The technology exists, however, to produce and utilize more than one energy stream from most energy conversion processes so that the input of a given amount of fuel could lead to the production of far more usable energy than is generally true in most steam production processes. This technology is the foundation of the ICES concept. Current examples of the technology can be found on university campuses, industrial or hospital complexes and other developments where a central power plant provides not only electricity but also thermal energy to the relevant community.

It is generally assumed by DOE that ICES will be designed to produce sufficient thermal energy to meet all the demands of their communities and that they will be interconnected with existing electric utility grids. Through such an interconnection, an ICES would be able to purchase electricity when its community's need for electricity exceeds the amount which could be produced from the level of operations needed to meet the community's thermal needs. In addition, when operations to meet thermal needs result in generation of more electricity than

necessary for the ICES community, the ICES would be able to sell excess electricity to the grid.

The ICES may take a variety of forms, from a single owner-user, such as a large industrial complex or university campus, where all energy generated is used by the owner without sales to other customers, to a large residential community in which central power plant produces heat and electricity which is sold at retail to residents of the community. Since successful operation of an ICES presupposes that the ICES will be able to use or sell all energy produced, it can be anticipated that all ICES will at some point seek to sell energy to customers or to the electric utility grid from which the electricity will be sold to customers. By their very nature ICES are likely to be classified as public utilities under the laws of many, or even all, states.

Ross, Hardies, O'Keefe, Babcock & Parsons has undertaken a contract with the Department of Energy to identify impediments to the implementation of the ICES concept found in existing institutional structures established to regulate the construction and operation of public utilities. These institutional structures have been developed in light of policy decisions which have determined that the most effective means of providing utility services to the public is by means of regulated monopolies serving areas large enough to permit exploitation of economies of scale while avoiding wasteful duplication of production and delivery facilities. These existing institutional structures have led to an

energy delivery system characterized by the construction and operation of large central power plants, in many cases some distance from the principal population centers being served. In contrast, effective implementation of ICES depends to some extent upon the concept of small scale operations supplying a limited market in an area which may be served by other suppliers of utility services. ICES may in many instances involve both existing regulated utilities and a variety of non-utility energy producers and consumers who have not traditionally been subject to public utility type regulation. Implementation of the ICES concept will also require a variety of non-traditional relationships between existing regulated utilities and non-regulated energy producers and consumers.

The purpose of this report is to generally describe the existing scheme of public utility regulation as it is likely to relate to the development and operation of an ICES, the construction of ICES facilities and the determination of relevant cost of service, rate of return and rate structure for the sale and purchase of energy by an ICES. Attention is given to the problems of the entry of an ICES into an energy market which has traditionally been characterized by a form of regulated monopoly where only one utility has been authorized to provide a particular service in a given area.

This report is one of a series of reports covering the law of each of the 50 states and the federal government and should be read in conjunction with Volume One in this series entitled Community Energy Systems and the Law of Public Utilities:

An Overview. That volume provides a national overview of the regulatory programs described in detail for the particular state covered by this report. It also provides an analysis of the impediments to effective implementation of the ICES concept and a series of recommendations for responding to those impediments. In many jurisdictions legal issues similar to those likely to arise in the implementation of the ICES concept have not previously been faced. Thus, this series of reports cannot give definitive guidance as to what all of the answers are with respect to all issues which may face ICES implementation. However, by having an understanding of the issues which may arise in the course of an effort to implement ICES, an ICES developer will be better equipped to seek solutions.

Ross, Hardies, O'Keefe, Babcock & Parsons has been assisted in this study by Professor Edmund Kitch, Professor of Law at the University of Chicago Law School; Deloitte, Haskins & Sells, independent public accountants; and Hittman Associates, Inc., engineering consultants.

ACKNOWLEDGEMENTS

We wish to acknowledge the efforts of numerous individuals who have assisted in the preparation of the series of reports which make up the Study of the Impacts of Water Regulations Affecting the Acceptance of ICES. A number of the lawyers and paralegal personnel of Ross, Hardies, have assisted in the research, writing, critiquing, rewriting, proofreading and other efforts including Drew Kaplan; Linda Arbetman; Cheryl K. Hachman; Barbara L. Ross; Joel F. Bonder; Sally H. Newton; Susan N. Stearns; Richard F. Babcock; Donald W. Graves; Theda C. Snyder; Patricia J. Crowe; Susan E. Merritt; Eileen A. Muench; Elizabeth West; Catherine B. Lipscomb; Margaret R. Hessler; and Elizabeth Walter.

Preparation of reports covering regulatory programs in every state has taken considerable research effort and we are grateful to a group of law students who spent not only countless hours in libraries, but also a great deal of time on telephones contacting public officials around the country to secure information about utility regulatory programs. Among the students were Marchall Seeder; Carl Anderson; Locke E. Bowman, III; James G. Bullard; Bruce W. Dewald; Norman B. Julius; Bruce S. Klafter; Ruth B. Kleiman; Suzanne Metzel; Terrence J. Molinari; Alison Moss; Rose M. Urban; Garth D. Wilson; Linda Yi; Shell Bleiweiss and Neal Heriaud.

We would also like to acknowledge the contributions of subcontractors Hittman Associates, Inc. and Deloitte, Haskins & Sells, Inc. who have assisted us in an appreciation of some of the engineering and public utility accounting and ratemaking aspects of this project.

- viii -

Blank

CHAPTER 1

EXECUTIVE SUMMARY

I. REGULATION OF PUBLIC UTILITIES

The authority to regulate utilities in West Virginia is vested by statute in the West Virginia Public Service Commission (Commission). The Commission is comprised of three members who are appointed by the Governor with the consent of the senate. The Commission possesses the exclusive authority to regulate public utilities and local governments are given no role in the regulation of public utilities in West Virginia. The Commission exercises regulatory powers over all forms of public utilities. Municipally-owned and operated utilities are subject to Commission authority as are cooperatively-owned and investor-owned and operated utilities. The Commission regulates all direct and indirect sales to consumers. Where energy is produced solely for use by the producer, however, such production is not regulated by the Commission.

The Commission is empowered to regulate the rates, systems of accounts, construction of new facilities, standards of service, mergers and consolidations and the construction of new facilities by jurisdictional utilities.

Although the Commission regulates almost all forms of public utilities, only certain public utilities must apply to the Commission for a certificate of public convenience and necessity before beginning construction of any new plant. Electric and gas utilities are among those which must apply for a certificate. No

certificate is needed, however, for ordinary extensions of existing systems in the usual course of business. Certificates are granted after a public hearing has been held, but the Commission may, for good cause shown, grant the certificate without formal notice or hearing. A certificate will be granted only if the Commission determines that the public convenience and necessity requires the production or service.

Decisions of the Commission may be appealed by any aggrieved party to the Supreme Court of Appeals. Review of the Commission's decision is on the record.

II. SITING OF ENERGY FACILITIES

Though there are no statewide standards for siting of new power plants in West Virginia, there is a siting law which governs the construction of an overhead power line with a capacity of 200,000 volts or more. Any one seeking to construct such a line must first obtain a certificate of public convenience and necessity from the Commission. In granting the certificate, the Commission must balance the reasonable needs of the region against any adverse environmental impact of the proposed line. Another state agency that has an indirect effect on the siting of new power plants is the State Water Resources Board, which administers the state water pollution control effort. Before industrial waste can be discharged into state waters, a permit is required from the Board. Water used for cooling purposes is treated as an industrial waste by the Board.

III. FRANCHISING OF PUBLIC UTILITIES

The authority to grant franchises to operate the public

utilities in West Virginia is vested by statute in municipalities. West Virginia courts have held, however, that a municipality's franchising power is subservient to the States' paramount power to regulate public utilities. Where the Commission has ordered that service be provided in a certain area, a municipality cannot defeat this order by withholding a franchise from the utility.

Applications for a franchise must be made to the governing body of the municipality which is empowered to grant the franchise by ordinance. There are no statutory provisions which describe the criteria that must be met in order to obtain a franchise.

Once granted, a franchise is limited to a term of fifty years and municipalities have no power to create perpetual franchises. Statutory provisions expressly allow municipalities to grant exclusive franchises. There are no statutory provisions which govern situations where a municipality might seek to revoke or terminate a franchise.

IV. UTILITY REGULATION

The statutes vest authority to regulate rates of public utilities in the Commission. The Commission regulates the rates of all utilities whether the ownership is public, private or cooperative.

West Virginia statutes give the Commission the authority to hold a hearing concerning the propriety of any proposed rate increase. The Commission may suspend the effective date of proposed new rates for a period of up to 120 days beyond the proposed effective date. If a decision cannot be reached within the

suspension period, the rates thereafter go into effect.

In determining a utility's rate base, the Commission has consistently used a 13 month historical average test period and has used an original cost rate base as a method of valuation.

As a general rule, the Commission has not allowed construction work in progress (CWIP) into rate base. In recent decisions, however, the Commission has allowed CWIP associated with pollution control facilities, and has also allowed CWIP, where the utility has needed additional coverage in order to finance extensive capital construction programs. The Commission has not announced any required method for allocation of rates between classes of customers. There are no utilities that provide more than one type of service in West Virginia, therefore, allocation of rate base among services has not arisen as an issue in Commission decisions.

The Commission will allow a utility to claim certain expenses, if the expenses provide a direct benefit to the ratepayer. Hence, expenses associated with advertising or charitable contributions have generally been disallowed by the Commission. Research and development expenses, however, and informational advertising expenses will be allowed if the utilities will be able to show enough customer benefits to justify the expense.

The Commission has not adopted a particular method to allocate costs between various customer classifications and has recognized that any number of methods used to allocate costs may be fully valid in any given situation. The Commission has stated that allocation formulas serve only as guidelines, and,

therefore, it has not required that any particular methodology be used.

The Commission allows a utility to normalize tax benefits realized from the use of accelerated depreciation where it is found that such treatment is required by statute. In other circumstances, however, the Commission has required companies to flow-through the benefits of liberalized depreciation. Similarly, the Commission generally requires that a utility deduct the amount of the investment tax credits from the cost of service. However, if a utility has made an election under the Internal Revenue Code, the Commission will permit normalization of such credits, although the utility may be required to reduce its rate base by the amount of the unamortized investment credit.

The Commission has not announced any preferred method for determining the return on equity that a jurisdictional utility is to be allowed. Rather, the Commission will award what it determines to be a fair return on equity. The Commission has emphasized that its judgement will be based on all evidence in the record and it has considered evidence as to comparable earnings, earnings-price ratios, and discounted cash flow. While the Commission has not indicated any risk situations which it feels would compel a higher than normal rate of return, it does acknowledge that it takes risk into consideration when determining a company's fair rate of return. Because the Commission does not discuss how it determines rate of return in any depth, it is not possible to tell whether the Commission applies double-leveraging in determin-

ing rates of return for subsidiaries.

Though the Commission generally adheres to a philosophy of cost based rates, it also considers other factors in setting rates for jurisdictional utilities. Such factors as customer impact, customer expectations and historical rates are considered by the Commission in setting new rate structures. West Virginia statutes do not require life-line rates, nor has the Commission imposed life-line rates on its own initiative.

West Virginia statutes do not grant the Commission authority to control the issuance of securities by jurisdictional utilities.

CHAPTER 2

REGULATION OF PUBLIC UTILITIES IN WEST VIRGINIA

I. PUBLIC AGENCIES WHICH REGULATE PUBLIC UTILITIES

The authority to regulate public utilities is vested generally in the West Virginia Public Service Commission (Commission). The Commission is comprised of three members appointed by the governor with the advice and consent of the state senate. Commissioners are appointed for six year terms. They must be free from any pecuniary or employment interest in public utilities.^{1/}

The Commission possesses the exclusive authority to regulate public utilities. While local governments retain the power to control the use of their streets and to grant franchises to public utilities, they cannot use this power to infringe on the exercise of regulatory power by the Commission. In Chesapeake & Potomac Tel. Co. v. City of Morgantown,^{2/} the court held that a city could not order a telephone company to terminate its service for there was a "clear legislative policy, for the public good, to place the regulation of public utilities under State control;" the statutes conferring this power on the Commission were "paramount" to any rights granted to local government.^{3/}

II. JURISDICTION OF THE COMMISSION

The jurisdiction of the Commission extends to all "public utilities," which are defined as "any person or

persons, or association of persons, however associated, whether incorporated or not, including municipalities engaged in any business . . . which is, or shall hereafter be held to be, a public service"^{4/} Some specific services which are considered public utilities are enumerated in a second statutory provision. These include entities involved in the:

. . . generation and transmission of electrical energy by hydroelectric or other utilities for service to the public, whether directly or through a distributing utility; supplying water, gas or electricity, by municipalities or others^{5/}

The jurisdictional provision, when combined with the broad statutory definition of public utility, appears to provide the Commission with a broad base from which to regulate all facilities and activities of any operation which it holds to be a public utility.

The Commission has statutory authority over "persons, or associations of persons, however associated, whether incorporated or not, including municipalities"^{6/} Thus, the Commission's jurisdiction extends to all conventional forms of utility ownership.

In order to be classified as a public utility, a person must be "engaged in . . . business."^{7/} This would indicate that there must be a receipt of compensation in order to trigger the Commission's jurisdiction. The incomplete statutory enumeration of public utilities includes the "generation and transmission of electrical energy . . . through a distributing utility,"^{8/} so indirect sales of electricity

clearly are subject to Commission regulation. Although the statutes are silent with respect to indirect sales of other services, the broad definition of public utility does provide a sufficient foundation for regulation of such indirect sales if the service ultimately reaches the "public."

A public utility must be engaged in a business which is a "public service."^{9/} There is no statutory definition of "public service," but the Commission and West Virginia courts have considered the meaning of this term. The Supreme Court of Appeals, in holding that a company which owned distribution lines through which gas sold to a municipal utility was delivered to the customers by the municipal utility was a public utility, elaborated on the meaning of "public service" and stated that the test is whether or not there is a:

devoting of private property by the owner or person in control thereof to such a use that the public generally, or that part of the public which has been served and has accepted the service, has the right to demand the use or service, as long as it is continued, shall be conducted with reasonable efficiency and under proper charges. 10/

The court further reasoned that:

Whenever any business or enterprise becomes so closely and intimately related to the public, or a substantial part thereof, dependent upon the proper conduct of such business, it becomes the subject for the exercise of the regulatory power of the state. 11/

In Wilhite v. Public Service Commission,^{12/} the court held that a corporation that constructed its own pipeline to sell gas produced at its own wells to two industrial

customers, was not a public utility. The court distinguished service to only particular individuals from a holding out of the availability of the service to the general public.

The court stated that:

The mere fact that a product which is usually dispensed by or sold by a utility to the public is being furnished does not make every person, firm, or corporation selling such product a public utility. If such product is sold under private contract and the seller does not hold himself out to sell such product to the public or render some service to the public, he is not a public utility. 13/

The court reached this holding even though there were substantial sales to the two industrial customers and these customers had previously been served by a public utility.

In Wingrove v. Public Service Commission, 14/ however, the court held that sales begun on a selective basis could become so indiscriminate as to render the operation subject to regulation. In this case, a coal company originally had produced electricity for its own use and that of its tenants but had gradually accepted other customers who applied for service. Only about twenty non-tenant customers were being served, but no requests for service had ever been denied. While the express intention of the company was to be able to discontinue service at any time, its acceptance of all applications for service was held to be sufficient election of public service to bring the company within the Commission's jurisdiction.

While there are no specific statutory exemptions

for service provided only to tenants or to the producer itself, the courts' and Commission's interpretations of the "public service" requirement lead to the conclusion that such activities are not subject to Commission regulation. As held in Wilhite, private sales are not covered and logically, neither is energy production for one's own use. Sales of electricity to one's tenants by contract has been held not to be the providing of a public service. Holdred Collieries v. Boone City., Coal Corp.^{15/} Similarly, in Linsky v. Nary,^{16/} the Commission refused to assume jurisdiction over a development corporation which sold water to the tenants and lessees of its mobile home park.

III. POWERS OF THE COMMISSION

The Commission has general supervisory authority over all public utilities operating pursuant to a charter or franchise issued by a city, town, municipality or county court.^{17/} In addition to this general authority, the Commission has been granted numerous specific powers. The Commission possesses the power to regulate rates,^{18/} and prescribe a uniform system of accounts to be kept by public utilities.^{19/} It must approve the construction of new facilities;^{20/} applications for franchises from municipalities;^{21/} abandonment of service;^{22/} and may prescribe standards of service.^{23/} In addition, the Commission must approve mergers and consolidations;^{24/} affiliated interest transactions;^{25/} arrangements with other utilities;^{26/} sales or leases of

property;^{27/} and transfers of franchises.^{28/}

IV. AUTHORITY TO ASSIGN RIGHTS TO PROVIDE SERVICE IN A GIVEN AREA

A. Generally

Although the term "public utility is defined to include any person or entity engaged in a business which is a public service, only certain public utilities must obtain a certificate of convenience and necessity before beginning construction of any plant, equipment, property or other facility for providing the services enumerated the statute.^{29/} These include electric and gas services but do not include steam or refrigeration. Thus, while providers of these services may be subject to the Commission's general regulatory authority, they are not subject to its certificating authority.

A certificate is also necessary before a public utility, person or corporation applies for or obtains a franchise from a municipality.^{30/} No certificate is needed, however, for "ordinary extensions of existing systems in the usual course of business" but those who extend systems into new territories must obtain a franchise.^{31/}

B. Competition

The policy of the state, as reflected in rulings by the courts and the Commission, is to avoid competition by public utilities in the same area. The statute itself provides only that the applicant must prove that "public convenience and necessity do exist."^{32/}

In United Fuel Gas Co. v. Public Service Comm.,^{33/}

the court refused to require one gas utility to extend service to customers in an area already served by another gas utility. The court based its decision on the detrimental impact this would have on the interests of the public; the additional investments to institute the duplicate service would raise customer rates unnecessarily.^{34/} The Commission, although recognizing that competition generally was not in the public interest, has allowed a new public utility to intrude into the area of an old utility when the latter failed to serve those in the area who requested service.^{35/}

C. Certificating Procedures

In order to obtain a certificate of public convenience and necessity, the utility must file an application with the Commission. This application should identify the area to be served, the nature of the service to be furnished, the franchising body, the existing utilities with which the new service will compete, and the estimated cost of the project.^{36/} After notice to interested parties, a public hearing will be held to consider the application.^{37/} The Commission may, for good cause shown, grant the certificate without formal notice and hearing.^{38/} The certificate will be granted only if the Commission determines that the public convenience and necessity require the proposed construction or service.^{39/} No Commission or judicial decisions have elaborated on this criterion.

D. Service Area Disputes

Service area disputes are resolved by the Commission pursuant to the general procedure for hearing complaints. Any person may complain to the Commission that any public utility is acting in contravention of any provision regulating public utilities.^{40/} If there appear to be reasonable grounds for the complaint, the Commission will conduct any necessary investigation, give notice to the utility complained of, and request a response from that utility. The complaint may then be resolved voluntarily by the accused utility or the Commission may take any action necessary.^{41/}

E. Abandonment of Service

No public utility may discontinue service without first obtaining the approval of the Commission.^{42/} No criteria have been enumerated with respect to approval by the Commission of abandonment requests.

V. APPEALS OF REGULATORY DECISIONS

If a party is not satisfied with an order of the Commission made after a hearing on its case, it may petition, within ten days of the final order, for a rehearing or re-argument.^{43/} The grounds for the claim that the matter was erroneously decided must be specified and all alleged errors stated.^{44/} An application for rehearing is not mandatory, however. The aggrieved party may petition the Supreme Court of Appeals, within thirty days following the entry of the order, to suspend the final order.^{45/}

The court is charged with the duty of deciding

the matter in controversy "as may seem to be just and right."^{46/}
West Virginia courts have consistently held that the appeal
is not a hearing de novo.

"The principle is well established by the
decisions of this Court that an order of
the public service commission based upon
its findings of facts will not be disturbed
unless such finding is contrary to the
evidence, or is without evidence to support
it, or is arbitrary, or results from a
misapplication of legal principles." ^{47/}

A Commission order will also be overturned if the
Commission "has exceeded the power which it could constitutionally
exercise, has gone beyond its statutory powers or its action
is based on a mistake of law."^{48/}

FOOTNOTES

1. W.Va. Code §24-1-3 (Michie 1980).
2. 144 W.Va. 149, 107 S.E.2d 489 (1959).
3. Id. 107 S.E.2d at 496.
4. W.Va. Code §24-1-2 (Michie 1980).
5. Id. §24-2-1.
6. Id. §24-1-2.
7. Ibid.
8. Id. §24-2-1.
9. Id. §24-1-2.
10. 154 W.Va. 146, 174 S.E.2d 331, 335 (1970).
11. Id. 174 S.E. 2d at 337.
12. 150 W.Va. 747, 149 S.E.2d 273 (1966).
13. Id. 149 S.E.2d at 282.
14. 74 W.Va. 190, 81 S.E. 734 (1914).
15. 97 W.Va. 109, 124 S.E. 493 (1924).
16. 11 PUR 4th 381 (1975).
17. W.Va. Code §24-2-5 (Michie 1980).
18. Id. §24-2-3.
19. Id. §24-2-8.
20. Id. §§24-2-11, 24-2-11a.
21. Id. §24-2-11.
22. Id. §24-3-1.
23. Ibid.
24. Id. §24-2-12(d).

25. Id. §24-2-12(f).
26. Id. §24-2-12(a).
27. Id. §24-2-12(b).
28. Ibid.
29. Id. §§24-2-1, 24-2-11.
30. Id. §24-2-11.
31. Ibid.
32. Id. §24-2-11.
33. 103 W. Va. 306, 138 S.E. 388 (1927).
34. Id. 138 S.E. 2d at 391.
35. Re Harrison Rural Electrification Assn. Inc., 24 P.U.R. (N.S.) 7 (1938).
36. W. Va. P.S.C., Rules of Practice of Procedure 10(c) (1977).
37. Id. 12.
38. Id. 10(k).
39. W. Va. Code §24-2-11 (Michie 1980).
40. Id. §24-4-6.
41. Ibid.
42. Id. §24-3-1.
43. W. Va. P.S.C., Rules of Practice and Procedure 19(a) (1977).
44. Id. 19(c).
45. W. Va. Code §24-5-1 (Michie 1980).
46. Ibid.
47. United Fuel Gas Co. v. Pub. Serv. Comm'n, 143 W. Va. 33, 99 S.E. 2d 1, 8 (1957).
48. Anchor Coal Co. v. Pub. Serv. Comm'n, 123 W.Va. 493, 15 S.E. 2d 406, 411 (1941).

CHAPTER 3

SITING OF ENERGY FACILITIES IN WEST VIRGINIA

I. PUBLIC SERVICE COMMISSION

There is no comprehensive power plant siting statute in West Virginia. However, there is a siting provision concerning high voltage transmission lines.^{1/} Any entity seeking to construct a power line with a capacity of two hundred thousand volts or more must obtain a certificate of public convenience and necessity from the Public Service Commission (Commission). The certificate is granted as approval of both the construction and location of the line.^{2/} In granting the certificate, the Commission must balance the reasonable power needs of the region against any adverse environmental impact when it makes its determination.^{3/} Public notice is required and interested parties may request a hearing on the matter.^{4/} There is no requirement that the Commission consult with other agencies prior to granting a certificate.

II. PLANNING AUTHORITIES

Every municipality and county commission may create by ordinance a planning commission.^{5/} Any municipal corporation with a population of 2,000 or more may assign the functions of this commission to its Department of Development.^{6/} Each planning commission must develop and recommend to its corresponding governing body a comprehensive plan for the physical development of the territory within its jurisdiction.^{7/} A county planning commission can recommend and the

county commission can adopt a comprehensive planning and zoning ordinance.^{8/} A comprehensive plan should include recommendations for development of the region and may include the general location and extent of publicly-owned utilities and "the uses of land for trade, industry, habitation, recreation, agriculture, forestry, soil and water conservation and other purposes."^{9/} There are no special provisions dealing with privately-owned public utilities.

Once the commission adopts the plan, it sends the plan to the governing body of the municipality or county.^{10/} The governing body then must adopt, amend or reject it.^{11/} After the comprehensive plan and an ordinance containing provisions for subdivision control have been adopted by a municipality:

[A] structure shall not be located and an improvement location permit for a structure on platted or unplatted lands shall not be issued unless the structure and its location conform to the municipality's comprehensive plan and ordinance. ^{12/}

Similar limits are placed on locating new structures on unincorporated lands within the jurisdiction of the county planning commission.

For any amendment to the plan to be valid, the planning commission must approve the amendment by resolution and the governing body of the municipality or the county commission must adopt it by ordinance.^{13/} The commissions have the power and duty to invoke any legal or equitable

remedy for the enforcement of the provisions of the ordinances.^{14/}

III. ENVIRONMENTAL AGENCIES

1. Water Pollution

The State Water Resources Board (Board) of the Division of Water Resources, Department of Natural Resources (Department), is authorized to regulate water pollution under the Water Pollution Control Act.^{15/} Its regulations represent a balancing of public health needs, protection of flora and fauna, and provision for adequate economic development.^{16/} Regulations issued by the Board in 1967 pursuant to its grant of authority, generally limit the uses of streams and rivers in the state. The regulations vary from region to region and some streams are not certified for use as sources of coolant waters.

It is unlawful, unless a permit is first obtained from the Department, to allow the discharge of industrial wastes into state waters, to create an outlet for such discharges or to make an addition to an existing facility that would increase the volume of its discharges.^{17/} Water used for cooling is treated as an "industrial waste" by the Department.^{18/} The permits are valid for five years.^{19/} The Department can issue a permit if the chief of the Division of Water Resources finds that the proposed use will not cause water pollution or violate any of the pollution regulations promulgated by the Board.^{20/}

2. Air Pollution

West Virginia statutes provide that no "stationary source of air pollutants" can be constructed or modified without a permit from the state Air Pollution Control Commission.^{21/} The Air Pollution Control Commission has the power to define that term by regulation and has done so.^{22/}

FOOTNOTES

1. W.Va. Code §24-2-11a (Michie 1980).
2. Id. §24-2-11a(a).
3. Id. §24-2-11a(d) (2).
4. Id. §24-2-11a(c).
5. Id. §8-24-1 (Michie 1976).
6. Id. §8-12-3a.
7. Id. §8-24-16.
8. Ibid.
9. Ibid.
10. Id. §8-24-19.
11. Id. §9-24-21.
12. Id. §8-24-36.
13. Id. §8-24-23.
14. Id. §8-24-14(10).
15. Id. §20-5A-1 et seq., §20-5A-3(b) (2) (Michie Supp. 1980).
16. Id. §20-5A-1.
17. Id. §20-5A-5(b).
18. Mr. Wright, Assistant Director, Division of Water Resources, Telephone conversation, 6/21/78.
19. W.Va. Code §20-5A-7(c) (Michie Supp. 1980).
20. Id. §20-5A-7(b).
21. Id. §16-20-11b (Michie 1979).
22. B.N.A. Environ. RPTR., State Air Laws Vol. 2, West Virginia Air Pollution Regulation XIII.

CHAPTER 4

FRANCHISING OF PUBLIC UTILITIES IN WEST VIRGINIA

I. EXPRESS AUTHORITY TO GRANT FRANCHISES

West Virginia law expressly grants, by statute, to every municipality and every county court (Commission) the authority to grant franchises.^{1/} The statute places no limit upon the entities to which a franchise can be granted; it specifically provides that it can be granted to "any person" but does not define the term "person."^{2/} Franchises to public utilities must be granted by an ordinance adopted by the governing body of the county or municipality.^{3/} There is no constitutional provision granting franchising authority to local governments. Prior to 1901, the power to grant franchises was based on provisions in the charters of the individual municipalities and a general grant of authority to municipal corporations to keep the streets in good repair.^{4/}

The specific question of whether a city can exclude a public utility by failing to grant an initial franchise has not been decided by West Virginia courts. However, the relevant statute indicates that a municipality's franchising authority is subservient to the state's authority to regulate public utilities.

The failure or inability of any person to obtain from any municipality or county court a franchise for the rendering of a public service shall in no way affect the power and authority granted to, and the duties

and obligations imposed upon, such person under the provisions of chapter twenty-four [Public Utility Act] . . . of this Code or by the public service commission. 5/

In Chesapeake & Potomac Tel. Co. v. City of Morgan-
town, 6/ the court held that a municipality could not compel the telephone company to remove its facilities from the streets of the municipality even though its franchise had expired. In reaching its decision the court recognized clear legislative policy to place the regulation of public utilities under state control.

Such statutes are paramount to rights given by the city, by charter and by general statute, reasonably to regulate the use of its streets. 7/

The court went on to conclude that the municipality's franchising power must yield to the state's paramount power to regulate public utilities. Thus, it would appear that a municipality's refusal to grant an initial franchise to a public utility would not preclude that utility from providing service as required by the public utilities commission.

II. PROCEDURES FOR GRANTING A FRANCHISE

The statute prescribes a specific procedure which must be followed in order to grant a valid franchise. An application for a franchise must be filed at least thirty days prior to action on the franchising request by the governing body. 8/ Notice of such application must also be published in accordance with the requirements for legal publication under West Virginia law. 9/

An action of a governing body to grant a franchise must be by ordinance.^{10/} Specific procedures must be followed for the adoption of an ordinance by a governing body.^{11/} These procedural requirements include the reading of the proposed ordinance by title at not less than two meetings of the governing body,^{12/} and the prohibition of a material amendment to an ordinance at the same meeting at which it is finally adopted.^{13/}

This ordinance and franchise procedure applies to all public utility services. No distinction is made between various types of utility service.^{14/} The statute does not require open competition for the awarding of a franchise. There is no express provision governing payments to the local government for the franchise rights. In Chesapeake & Potomac Tel. Co. v. City of Morgantown,^{15/} the court held that municipalities could charge franchise holders reasonable fees to cover the regulation of the use of the public streets but could not use such fees as a means to tax the utilities holding franchises.

There is no provision requiring that the question of awarding a franchise be put to a vote of the citizens of the jurisdiction. Nor is there a requirement that a written acceptance of the franchise must be made by the public utility. The West Virginia public utilities law requires that a public utility must, before applying for a franchise, obtain a certificate of public convenience and necessity.^{16/} There

is no statutory provision or court decision which identifies specific criteria which must be satisfied in the granting of a franchise.

III. CHARACTERISTICS OF A FRANCHISE

A. Duration and Termination

The statute limits the duration of franchises granted after 1901 to fifty years.^{17/} Municipalities and county commissions have no power to create perpetual franchises; no "franchise hereafter granted for any longer term than fifty years shall be of any force or validity."^{18/} However, there may be some franchises which are perpetual and are still being used.

As discussed above, if a franchise terminates without successful negotiation for renewal, the municipality cannot force the utility to remove its facilities without the consent of the Public Service Commission.^{19/}

B. Exclusivity

The franchise statute expressly gives to municipalities the authority to grant exclusive franchises.^{20/} Thus, the court's objections to such franchises in Parkersburg Gas Co. v. Parkersburg,^{21/} a case decided before the passage of the franchise statute, are no longer valid. However, there is a traditional hostility to exclusive franchises and no such franchises will be implied. In no case will an exclusive franchise in one field be implied to bar the granting of a franchise to a different type of utility. The court in

Parkersburg held that even if the gas company had an exclusive franchise to light the streets with gas, that would not preclude a franchise to light the streets with electricity.

FOOTNOTES

1. W.Va. Code §8-31-1 (Michie 1976).
2. Ibid.
3. Id. §8-11-3(9).
4. Id. Ch. 47, §28 (ed. 1884).
5. Id. §8-31-1 (Michie 1976).
6. Chesapeake & Potomac Tel. Co. v. City of Morgantown,
144 W.Va. 149, 107 S.E. 2d 489 (1959).
7. 107 S.E. 2d at 496-7.
8. W.Va. Code §8-31-1 (Michie 1976).
9. Id. §59-3-1 (Michie Supp. 1980).
10. Id. §8-11-3 (Michie 1976).
11. Id. §8-11-4.
12. Id. §8-11-4(a) (1).
13. Id. §8-11-4(a) (3).
14. Id. §8-11-3.
15. Chesapeake & Potomac Tel. Co. v. City of Morgantown,
143 W.Va. 800, 105 S.E. 2d 260 (1958).
16. W.Va. Code §24-2-11 (Michie 1980).
17. Id. §8-31-1.
18. Ibid.
19. Chesapeake & Potomac Tel. Co. v. City of Morgantown,
144 W.Va. 149, 107 S.E. 2d 489 (1959).
20. W.Va. Code §8-31-1 (Michie 1976).
21. Parkersburg Gas Co. v. Parkersburg, 30 W.Va. 435,
4 S.E. 650 (1887).

CHAPTER 5

RATE REGULATION IN WEST VIRGINIA

I. RATEMAKING AUTHORITY

A. General

The West Virginia statutes confer authority on the Public Service Commission of West Virginia (Commission) to enforce, originate, establish, change and promulgate rates for all public utilities.^{1/} "Public utility" is defined to include "any person or persons, or association of persons, . . . which is, or shall hereafter be held to be, a public service."^{2/} Certain utilities are enumerated in the statutes, including gas, water and electric.^{3/} The definition of "public utility",^{4/} includes investor-owned, publicly-owned and cooperative utilities.

The Commission is granted authority to establish a uniform system of accounts for public utilities under its jurisdiction.^{5/} Further, it may prescribe the forms of accounts, records and memoranda to be kept by public utilities.^{6/} The system of accounts established by the Commission and the forms of accounts, records and memoranda prescribed by it are not to be inconsistent with the systems and forms established for such utilities by the Interstate Commerce Commission.^{7/} The purpose of requiring that the income accounts of the public service company be kept in a certain manner is primarily for the purpose of assisting the

Commission in its duty to determine fair and just rates to be charged by the service company.8/

West Virginia has adopted the uniform system of accounts established by FERC for both gas and electric utilities.9/

Rules promulgated by the Commission prescribe the procedures which a public utility must follow with respect to any proposed change in its depreciation rates. A public utility is required to file with the Commission certain types of information including:

(1) a statement showing the class or subclass of plant to which applicable, the effective date of the proposed change, the rates in effect immediately before and after such change, and the corresponding service-life, salvage and cost of removal estimates, and (2) a general statement describing the method or methods employed in the development of the service-life, salvage and cost of removal estimates, and the reasons for the proposed change in the rates.10/

B. Ratemaking

Every public utility is required to file with the Commission, and keep open to public inspection, schedules showing all rates and charges for service to be rendered by it.11/ No public utility may change any rate except after thirty (30) days' notice to the Commission and the public. The proposed changes must be shown by printing new schedules, or must be plainly indicated upon the current schedules and kept open to public inspection.12/ The Commission has authority, either upon complaint or upon its own initiative,

to hold a hearing concerning the propriety of any proposed rate increase.^{13/}

Pursuant to the Commission's Rules of Practice, a public utility desiring to change its rates must file an application in a form prescribed by the Commission.^{14/} Such an application must set forth (1) the rates, charges, rules and regulations in effect, (2) the proposed rates, charges, rules and regulations, (3) the estimated annual effect on revenue, and (4) the reason for the proposed change.^{15/}

Whenever a public utility files with the Commission any schedule changing rates, the Commission may, pending a decision, suspend the effective date of the new rates for a period of up to 120 days. If a decision cannot be reached within the suspension period, the rates thereafter go into effect.^{16/}

After June 30, 1981, the Commission may suspend proposed increased rates for periods of up to between one-hundred and twenty and two-hundred and seventy days, depending on the number of customers served by the petitioning utility.^{17/} If the Commission has not reached a final decision on the rate increase by the end of the suspension period, the proposed rates go into effect. While the Commission may still reduce rates which have gone into effect, it cannot order refunds of amounts collected prior to its final order.^{18/}

At any hearing involving a rate increase, the

burden of proof to show that the increased rate is just and reasonable rests upon the public utility making application for an increase.^{19/} However, the statute does not define the elements of justification.

C. Particular Issues

Whenever the Commission finds any existing rates to be unjust, unreasonable, insufficient or unjustly discriminatory, the Commission shall fix reasonable rates to be followed in the future in lieu of the current rates.^{20/} In addition to this general mandate that rates should be "just and reasonable", the statutes provide that the Commission may not authorize a tariff which includes any automatic adjustment clause or fuel adjustment clause.^{21/}

II. RATE BASE DETERMINATION

A. Test Period

The Commission has consistently adhered to a historical average of 13-month balances method of ratemaking, to insure a proper match between plant expenses and revenues.^{22/}

B. Rate Base Valuation

The Commission values a utility's rate base using original cost, less depreciation.^{23/}

C. Rate Base Components and Adjustments

The inclusion of an item of utility property in rate base is based upon the determination of whether the item is used or useful in rendering a company's regulated

service.^{24/} In a case in which a company sought to include its investment in a subsidiary company which owned undeveloped coal reserves, the Commission concluded that the investment in a subsidiary, which had merely acquired coal reserves to be used in an indefinite future period, should not be included in utility rate base. According to the Commission, the proper time for the utility to earn a return on its investment is when the property is placed in operation.^{25/}

Commission decisions have not dealt with the issue of inclusion in rate base of utility plant used to provide an unregulated service. However, as the Commission defines rate base property as that which is used or useful in rendering regulated service, it is likely that investments in facilities which are not subject to agency jurisdiction would be excluded from the rate base.

Generally, construction work in progress (CWIP) is excluded from the rate base on the grounds that (1) such construction is not used or useful in rendering utility service to the public, (2) the Commission compensates for the capital costs of construction by allowing the capitalization of funds used during construction (AFUDC), and (3) the Commission maintains that it is "sound ratemaking" to require future customers to pay for new facilities only when they become available.^{26/} However, the Commission has permitted CWIP associated with pollution control facilities to be included in rate base. This exception was created

because such facilities are: "(1) large, (2) required by governmental environment regulation, (3) non-revenue producing, and (4) operating costs increasing."27/ The Commission has also noted that by allowing CWIP associated with pollution control facilities in the rate base, it has enabled utilities to earn a current cash return on the property, and, as a result, to decrease dependence upon outside financing and to improve cash flow and earnings quality.28/

The Commission has recently allowed one utility to include non-pollution control related CWIP in its rate base because the utility needed additional coverage in order to finance its intensive capital construction program (an increase in total assets by almost two-thirds in four years). The Commission observed that for several years, the company had experienced a net non-operating income (primarily for AFUDC), which exceeded 10% of net operating income before federal income tax. The company was limited by its mortgage indenture from including in "defined" earnings, net non-operating income in excess of 10% of pre-tax net operating income. As a result, the excess of the company's net non-operating income had not been available to provide coverage for debt interest, thereby reducing the company's ability to raise capital.29/

When the Commission allows CWIP to be included in the rate base, the utility must cease capitalizing AFUDC on the amount of CWIP allowed.30/

D. Rate Base Allocation

No West Virginia utilities provide more than one type of utility service from a single facility. Therefore, the issue of rate base allocation between utility operations provided from a single facility has not arisen.

The Commission has been confronted with the issue of the proper allocation of electric plant items among various classes of customers.^{31/} The Company had formulated the following ratios based on test-year data: "(1) number of customers of classes, (2) number of services by classes, and (3) peak demand by classes."^{32/} The electric plant items, such as land, which are not sized or costed according to the functions of peak demands were allocated according to the ratio of numbers of customers of services. Other plant items, such as overhead conductors and transformers, which are sized and costed relative to capacity and other functions were divided and allocated by two different methods. Under this approach, it was assumed that 70 percent of the items were related to capacity, and they were therefore allocated on the basis of peak demand by classes. The remaining 30% of the items were allocated on the ratio of the number of services by classes.

The Commission accepted the company's method of rate base allocation for the purposes of the case, concluding that "although this type of cost apportionment has the appearance of being somewhat arbitrary, when one deals with

a myriad of diverse costs and factors, the end results are rationally based and protected by the principal of diversity."33/

III. COST OF SERVICE

III. COST OF SERVICE

A. Allowable Expenses

Allowable Expenses

The Commission only allows expenses which are a direct benefit to the rate payer. "The Commission shall adhere to that principle of utility regulation which holds that the rate payer should only be charged with those expenses which are a direct benefit to the rate payer."34/ Thus, the Commission has refused to include political or institutional advertising because such advertising is directed at upgrading the company's public image.35/ It has also held that informational advertising will be allowed if the utility is able to show enough customer benefits to justify the cost. "The utility must show that the advertisement will result in a savings or that the message will eliminate hazard or inconvenience to the general public."36/

Similarly, the Commission has consistently refused to include charitable contributions in the cost of service on the grounds that such expenditures are made to upgrade the company's public image.37/ Other expenses which have not been attributed to rate payers are oil association dues,38/ and interest expense on refunds to customers.39/ However, the Commission has indicated its receptiveness to

the inclusion of research and development expenses by including a national gas company's contribution to an organization dedicated to developing a means of converting gas energy directly into electrical energy.40/

B. Methods of Allocating Joint Expenses

The Commission has not been confronted with the issue of expense allocation between two different utility operations of the same utility. However, the Commission has been confronted with the issue of the proper allocation of expenses between the operations of the same utility in different jurisdictions.

Historically, the Commission has used the "West Virginia Division" cost allocation method to assign costs to utility operations in different jurisdictions. Under this method, all of the distribution costs directly assignable to West Virginia customers are segregated. The balance of the rate base and cost-of-service costs attributable to West Virginia are allocated between West Virginia customers and out-of-state customers by calculating volumetric ratios for a demand factor and a commodity factor. These factors are applied to cost components, "functionalized" to production, storage, transmission and distribution operations and allocated at various percentages between demand and commodity.41/

The Commission recently permitted a deviation from this method of cost allocation.42/ The key issue in the case was whether the Commission should permit an affiliated

supply corporation to allocate costs on a system-wide basis so that a portion of the cost of a new gas supply (which would not be delivered to West Virginia) would be allowed to the utility's West Virginia customers.

The Commission approved the adoption of the system-wide allocation method for two reasons. First, the availability of new gas would benefit the utility's West Virginia customers even though this gas would never enter the state because the use of the new gas in other parts of the entire parent company system would permit delivery of an additional supply to West Virginia through displacement. Secondly, the Commission concluded that the adoption of the new allocation method would not have a large impact on rates to West Virginia customers.^{43/}

The Commission noted that "cost allocation is an artful exercise and that the adoption of any particular allocation method . . . is not an assurance of the continuation of that method in future proceedings."^{44/}

C. Allocation Between Various Customer Classifications

The Commission has not adopted a particular method to allocate costs between various customer classifications. The Commission recognizes that cost allocation is not an "exact science" and therefore any number of methods used to allocate costs may be equally valid in a given situation. The Commission maintains that "each cost apportionment technique should be evaluated to see the extent of its

validity in reaching cost guidelines for use in establishing cost responsibility in rate design."45/

The Commission's primary concern in evaluating the validity of the cost allocation methods used in a given case, is the ratemaking result on the various customer classes. In one case,46/ the utility apportioned its costs between various service zones and customer classes on the basis of allocation factors which included:

(1) demand allocation factors based on ratios of estimated design day requirements by classes and zones to the total design day requirements; and (2) commodity allocation factors based on ratios of actual test year sales by classes and zones to net actual test year total sales . . .; and (3) purchased gas costs embedded in the new cost of service were assigned to classes of customers and service areas on a peak responsibility and annual volume basis.47/

The Commission observed that the use of actual peak day data as opposed to design day data would shift substantial dollars away from the industrial rate base and cost of service, because the actual data took into account actual test year curtailments of industry whereas the design data assumed a period of non-curtailment. The Commission said that the use of design day data to allocate demand costs in a time of gas shortages and industry curtailment was unreasonable. The Commission went on to say:

However, the results of allocation methods are guidelines only. Thus, we can use the studies . . . with the knowledge that other, more appropriate methods would shift cost

responsibilities away from the industrial class of consumers.^{48/}

One electric utility used the noncoincidental peak method of allocating demand costs. The Commission points out that the "major problem with the noncoincidental demand allocation procedure is that it fails to give demand credit to those customers whose peak demands do not contribute to the overall system peak," which may result in demand costs being improperly allocated to the off-peak load.^{49/} However, the Commission approved the use of this method because the power company was a small system with less diverse demand and usage patterns than a large system.

For the most part, the Commission appears to be flexible in its approach to cost allocation. It recognizes that any number of cost allocation methods may be valid in a given situation. However, the Commission also stresses that the inherent imprecision of cost allocation gives it the flexibility to " 'tilt' the rate components to a limited extent from the precise results of the unit cost determinations in the design of rates."^{50/}

IV. FEDERAL INCOME TAX ISSUES

A. Accelerated Depreciation

For the most part, the Commission has permitted normalization of accelerated depreciation only where such treatment is required by statute:

On prior occasions we have approved normalization where such treatment is required by statute, pursuant to an election by the tax-payer. Whenever there has been no statutory obligation to normalize, however, we have held that normalization is not proper for ratemaking purposes and have required flow through accounting to be used for the benefit of customers of the utility.^{51/}

Thus in one case the Commission permitted normalization of depreciation on post-1969 expansion property, as required by the Tax Reform Act of 1969 (Internal Revenue Code §441(a)), but required the company to flow through the benefits of liberalized depreciation on post-1969 nonexpansion property and all pre-1970 property.^{52/} However, the Commission has indicated that there might be times when normalization (absent statutory "mandate") would be appropriate. The key factor for determining when a company may normalize, is whether the tax benefits of liberalized depreciation amount to a permanent savings for the company. Thus, the Commission required one company to flow through the benefits of liberalized depreciation because the company was experiencing steady growth. "Under such circumstances, normalization ratemaking amounts to an involuntary conscription of capital from the ratepayer"^{53/}

On the other hand, the Commission has permitted normalization of liberalized depreciation on pollution-control facilities. The Commission found that normalization would not amount to a permanent tax saving for the company, because of the short amortization period and the clear rapid cross-over of accelerated to straight-line amortization.^{54/}

B. Investment Tax Credit

Generally, the Commission requires that a company deduct the amount of investment tax credits from the cost of service. However, if the company has made an election under §46(f)(1) of the Internal Revenue Code, the Commission permits normalization of such credits. Where normalization is permitted, the company is required to reduce its rate base by the amount of the unamortized investment credit. The rate base is to be restored not less rapidly than ratably over the life of the property.^{55/}

It should be noted that in a 1977 rate order, the Commission allowed Appalachian Power Company to switch from flow-through to normalization accounting for the tax benefits associated with investment tax credits.^{56/} However, this ruling was reversed in the Commission's May 3, 1978 order.^{57/} While the Commission acknowledged that improving a company's cash flow, coverage, and quality of earnings were factors to be considered in determining whether or not to permit normalization accounting, it emphasized that " . . . the Commission has long adhered to the policy that its allowance for taxes should be limited to the amounts foreseeably payable to the Federal Government, and no more."^{58/}

V. METHODS USED FOR DETERMINING RETURN TO BE ALLOWED A REGULATED UTILITY

A. Overall Return and Return on Equity

The Commission decisions which have dealt with the

issue of a proper overall return and return on equity, give little indication as to how the Commission arrives at such figures. Furthermore, only one recently reported decision has indicated what the Commission determined to be a fair return on equity. In that case, the Commission emphasized that their judgment must consider evidence in the record of comparable earnings, earnings-price ratios, discounted cash flow and the like.^{59/} The company using such methods arrived at a 14.5% return on equity, while the staff recommended a return between 13.0% and 13.5%. The Commission concluded that a 13.6% return on equity was fair and reasonable. The Commission settled on a slightly higher return on equity, than recommended by the staff, in view of the Company's highly leveraged capitalization ratio (debt-60.76%; preferred stock-6.81%; common stock-32.45%) which caused serious coverage problems for the company.^{60/}

In all other cases, the Commission has not indicated what the return on equity should be, but has merely concluded what it considers to be a fair overall return. This reflects the Commission's view, that "the cost of common equity, cannot be viewed as an isolated cost rate. . . ." ^{61/}

The following statement best illustrates how the Commission arrives at reasonable overall return: "We [the Commission] must strike a fair balance to allow the utility to recover its reasonable cost of service and at the same time prevent the utility customer from paying unreasonable

rates." Invariably the Commission has selected an overall return which is slightly higher than the staff recommendation, but lower than the company's requested return, usually with merely a conclusion that the rate of return is "just and reasonable" or within the "zone of reasonableness."

It appears that the Commission, with the mathematical calculations of staff and the company as guidelines, determines a fair rate of return by looking at net overall impact of its order. In one case, the Commission enunciated several factors which prevented it from granting as high a rate of return as the company requested: The Commission had been liberal in its adjustments to fuel expense; permitted a measure of CWIP in rate base; allowed partial normalization of income taxes; was concerned about whether West Virginia customers were subsidizing the expansion of facilities for the benefit of Pennsylvania ratepayers; and finally the Commission sought to limit rate increases in view of the West Virginia ratepayer's limited incomes.^{62/}

The table in Appendix A lists the overall returns and returns on equity allowed in recent rate cases.

B. Other Return Factors

While the Commission has not indicated any risk situations which it feels would compel awarding a higher than normal rate return, it has taken risk into account in determining a company's rate of return. In one case, the Commission enumerated four factors which it took into consider-

ation in denying the utility's request for a higher return than granted in its previous case: (1) relative risk, (2) minimum expansion of the utility in West Virginia; (3) lack of pressure on earnings due to the monthly purchased gas adjustment surcharge permitted in a prior order; (4) the utility's lower debt ratio than that of its parent. The Commission concluded that "overall test year earnings are not guaranteed and may be deteriorated in the course of setting rates . . . to avoid undue rate discrimination and to balance risk."63/

Recent agency decisions have not dealt with the issue of allowances made in the rate of return to provide incentives or penalties. In addition, it is unclear whether the Commission applies double leverage in determining the cost of equity, since Commission decisions rarely discuss the return on equity as an isolated cost rate.

VI. RATE DESIGN CRITERIA

The Commission has enumerated seven "basic principles" of utility ratemaking. These principles include the ideas that rate should (1) produce revenues required for the utility to operate its business; (2) be simple and easy for the customer to understand; (3) promote stability in revenue flow over annual operating period; (4) be based on fair apportionment of the cost of service, considering both use and availability of use, to all classes of customers wherever

located; (5) discourage wastefulness; (6) not be so high as to render utility service out of the reach of the poor or unduly burden any other class of customers; and (7) not be changed abruptly or arbitrarily in departing from historical levels or rate designs. "An analysis of these basic principles reveals that they form an integrated concept in which each principle must be weighed and balanced with the others".64/

In seeking to apply these principles, the Commission was confronted with the issue of how to distribute increased fixed costs of distributing gas resulting from a gas shortage. While it acknowledged that generally rates should be set to produce the utility's overall revenue requirement, the Commission declined to do so in this instance. To avoid increasing rates to certain zones and classes of service, which company cost studies indicated were already contributing their fair share of revenues and which had been subject to gas supply curtailments, the Commission set rates so as to distribute the burden of cost increases between the utility and those zones and classes of customers that were not paying as much as the cost study indicated to be appropriate. The Commission felt that if the company were made to bear the entire burden of cost increases, it might be financially injured to the extent that it could not continue to adequately serve the public. However, the Commission considered it appropriate for the company to absorb part of the losses because it should not be totally insulated from the risk

effects of gas shortages and in the event that the gas shortage should end, the company would enjoy excessive earnings until it was required to reduce rates.^{65/}

In short, although the Commission depends a great deal on the cost of service studies prepared by staff and the utility company, it considers factors other than costs to set rates.

VII. ISSUANCE OF SECURITIES

A. Securities

The statutes do not grant the Commission authority to control the issuance of securities.

B. Capital Structures

The Commission found a reasonable capital structure for a power company to consist of 53.47 per cent debt, 34.16 per cent common equity, and 12.36 per cent preferred stock.^{66/} A proper capital structure for another electric company was found to consist of 59.85 per cent debt, 29.2 per cent common equity, 8.73 per cent preferred stock, and 2.2 per cent deferred federal income taxes.^{67/}

APPENDIX A

<u>CASE</u>	<u>ALLOWED & RATE OF RETURN</u>	
	<u>OVERALL</u>	<u>ON COMMON EQUITY</u>
<u>Re Appalachian Power Co.,</u> Decision No. 7083, Jan. 31, 1979 Decision No. 9091, May 3, 1978	8.73 9.75	14.20 13.63
<u>Re Monongahelia Power Co.,</u> Decision No. 8127, March 18, 1977	9.15	13.63
<u>Re Potomac Edison Co.,</u> Decision No. 8280, April 5, 1977	9.15	13.70
<u>Re Columbia Gas Co.,</u> Decision No. 8807, March 27, 1977	7.51	10.30

FOOTNOTES

1. W.Va. Code §24-2-3 (Michie 1980).
2. Id. §24-1-2.
3. Id. §24-2-1.
4. Id. §24-1-2.
5. Id. §24-2-8(a).
6. Ibid.
7. Ibid.
8. Appalachian Elec. Power Co. v. Koontz, 138 W.Va. 84, 76 S.E. 2d 863 (1953).
9. Mr. David Ellis, Director of Accounting, Commission, Telephone conversation, 11/8/79.
10. W.Va. Pub. Serv. Comm'n., Rules of Practice and Procedure, Rule 20 (1977).
11. W. Va. Code §24-3-5 (Michie 1980).
12. Id. §§24-2-4-4a.
13. Ibid.
14. W. Va. Pub. Serv. Comm'n., Rules of Practice and Procedure, Rule 106 and Form 4.
15. Id. Rule 10(b).
16. W.Va. Code §24-2-4 (Michie 1980).
17. Id. §24-2-4a
18. Ibid.
19. Id. §§24-2-4-4a.
20. Id. §24-2-3.
21. Id. §24-2-15.
22. Re Appalachian Power Co., Case No. 8182, May 6, 1977, at 19.

23. Re United Fuel Gas Co., 46 P.U.R.3d 118, 125 (1962).
Argus Utility Scope Regulatory Service (West Virginia),
May, 1978, confirms that the Commission has recently
used net original cost to value rate base.
24. Re Monongahela Power Co., Case No. 8127, March 18,
1977.
25. Id. at 10.
26. Re Chesapeake & Potomac Tel. Co. W. Va., 18 P.U.R.4th
236, 241 (1976).
27. Re Appalachian Power Co., Case No. 8182, May 6, 1977,
at 19.
28. Re Appalachian Power Co., Case No. 9091, Interim Order,
May 3, 1978, at 19.
29. Id. at 9, 10.
30. Id. at 10.
31. 13 P.U.R.4th 509 (1976).
32. Id. at 516.
33. Id. at 517.
34. Re Chesapeake & Potomac Tel. Co., 26 P.U.R.4th 29, 29,
36 (1978).
35. Id. at 36.
36. Id. at 36, 37.
37. Re Chesapeake & Potomac Tel. Co., 18 P.U.R.4th 236, 240
(1976).
38. Re Pennzoil Co., 6 P.U.R.4th 189, 194 (1974).
39. Re Consumers Gas Util. Co., 99 P.U.R.3d 206, 208 (1973).
40. Re Columbia Gas of W. Va., Inc., Case No. 8000, June
16, 1976.
41. Re Equitable Gas Co., 17 P.U.R.4th 95, 101 (1976).
42. Re Hope Nat. Gas Co., 27 P.U.R.4th 348, (1978).

43. Id. at 353.
44. Ibid.
45. Re Union Power Co., 13 P.U.R.4th 509, 514 (1976).
46. Re Columbia Gas Co. of W. Va., 20 P.U.R.4th 204, 212 (1977).
47. Id. at 214.
48. Re Union Power Co., 13 P.U.R.4th 509, 519 (1976).
49. Re Union Power Co., 13 P.U.R.4th 509, 514 (1976).
50. Re Monongahela Power Co., Case No. 8809, June 29, 1978 at 11.
51. Re Hope Nat. Gas Co., 16 P.U.R.4th 180 (1976).
52. Re Appalachian Power Co., Case No. 9091, Interim Order, May 3, 1978 at 17.
53. Ibid.
54. Re Hope Nat. Gas Co., 16 P.U.R.4th 180, 185-86 (1976).
55. Re Appalachian Power Co., Case No. 8182, May 6, 1977, at 31.
56. Re Appalachian Power Co., Case No. 9091, May 3, 1978.
57. Id. at 16.
58. Re Appalachian Power Co., Case No. 9091, Interim Order, May 3, 1978, at 5.
59. Id. at 6.
60. Re Monongahela Power Co., Case No. 8127, March 18, 1977, at 18.
61. Re Appalachian Power Co., Case No. 8182, May 6, 1977 at 24.
62. Re Columbia Gas of W. Va., Inc., 20 P.U.R.4th 204, 215 (1977).
63. Id. at 215.

64. Id. at 218.

65. Re Monongehela Power Co., 25 P.U.R.4th 449 (1978).

66. Re Appalachian Power Co., Case No. 7083, Jan. 31, 1975.

67. Re Chesapeake & Potomac Tel. Co. W. Va., Case No. 7496 (1974).

CHAPTER 6

SUMMARY OF IMPEDIMENTS TO IMPLEMENTATION OF ICES

I. Types of Impediments

In order to analyze the extent to which the traditional public utility regulatory system may impede the implementation of ICES, one must first identify what is meant by the word "impediment." For the purposes of this analysis, four broad types of impediments can be identified. The first major category of impediment is the "no-subsidy impediment." This impediment consists of the failure of the government or the regulatory system to provide some desired degree of monetary or other encouragement of ICES. Such subsidies could take the form of grants or tax incentives. On the other hand, a subsidy could result from state public utility regulatory commission (PUC) departure from strictly cost-based rates for purchases and sales of electricity between an ICES and conventional electric utilities, thereby compelling the customers of the electric utility grid to subsidize ICES.

The second major category of impediment is the "uncertainty impediment." The absence of certainty with respect to the manner in which an ICES will be regulated will impose costs that must be borne by the ICES operator. Uncertainty impediments will appear in many forms. ICES will be faced with uncertainty because it represents a new concept which can be

expected to raise issues with which utility regulators are unfamiliar. Such uncertainties will be aggravated as a result of the fact that regulatory jurisdiction in the United States is decentralized. Thus, these uncertainties will have to be resolved largely on a jurisdiction-by-jurisdiction basis. In addition, ICES will necessarily be involved in the sale of excess electrical power to and the purchase of back-up electrical power from conventional electric utilities. These arrangements, however, can be altered by a PUC even though the ICES and utility initially agreed upon the terms. Therefore, ICES will face transactional uncertainties not normally encountered in doing business outside the utility field.

Another major category of impediment is the "discriminatory impediment." This type of impediment takes the form of rules or regulations which, for whatever reasons, affect ICES more harshly than competing energy technologies. These differences in impact may be the result of any number of factors including, but not limited to, ICES size, the type of customers it can be expected to serve and the manner in which it will do business.

The final general category of impediment is the "prohibition impediment." These impediments could be either regulations which impose so substantial a cost on the ICES that it cannot operate economically or regulations which would actually preclude operation of an ICES.

II. Regulatory Impediments to ICES Implementation

The degree and manner in which the existing regulatory system will impede the development of ICES will vary depending on the form of ownership, class of customer and method of doing business chosen by an ICES developer. The ICES type which can be expected to encounter the most serious impediments is the investor-owned ICES seeking to construct a new facility to serve customers in a community already being served by a conventional utility. Such an ICES will face impediments in the form of general PUC regulation, regulations relating to the siting of facilities and the granting of local franchise and regulations concerning rates charged for energy service.

A. General Regulatory Impediments

Public utility regulation probably is more pervasive and complex than any other form of government regulation of business. A businessman not engaged in the utility business may be reluctant to become involved in a business which will subject him to such pervasive governmental regulation. Some examples of areas of regulation which might discourage investors from becoming involved in ICES implementation are the requirement that a regulated utility maintain its books in conformity with a system of accounts prescribed by the PUC and PUC regulation and scrutiny of the financial affairs of the utility. When the ICES is operated in conjunction with a non-utility business, such regulation necessarily will extend beyond the operator's utility operations and involve PUC examination of

its non-utility business. Attempts at minimizing the effects of these types of impediments by setting up a subsidiary corporation to own and operate the ICES could subject the parent company to extensive Securities and Exchange Commission regulation pursuant to the Public Utility Holding Company Act of 1933.

Even if an ICES developer is willing to face the possibility of extensive PUC regulation, it will face a significant uncertainty in determining whether it will be deemed a public utility and therefore subject to PUC regulation. All states require that a utility provide service "to or for the public" before it becomes subject to the jurisdiction of the PUC. Few states, however, have provided any real guidance with respect to the meaning of the phrase "to or for the public." Thus, an ICES operator can expect very little guidance in determining whether its operations will be sufficient to bring it within the classification of "public utility."

Similarly, many states require that a utility "sell" utility service before it will be classified as a public utility. Again, statutes, administrative rules and caselaw provide very little guidance with respect to when a transaction will be classified as a "sale." Thus, the ICES operator must face another significant area of uncertainty with respect to PUC regulation of its operations.

Assuming that some aspects of the ICES operations will bring it within the classification of public utility, a

serious question remains with respect to whether sales of both of the ICES energy streams will be subject to PUC regulation and, if not, whether and by whom the non-PUC regulated energy stream will be regulated. This uncertainty arises because many state statutory schemes provide for the regulation of only certain enumerated utility services such as heat, electricity and gas. In such states, the provisions of refrigeration or motive power may not be within PUC jurisdiction. Regardless of whether these energy streams will be regulated by local governments, or left unregulated, such split regulation may raise significant problems with respect to the marketing of both energy streams at competitive rates.

State territorial assignment programs could present an impediment capable of precluding operation by ICES. Several states have enacted legislation which specifically provides that the PUC is to divide the state into a finite number of service areas and assign each of these service areas exclusively to a particular utility. Where such programs exist, service area assignments have been made and, generally, these programs make no provision for the assignment of service areas to new utilities unless there is some indication that customers are not being adequately served. Even where no specific statutory allocation scheme exists, PUCs generally have sought in granting certificates of public convenience and necessity to avoid what they viewed as wasteful duplication of facilities by granting the first utility serving a given area in effect an exclusive

right to serve that area so long as the utility provides adequate service. Thus, in many cases, an ICES may find that it is precluded from initiating operations as a result of these territorial assignment programs.

B. Siting Impediments

The siting of energy production facilities is regulated in some manner in all states. The types and degree of impediments presented will vary depending on the type of siting program in effect in a particular jurisdiction and the type of facility proposed to be constructed. In those states which have not adopted comprehensive one-stop siting programs, a utility desiring to construct an energy production facility generally must seek approval from a variety of state and local agencies. Because an ICES developer in such a state will be forced to obtain numerous approvals, the procedural requirements related to obtaining such multiple approvals could present significant impediments to the implementation of ICES. In those states which have attempted to minimize the procedural difficulties presented by the need to obtain multiple approvals by implementing one-stop comprehensive siting programs, an ICES operator may face significant impediments in the form of substantive requirements in obtaining the required approval.

C. Local Franchising Impediments

In addition to obtaining certificates of convenience and necessity from PUCs and siting approvals from one or more state agencies, ICES operators generally will be required to

obtain franchises from local governments to use public rights-of-way for transmission and distribution facilities. Because of the total lack of uniformity in the law and procedures governing local franchising, ICES operators will face many uncertainties in this area. One major uncertainty related to whether a franchise is needed or available and, if a franchise is not available, whether this will preclude the use of public rights-of-way in conjunction with the operation of the ICES. Many franchise enabling statutes list specific services which local governments are authorized to franchise. In addition, most statutes require that the franchisee be serving a public purpose in order to be eligible for a franchise. These types of restrictions raise the question of whether, if an ICES is providing a service which is not deemed to be serving a public purpose, a franchise may be granted. If a franchise cannot be granted, significant uncertainty exists with respect to whether the ICES may operate along public rights-of-way without a franchise. If not, it may be precluded from operating unless all facilities are maintained on private property with the permission of the property owners.

Assuming a franchise is available to an ICES, additional uncertainty exists with respect to the procedure pursuant to which the franchise will be granted and the standards which will be applied in determining whether the franchise should be granted. These procedures and standards vary substantially from state to state and from municipality to municipality within each state.

Finally, an ICES which might otherwise be eligible for a franchise may be unable to obtain the necessary franchise as a result of a prior grant of an exclusive franchise to another utility serving the area. Nearly one-half of the states have not resolved the issue of whether exclusive franchises are permissible.

D. Rate Regulation Impediments

Assuming that an ICES operator can overcome or operate in spite of the impediments described above and begin its operations, it must be able to market both energy streams at competitive rates in order to stay in business. Several areas of PUC rate regulation may impede the ICES' ability to operate profitably. For example, an ICES may find that the rates for one energy stream are regulated on a statewide basis by the PUC while the remaining stream is regulated by one or more local governments. With such split jurisdiction, there can be little assurance that rates will be regulated consistently and in such a way as to enable competitive marketing of both energy streams.

Even if both energy streams are regulated by the PUC, resolution of various cost and rate-base allocation issues could present serious issues unique to ICES. Depending on the method chosen to allocate costs and rate base between the two services being marketed, the ICES operator may find that it will be compelled to sell one energy stream at a rate too low for the whole ICES to be profitable while the second energy stream must be sold at a rate too high to be competitive.

In addition, PUCs traditionally have exercised rate-making authority only with respect to sales by conventional utilities operating in a monopoly market. Investment in these conventional utilities traditionally has been considered a low-risk investment and, therefore, the rates of return on equity permitted by PUCs have been commensurately low. Because ICES, as a new industry and as a utility operating in competition with other utilities, will be viewed as a more risky investment, PUC decisions with respect to allowable rates of return will have a significant impact on the ability of ICES to attract investors. Rates of return satisfactory to investors in conventional utilities are unlikely to attract investors to the more risky ICES operations.

Finally, ICES must be able to obtain reasonable rates for sales of excess electrical power to and purchases of back-up electrical power from conventional electric utilities. These rates also will be regulated by PUCs and the PUC determinations will substantially affect the ability of the ICES to operate profitably. The uncertainty surrounding the factors that will be considered by PUCs in establishing these rates is very likely to be perceived as an impediment by prospective ICES operators and investors.

CHAPTER 7

OVERCOMING IMPEDIMENTS TO ICES -- SUMMARY

The Chapter 6 analysis demonstrates that the traditional public utility regulatory system presents numerous impediments to the implementation of ICES. These impediments do not appear in the form of a list of individual statutory or rule provisions which can be easily modified to accommodate ICES. Rather, the impediments take the form of the existing regulatory system itself -- a system which is based largely on a set of assumptions and practices foreign to the ICES concept.

Because the existing regulatory system is, in effect, the major impediment to the implementation of ICES, there are only two available alternatives for dealing with this impediment. Advocates of ICES can attempt to change the system, or they can work within the system in order to demonstrate the value of the ICES concept. Because many of the regulatory provisions which appear to be impediments to the implementation of ICES are integral parts of the existing regulatory system, however, any effort to change the system sufficiently to encourage the widespread implementation of ICES will require changes so fundamental that traditional forces operating within the system would have little trouble blocking such changes. Thus, a widespread effort by the advocates of ICES to change the system may result in a substantial expenditure of resources while bringing about very little change.

There is no single configuration or form of ICES. While differences can result from employing different technologies to produce different energy streams, the most useful classifications for purposes of analyzing potential institutional impediments to the implementation of ICES are those based on type of owner/developer and the nature of the customer group served. The classification scheme used in the following analyses includes ICES-Utility -- an ICES owned and operated by a conventional electric utility, ICES-Complex -- an ICES designed to serve existing institutional complexes such as government, commercial, industrial, residential or medical centers, ICES-Heat Plant -- an ICES providing thermal service for its own use or the use of a limited class of customers and selling all electrical output to a conventional utility, ICES-Co-Op -- an ICES owned by its customers and serving only these member/customers and ICES-Entrepreneur -- an ICES owned and operated by any entity intending to sell or provide utility service at retail to all users within a particular service area. Obviously, additional types, of ICES can be developed by combining these various modes of ownership with the various available customer classes.

ICES may be established gradually in forms that will not encounter, or not be significantly affected by, many of the impediments discussed above. When the various types of ICES are compared against the existing regulatory framework, it is apparent that there is a wide range in the degree of compatibility

between that framework and the various ICES types. The degree to which the implementation of ICES will be impeded by the existing regulatory system varies greatly depending on the form of ownership of the ICES, the number and type of customers which it intends to serve and the manner in which it will conduct its utility operations. Therefore, if advocates of ICES seek implementation along the paths of least resistance, this gradual implementation will provide ICES technology with an opportunity to establish its viability and adapt to the existing regulatory system while permitting the existing system to become familiar with and adapt to the peculiar problems and benefits of ICES. The following may be the most appropriate sequence of implementation of ICES.

I. ICES-Utility

ICES-Utility would include any ICES owned by an existing electric utility and operated as a part of its existing utility business. The utility could either operate its own cogeneration equipment or operate equipment owned by another entity on behalf of the owner. The utility would carry on its electrical operations in the same manner as it had before becoming involved with the ICES, but the particular arrangements for the sale of thermal energy could vary. Thermal energy might be distributed by the ICES-Utility to individual customers or it could be sold in bulk to a single customer for use by that customer or for further distribution by it.

ICES-Utility, because it would be operated by an existing utility, would be least affected by the regulatory impediments discussed in Chapter 6. As an existing utility, the ICES operator would already be subject to PUC regulatory jurisdiction and would have the experience necessary to function within that system with a minimum of inconvenience. In addition, the ICES-Utility might be able to install and maintain its ICES equipment pursuant to existing franchises, certificates or other approvals or obtain minor modifications in these prior approvals so as to permit the ICES operations.

II. ICES-Complex, ICES-Heat Plant

A second approach would be to structure ICES so as to take advantage of traditional exemptions built into the existing regulatory scheme in most states. In all states, a utility must be providing service "to or for the public" before it will be subject to PUC regulatory jurisdiction. In about half of the states, a utility will be subject to PUC jurisdiction only if it is deemed to be making "sales" of energy service. If the ICES is structured so as to either not be deemed to be providing service "to or for the public" or not to be making "sales" of energy services, that ICES would not be subject to PUC regulatory jurisdiction. ICES-Complex and ICES-Heat Plant would be structured so that energy services would be provided only to a limited and clearly defined class of customers. In addition, in many cases, such ICES may be able to provide energy service

as a part of an over-all rental package rather than on an individual metered basis. Such ICES could, in many cases, avoid classification as public utilities. Examples of such

ICES would be an ICES established to serve a residential, industrial, commercial, governmental or university complex.

A great deal of uncertainty exists with respect to what types of service can be provided and to how many customers before a utility will be deemed to be subject to PUC jurisdiction. These uncertainties, however, could be remedied by means of fairly simple legislative or administrative action.

By operating so as to avoid PUC regulatory jurisdiction, these ICES will also give up the protections afforded by the regulatory system. Thus, such ICES may be able to operate in competition with conventional utilities without having to obtain PUC approval, but they also must be capable of waging a competitive battle with the existing utilities in the area to be served because they would not enjoy the luxury of the traditional monopoly status of a public utility. Similarly, such ICES would not be subject to PUC rate regulation but would also possibly not receive adequate regulatory protection in their attempts to negotiate contracts to purchase back-up power from or sell surplus power to conventional utilities.

III. ICES-Co-Op

ICES-Co-Op, unlike the ICES discussed above, could lend itself to broad implementation of ICES. By operating as a

cooperative -- a utility which is owned by its customers and provides service only to these owner/customers -- the ICES-Co-Op could avoid many of the more troublesome aspects of the traditional regulatory system while still enjoying many of its benefits. For example, utility cooperatives are exempted from PUC rate regulation and regulation of financial affairs in many states. On the other hand, utility cooperatives often are subject to service area restrictions and, therefore, are afforded the protections of the various methods of territorial allocations utilized by PUCs.

This traditional utility concept could be utilized by, and modified to better serve, ICES projects intended to serve large numbers of customers. One area of possible modification would be to permit qualifying ICES-Co-Ops to commence operations in service areas of conventional utilities under certain circumstances. Qualifying ICES-Co-Ops could be allowed to serve only large concentrations of new customers or they could be allowed to serve existing concentrations of customers. The prejudicial effect of such an extension of the cooperative concept could be minimized by requiring ICES-Co-Ops to purchase those facilities of the conventional utility within the ICES service area which are necessary for serving the ICES customers and which would be rendered unnecessary to the utility.

IV. Exempt-ICES

By utilizing the ICES types discussed above, advocates of ICES can implement ICES in forms which will be least affected by regulatory impediments in order to establish showcase ICES designed to demonstrate the viability and special benefits of the ICES concept. After these showcase ICES have existed in peaceful coexistence with conventional utilities for a time, conventional utilities, utility regulators and legislators may be more amenable to the type of system modifications necessary to encourage widespread implementation of ICES in many forms. At this point, the advocates of an ICES might effectively petition PUCs and state legislatures to define certain categories of ICES which will be exempt from certain troublesome aspects of the traditional regulatory system while enjoying some of its benefits.

In order to qualify as an Exempt-ICES, the ICES must, of course, be required to establish that it would be a reliable, responsible supplier of energy. Once utility regulators are convinced that the ICES has the financial and technological ability to adequately serve its proposed customers, the ICES could be exempted from many traditional areas of regulation without jeopardizing the best interest of the customers.

The Exempt-ICES should be permitted to commence operations to appropriate groups of customers in the service areas of conventional utilities. However, like the ICES-Co-Op, it should be required to purchase any equipment owned by the conventional utility which is rendered useless as a result of

the ICES being permitted to serve customers within the conventional utility's service area. Once it has established its service area, the Exempt-ICES should receive the type of territorial protection traditionally afforded public utilities.

The Exempt-ICES could also be freed from traditional PUC rate regulation. Rather than establishing traditional cost-based rates, the Exempt-ICES could be permitted to market its energy package at any rate which does not exceed the rates for comparable service from conventional utilities. If the Exempt-ICES believed that it was, for some reason, entitled to higher rates, it should be compelled to submit to traditional rate-making procedures. This should assure that, if the ICES concept is in fact economically viable, investors will be able to achieve sufficient returns on their investment while ICES customers are guaranteed reliable energy service at reasonable rates.