



**PSE&G**

The Energy People

**RETURN TO REGULATORY CENTRAL FILES  
ROOM 016**

**— NOTICE —**

THE ATTACHED FILES ARE OFFICIAL RECORDS OF THE DIVISION OF DOCUMENT CONTROL. THEY HAVE BEEN CHARGED TO YOU FOR A LIMITED TIME PERIOD AND MUST BE RETURNED TO THE RECORDS FACILITY BRANCH 016. PLEASE DO NOT SEND DOCUMENTS CHARGED OUT THROUGH THE MAIL. REMOVAL OF ANY PAGE(S) FROM DOCUMENT FOR REPRODUCTION MUST BE REFERRED TO FILE PERSONNEL.

DEADLINE RETURN DATE \_\_\_\_\_

**REGULATORY DOCKET FILE COPY**

Docket # 50-272

Control # 7808-20041

Date 3/13/78 of Document

**REGULATORY DOCKET FILE**

RECORDS FACILITY BRANCH



# Highlights

	1977	1976	% Change
<b>Financial</b>			
Earnings per average share of Common Stock	\$2.86	\$2.79	3
Shares of Common Stock			
Average	59,243,000	58,308,000	2
Year end	59,806,000	58,976,000	1
Dividends paid per share of Common Stock	\$1.92	\$1.78	8
Total Operating Revenues	\$2,032,795,000	\$1,869,535,000	9
Total Operating Expenses	\$1,735,822,000	\$1,581,097,000	10
Balance Available for Common Stock	\$ 169,177,000	\$ 162,767,000	4
Gross Additions to Utility Plant	\$ 430,675,000	\$ 350,576,000	23
Total Utility Plant	\$5,654,097,000	\$5,255,286,000	8

## Electric Operations

Electric Operating Revenues	\$1,470,118,000	\$1,316,077,000	12
Kilowatthour Sales to Customers	28,404,548,000	27,957,732,000	2
Peak Load — Kilowatts	6,895,000*	6,190,000	11
Cooling Degree Hours	8,269	6,513	27

## Gas Operations

Gas Operating Revenues	\$ 562,677,000	\$ 553,458,000	2
Therm Sales to Customers	1,742,967,000	1,822,726,000	(4)
Maximum Day's Sendout — Therms	14,006,000*	12,803,000	9
Heating Degree Days	5,155	5,349	(4)

\*Record



**PSE&G**

The Energy People

**Public Service Electric and Gas Company**

80 Park Place Newark, New Jersey 07101 201/430-7000

**Annual Meeting**

Please note that the Annual Meeting of Stockholders of the Company will be held in the Company auditorium, 70 Park Place, Newark, New Jersey on Tuesday, April 18, 1978, at 2:00 p.m. A summary of the meeting will be sent to stockholders at a later date.

**Financial and Statistical Review**

A comprehensive statistical supplement to this report, containing financial and operating data for the years 1967-1977, will be available this Spring. If you wish to receive a copy, please write to the Vice President and Treasurer, Public Service Electric and Gas Company, P.O. Box 570, Newark, N.J. 07101.

**Stock Symbol**

**PEG**

**Transfer Agents**

All Stocks  
Morgan Guaranty Trust Company of New York  
30 West Broadway, New York, N.Y. 10015  
Stock Transfer Department  
Public Service Electric and Gas Company  
80 Park Place, Newark, N.J. 07101

**Registrars**

All Stocks  
Fidelity Union Trust Company  
765 Broad Street, Newark, N.J. 07101  
Morgan Guaranty Trust Company of New York  
30 West Broadway, New York, N.Y. 10015

**Contents**

Highlights	(Inside Front Cover)
Message to Shareholders	2
Revenues and Operating Expenses	4
Earnings and Dividends	4
Construction Expenditures	6
Financial Policies and Objectives	7
Electric and Gas Production	7
Gas Supply	9
Transmission and Distribution	11
Commercial and Consumer Affairs	12
Area Development	13
Human Resources	17
Subsidiaries	19
Financial Statement Responsibility	23
Accounting Policies	23
Financial Statements	25
Operating Statistics	34
Financial Statistics	36
Management's Discussion and Analysis of the Statement of Income	38
Independent Accountant's Opinion	39
Organization Chart	40
Officers and Board of Directors	(Inside Back Cover)

**About the cover:** Shown is the new headquarters building planned for PSE&G which has been designed to bring greater efficiency through consolidation of operations and achieve significant savings through energy conservation. Recovery of heat from light, computers and other office equipment is expected to eliminate the need for supplemental heating on all but the coldest days.

PSE&G plans to lease 21 floors of this 26-story office tower plus an adjoining three-story plaza building. The complex will house approximately 3,000 Company employees and provide space for rental by others. The present headquarters building, which adjoins the project site, will be demolished and a landscaped plaza will be developed in its place. Groundbreaking is expected to take place before mid-year.

Many new buildings have been erected in Newark in recent years and this project will further enhance the economy of the City and the State.

(Rendering by Project Architects — Poor, Swanke, Hayden and Connell.)

**PSE&G Territory**







February 22, 1978

## Message to Shareholders

Your Company's revenues exceeded \$2 billion in 1977 — the highest level in our history. Total revenues amounted to \$2.033 billion, up 8.7% over 1976. Earnings showed an increase of \$6.4 million as earnings per share of Common Stock rose from \$2.79 to \$2.86

Quarterly Common Stock dividends were increased 4¢ a share beginning with the second quarter of 1977. The additional dividend brought quarterly payments to 49¢ a share and raised the annual rate from \$1.80 to \$1.96. This increase provides a strong indication of the importance your management attaches to increasing stockholder return. Future dividend increases will, of course, depend upon the continued satisfactory financial condition of the Company.

The imposition of a moratorium on new gas customers as the result of supply problems early in 1977, and the continued hesitancy in New Jersey's recovery from the economic recession, served to dampen sales growth in both the electric and gas areas. Kilowatthour sales were up a modest 1.6%. Therm sales declined 4.4%. Conservation, loss of customers and relatively mild weather late in 1977, in addition to the moratorium, affected gas sales.

Late in 1977, as a consequence of increased gas availability, we petitioned the New Jersey Board of Public Utilities to lift the moratorium on new gas sales and permit us to take on customers at the rate of 4.8 billion cubic feet per

year, about 3% of our annual sendout. On January 5, 1978, the Board granted the Company's request with an order permitting us to take on new industrial customers immediately. The moratorium on small commercial and residential customers was lifted effective March 1, 1978. An encouraging report on the "1978 Economic Outlook for New Jersey," made by the State's Economic Policy Council, predicts a 5% rate of real economic growth — which should be reflected in both electric and gas sales.

Utilities today, particularly electric utilities, are operating in a vacuum of uncertainty. Prior to 1973, electric loads could be predicted 10 years in advance with reasonable accuracy. In our case the growth rate was 6 to 7% and we could plan on that basis because the factors influencing that growth rate were fairly visible. Today, individuals and companies, extremely conscious of the cost of energy, are continuously seeking ways to reduce their energy consumption by changing life-styles and patterns of use. These changes are influencing the demand for energy but the extent and magnitude of that influence is presently unpredictable. A year ago we predicted an electric peak demand growth rate of 4%. Now, on the basis of our experience in 1977, particularly during the hot summer period, we are predicting a long-range growth rate of 3%.

A change in the forecast of electric peak demand calls for changes in our electric generation construction program because that program is based on large nuclear generating units which require long lead time — 10 years or more — and large capital expenditures prior to operation. It was because of the reduction in growth rate from 4% to 3% that we requested Offshore Power Systems to delay the delivery of each of our four floating nuclear units for three years. The first two of these units, originally scheduled for operation in 1985 and 1987, are now scheduled for 1988 and 1990. We have negotiated an agreement with Offshore Power Systems, a division of Westinghouse Corporation, which limits our liability under the contract for the floating units to that which was incurred as of the end of 1977 until a clearer picture of the demand for electric energy emerges.

The uncertainty which plagues utilities has been compounded by a lack of decision on federal energy policy. There seems to be general agreement that we must reduce our dependence on foreign oil and that we must basically rely on both coal and nuclear power for new electric generation until the end of this century. With regard to nuclear, although the announced federal policy appears to endorse the development of light water reactors — the type we are installing — there appears to be no real substance to that endorsement. Members of the federal administration have confused the public with anti-nuclear attitudes, particularly with regard to non-proliferation and the breeder reactor. The lack of strong and positive support for the light water reactor program reflects it-



self in delayed licensing procedures and encouragement of intervenors, which results in higher than necessary plant costs as well as increased uncertainty.

Despite these handicaps, our nuclear program is moving forward. The first of two 1,100 megawatt units at Salem went into full commercial operation in mid-1977. Construction is proceeding on the second unit at Salem which is scheduled for service in 1979. After a number of licensing delays, construction began on the two units at Hope Creek which are presently scheduled for 1984 and 1986 operation.

The lack of a federal policy on liquefied natural gas (LNG) imports has raised questions concerning our proposed program to import LNG from Algeria. Federal Department of Energy hearings, designed to obtain the information necessary to develop a federal policy, were held early in January 1978. We hope the policy developed will enable us to proceed with the Algerian project. Algonquin Gas Transmission Company withdrew from the venture in June 1977 and, having reached tentative agreement with potential customers, we are planning to restructure the project at 60% of the original 4.4 trillion cubic feet over a 22 year period. Permits to utilize the two storage tanks which we own in Rossville, Staten Island, N.Y. still have to be obtained.

The Company gas supply situation improved during the latter part of 1977 because of conservation and attrition, as well as basic supply increases, and we are predicting a modest growth of about 2% in gas sales. Our subsidiary Energy Development Corporation, for instance, is continuing to provide increasing quantities of gas from its successful exploration efforts in the Gulf Coast area.

Our prospects for additional gas sales will be enhanced if our proposed merger with New Jersey Natural Gas Company proceeds to a satisfactory conclusion. An agreement in principle has been reached with the directors of New Jersey Natural. The merger still needs the approval of the stockholders of New Jersey Natural and the Board of Public Utilities. If the merger is accomplished, the potential for sales growth is indicated by the fact that New Jersey Natural's territory has only 130 customers per square mile in a developing area compared to 550 customers per square mile in Public Service territory.

On November 21, 1977 the Company filed with the Board of Public Utilities for a rate increase of nearly \$395 million, \$304 million in electric rates and \$91 million in gas rates. This step was absolutely necessary to maintain the Company's financial integrity and to continue to provide safe and reliable service to our customers in the face of persistent inflation and increases in all costs of doing business. Hearings began on January 4, 1978 and an early decision in the case is anticipated.

Partly as a result of an audit of management effectiveness conducted by McKinsey & Company a number of changes in the structure of the organization were made during 1977. The

changes, together with a chart of the new organization, are shown on page 40. Basically, the reorganization was instituted to increase the effectiveness of the Company in meeting the challenges of a changing industry.

The establishment of a wholly-owned research subsidiary, PSE&G Research Corporation, was a part of the reorganization. This subsidiary will coordinate all of the Company's research activities and market the research and testing laboratory capabilities of the Company as a source of income.


Rate design, load forecasting, load management and market planning activities were combined in 1977 to enable us to accelerate responses to rapidly changing conditions and eliminate lag during critical periods.

Our territory, as well as that of other utilities in the northeastern part of the country, appears to be lagging behind the rest of the nation in recovering from the economic recession. To speed the recovery, our area development group has increased its level of activity with positive results. The State government is embarking on an all-out campaign to create jobs and bring business and industry to New Jersey. The recently created State Department of Energy, which has coordinating responsibility for energy planning and allocation within the State, is dedicated to improving the industrial climate in New Jersey as evidenced by the decision to release additional gas to industrial customers prior to the release to residential customers.

Negotiations with our union-represented employees were successfully concluded during the year. A three year contract, effective May 1, 1977, provides for wage increases of 7% in 1977, 6.69% in 1978, and a wage reopener for the contract year expiring April 30, 1980.

In this era of uncertainty we must act promptly when positive signs appear. The Company has dedicated and talented employees who appreciate the need for flexibility in these rapidly changing times. They are our most valuable resource in meeting our future responsibilities to the State as a whole and to our customers and investors, wherever they may be.

To you, our shareholders, go our thanks for your support in 1977 and our pledge to continue earning that support in the future.

  
Robert I. Smith,  
Chairman of the Board  
and Chief Executive Officer

  
John F. Betz, President



**Revenues Exceed \$2 Billion**

In 1977, revenues passed the \$2 billion mark for the first time as they rose \$163 million, or 8.7% over the 1976 total, to \$2.033 billion. Most of the increase, about \$112 million, represented rate rises for gas and electric service made effective in October 1976.

Electric revenues, up 11.7% to \$1.470 billion, contributed 72% of total revenues. The other 28% came from gas revenues which increased 1.7% to \$563 million although therm unit sales declined from the 1976 level.

The sources of 1977 revenues by customer classification were:

	Electric	Gas	Combined
Residential	34%	61%	41%
Commercial	36	25	33
Industrial	28	14	24
Street Lighting and other	2	—	2
Total	100%	100%	100%

**Operating Expenses Up 10%**

Total operating expenses increased 9.8% or \$155 million over 1976 to reach \$1.7 billion. The modest increase of 1.3% in the system output of electricity was accompanied by an 11% rise in fuel and interchanged energy costs. The major cost factor was the greater use of oil for generation with its 16% increase in the average cost during 1977.

Higher costs of fossil fuels were tempered by increases in nuclear energy from the two Peach Bottom units operated by Philadelphia Electric Company and the Salem Generating Station Unit 1 operated by PSE&G. The Salem unit went into commercial operation on June 30, 1977.

Although gas sendout dropped 4.4% compared to 1976, gas costs declined only 1.3%. This resulted primarily from the need to manufacture the more expensive synthetic natural gas due to curtailments by our principal pipeline suppliers during the record cold weather in January and February of 1977.

Labor costs rose \$22.5 million, due in part to wage increases negotiated with union-represented employees during the year.

Expenses to maintain Company property and equipment increased \$25 million to \$125 million, or 25% over the 1976 level. This increase resulted from more maintenance on electric generation equipment as well as electric and gas distribution facilities.

Depreciation charges went up \$15 million, a reflection of higher depreciation rates allowed in the last rate case and Salem 1 going into service.

**The 1977 Income Dollar**

**Where It Came From**

<b>\$.71</b>	Electric Revenues
<b>.27</b>	Gas Revenues
<b>.02</b>	Allowance For Funds Used During Construction

**\$1.00**

**Where It Went**

<b>\$.38</b>	Fuel, Purchased Power and Gas
<b>.11</b>	Salaries and Wages
<b>.07</b>	Materials and Services
<b>.18</b>	Taxes
<b>.06</b>	Interest
<b>.08</b>	Dividends
<b>.12</b>	Reinvested in Business

**\$1.00**

**Earnings and Dividends Rise**

Earnings per share for Common Stock rose to \$2.86 from \$2.79 in 1976. The number of average shares outstanding increased during 1977 from 58,308,000 to 59,243,000.

Dividends on the Common Stock were increased to an annual rate of \$1.96 a share from \$1.80 in 1976 commencing with the June 30, 1977 quarterly payment. The Company paid dividends of \$1.92 per share of Common Stock during 1977 as compared to \$1.78 per share in

1976. The quarterly rate had been raised during 1976 from 43 to 45 cents.

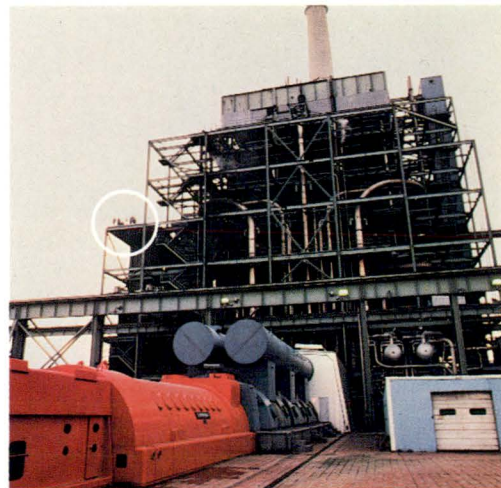
The Company's Common Stock and the \$1.40 Dividend Preference Common Stock are traded on the New York Stock Exchange. The Common Stock is also listed on the Philadelphia Stock Exchange. The following table indicates the quarterly dividends paid and the range of trading prices for the last two years.



	Common Stock		\$1.40 Dividend Preference Common Stock	
	1977	1976	1977	1976
Quarterly Dividends Paid Per Share	\$ .49*	\$ .45**	\$ .35	\$ .35
Price Range				
First Quarter	24½-21½	20¼-17⅝	17⅞-16¼	16-14½
Second Quarter	25⅛-22	19⅞-18	17-16⅛	15⅞-14⅝
Third Quarter	26⅛-23¾	23⅛-19¼	17¼-16⅛	16⅞-15
Fourth Quarter	25⅛-22⅛	23⅞-21¾	16⅞-16	16¾-15⅝

\* \$.45 first quarter only    \*\* \$.43 first quarter only

Exterior view of Hudson Generating Station. Board members (part of group within circle) were given insight into station operations.



Two of the most recently elected members of the Board of Directors, Stewart G. Pollock and Milton Perlmutter, toured various Company locations. Scene here is at the Hudson Generating Station control room with Ted Light, Manager, pointing out details of control room instrumentation.





## Rate Increases Requested

On November 21, 1977 we petitioned the New Jersey Board of Public Utilities for rate increases to produce additional annual revenues totaling \$395 million. This amount includes \$304 million for electric service and \$91 million for gas.

Our last rate increase, effective October 21, 1976, was based on our costs of providing service during the 12 months ended June 30, 1976. By the time a decision is reached in the current case, our present rates will be based on costs experienced more than two years ago. The cost of labor, a major factor, continues to rise — \$19 million in 1977-78, and another \$20 million in 1978-79 as established by a new wage agreement effective May 1977.

In addition, two other substantial cost factors involve the lengthy lead time required to design and construct new generating stations and the meeting of pollution control and environmental regulations. The cost of satisfying these regulations is now more than \$160 million a year, and this total can be expected to increase.

In our petition for rate increases, we also proposed that fuel and raw material costs be rolled into the base rates. (A favorable ruling was issued effective February 1, 1978.)

Gross receipts and franchise taxes, which we pay to the State of New Jersey and to municipalities, have nearly tripled since 1970. These taxes amounted to \$270 million in 1977 and can be expected to grow larger each year.

Late in 1977, the State of Pennsylvania enacted a gross receipts tax on electric utilities that own shares in Pennsylvania power plants and export power to service their customers. This tax, which is retroactive to January 1, 1977, cost PSE&G about \$7.2 million for 1977 because of the Company's substantial interests in three generating plants in Pennsylvania. The tax rate is 4.5% on an apportionment basis. The Company expects to join with other utilities in legal action to challenge the constitutionality of the new tax.

## Construction Expenditures Increase

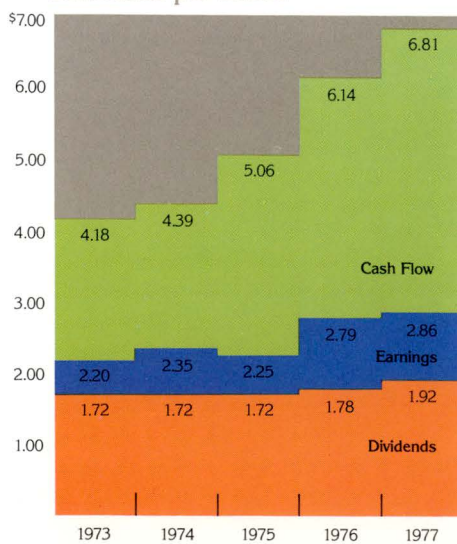
Construction expenditures, including payments for nuclear fuel and advances to subsidiaries, rose to \$411 million in 1977 from \$333 million in 1976. Expenditures for 1978 are estimated at \$565 million. This figure represents a downward revision from earlier estimates because a recent load forecast indicated future demands for electricity and gas in our service area will increase at slower rates than previously anticipated. These

revised load estimates have resulted in the deferral of in-service dates for certain major projects as discussed under Nuclear Generating Facilities.

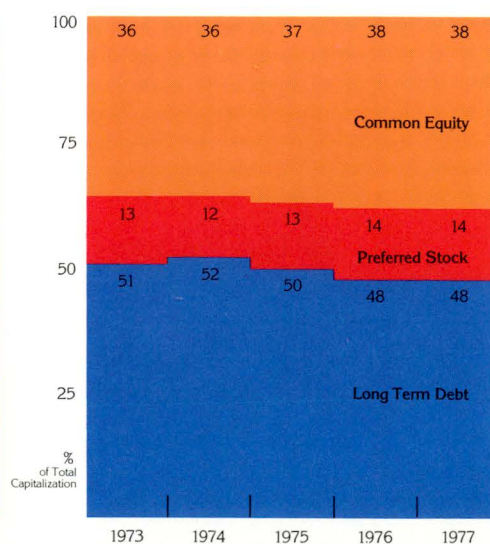
Assuming adequate future rate increases, the Company expects to provide between 40% and 50% of its construction expenditure requirements through 1982 from internal sources.

Construction estimates for the years 1978

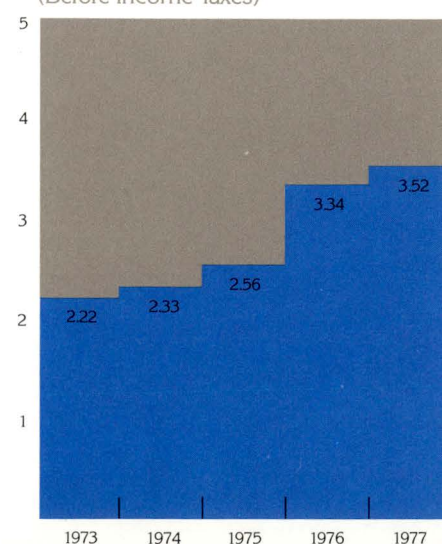
### Cash Flow, Earnings and Dividends per Share



### Capitalization Ratios



### Times Fixed Charges Earned (Before Income Taxes)





through 1982, including nuclear fuel but excluding allowance for funds used during construction are as shown. The figures include a total of \$619 million for the Atlantic Generating Station.

#### Estimated Expenditures

Year	1978	1979	1980	1981	1982
Total (Millions)	\$565	\$616	\$677	\$862	\$823

#### Financing

The Company raised \$234 million in 1977 through sales of new securities including First and Refunding Mortgage Bonds, Common Stock, and Preferred Stock.

In June, an offering of \$125 million of 8¼% First and Refunding Mortgage Bonds was completed. The proceeds were used to pay short-term obligations including those incurred in May when the Company purchased, through a tender offer, \$84 million principal amount of the \$98 million outstanding First and Refunding Mortgage Bonds, 12% Series E due 2004.

In September, PSE&G sold \$60 million principal amount of 8⅞% First and Refunding Mortgage Bonds and 300,000 shares of 8.16%

Cumulative Preferred Stock (Par value \$100) for \$30 million.

In addition, the Company raised \$15 million through sales of 666,899 shares of Common Stock to PSE&G stockholders through the Automatic Dividend Reinvestment Plan and \$4 million from the issuance of 163,270 shares under the Company's Tax Reduction Act Employee Stock Ownership Plan.

Commercial paper and bank notes were sold at various times during the year to satisfy short-term needs. The Company's outstanding short-term debt was \$97 million at year end.

In 1978, we expect to raise about \$300 million from sales of long-term securities.

#### Stockholders

Stockholders of record at the end of 1977 totaled 260,270, including 212,640 holders of Common Stock, 14,064 holders of \$1.40 Dividend Preference Common Stock, and 33,566 holders of Preferred Stock. At year end, the number of Common Stock holders participating

in the Automatic Dividend Reinvestment Plan had grown to 31,437 from 25,507 a year earlier. Effective with the June 30 dividend, participants in the plan were permitted to reinvest their dividends in additional shares at a 5% discount from market price.

#### Financial Policies and Objectives

Your Company's financial policies continue to reflect management's strong commitment to maintain PSE&G in a sound financial condition. Financial strength and stability must be maintained if we are to successfully compete for the new capital required to finance our construction program in the future.

The principal elements of our long-range financial policy continue to be a sound capital structure comprised of approximately 48% debt, 13% preferred stock, and 39% common equity; the practice of following conservative accounting principles; strong cash flow, high quality

earnings, and the maintenance of high quality credit ratings for all our securities. We have made significant progress in recent years toward achieving these goals.

We will continue to strive for a fair return on our invested capital in order to properly compensate the shareholders for the use of their funds. A sound financial condition, a fair return on capital and an attractive dividend policy are all essential factors in achieving a market price for PSE&G's Common Stock at a reasonable premium over book value.

#### Electric and Gas Production

Electric output increased slightly in 1977. Total kilowatthours produced, purchased, and interchanged totaled 30.8 billion, a modest increase over 1976.

The year's peak demand of 6,895 megawatts occurred on July 21, 1977. This was 11.4% greater than the hourly peak reached in 1976. It also established a new hourly peak for PSE&G, surpassing the previous mark of 6,816 megawatts reached in 1973. The 1977 maximum day's output of 133,266,000 kilowatt-hours also occurred on July 21 and was 13.8% larger than the 1976 highest daily output. However, both the peak and output were influenced by the higher Summer temperatures in 1977

compared to 1976 and weather-corrected figures indicate differentials at only 1 to 2%.

Total sendout of gas was 1.8 billion therms, 4.4% less than the 1976 amount. In 1977, the highest sendout for a single day was 14,006,000 therms on January 17 when the temperature averaged 2.6°F. This sendout, a new record for a single day, was 9.4% greater than the 1976 single day sendout high of 12,803,000 therms on February 2 when the temperature averaged 12°F. The 1977 record was 8.8% greater than the previous record 24-hour sendout of 12,872,000 therms reached on February 1, 1971 when the temperature averaged 10°F.



## Generating Capacity

The Company's installed generating capacity at the end of 1977 reached 9,247 megawatts, an increase of 506 megawatts from a year earlier, and a new high for PSE&G. Our reserve at the 1977 peak was 34.1%, based on the installed generating capacity. The increase in capacity during 1977 is basically the result of the Salem Generating Station Unit 1 being placed in commercial production on June 30. Salem 1, the first nuclear unit to be designed and operated by our Company, can produce 1,079 megawatts at full output.

The peaks, installed capacity and reserves expected for the next ten years are as shown.

## Generating Capacity Forecast

Year	Peak Load	Installed Capacity	% Reserve
(Megawatts)			
1978	6,940	9,028	30
1979	7,250	9,383	29
1980	7,500	9,383	25
1981	7,750	9,383	21
1982	8,000	9,503	19
1983	8,250	9,783	19
1984	8,500	9,783	15
1985	8,775	10,458	19
1986	9,075	11,060	22
1987	9,400	11,060	18

## Nuclear Generating Facilities

Our Company generated 17% of its total electric output in 1977 from nuclear energy compared to 16% in 1976. Our nuclear capacity rose during the year to 14.6% from 10.1% in 1976.

Construction continued on Salem Generating Station Unit 2 and was 85% complete at year end. This 1,115 megawatt unit, which will add 475 megawatts of nuclear capacity to our system, is scheduled to enter commercial operation in mid-1979. When this unit delivers full power output, it will lift our Company's nuclear generation to 19.4% of total electric production.

PSE&G and Philadelphia Electric Company each are entitled to 42.59% of Salem's output while Atlantic City Electric Company and Delmarva Power & Light Company are each entitled to 7.41%.

Construction also continued on Hope Creek Generating Station, where work was started in 1976 following a number of delays. The main excavation, 70 feet deep, was completed in May 1977. The initial structural concrete pouring on August 30, 1977 involved the 14-foot thick basemat which will provide the main support for the nuclear units.

The two nuclear units at Hope Creek are scheduled to enter commercial operation in 1984 and 1986, respectively. PSE&G, which owns 95% of the Hope Creek Generating Station, is entitled to 1,014 megawatts from Unit 1 and 1,013 megawatts from Unit 2. Atlantic City Electric Company, with a 5% ownership interest in each, is entitled to a total of 107 megawatts.

Efforts continued in 1977 to obtain the licenses and permits required to construct Atlantic Generating Station. PSE&G will own 80% of each 1,150 megawatt unit while Atlantic City Electric Company and Jersey Central Power & Light Company will each own 10%.

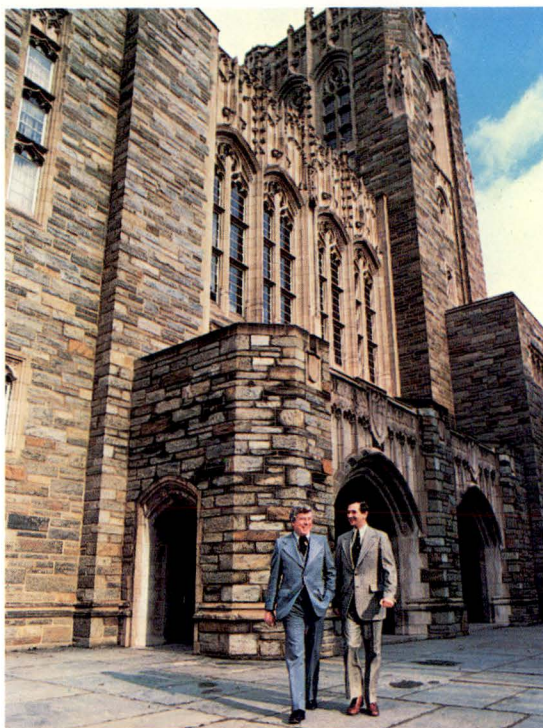
The Nuclear Regulatory Commission (NRC) also conducted hearings on the application of Offshore Power Systems (OPS) for a manufacturing license to construct barge-mounted nuclear powered units. OPS, which applied to the NRC for a license early in 1973, hopes for a decision in 1978. In December 1975, the NRC's Advisory Committee on Reactor Safeguards had issued an interim report indicating that, subject to completion of their review, the barge-mounted nuclear units could be constructed and operated without undue risk to the health and safety of the public.

Because of decreases in projected demand and uncertainties surrounding the rate of future growth, the Company requested and received a three-year delay in delivery of these units and a modification of our contract with OPS. This modification provides for reduced payments



The Salem Generating Station Unit #2 was 85% complete at year end and when put into commercial operation in mid-1979, will raise the station's capacity to 2,200,000 kilowatts. The Hope Creek site can be seen at top of photo.





Richard S. Faltin, Senior Vice President, Arete Publishing Company, discussing plans with William T. Nolan of K. S. Sweet Associates, Project Managers for Princeton University's research development. Princeton Library, being heavily utilized by Arete, is in background.

Approximately 25% of the nation's private research dollars are expended in New Jersey with a large concentration of this activity within a 25-mile radius of Princeton. This remarkable core of research and development facilities continues to attract and stimulate business activity.

Princeton University, with the objective of creating a practical relationship between the academic sector and the corporate world, is developing the Princeton Forrestal Center, a 1600-acre research and office complex adjoining its main campus. By providing access to the University's facilities, they have been successful in attracting a large variety of major research-oriented organizations.

during the deferral period. It also limits our exposure under the contract until the end of 1979 to the liabilities that had been incurred to December 29, 1977. This modification will allow OPS to continue to seek its manufacturing license and allow us to work with the New Jersey State Department of Energy and other governmental agencies to select the best sites for the floating generating facilities. Additional time

also will be available to evaluate our capacity requirements for the 1990's and thereafter.

No positive assurance can be given that necessary licenses for the equipment and site permits will be forthcoming or that these facilities will be completed. If as the result of future developments this project is not completed, the ultimate realization of our investments in these facilities, as with any major project of this type, will depend upon the sale of the Company's interests under the OPS contract and the treatment that is accorded the investment for rate-making purposes.

Both the projected Atlantic Station and the station at Hope Creek under construction will require additional permits from the New Jersey Department of Environmental Protection as well as from other state and federal agencies.

The Company's expenditures for its nuclear projects, excluding nuclear fuel, at the end of 1977 were: \$440 million for Salem; \$357 million for Hope Creek; and \$215 million for Atlantic excluding allowance for funds used during construction of \$102 million, \$43 million and \$36 million, respectively.

## Fuel for Electric Generation

The Company's supplies of fossil fuels remained adequate for its production needs in 1977. Coal prices remained relatively stable throughout the year. Declines in the cost of coal at the mine were offset by higher transportation costs. The net result was that the delivered cost of coal rose an average of 7.4% over the average delivered price in 1976.

Prices of heavy oil rose an average of 15.1% over 1976 while light oil increased an average of 16.7%. Heavy oil prices had risen rapidly in the first quarter when extremely cold weather caused a sudden shortage, but eased for most of the rest of the year.

Both oil and coal are expected to cost more in 1978. Oil prices should increase moderately as a result of anticipated actions by the OPEC nations, and also as a result of President Carter's proposed energy plan. Higher coal prices are expected in 1978 mainly because of new mine worker union agreements and also because of higher costs stemming from the Surface Mining Control and Reclamation Act of 1977.

The Company moved closer in 1977 to its goal of insuring that supplies of uranium will be adequate to meet the needs of all its nuclear generating units.

PSE&G has sufficient material and services

under contract to operate Salem 1 and 2 into 1980. The Company has also been advised by Philadelphia Electric Company that contracts have been negotiated to provide enough nuclear fuel to operate Peach Bottom 2 and 3 into 1985. In addition, the Company's agreements with Kerr-McGee Nuclear Corporation and with Homestake Mining Company are expected to provide the fuel required to operate Salem and Hope Creek Generating Stations from 1980 through 1995. Preparation for mining has started in one of three projected Kerr-McGee mines. Over-burden stripping for the open pit mine was completed in 1977 with mining scheduled to start in 1978. The Homestake Mining exploration program has found additional proven reserves to bring total reserves to about 2 million pounds. The first phase of the exploration program - with a target of 3 million pounds of proven reserves - is expected to be completed in 1978. The exploration program will be continued in phases until enough reserves are proven to develop a mining and milling complex.

Market prices of uranium stabilized in 1977 after substantial increases in 1976. In addition to an essentially constant price level, uranium also became more plentiful to buyers on an open market basis.



## Gas Supply

The Company's daily gas capacity, excluding the effect of pipeline curtailments, as of December 31, 1977 was:

Type of Gas	Therms Per Day
Natural Gas	13,892,000
Liquefied Petroleum Gas	2,068,000
Oil Gas	1,393,000
Synthetic Natural Gas	1,325,000
Refinery Gas	255,000
	18,933,000

The capacity to store gas underground for use during the winter heating season was increased from 400 million therms in 1976 to 414 million therms in 1977. The Company entered into new short-term contracts with Texas Eastern Gas Pipeline Company and Transcontinental Gas Pipe Line Corporation for a total of 75 million therms of storage service and terminated 61 million therms of storage service provided by Transcontinental Gas Supply Corporation.

## Natural Gas

The daily supply of natural gas included in the total capacity declined to 13,892,000 therms from 14,257,000 therms at the end of 1976. About 48% of the daily natural gas capacity is composed of high-load-factor gas which is available every day of the year. The remainder of the gas comes from field storage, liquefied storage, and contract peaking supply.

In 1977, PSE&G bought and used in send-out to customers 1.6 billion therms of natural gas, including storage gas. This was a decrease of 125 million therms or 7% compared with 1976, resulting from lower sales coupled with less natural gas from pipelines during the cold January and February of 1977. The available supply of natural gas increased, however, later in 1977. This was due to greater pipeline deliveries and to larger quantities from Energy Develop-

ment Corporation (EDC), the Company's exploration and development subsidiary. This allowed storage inventories to be replenished and even increased with additional natural gas purchases. Curtailments averaged 29%, or 1.9 million therms a day in 1977 compared with 31% or 2.1 million therms a day in 1976. The 1977 curtailments marked the first decline since 1971, the year they started.

At year end, natural gas was being delivered by EDC at the rate of 111,000 therms a day. This rate is expected to increase as additional wells are drilled. Additional information on EDC will be found on pages 19 and 20.

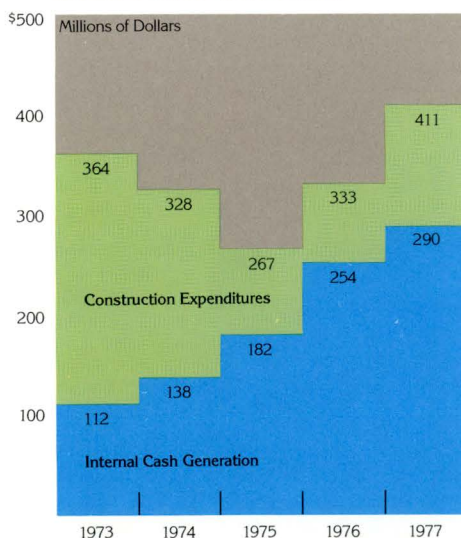
Cost of natural gas to PSE&G averaged \$1.31 a million BTU's, an increase of 19¢ over the average in 1976.

## Refinery Gas

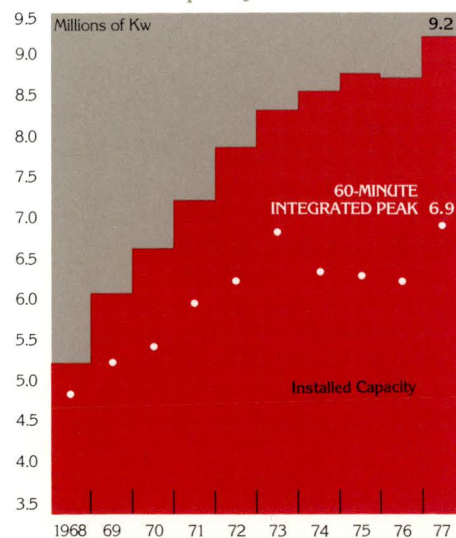
The Company bought 98 million therms of refinery gas in 1977 from Exxon's New Jersey refinery. This gas accounted for 5% of PSE&G's

total gas supply for the year. The cost of this gas averaged \$3.17 a million BTU compared with \$2.82 in 1976.

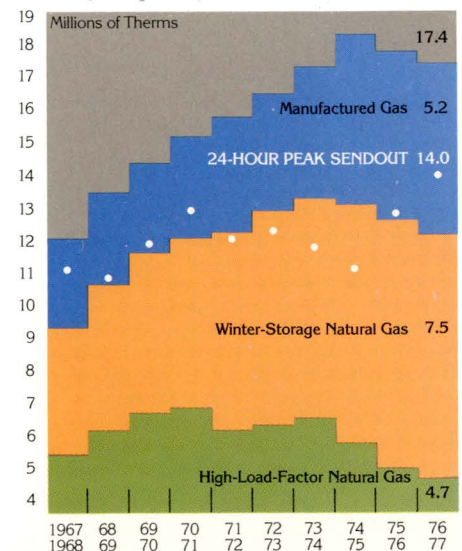
### Construction Expenditures and Internal Cash Generation



### Electric Peak Load and Installed Capacity at Time of Peak



### Gas Peak Sendout and Daily Capacity at Time of Peak





## Supplementary Gas Supply

To supplement its supplies of purchased natural gas and refinery gas, the Company manufactures synthetic natural gas (SNG) from naphtha, oil gas made from kerosene and liquefied petroleum gas produced from propane. The daily capacity for producing these gases is 4,786,000 therms, a decrease of 117,000 therms from

1976. Total production in 1977 rose to 103 million therms, or 61 million more than in 1976. This additional production was necessitated by abnormally cold weather in January and February of 1977. These manufactured gases amounted to 6% of PSE&G's total gas sendout during the year.

## Transmission and Distribution

Our electric transmission system was expanded considerably in 1977. The Company's bulk power capability in northern and central New Jersey was substantially strengthened with the completion of a 500,000 volt overhead line, two 230,000 volt overhead lines, and the interconnection of a new substation to provide additional circuits. A 500,000 volt line linking New Jersey and Delaware was also completed. This line, placed in service in December, will improve the reliability of power transmission from Salem Generating Station to PSE&G customers and also to customers of other utilities that share in the Salem station's output.

The Company's electric distribution system was also expanded by the installation of three substations. Three unit substations of limited capacity were discontinued during the year. In addition, three new 26,000 volt subtransmission circuits and eight new 13,000 volt distribution

circuits were installed while four 4,000 volt distribution circuits were discontinued in 1977.

In December, an advanced computer system — Supervisory Control and Data Acquisition (SCADA) — was placed in service in the Camden Division to help defer the need for installation of additional substation and switching facilities. SCADA will also improve distribution operations and speed service restoration.

Gas distribution operations were adversely affected by severe weather conditions at various times. In January 1977, low natural gas supplies during the extremely cold weather forced us to curtail service to some firm industrial and commercial customers for the first time in the Company's 74-year history. In November, several service areas were flooded by torrential rains causing interruption of service to some customers.

Charles L. Hiltzheimer, Chairman, and Henry L. Gilbertson, President of Sea-Land Service, Inc. — the world's largest containerized transportation firm — at their corporate headquarters in Edison, New Jersey.

Proportionate to size, New Jersey has more linear miles of railway/highway/super-highway/ and more square miles of airport, railroad yard and seaport than any other state. More cars, trucks, buses, railroads, airplanes and ships move into, through and about New Jersey than any similar area on earth.

The Newark/Elizabeth area is one of the busiest and largest transportation hubs in the world. Located here are two major ports

handling more than 60% of the total tonnage coming through the Port of New York-New Jersey; the new Newark International Airport, built at a cost of \$500 million; the tracks of five major railroads, now consolidated under Conrail; and, surrounding the complex, five major highways including the New Jersey Turnpike — the nation's busiest roadway.



Sea-Land Service is the largest containerized shipping company in the world. It has 130 offices and terminals worldwide, 8,000 employees and serves 36 ports in 50 countries. Sea-Land is one of the few shipping firms operating without the benefit of government subsidy.

Newark International Airport is served by 20 of the country's domestic and overseas airlines and in 1977 handled eight million passengers.



---

### Energy Pooling Progresses

As mentioned above, two important sections of the Lower Delaware Valley transmission system were completed in 1977 with the construction of two 500,000 volt lines. The lines linked Deans Substation with Branchburg Substation in Central New Jersey, and Salem Generating Station with the Delmarva Power & Light Company's Keeney Substation, located across the Delaware River from Salem.

PSE&G and Consolidated Edison Company agreed to provide additional interconnections between their systems. The plan calls for the construction by 1982 of two 345,000 volt lines to connect the two systems. In addition, PSE&G is to expand its transmission facilities so that it can deliver more power to New York City. The Company will be fully compensated by Con Edison.

---

### Commercial and Consumer Affairs

A new Customer Payment Processing Center was opened in March 1977 in Metro Park, Woodbridge centralizing the receipt, crediting, and depositing of customer mail payments formerly handled in each commercial office.

Service to customers was further improved in December with the installation in commercial offices of equipment to electronically display customer information. This interim system will improve response time for customer inquiries until replaced by a more sophisticated information system now under development.

Marketing personnel continued to capitalize

on off peak load opportunities, such as dusk-to-dawn lighting and electric space heating. Over 3,500 dusk-to-dawn installations were made resulting in a year-end total of 46,000. Electric space heating installations totaled 1,640 representing 44,543 kilowatts. Total electric heating load now exceeds 825,000 kilowatts.

Stalled contract negotiations with the union representing employees in commercial offices caused a three-week work stoppage from mid-June to early July. Management and supervisors staffed the offices, limiting the effect on Company operations.

---

### Conservation

Tests conducted by PSE&G and Princeton University's Center for Environmental Studies have demonstrated the electric heat pump to be an energy efficient way of heating and cooling homes. We anticipate that the use of heat pumps will become a significant source of increased revenue for the Company. Some builders are already installing heat pumps in a number of major new housing developments. Over 36% of the 935 heat pumps connected to

our lines at year end were added during 1977.

Additional evidence of the Company's continuing dedication to conservation is the PSE&G Home Insulation and Energy Conservation Program which commenced in September. The focus is on providing customers with information on a wide variety of conservation options both technical and financial. The program has been well received. In a little over three months, 2,400 customers have been assisted.

---

### Interruptible Service

Linden Chlorine Products Inc. is one of seven electric customers whose service can be interrupted when power is needed elsewhere. By initiating interruptible electric service, costs for expensive peaking capacity can be kept to a minimum.



Interruptions to gas customers served under interruptible contracts totaled 102 calendar days in 1977 compared with 175 days in 1976. The number of interruptible customers declined from 76 to 74. Revenues from interruptible customers rose 77% to \$35 million as therm sales rose 40% from 1976.

We initiated lower rate interruptible electric service early in 1977. By the end of the year, seven customers using a total of 87,729 kilowatts had signed contracts for the new service. During the year these customers had their electric service interrupted six times for a total of 45 hours.

---

### Load Management

A two-year experiment to determine how electric rate schedules adjusted to time-of-day use may affect consumption patterns was started by PSE&G late in 1977. New meters to record electricity use on a 24-hour cycle were installed in the homes of several hundred residential cus-

tomers and billings based on the new rate structure started November 15. Three different rate schedules will be used for purposes of comparison in compiling the data.

The purpose of the experiment is to see if lower rates in off-peak hours can offer enough



incentive for customers to shift some of their electric consumption from peak periods to times of low demand. If enough demand can be switched from peak periods, the result would mean financial savings by reducing the need for new peak capacity. In addition, a successful load

management program could also increase the efficiency of our energy generation. Greater off-peak use of available capacity could also save our customers money by cutting our dependence on oil in favor of the cheaper energy sources — coal and nuclear fuel.

## Area Development

Industrial and commercial development continued to expand within the Company's service territory in 1977. The number of companies seeking locations for offices, distribution and manufacturing facilities, stores and other commercial enterprises increased as the national economy gained strength.

A total of 487 industrial and commercial firms, employing about 20,900 persons, moved into or expanded their operations in Public Service territory during 1977. A total of 72 companies, employing 6,800, either moved away or suspended operations, resulting in a net gain of 14,100 jobs.

The market for office quarters within PSE&G territory remained strong, helped to some extent by firms in New York City seeking suburban locations.

New Jersey's Economic Development Authority provides financial assistance to companies which invest in new plants and equipment in New Jersey. Since its inception in 1974, the Authority has arranged for nearly \$600 million in low-interest financing for over 400 industrial and commercial projects. These projects have generated nearly a billion dollars of investment money within the State's economy.

Commissioner of Labor and Industry, John Horn (center), discusses New Jersey's increasingly bright business outlook with Robert Powell (left), Executive Director, New Jersey Economic Development Authority, and Robert Franklin, PSE&G's General Manager of Urban Affairs and Area Development.

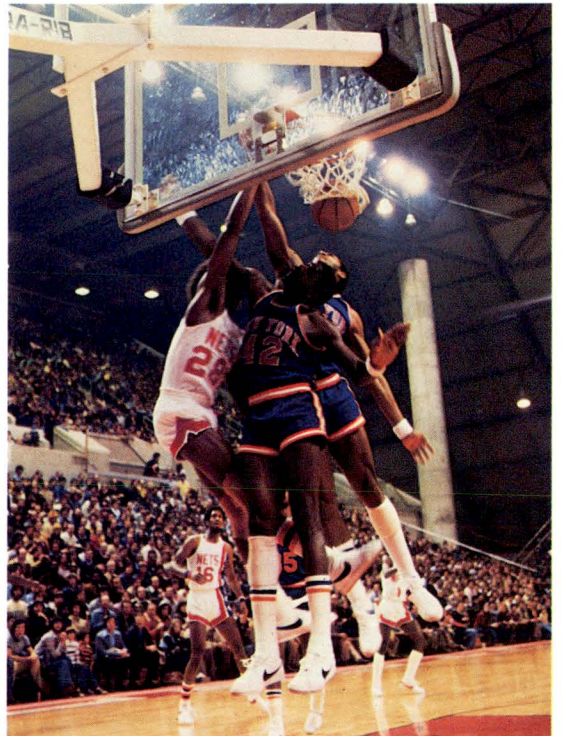


Sonny Werblin chatting with New Jersey's Governor Byrne at the Giants Stadium. Mr. Werblin was Chairman of the Board of the New Jersey Sports and Exposition Authority from its inception through 1977. Under his leadership, the Meadowlands Sports Complex became highly successful and has served as a catalyst for additional commercial, residential and industrial development in the area.



As a result of this expanded interest, a number of real estate developers have built or announced plans to build large office facilities. These ventures included a 350,000 square foot structure completed in 1977 by Mack Construction Company. Located in Paramus, it has attracted a number of firms from New York City. It is also the new corporate headquarters of Becton, Dickinson and Company.

The Hackensack Meadowlands, located in Bergen and Hudson Counties, continues to be an expanding area for industrial, commercial and residential development. The New Jersey Sports and Exposition Authority plans to build a 20,000-seat arena adjacent to the 78,000-seat football stadium and the recently expanded Meadowlands Race Track. The arena, expected to be completed in 1980, will be designed for



The New Jersey Nets, the State's first NBA professional basketball team, play host to the New York Knicks at Rutgers University Field House — an interim court while a new, 20,000-seat arena is being constructed at the huge Meadowlands Sports Complex. Here, the Giants Stadium, as a football facility, established the largest attendance record in the country during 1977. The racetrack, adjacent to the football stadium, attracted 5 million fans who wagered \$526 million during the racing season, making it the most successful track in the country.



basketball, hockey, tennis, track and boxing events. It will also be available for concerts, conventions, expositions and other public recreational activities. The New Jersey Nets of the National Basketball Association has signed a contract to use the new arena as its home court.

In addition to stimulating large attendances at the stadium and the race track, the meadowlands has attracted investments totaling several hundred million dollars. Hartz Mountain Industries, Inc., the largest developer in the meadowlands, has sold all 640 units of its residential condominium development known as Harmon Cove. The industrial park owned by Hartz and covering 10 million square feet includes a high-rise office building of 190,000 square feet, now almost fully rented, and a 300-room Hilton Hotel and convention center, scheduled to be completed in July 1978. Federated Department Stores has completed a 500,000 square foot distribution center in the park for its Abraham & Straus division.

Hartz has also acquired additional land in the meadowlands and plans to build a 1.5 million square foot shopping mall, 1.5 million square feet of campus-type office and research buildings, and 2 million square feet of industrial space.

Other large developers in the meadowlands include Bellemead Development Corporation. It has invested more than \$75 million to build and lease in excess of 1.5 million square feet of

commercial space. Its tenants include International Business Machines Corporation, S.B. Penick & Company, Rolls-Royce Ltd., and Wedgwood, Ltd.

Wedgwood, which recently established its U.S. headquarters and a major distribution facility in Lyndhurst, is one of many foreign companies to locate within PSE&G's service territory. New Jersey is now the U.S. base for more foreign companies than any other state. The largest number of foreign firms located here continues to be Japanese although many countries are represented in New Jersey through commercial or industrial facilities. Japanese companies which established new facilities in the State during 1977 include Yashica, Inc., Mitsubishi Boeki, Inc., Komatsu America, Marubeni America, Miida Electronics, and Sumitomo Machinery.

Large American companies which located manufacturing operations in PSE&G territory during 1977 included E.I. duPont de Nemours, Ciba-Geigy, and Spiegel Company. In addition, Mattel, Inc. broke ground for a 375,000 square foot plant in Edison, and Tuck Industries plans to buy a 1.1 million square foot complex in Passaic, formerly owned by Uniroyal, to make pressure-sensitive tape.

Plans to occupy or build distribution facilities were announced during the year by R.H. Macy, Addressograph-Multigraph, Eastman Kodak, and Johnson & Johnson.

To help promote economic development within the State, PSE&G has prepared an advertising program which features comments and profiles of top management people with firms that are successfully operating in our State. Advertisements will appear in national media during 1978.



New corporate center, Bellemead Development Corporation, Lyndhurst.

Gene Heller, President of Hartz Mountain Industries, and Raymond Newman, Vice President of Industrial Development, discuss Meadowland expansion plans.



Paramus Park, one of Bergen County's newest shopping malls.

New Jersey has the nation's second highest per capita income and the State's numerous shopping centers reflect the affluent buying power of its 7.3 million residents. Retail sales are estimated at over \$23 billion.

Bergen County, for its size, is one of the nation's largest and richest marketplaces.



Although a number of companies started or announced plans to start new facilities for manufacturing in New Jersey, the State continues to suffer an erosion of its manufacturing base. The combination of strict environmental regulations, and the relatively high costs of land, labor, and taxes, have contributed to a steady decline for production operations. The growth potential of the New Jersey metropolitan area has also been diminished by the shifts of population and markets to other regions. While the State's proximity to major markets remains a strongly competitive factor, this appeal — when weighed against other costs of operating in New Jersey — is be-

coming less attractive to manufacturers. Several large industrial companies eliminated, curtailed, or moved their operations from New Jersey in 1977.

As a partial counter to this, several plastics companies, publishing firms and other large users of energy have moved from New York City to New Jersey. Plans to build a \$95 million steel plant in Perth Amboy were completed in 1977. The site for the steel rod production facility was chosen by Raritan River Steel Company, a subsidiary of Co-Steel International, Ltd., Canada, because it is in the center of the largest scrap steel market on the East Coast.

New Jersey leads the nation in the number of foreign firms located within its boundaries. Japanese firms outnumber all others, citing New Jersey's location in the center of one of the world's richest markets — and its unsurpassed transportation

network — as being the most important factors in choosing this state. Representative companies as shown in these photographs are: (1) Panasonic, (2) Minolta and (3) Yashica.



One of the Japanese-owned companies to locate here is Sumitomo Machinery Corp. of America. President Akio Naritomi (left), confers with his associates. Says he: "Our company is thoroughly Americanized, so we combined both Japanese and American business judgement before building our new plant here. We're delighted with the results. An additional supply of labor was readily available. Transportation facilities are excellent, and that's especially important because we depend so much on shipments of materials from other parts of the world."

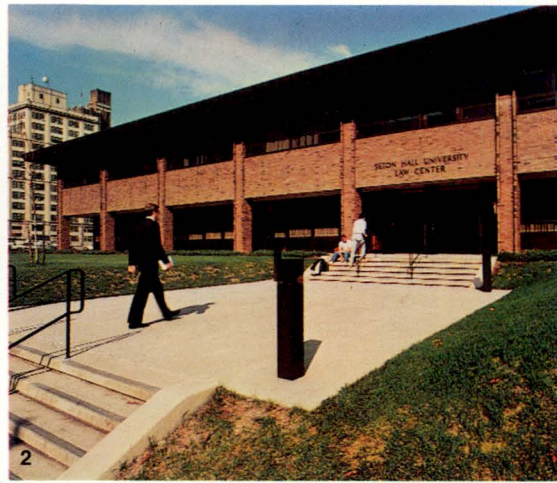




Newark, New Jersey's largest city, is also one of the nation's major "college towns." More than \$300 million has been invested in expanding higher learning facilities and approximately 24,000 students are enrolled in five educational institutions. They are: 1) New Jersey College of Medicine and Dentistry, 2) Seton Hall University, 3) New Jersey Institute of Technology, 4) Rutgers

University and 5) Essex County College. The schools are within blocks of each other and occupy more than 90 acres of land near the heart of Newark's business district.

New building in Newark – either under construction or on the planning board – presently totals an impressive \$200 million.



There's new life in New Jersey's older cities! "New Brunswick Tomorrow" is a cooperative effort of government, business and community organizations working to revitalize the business district and neighborhoods. Leaders in this constructive endeavor include: Mr. C. Roy Epps, Executive Director, Urban League of Greater New Brunswick; Richard B. Sellars, Chairman of the Finance Committee, Johnson & Johnson and Chairman of the New Brunswick Development Corporation; and John J. Heldrich, J&J's Corporate Vice President of Administration and Chairman of "New Brunswick Tomorrow."



Merrymaking during New Brunswick's Second Annual George Street Festival.



---

**Community Involvement**

As a company whose operations are increasingly affected by the understanding of the members of the various communities within its service territory, PSE&G has become involved with many educational, civic and cultural organizations.

Through its Consumer Affairs, Urban Affairs, and Community Relations Departments, PSE&G has initiated and participated in many programs intended to serve a broad spectrum of needs. Many of these programs were designed to help the urban poor attain a fair chance for educational, cultural and economic parity. PSE&G has also provided financial support and counseling for minority students, at both secondary and college levels.

Company personnel served a wide variety of community organizations such as the Newark Boys Chorus School, the Newark Community

Center of the Arts, the Day Care Coordinating Council of Essex County, the New Jersey State Special Olympics, and the State Resource Mobilization Council. Special seminars were held for Senior Citizens to discuss their areas of special interest as well as concerns of the Company. Art contests were conducted for high school students with exhibits held in our Commercial Offices.

PSE&G's Urban Affairs Department initiated a series of management training programs for executives of non-profit service agencies. The programs exemplified continued support of organizations which serve disadvantaged urban populations and also recognize that few community agencies have the structure or means to develop effective management methods and skills.

---

**Environmental Affairs**

The Company has continued to meet frequently with representatives of federal and state government environmental agencies.

The Environmental Affairs Department represents the Company at public meetings on environmental matters. It also presents a wide range of information programs on energy and the environment to the general public.

As environmental regulations become more complex and demanding, the cost of complying with these regulations becomes a matter of increasing concern for both the customers and the stockholders of an electric and gas utility. PSE&G spent about \$168 million in its continuing effort to achieve a cleaner environment during 1977.

---

**Communications**

We maintained a broad communications program in 1977 and an important facet of it was our investor relations program. We again provided a regular flow of information on developments at PSE&G to security analysts, portfolio managers, institutional investors and other professionals in the investment community. Company executives addressed several investment industry meetings and participated in a number of investment-oriented seminars. PSE&G also arranged several formal meetings with stock brokers in New Jersey. These meetings held at central locations provided brokers and individual investors with pertinent information on current developments at PSE&G.

In recognition of the increasing importance of European institutions as a potential source of capital, we held meetings in September with banking and investment executives in five key European financial centers. The meetings, held in London, Paris, Frankfurt, Zurich and Geneva,

were designed to develop investment interest in PSE&G.

Our Community Relations Department reached many audiences through its film, slide and lecture programs. More than 1,500 presentations on energy, conservation and other topics related to our industry were made to civic, social, and school audiences totaling more than 220,000 persons in 1977.

Under the direction of our Environmental Affairs Department, our Speakers' Bureau gave 327 talks to 13,400 people. The Second Sun, the Company's floating energy information center, was visited by 45,000 people and our Salem Visitors' Center had 10,000 visitors. The department also conducted generating station tours for 2,800 visitors and sponsored high school education programs for 200,000 students.

The Information Services Department continued to be available round-the-clock, seven days a week, for the press, radio and television.

---

**Human Resources**

The number of Company employees at year end totaled 13,339, essentially unchanged from 1976.

Wages and salaries for the year totaled \$259,925,000, including \$9,399,000 for disability benefits and compensation. Negotiations

covering union-represented employees resulted in new three-year agreements providing for general wage increases of 7% the first year, effective May 1, 1977, and 6.69% the second year. There will be a wage reopener for the third year which begins on May 1, 1979. The agreements, ratified



by all of the seven unions representing PSE&G employees, also provide improvements in benefit programs and a resumption of employee contributions to health plan premiums.

The Company established a Human Resources Department in 1977 to consolidate employee-related activities and to emphasize the importance of human resources activities under senior management leadership. The new

department contains the former Personnel Department, the Equal Opportunities group, and the Industrial Relations groups.

The Company has continued to stress its Affirmative Action program in relation to the employment of women and members of minority groups. In 1977, 25% of all persons hired were women and 26% were from minorities. At the end of 1977, the Company had 1,783 female

As part of our Affirmative Action Program, special efforts have been made to recruit women for jobs which have traditionally been held by men at PSE&G. More and more women are expressing interest in these jobs - particularly in manual trade areas.

To aid in recruiting women, a twelve-minute film depicting women working for the Company in non-traditional jobs has been produced. In the film, the women are shown "on the job" and candidly express their feelings about the type of work they do. This film will be used at recruitment Open Houses to be held by PSE&G, as well as shown at local career fairs and at high schools upon request.



Grace Macken  
Utility Operator



Carole Gordon  
Meter Reader



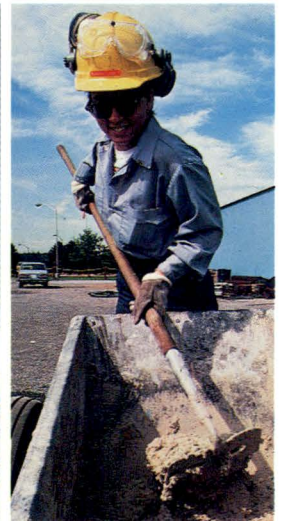
Susan Nordman  
Apprentice Technical Helper



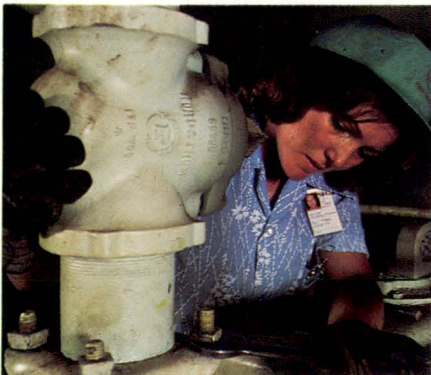
Beverly Carmichael  
Operator Helper



Betty Onque  
Custodian



Susan Lewis  
Utility Person



Beth Grogan  
Service Mechanic, 1st Class



Lyn Horvath  
Stock Handler



Linda Rahilly  
Technical Helper



employees and 1,630 employees from minority groups. The Affirmative Action Program resulted in a sizeable increase in the number of women and minority group persons in professional and managerial positions in 1977 as compared to the previous year.

As part of the continuing effort to improve managerial effectiveness, PSE&G expanded its management development activity by initiating a Company Job Rotation Program. As a further indication of the Company's encouragement of self-development, a total of 545 employees attended job-related courses during the year at nearby colleges under the Company's Tuition Aid Program. In April, the Company also introduced an Internal Career Opportunity System (ICOS) designed to inform employees of job vacancies in non-union and certain supervisory

positions. ICOS is expected to result in a more efficient use of employee skills.

In November, the Company distributed a comprehensive manual covering details of the Employee Benefits Program to all employees. The manual, a two-year project, is intended to play a major role in PSE&G's efforts to communicate more effectively with its employees.

During the year the Company also implemented a computerized Employee Information System to centralize and consolidate personnel records. Employees were given individual statements containing the information in the system. This will be an annual procedure which not only will keep employees informed of the information maintained about them by the Company but also will improve the Company's ability to keep the information up-to-date.

## Energy Development Corporation

Energy Development Corporation (EDC), the Company's exploration subsidiary broadened its operations in 1977 as part of its continuing efforts to locate and develop new sources of natural gas, primarily in the Texas and Louisiana Gulf Coast areas.

In 1977, \$13.8 million was expended for exploration, \$4.3 million for development, and \$3.6 million to acquire offshore leases. EDC earned \$1,213,000 in 1977 compared to \$938,000 in 1976. Revenues from the sales of oil and gas were \$8,227,000, compared to \$4,741,000 in 1976.

To spread the economic risks inherent to exploration, and also to help accelerate its offshore drilling, EDC entered into 3-year exploration

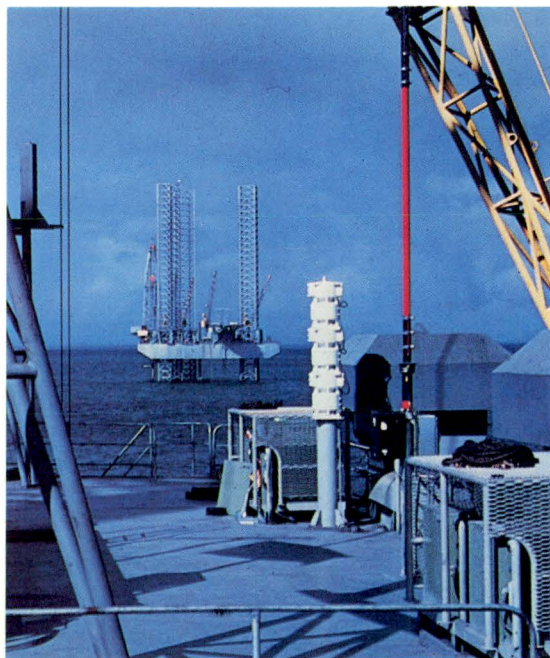
agreements with Cincinnati Gas and Electric Company and Philadelphia Electric Company for combined annual commitments of \$4 million for the first 12 months. The two utilities have agreed to pay 41.7% of the exploratory costs for a 31.3% interest in any oil or gas discoveries.

EDC last year participated in the drilling of 33 exploratory wells and 12 development wells, both onshore and in the offshore waters of the Gulf of Mexico. Onshore activities are concentrated in the coastal areas of Texas and Louisiana. In 1977, EDC's onshore operations resulted in the drilling of 6 successful gas wells, 1 successful oil well, and 6 dry holes. At year end, EDC was in the process of drilling 5 additional onshore wells.

During the year, EDC obtained regulatory approval to transport gas from two additional onshore fields to PSE&G's market area. At the end of 1977, production from EDC wells was being delivered to PSE&G at the rate of 111,000 therms a day compared to 48,000 therms a year earlier. The daily rate is expected to increase as additional wells are drilled and additional regulatory approvals are secured.

EDC's offshore activities, 60% of its total drilling operations last year, resulted in the drilling of 12 successful gas wells and 10 dry holes. A total of 5 wells were being drilled as the year ended. One of the subsidiary's more significant discoveries occurred off the Louisiana shore on Vermilion Block 310 where EDC has an 8.34% interest. The tract, acquired in 1976 for \$34.2 million by a group headed by Transco Exploration Company, has had 11 wells drilled on it, including 9 where gas has been found. Development of the tract is expected to commence in 1978 upon the installation of two drilling platforms. Initial production is expected in the

Energy Development Corporation explores for gas in the Gulf of Mexico. In 1977, EDC participated in the successful drilling of 18 gas wells and 1 oil well. EDC has an increasing involvement in offshore drilling and has been successful in obtaining interest in 16 blocks off the Jersey coast.





summer of 1979.

EDC's participation with the Transco group last year in bidding for additional blocks in the Gulf of Mexico resulted in six successful bids. Of EDC's bids of \$15.2 million, it was successful in winning shares totaling \$3.6 million. With acquisition of these new blocks, EDC now owns shares in 29 offshore blocks with interest partici-

pations ranging from 1.4% to 33.3%. The offshore blocks include 13 in the Gulf of Mexico where exploratory drilling on most blocks was completed by the end of the year. EDC also owns interest in 16 blocks off the Atlantic Coast where drilling has been delayed by court action. Drilling is expected to start, however, on several blocks in 1978.

## PSE&G Research Corporation

Artist's rendering of BEST (Battery Energy Storage Test) Facility which is expected to play a vital role in developing new types of batteries for storing energy during periods of low demand for use during peak requirements. Large systems, if successful, could cut U.S. oil imports by as much as one million barrels a day.

Harold Sonn, President of PSE&G Research Corporation, being interviewed by NBC's Jim Collis at the BEST Facility groundbreaking ceremonies.

Local and national leaders help to officially launch construction of the \$8.7 million BEST Facility.

PSE&G Research Corporation was formed in 1977 as a wholly-owned subsidiary of PSE&G to more effectively direct the parent company's research and development program, obtain increased outside research support and diversify its testing capability to meet industrial needs. The new corporation was formed by combining the Research and Development Department and the Energy Laboratory.

In addition to conducting research and development programs related to current and long-range energy problems, the new subsidiary will explore other areas of technology as potential new ventures for the parent corporation. The Energy Laboratory will make its resources of specialized test equipment and the services of its personnel available on a commercial basis to other industries.

One new venture is the establishment of an Aquaculture Research Center. The Mercer Aquaculture facility, which became operational

in 1974, was expanded during 1977 to a prototype commercial aquaculture facility designed to demonstrate the economic feasibility of raising commercial size fresh water fish in warm water discharged from power plants. Expansion of the Mercer facility was financed by grants from the National Science Foundation totaling \$1.1 million, the largest grant ever awarded under the Foundation's Research Applied to National Needs program. The expanded facility's first crop, some 58,000 trout, is expected to be ready in the spring of 1978, and will be marketed to commercial food processors. If the larger-scale project proves to be economically feasible, it could aid in development of an aquatic food industry.

Due to its experience in testing large electrical systems, PSE&G was selected as host utility for the Battery Energy Storage Test (BEST) Facility. Construction on the \$8.7 million facility was started in 1977 and it is expected to be op-





erational in 1980. It will be used as a national test center for advanced battery systems to evaluate their effectiveness when used by electric utilities to meet peak demands. Development of efficient and economic batteries for large-scale energy storage would permit power from nuclear and fossil fuel generating stations produced during periods of low demand to be stored for use at times of peak requirements. Successful adaption of large-scale systems could pare our country's need for expensive oil imports by as much as one million barrels a day. It could also reduce the need for greater capacity to meet peak loads. PSE&G will spend about \$1.5 million to provide the building, associated substation equipment, and the site, which is adjacent to a Company substation in Somerset County. The balance of the funding for the joint project will be supplied by the U.S. Department of Energy and the Electric Power Research Institute.

Along with eight other utilities, PSE&G is continuing to support research to develop a 26,000-kilowatt fuel cell power plant for large-scale power applications. A major milestone was reached when a 1,000 kilowatt fuel cell pilot powerplant was successfully tested by United Technologies Corporation in 1977. During the

next phase, financed jointly by the U.S. Department of Energy and the Electric Power Research Institute, a 4,800 kilowatt fuel cell power plant will be installed and tested on an electric utility system.

PSE&G is also testing solar energy systems for residential use. During 1977, PSE&G Research Corporation installed and began testing 11 solar water heating, space heating and pool heating systems in customers' homes. Three additional installations will be completed in 1978 as part of a three-year test program costing approximately \$500,000. The testing will provide information on the performance of solar heating systems in our territory. Four weather stations have been operating since the spring of 1977 to provide comprehensive data for evaluation of this program.

While expanding its research operations, the new PSE&G enterprise will continue corporate policy of seeking external funding for specific programs from the Federal Government, research organizations and private industry. In 1977, PSE&G was awarded 8 research contracts involving over \$1 million in outside financing. The parent company also allocated \$8.5 million for its own research and development work and to pay for its share of utility industry research.

These two banks of solar panels will be used to help provide heat and hot water for the home shown in background. This is part of PSE&G's three-year program to test solar water heating, space heating and pool heating systems in customers' homes.





---

**Transport  
of New Jersey**

Transport of New Jersey, a transportation subsidiary of PSE&G, and Transport's wholly-owned operating transportation subsidiary, Maplewood Equipment Company, recorded a net loss of \$247,000 in 1977 after receiving \$25,211,000 in operating assistance from the State of New Jersey to supplement fare box revenue. This com-

pires to a net loss of \$504,000 for the year 1976 after receiving \$20,976,000 in operating assistance from the State of New Jersey.

Private Reinvestment Capital Corporation, a wholly-owned non-operating subsidiary of Transport, formed in 1977, had net income of \$420,000 for the year.

---

**Energy Terminal  
Services Corporation**

Energy Terminal Services Corporation (ETSC), a wholly-owned subsidiary formerly known as Distrigas of New York Corporation, was renamed after its purchase by PSE&G from Cabot Corporation in 1976. The assets of ETSC primarily consist of a facility on Staten Island equipped to unload, process, and store liquefied natural gas (LNG). The terminal with two large storage tanks is about 95% complete. When completed, the facility will be able to deliver gas at an average rate of 3.6 million therms a day and a maximum daily capacity of 7.6 million therms. Additional construction has been suspended until the permits needed to import and store LNG can be

obtained from federal, state and other regulatory agencies.

Late in 1977, ETSC filed a motion with the Federal Energy Regulatory Commission (FERC) applying for "a conditional certificate of public convenience and necessity" for the LNG facility. The granting of a conditional certificate could be expected to help the Company in its continuing negotiations to reach an agreement on the importation of LNG with Sonatrach, Algeria's state-owned oil and gas company. Although ETSC requested FERC for a prompt reply on its application, the federal agency had taken no action by December 31.

---

**Energy Pipeline  
Corporation**

Energy Pipeline Corporation, a wholly-owned subsidiary formerly known as Distrigas Pipeline Corporation, was acquired from Cabot Corporation along with ETSC. Intended to construct and operate two pipelines to transport LNG from

the ETSC terminal on Staten Island to the PSE&G system, this company is currently in a standby status. Although the pipelines have not been built, most of the pipe and valves have been bought and are now in storage.

---

**Eascogas LNG, Inc.**

Eascogas LNG, Inc. became a wholly-owned subsidiary in 1977 when PSE&G purchased the 50% interest held by Algonquin Gas Transmission Corporation. Eascogas, formed in 1972 to import liquefied natural gas from Algeria, has been unable to secure approval for imports from

federal authorities as a result of New York State legislation concerning terminalling, and other factors. PSE&G has elected to restructure the import project on a reduced basis and is negotiating a new agreement with Sonatrach for the purchase and transportation of LNG.

---



Methane gas can be found in landfill areas but no one has yet been able to discover how to accurately judge supply or determine the best way to recover what might become a valuable new energy source. At a large landfill site in Central New Jersey, Doug Nielsen, Gas Planning Department, is taking gas pressure and measuring methane output. This particular project is expected to recover one million cubic feet of gas per day generated by decomposing garbage.



---

## Financial Statement Responsibility

The management of PSE&G is responsible for the integrity and objectivity of the financial statements of the Company. These statements, prepared by the Company in accordance with generally accepted accounting principles applied on a consistent basis, make full disclosure of the Company's financial affairs.

To facilitate the gathering of financial data, PSE&G maintains an accounting system established with sound accounting and business policies effectively communicated to the appropriate personnel. This system, together with its re-

lated internal controls, is reviewed by the Company's staff of internal auditors and its independent public accountants. Management feels the effectiveness of this system is enhanced by a program of continuous and selective training of our employees.

The Board of Directors carries out its responsibility of financial disclosure through the Audit Committee consisting of five outside directors. The Audit Committee meets periodically with management as well as representatives of the internal and independent auditors to review the work of each, ensuring that their respective responsibilities are being carried out, and to discuss related matters. Internal and independent auditors have full and free access to the Audit Committee.

---

## Summary of Significant Accounting Policies

### System of Accounts

The Company is under the jurisdiction of the Federal Energy Regulatory Commission (FERC) and the Board of Public Utilities (BPU) of the State of New Jersey and maintains its accounts in accordance with their prescribed Uniform Systems of Accounts, which are substantially the same. As a result of the rate-making process the accounting principles applied by the Company differ in certain respects from those applied by non-regulated businesses.

### Investments in Subsidiaries

The Company's investments in its subsidiaries, which in the aggregate are not significant as defined by the Securities and Exchange Commission, are reported in the accompanying financial statements on the equity method of accounting.

### Revenues

Revenues are recorded based on estimated service rendered, but are generally billed to customers through monthly cycle billings on the basis of actual usage.

### Fuel Costs

The Company projects the costs of fuel for electric generation, interchanged power, gas purchased and materials for gas produced for twelve month periods. Adjustment clauses in the Company's rates allow the recovery of the excess of such projected costs over those included in the Company's basic rates through levelized monthly charges over the period of projection. Any under-or-over recoveries are deferred and reflected in subsequent periods. Fuel costs are charged to operations in the period in which they are recovered. Deferred amounts under this procedure are classified as current items.

Prior to July 1, 1977, the date of establishment of the levelized electric adjustment clause, the Company recovered increases in electric energy costs approximately two months subsequent to their incurrence and charged operations in the period in which these costs were recovered. The balance of unrecovered electric fuel costs remaining from this procedure is classified as a deferred debit and is being amortized through basic rates in accord with a rate order of the BPU.

Prior to January 2, 1976, the date of the levelized gas adjustment clause, increases in costs of purchased gas and materials used to produce gas were recovered in months subsequent to their incurrence and were charged to operations principally as they were incurred. An unrecovered gas balance of \$12,487,000, which is not included in a new levelized rate established December 2, 1977, will be considered for rate base treatment, with appropriate amortization, in the Company's current rate case.

### Amortization of Nuclear Fuel

Nuclear energy burnup costs are charged to fuel expense on the basis of the number of units of thermal energy produced as they relate to total thermal units to be produced over the life of fuel. The rate calculated for fuel used at the Company's Salem plant includes a provision for estimated future storage and disposal costs. In accordance with procedures established by the operating company of the Peach Bottom plant, the rates for fuel used at that plant assume a zero net salvage.

### Depreciation and Utility Plant

Depreciation, for financial reporting purposes, is computed under the straight-line method and is based on estimated average remaining lives of the several classes of depreciable property. These estimates are reviewed continuously and adjustments, as approved by the BPU, are made as required. Depreciation applicable to nuclear plant provides for estimated costs of dismantling or decommissioning. Depreciation provisions for the years 1977 and 1976 stated in percentages of original cost of depreciable property are 3.51% and 3.39%, respectively.

The cost of maintenance, repairs and replacements of minor items of property is charged to appropriate expense accounts. The cost of replacements of units of property is charged to Utility Plant. At the time depreciable properties are retired or otherwise disposed of, the original cost less net salvage value is charged to the appropriate accumulated provision for depreciation.

### Income Taxes

The Company and its subsidiaries file a consolidated Federal income tax return and income taxes are allocated, for report-



ing purposes, to the Company and its subsidiaries based on the taxable income or loss of each.

Deferred income taxes are provided for differences between book and taxable income to the extent permitted by the BPU or other regulatory agencies for rate-making purposes.

Investment tax credits are deferred and amortized over the average life of the related plant.

### **Allowance for Funds Used During Construction**

Allowance for Funds Used During Construction (AFDC) is a cost accounting procedure whereby the approximate net composite interest and equity costs of capital funds used to finance construction are transferred from the income statement to Construction Work in Progress (CWIP) in the balance sheet. This procedure is intended to remove the effect of the cost of financing construction activity from the income statement, and results in treating such cost in the same manner as construction labor and material costs. The rate used for calculating AFDC was 8% in 1977 and 1976.

The BPU issued rate orders in 1975 allowing the Company to recover the financing cost on \$250,000,000 of CWIP through current operating revenues, and since then no AFDC has been accrued on this amount.

The FERC issued an order revising the Uniform Systems of Accounts, effective January 1, 1977, which provides a formula for determining the maximum allowable AFDC rate, and for segregating AFDC into two component parts, debt and equity. The debt component for 1977 is included in the Interest Charges section of the Statement of Income as a credit and the equity component remains as part of Other Income. The Company has not reclassified AFDC into its debt and equity components prior to the effective date as it is felt the allocation would not be representative of the conditions which existed during that period. The rate currently used for calculating AFDC is 8% which is within the limits set

by the FERC formula. The Company does not expect any material change in its AFDC rate or adverse effects on the results of operations as a result of this order. However, earnings available for coverage tests under the provisions in the Company's Mortgage and Restated Certificate of Incorporation will decrease by the amount of the debt component of AFDC. It is expected that this change will not affect the Company's financing.

### **Pension Plan**

Pension costs are accounted for on the basis of an acceptable actuarial method and are charged to operating expenses, utility plant and other accounts. The Company's policy is to fund pension costs accrued. In 1977 the Company increased its annual payment to the fund for prior service costs, thereby reducing the funding period, which began January 1, 1967, from 40 to 35 years.

### **Gross Receipts Tax**

As a result of rate orders received from the BPU, the Company, effective January 1, 1973, began accruing gross receipts tax on current revenues rather than on the previous basis of taxes paid. The gross receipts tax on 1972 revenues was deferred and is being charged to operations by an amount equivalent to .5% of revenues subject to the gross receipts tax.

### **Unamortized Debt Expense**

Unamortized Debt Expense includes costs associated with the issuance or reacquisition of debt. Such amounts consist principally of costs associated with the Company's tender offer for mortgage bonds in May 1977. In accordance with BPU approval, these amounts are deferred and amortized over the lives of the related issues.

### **Extraordinary Property Losses**

Extraordinary Property Losses are deferred and amortized over periods prescribed by the BPU, the longest of which ends December 1, 1993.



# Statement of Income

For the Years Ended December 31,

1977

1976

	(Thousands of Dollars)	
<b>Operating Revenues</b>		
Electric	\$1,470,118	\$1,316,077
Gas	562,677	553,458
<b>Total Operating Revenues</b>	<b>2,032,795</b>	<b>1,869,535</b>
<b>Operating Expenses</b>		
Operation		
Fuel for Electric Generation	416,760	362,257
Interchanged Power—net	120,041	121,917
Gas Purchased and Materials for Gas Produced	257,897	261,190
Other Operation Expenses	253,831	227,395
Maintenance	124,876	99,617
Depreciation	147,652	133,087
Taxes Other than Federal Income Taxes	293,796	275,254
Federal Income Taxes (note 1)	120,969	100,380
<b>Total Operating Expenses</b>	<b>1,735,822</b>	<b>1,581,097</b>
<b>Operating Income</b>	<b>296,973</b>	<b>288,438</b>
<b>Other Income</b>		
Allowance for Funds Used During Construction		
Debt and Equity		43,547
Equity	32,028	
Miscellaneous Other Income—net	852	1,928
Earnings of Subsidiaries—net (note 2)	595	726
<b>Total Other Income</b>	<b>33,475</b>	<b>46,201</b>
<b>Income Before Interest Charges</b>	<b>330,448</b>	<b>334,639</b>
<b>Interest Charges</b>		
Long-Term Debt	129,782	127,643
Short-Term Debt	1,892	359
Other	2,044	2,613
Allowance for Funds Used During Construction—Debt	(17,512)	
<b>Net Interest Charges</b>	<b>116,206</b>	<b>130,615</b>
<b>Net Income</b>	<b>214,242</b>	<b>204,024</b>
Dividends on Cumulative Preferred Stock and \$1.40 Dividend Preference Common Stock	45,065	41,257
<b>Balance Available for Common Stock</b>	<b>\$ 169,177</b>	<b>\$ 162,767</b>
<b>Shares of Common Stock Outstanding</b>		
End of Year	59,805,916	58,975,747
Average for Year	59,243,392	58,307,947
<b>Earnings per average share of Common Stock</b>	<b>\$2.86</b>	<b>\$2.79</b>
<b>Dividends paid per share of Common Stock</b>	<b>\$1.92</b>	<b>\$1.78</b>

See Summary of Significant Accounting Policies and Notes to Financial Statements.



# Balance Sheet

December 31.

## Assets

	1977	1976
	(Thousands of Dollars)	
<b>Utility Plant—original cost</b>		
Electric Plant	\$3,665,195	\$3,219,349
Gas Plant	849,272	843,315
Common Plant	72,767	41,948
Utility Plant in Service	4,587,234	4,104,612
Less Accumulated Depreciation	1,309,045	1,194,444
Net Utility Plant in Service	3,278,189	2,910,168
Construction Work in Progress	955,772	1,057,152
Nuclear Fuel, net of accumulated amortization— 1977, \$5,868; 1976, \$20	82,480	72,352
Plant Held for Future Use, net of accumulated depreciation— 1977, \$3; 1976, \$3	22,740	21,147
Net Utility Plant	4,339,181	4,060,819
<b>Other Property and Investments</b>		
Nonutility Property, net of accumulated depreciation— 1977, \$183; 1976, \$380	6,379	6,535
Investments in and Advances to Subsidiaries (note 2)	135,535	117,354
Total Other Property and Investments	141,914	123,889
<b>Current Assets</b>		
Cash (note 3)	23,746	26,728
Accounts Receivable, net of accumulated provision for doubtful accounts— 1977, \$4,378; 1976, \$4,039	179,064	168,604
Unbilled Revenues	101,520	99,113
Fuel, at average cost	127,271	102,570
Underrecovered Electric Fuel Costs	8,511	
Underrecovered Gas Costs	7,965	
Materials and Supplies, at average cost	16,651	15,801
Prepayments	5,458	2,367
Total Current Assets	470,186	415,183
<b>Deferred Debits</b>		
Gross Receipts Tax	86,437	96,397
Electric Fuel Costs	55,893	43,492
Unamortized Debt Expense	26,309	2,241
Extraordinary Property Losses	5,577	6,761
Total Deferred Debits	174,216	148,891
<b>Total</b>	<b>\$5,125,497</b>	<b>\$4,748,782</b>

See Summary of Significant Accounting Policies and Notes to Financial Statements.



**Liabilities**

1977

1976

(Thousands of Dollars)

**Capitalization**

Common Equity		
Common Stock (see statement, page 29)	\$ 919,752	\$ 900,384
Premium on Capital Stock	557	550
Paid-In Capital	26,065	26,065
Retained Earnings Reinvested in Business (note 4)	651,885	596,745
Total Common Equity	1,598,259	1,523,744
Preferred Stock (see statement, page 29)	589,994	559,994
Total Stockholders' Equity	2,188,253	2,083,738
Long-Term Debt (see statement, page 30)	1,980,897	1,894,210
Total Capitalization	4,169,150	3,977,948

**Current Liabilities**

Long-Term Debt due within one year (see statement, page 30)	5,816	37,136
Commercial Paper (note 5)	96,892	4,700
Accounts Payable	67,126	66,457
Taxes Accrued, including gross receipts tax— 1977, \$281,326; 1976, \$257,498	304,625	276,410
Deferred Income Taxes (note 1)	56,639	39,991
Interest Accrued	31,499	33,183
Gas Purchased	30,375	27,202
Overrecovered Gas Costs		15,798
Other	33,448	31,432
Total Current Liabilities	626,420	532,309

**Deferred Credits**

Accumulated Deferred Income Taxes (note 1)	205,214	147,130
Accumulated Deferred Investment Tax Credits (note 1)	117,312	83,735
Other	7,401	7,660
Total Deferred Credits	329,927	238,525

**Commitments and Contingent Liabilities (note 7)**

Total	\$5,125,497	\$4,748,782
-------	-------------	-------------



# Statement of Retained Earnings Reinvested in Business

For the Years Ended December 31,

1977

1976

	(Thousands of Dollars)	
Balance January 1	\$596,745	\$540,041
Add Net Income	214,242	204,024
<b>Total</b>	<b>810,987</b>	<b>744,065</b>
<b>Deduct</b>		
Cash Dividends		
Preferred Stock at required annual rates	43,184	39,462
\$1.40 Dividend Preference Common Stock	1,881	1,881
Common Stock	113,735	103,609
Total Cash Dividends	158,800	144,952
Capital Stock Expenses	302	2,368
<b>Total Deductions</b>	<b>159,102</b>	<b>147,320</b>
<b>Balance December 31 (note 4)</b>	<b>\$651,885</b>	<b>\$596,745</b>

# Statement of Changes in Financial Position

For the Years Ended December 31,

1977

1976

	(Thousands of Dollars)	
<b>Source of Funds:</b>		
Net Income	\$214,242	\$204,024
<b>Non-cash Items:</b>		
Depreciation	150,195	135,833
Amortization of Nuclear Fuel	5,848	20
Amortization of Gross Receipts Tax	9,960	9,182
Amortization of Deferred Electric Fuel Costs	5,208	5,208
Provision for Deferred Income Taxes—net	58,084	44,302
Investment Tax Credit Adjustments—net (note 1)	33,577	49,966
Allowance for Funds Used During Construction	(49,540)	(43,547)
Equity in Net Earnings of Subsidiaries	(1,387)	(434)
Other	1,880	781
<b>Total from operations</b>	<b>428,067</b>	<b>405,335</b>
<b>Proceeds from sales of:</b>		
Long-Term Debt	183,714	132,526
Preferred Stock	29,942	48,163
Common Stock	19,136	44,086
<b>Total Security Sales</b>	<b>232,792</b>	<b>224,775</b>
<b>Total Funds Provided</b>	<b>\$660,859</b>	<b>\$630,110</b>
<b>Application of Funds:</b>		
Additions to Utility Plant, excluding allowance for funds used during construction	\$381,135	\$307,029
Investments in and Advances to Subsidiaries	16,794	28,877
Reductions of Long-Term Debt	121,738	190,504
Cash Dividends	158,800	144,952
Deferred Electric Fuel Costs	17,609	3,278
Miscellaneous	3,891	3,135
<b>Total Funds Applied</b>	<b>699,967</b>	<b>677,775</b>
<b>Changes in Working Capital:</b>		
Short-Term Debt—(Increase) Decrease	(92,192)	5,300
Other (net)—Increase (Decrease)	53,084	(52,965)
<b>Net Decrease in Working Capital</b>	<b>(39,108)</b>	<b>(47,665)</b>
<b>Total Funds Applied and Changes in Working Capital</b>	<b>\$660,859</b>	<b>\$630,110</b>

See Summary of Significant Accounting Policies and Notes to Financial Statements.



# Statement of Capital Stock

December 31,	Outstanding Shares	1977	1976	Current Redemption Price Per Share	Refunding Restricted Prior to (note A)
(Thousands of Dollars)					
<b>Cumulative Preferred Stock</b>					
\$100 par value—authorized					
7,500,000 shares					
Series issued:					
4.08%	250,000	\$ 25,000	\$ 25,000	\$103.00	
4.18%	249,942	24,994	24,994	103.00	
4.30%	250,000	25,000	25,000	102.75	
5.05%	250,000	25,000	25,000	103.00	
5.28%	250,000	25,000	25,000	103.00	
6.80%	250,000	25,000	25,000	106.00	
9.62%	350,000	35,000	35,000	109.50	July 1, 1980
7.40%	500,000	50,000	50,000	106.00	
7.52%	500,000	50,000	50,000	106.00	
8.08%	150,000	15,000	15,000	106.00	
7.80%	750,000	75,000	75,000	106.00	
7.70%	600,000	60,000	60,000	108.49	April 1, 1978
12.25% (note B)	350,000	35,000	35,000	112.00	February 1, 1985
8.16% (1977)	300,000	30,000		108.90	October 1, 1982
Unissued—2,500,058 shares					
\$25 par value—authorized					
10,000,000 shares					
Series issued:					
9.75%	1,600,000	40,000	40,000	27.50	January 1, 1981
8.70% (1976)	2,000,000	50,000	50,000	27.00	October 1, 1981
Unissued—6,400,000 shares					
<b>Total Cumulative Preferred Stock (note C)</b>		<b>\$589,994</b>	<b>\$559,994</b>		
<b>Dividend Preference Common Stock and Common Stock</b>					
\$1.40 Dividend Preference Common Stock (no par)—1,343,999 shares authorized, issued and outstanding; current redemption price \$35.00 per share (note D)					
		\$919,752	\$900,384		
Common Stock (no par)—authorized 100,000,000 shares (note E): issued and outstanding as of December 31, 1977, 59,805,916 shares (830,169 shares issued for \$19,368 in 1977 and 2,452,587 shares issued for \$44,510 in 1976)					

## Notes:

A—Prior to the date specified, none of the shares of each such series may be redeemed, other than through the operation of a sinking fund, through refunding of such shares by the incurring of debt or the issuance of Preferred Stock where the cost of such debt or such Preferred Stock is less than the cost to the Company of each such series.

B—On February 1, 1980 and annually thereafter not less than 17,500 shares or more than 35,000 shares must be redeemed through the operation of a sinking fund at a redemption price of \$100 per share plus accumulated and unpaid dividends to the date of such redemption. The sinking fund requirement to redeem not less than 17,500 shares is cumulative.

C—As of December 31, 1977 the annual dividend requirement on Preferred Stock was \$44,917,000 and the embedded dividend cost was 7.70%.

D—Each share of \$1.40 Dividend Preference Common Stock is entitled to cumulative dividends, to two votes, and, on liquidation or dissolution, to twice as much as each share of Common Stock.

E—Includes 1,225,412 shares of Common Stock reserved for possible issuance under the Automatic Dividend Reinvestment Plan and 336,730 shares for possible issuance under the Company's Tax Reduction Act Employee Stock Ownership Plan.

See Summary of Significant Accounting Policies and Notes to Financial Statements.



# Statement of Long-Term Debt

December 31,	1977	1976
<b>First and Refunding</b>	(Thousands of Dollars)	
<b>Mortgage Bonds</b>		
Series (note A)		
2 <sup>7</sup> / <sub>8</sub> % June 1, 1979	\$ 53,430	\$ 54,740
2 <sup>3</sup> / <sub>4</sub> % May 1, 1980	18,795	19,060
3 <sup>1</sup> / <sub>4</sub> % October 1, 1983	22,630	22,833
3 <sup>1</sup> / <sub>4</sub> % May 1, 1984	50,000	50,000
4 <sup>3</sup> / <sub>8</sub> % November 1, 1986	50,000	50,000
4 <sup>7</sup> / <sub>8</sub> % September 1, 1987	60,000	60,000
4 <sup>5</sup> / <sub>8</sub> % August 1, 1988	60,000	60,000
5 <sup>1</sup> / <sub>8</sub> % June 1, 1989	50,000	50,000
4 <sup>3</sup> / <sub>4</sub> % September 1, 1990	50,000	50,000
4 <sup>3</sup> / <sub>8</sub> % August 1, 1992	40,000	40,000
4 <sup>3</sup> / <sub>8</sub> % June 1, 1993	40,000	40,000
4 <sup>5</sup> / <sub>8</sub> % September 1, 1994	60,000	60,000
4 <sup>3</sup> / <sub>4</sub> % September 1, 1995	60,000	60,000
6 <sup>1</sup> / <sub>4</sub> % June 1, 1997	75,000	75,000
7 % June 1, 1998	75,000	75,000
7 <sup>5</sup> / <sub>8</sub> % April 1, 1999	75,000	75,000
9 <sup>1</sup> / <sub>8</sub> % March 1, 2000	98,000	98,000
8 <sup>3</sup> / <sub>8</sub> % A May 15, 2001	69,300	69,300
7 <sup>5</sup> / <sub>8</sub> % B November 15, 2001	80,000	80,000
7 <sup>1</sup> / <sub>2</sub> % C April 1, 2002	125,000	125,000
8 <sup>1</sup> / <sub>2</sub> % D March 1, 2004	90,000	90,000
12 % E October 1, 2004 (note B)	12,730	98,000
8 <sup>3</sup> / <sub>4</sub> % F April 1, 2006	60,000	60,000
8.45% G September 1, 2006	60,000	60,000
6.30% Pollution Control		
A October 1, 2006	14,300	14,300
8 <sup>1</sup> / <sub>4</sub> % H June 1, 2007	125,000	
8 <sup>1</sup> / <sub>8</sub> % I September 1, 2007	59,900	
8 % June 1, 2037	7,463	7,463
5 % July 1, 2037	7,538	7,538
<b>Total First and Refunding</b>		
Mortgage Bonds	<b>\$1,649,086</b>	<b>\$1,551,234</b>

## Notes:

A—The Company's Mortgage, securing the First and Refunding Mortgage Bonds, constitutes a direct first mortgage lien on substantially all property and franchises.

B—Reduced principally as a result of a tender offer in May 1977 at 127.75% of principal amount.

C—As of December 31, 1977 the annual interest requirement on Long-Term Debt was \$132,960,000 of which \$108,793,000 was the requirement for First and Refunding Mortgage Bonds. The embedded interest cost on Long-Term Debt was 6.82%.

See Summary of Significant Accounting Policies and Notes to Financial Statements.

	1977	1976
<b>Debenture Bonds unsecured</b>	(Thousands of Dollars)	
4 <sup>5</sup> / <sub>8</sub> % March 1, 1977		31,000
4 <sup>3</sup> / <sub>4</sub> % October 1, 1981	33,010	34,080
4 <sup>5</sup> / <sub>8</sub> % October 1, 1983	28,008	28,818
5 <sup>3</sup> / <sub>4</sub> % June 1, 1991	45,599	46,752
7 <sup>1</sup> / <sub>4</sub> % December 1, 1993	32,438	32,931
9 % November 1, 1995	63,000	65,935
7 <sup>3</sup> / <sub>4</sub> % August 15, 1996	65,308	67,078
8 <sup>3</sup> / <sub>4</sub> % November 1, 1996	49,187	51,461
6 % July 1, 1998	18,195	18,195
<b>Total Debenture Bonds</b>	<b>334,745</b>	<b>376,250</b>
<b>Other Long-Term Debt</b>		
6 <sup>1</sup> / <sub>2</sub> % Note due serially from May 15, 1977 to November 15, 1983	3,120	3,600
<b>Total Long-Term Debt</b>		
principal amount		
outstanding (note C)	1,986,951	1,931,084
Less amount due within one year (note D)	5,816	37,136
<b>Long-Term Debt excluding amount due within one year (note D)</b>	<b>1,981,135</b>	<b>1,893,948</b>
Add Net Unamortized Premium (Discount)	(238)	262
<b>Long-Term Debt and Net Unamortized Premium or Discount</b>	<b>\$1,980,897</b>	<b>\$1,894,210</b>

D—The aggregate principal amount of requirements for sinking funds and maturities for each of the five years following December 31, 1977 is as follows:

Year	Sinking Funds	Maturities	Total
(Thousands of Dollars)			
1978	\$ 5,336	\$ 480	\$ 5,816
1979	9,559	53,730	63,289
1980	9,300	18,940	28,240
1981	8,300	31,480	39,780
1982	8,300	480	8,780
	<b>\$40,795</b>	<b>\$105,110</b>	<b>\$145,905</b>

For sinking fund purposes, certain First and Refunding Mortgage Bond issues require annually the retirement of the aggregate of \$16,150,000 principal amount of bonds or the utilization of bondable property additions at 60% of cost and the portion expected to be met by property additions has been excluded from the table above. Also, the Company may, at its option, retire additional amounts up to \$6,200,000 annually through sinking funds of certain debenture bonds.



## Notes to Financial Statements

### 1. Federal Income Taxes

A reconciliation of reported Net Income with pre-tax income and of Federal income tax expense with the amount computed by multiplying pre-tax income by the statutory Federal income tax rate of 48% is as follows:

	1977	1976
	(Thousands of Dollars)	
Net Income	\$214,242	\$204,024
Federal income taxes included in:		
Operating income:		
Current provision	8,660	6,033
*Provision for deferred income taxes-net	74,732	44,381
Investment tax credit adjustments-net	37,577	49,966
Total deferred	112,309	94,347
Total included in operating income	120,969	100,380
Miscellaneous other income-net	73	232
Total Federal income tax provisions	121,042	100,612
Total	335,284	304,636
Earnings of subsidiaries-net	(595)	(726)
Pre-tax income	\$334,689	\$303,910
Tax expense at 48% of pre-tax income	\$160,651	\$145,877
Adjustments to pre-tax income, computed at 48%, for which deferred taxes are not provided under current rate-making policies:		
Tax depreciation in excess of book depreciation	(1,545)	(6,126)
Allowance for funds used during construction	(23,779)	(20,902)
Overhead costs capitalized	(6,117)	(4,652)
Other	1,868	(600)
Total	(29,573)	(32,280)
Amortization of deferred tax items	(10,036)	(12,985)
Total	(39,609)	(45,265)
Total Federal income tax provisions	\$121,042	\$100,612
*Represents the tax effects of the following items:		
Current Liabilities		
Unbilled revenues	\$1,155	\$7,662
Unbilled fuel costs	15,493	(7,583)
Total	16,648	79

Deferred Credits		
Additional tax depreciation	34,694	28,002
Repair allowance property	5,034	18,239
Gross receipts tax	1,281	1,653
Electric fuel costs	5,951	(925)
Loss on reacquired debt	11,598	
Other	(474)	(2,667)
	58,084	44,302
Total	\$ 74,732	\$ 44,381

The balance of investment tax credits not utilized in 1977 in the amount of \$12,000,000 is available as a carry-over to future years. The Tax Reduction Act of 1975 provides that, for the year 1976, investment tax credits can be utilized to offset 100% of tax liability and, for 1977, 90% of tax liability before investment credit.

The Company has a Tax Reduction Act Employee Stock Ownership Plan (TRASOP) under provisions of the Tax Reduction Act of 1975, as amended. Such provisions permit the Company to elect an additional 1% investment tax credit if the Company transfers to a TRASOP an equivalent amount of its common stock or cash for the purchase of shares of common stock and thereby fund a TRASOP without cost. Such additional credits amounted to \$4,000,000 and \$610,000 for the years 1977 and 1976, respectively.

### 2. Investments in and Advances to Subsidiaries

Investments in and advances to subsidiaries (including the Company's equity in undistributed earnings or losses) are summarized as follows:

December 31,	1977	1976
	(Thousands of Dollars)	
Transport of New Jersey Investment	\$ 10,192	\$ 10,019
Energy Terminal Services Corporation		
Investment	3,098	3,097
Advances	75,085	69,598
Energy Pipeline Corporation		
Investment	1,000	1,000
Advances	396	400
Energy Development Corporation		
Investment	4,092	2,879
Advances	41,652	30,356
Eascogas LNG, Inc.		
Investment	10	5
PSE&G Research Corporation		
Investment	10	
Total	\$135,535	\$117,354

The Company owns all the outstanding capital stock of Energy Terminal Services Corporation (ETSC). An LNG terminal under construction on Staten Island is ETSC's only substantial asset. The Company has made significant advances to ETSC through interest bearing notes. PSE&G is negotiating for the importation of LNG from foreign sources and plans to use the terminal as the port of entry.

Construction on the terminal has been suspended until the necessary regulatory approvals, authorizations and permits are received as well as a supply of LNG for the operation



of the terminal facilities. The ultimate realization of the carrying value of this investment may depend, among other things, upon the Company's ability to find alternate uses for the facilities and the treatment granted by the BPU for rate-making purposes.

Any loss the Company may incur, if the above conditions are not resolved, is not presently determinable; however, in the opinion of the management of the Company such loss, if any, would not have a material effect on the financial position of the Company or the results of its operations. Until such time as these conditions are met, the Company will continue its policy of not recognizing any income on this investment. See also subsidiary corporations — page 22.

### 3. Compensating Balances

Cash at December 31, 1977 and December 31, 1976 consisted primarily of compensating balances under informal arrangements with various banks to compensate them for services and to support lines of credit of \$190,650,000 and \$189,250,000, respectively. There are no legal restrictions placed on the withdrawal or other use of these bank balances.

### 4. Retained Earnings and Dividend Restrictions

Certain indentures supplemental to the First and Refunding Mortgage, certain of the Debenture Bond indentures and the Restated Certificate of Incorporation, as amended, contain provisions relating to the payment of dividends on both Common Stock and \$1.40 Dividend Preference Common Stock and provisions relating to the use of retained earnings. The amount of retained earnings available for the payment of dividends as of December 31, 1977 was \$641,885,000.

### 5. Short-Term Obligations

Commercial paper represents the Company's unsecured bearer promissory notes sold to dealers at a discount having terms of nine months or less. Average interest rates and average and maximum outstanding balances of short-term obligations are as follows:

	1977	1976
	(Thousands of Dollars)	
Maximum amount outstanding at any month-end	\$96,892	\$50,650
Daily average outstanding (A)	\$32,457	\$ 6,439
Weighted average annual interest rate (B)	5.83%	5.58%
Weighted average interest rate for obligations outstanding at year end	6.66%	4.63%

(A) Computed by multiplying the principal amounts of short-term obligations by days outstanding and dividing the sum of the products by number of days during the period.

(B) Computed by dividing short-term interest expense by the daily average short-term obligations.

### 6. Pension Plan

The Company has a non-contributory, trusted plan covering all employees who complete one year of service. As of December 31, 1977 the unfunded prior service cost was approximately \$291,476,000 and vested benefits were approximately \$312,385,000. The market value of the plan assets, \$130,667,000 at December 31, 1977, increased by \$11,486,000 as a result of contributions (net of pension payments), investment income and a net decline in market value. The Company's annual contribution is actuarially determined and provides for full funding by December 31, 2001.

Pension costs for the past two years, including contributions of \$17,126,000 in 1977 and \$15,550,000 in 1976 net of payments to pensioners and expenses, were as follows:

	1977	1976
	(Thousands of Dollars)	
Operating Expenses	\$29,856	\$27,398
Utility Plant and Other Accounts	8,991	8,606
Total Pension Costs	\$38,847	\$36,004

### 7. Commitments and Contingent Liabilities

The Company has substantial commitments as part of its construction program as well as commitments to obtain sufficient sources of fuel for electric generation and adequate gas supplies. Construction expenditures, excluding AFDC, of \$3.5 billion are expected to be incurred during the years 1978 through 1982. For detailed information see Construction Expenditures — page 6, Nuclear Generating Facilities — page 8, Fuel for Electric Generation — page 9, and subsidiary corporations — page 19.

As of December 31, 1977, the Company's expenditures applicable to the Atlantic Generating Station (Atlantic) were \$215 million. This amount excludes AFDC of \$36 million and advances of \$7 million for nuclear fuel enrichment. Because of decreases in projected demand and uncertain rate of future growth, the Company requested and received a three-year delay in the delivery of the units by Offshore Power Systems. The Company and OPS also agreed that PSE&G's additional liability, in the event the contract is terminated on or before December 29, 1979, was approximately \$60 million as of December 29, 1977 and PSE&G will continue to make provisional monthly payments of \$2.5 million over the next two years. These payments are being made toward the ultimate completion of the project in anticipation that the necessary licenses and permits will be obtained. However, in the event of cancellation, they will serve to discharge our termination liability.

No positive assurance can be given that the necessary licenses and permits will be obtained. If, as the result of future developments this project is not completed, the ultimate realization of our investment in these facilities, as with any major project of this type, will depend upon the sale of the Company's interests under the OPS contract and the treatment that is accorded the investment for rate-making purposes. For a further discussion of Atlantic, see Page 8.

Amendments adopted in 1975 to the Price-Anderson liability provisions of the Atomic Energy Act of 1954 became effective in August 1977. Under that Act, there is a limit of \$560 million on each nuclear generating unit in the United States for public liability claims that could arise from a nuclear incident. In the event of any such incident, all owners of nuclear generating units licensed to operate would be required to contribute toward satisfaction of such claims. The owners insure against this exposure by purchasing the maximum available private insurance (presently \$140 million), and the remainder of \$420 million is provided by indemnity agreements with the Nuclear Regulatory Commission (NRC). Under the 1975 amendments to these provisions, the \$420 million of NRC indemnity started to decrease in August 1977 under a new system of retrospective premiums to be assessed against the owners of nuclear reactors after a nuclear incident if the damages exceed private insurance. In the event of such an incident, the Company, to the extent of its ownership participation, could be assessed at the rate of



\$5 million for each licensed reactor owned, with a maximum assessment of \$10 million per reactor in a year.

In a proceeding to which the Company is not a party, the United States District Court for the Western District of North Carolina issued a decision on March 31, 1977 to the effect that the \$560 million limitation on liability described above is unconstitutional. This decision has been appealed to the Supreme Court of the United States. At this time, it is not possible to determine what effect the decision might have on the Company if it should be upheld on appeal. A contention that the limitation on liability is unconstitutional has also been made in an action against the Company and certain other utilities, which was commenced on October 6, 1977.

The Company is a member of Nuclear Mutual Limited (NML) which provides insurance coverages, up to \$175 million, for property damage to nuclear generating facilities of member companies. In the event of losses at any plant covered by NML, the Company would be subject to a maximum assessment of fourteen times its annual premium, which currently would not be material for a single assessment.

The Company, under an agreement entered into in May 1972, agreed to provide a limited guaranty of not more than \$76,000,000 of the legal obligations of the Company's unconsolidated subsidiary, Transport of New Jersey (Transport) under its pension plan in the event Transport failed to meet such obligations, limited to pension benefits accrued to the date of the agreement. As of December 31, 1977, the actuarially computed value of the Company's obligation under the guaranty was approximately \$49,900,000. Under an interpretation of the Employee Retirement Income Security Act of 1974, the Company could be liable to the Pension Benefit Guaranty Corporation, a corporation established within the United States Department of Labor, for deficiencies in plan assets if the subsidiaries' pension plans were terminated. As of December 31, 1977 vested benefits of the Company's subsidiaries' pension plans exceeded the fund assets by approximately \$76,000,000. Any payments made under the guaranty would have the effect of reducing the Company's potential liability to the Pension Benefit Guaranty Corporation.

## 8. Replacement Cost (Unaudited)

The impact of the rate of inflation experienced in recent years has resulted in replacement cost of productive capacity which is greater than the historical cost of such assets as reported in the Company's financial statements. It is anticipated that the actual cost of replacing productive capacity, when incurred, will be recovered through depreciation recognized, together with a return on the unrecovered investment thereon, in future rates allowed by regulatory bodies in the same man-

ner that historic costs and returns on investments are being recovered in current rates. In compliance with reporting requirements of the Securities and Exchange Commission, estimated replacement cost information is disclosed in the Company's annual report to the SEC on Form 10-K.

## 9. Accounting for Leases

The Company has certain leases for property and equipment which meet the criteria for capitalization, but in accordance with rate-making treatment are accounted for as operating leases. The capitalization of such leases would not have a significant effect on assets, liabilities or operating expenses.

## 10. Other Matters

Information regarding rate relief appears on page 6 and information describing financing during the year 1977 and subsequent to December 31, 1977 appears on page 7, and information regarding discussions with New Jersey Natural Gas Company as to a possible merger appears on page 3.

## 11. Financial Information by Business Segments

	Electric	Gas	Total
	(Thousands of Dollars)		
For the Year Ended December 31, 1977			
Operating Revenues	\$1,470,118	\$562,677	\$2,032,795
Operating Income*	\$ 250,385	\$ 46,588	\$ 296,973
Depreciation	\$ 109,093	\$ 38,559	\$ 147,652
Additions to Utility Plant (excluding AFDC)	\$ 351,762	\$ 29,373	\$ 381,135
December 31, 1977			
Net Utility Plant	\$3,779,534	\$559,647	\$4,339,181
Gas Exploration Subsidiary and LNG Program		125,333	125,333
Other Corporate Assets			660,983
Total Assets			\$5,125,497
*Net of Federal Income Tax	\$ 97,961	\$ 23,008	\$ 120,969

## 12. Selected Quarterly Data (Unaudited)

The information shown below in the opinion of the Company includes all adjustments, consisting only of normal recurring accruals, necessary to a fair presentation of such amounts. Due to the seasonal nature of the business, quarterly amounts vary significantly during the year.

Calendar Quarter Ended	March 31,		June 30,		September 30,		December 31,	
	1977	1976	1977	1976	1977	1976	1977	1976
(Thousands)								
Operating Revenues	\$542,685	\$515,138	\$460,862	\$426,634	\$498,290	\$427,676	\$530,958	\$500,087
Operating Income	75,918	74,667	68,356	63,169	81,588	69,375	71,111	81,227
Net Income	57,218	52,147	51,610	42,158	57,647	49,392	47,767	60,327
Balance Available for Common Stock	46,130	42,147	40,522	32,158	46,458	39,222	36,067	49,240
Earnings per Average Share of Common Stock	\$ .78	\$ .74	\$ .69	\$ .55	\$ .78	\$ .66	\$ .61	\$ .84
Average Shares of Common Stock Outstanding	58,977	56,986	59,097	58,626	59,289	58,743	59,604	58,866



# Operating Statistics

(000 omitted where applicable)	1977	1976	% Annual Increase—1977 compared with	
			1976	1967
<b>Electric</b>				
Revenues from Sales of Electricity (a)				
Residential	\$ 492,473	\$ 443,531	11.03	13.70
Commercial	531,118	474,791	11.86	15.48
Industrial	414,058	367,470	12.68	13.82
Public Street Lighting	27,622	25,863	6.80	9.54
Total Revenues from Sales to Customers	1,465,271	1,311,655	11.71	14.24
Interdepartmental	1,916	1,585	20.88	15.46
Total Revenues from Sales of Electricity	1,467,187	1,313,240	11.72	14.25
Other Electric Revenues	2,931	2,837	3.31	23.97
Total Operating Revenues	\$1,470,118	\$1,316,077	11.70	14.26
Energy Adjustment Revenues (included above)	\$ 257,902	\$ 307,530	(16.14)	29.56
Sales of Electricity — kilowatthours (a)				
Residential	7,769,629	7,711,953	.75	4.21
Commercial	9,747,908	9,514,574	2.45	6.27
Industrial	10,627,734	10,472,054	1.49	1.01
Public Street Lighting	259,277	259,151	.05	1.66
Total Sales to Customers	28,404,548	27,957,732	1.60	3.42
Interdepartmental	38,331	34,996	9.53	4.36
Total Sales of Electricity	28,442,879	27,992,728	1.61	3.42
Kilowatthours Produced, Purchased, and Interchanged — net	30,771,719	30,376,187	1.30	3.48
Load Factor	50.9%	55.9%		
Heat Rate — Btu of fuel per net kwh generated	10,677	10,593	.79	.23
Net Installed Generating Capacity at December 31 — kilowatts	9,247	8,741	5.79	6.06
Net Peak Load — kilowatts (60-minute integrated)	6,895	6,190	11.39	4.82
Cooling Degree Hours	8,269	6,513	26.96	6.50
Average Annual Use per Residential Customer — kwh	5,403	5,395	.15	3.48
Meters in Service at December 31	1,704	1,697	.41	.58
<b>Gas</b>				
Revenues from Sales of Gas (a)				
Residential	\$ 344,444	\$ 342,524	.56	9.23
Commercial	137,811	140,809	(2.13)	12.38
Industrial	78,474	68,341	14.83	12.84
Street Lighting	178	159	11.95	8.74
Total Revenues from Sales to Customers	560,907	551,833	1.64	10.38
Interdepartmental	572	476	20.17	10.23
Total Revenues from Sales of Gas	561,479	552,309	1.66	10.38
Other Gas Revenues	1,198	1,149	4.26	22.85
Total Operating Revenues	\$ 562,677	\$ 553,458	1.67	10.40
Raw Materials Adjustment Revenues (included above)	\$ 113,787	\$ 154,526	(26.36)	26.18
Sales of Gas — therms (a)				
Residential	980,570	1,045,627	(6.22)	.82
Commercial	432,810	468,761	(7.67)	3.56
Industrial	329,211	307,949	6.90	.97
Street Lighting	376	389	(3.34)	(1.84)
Total Sales to Customers	1,742,967	1,822,726	(4.38)	1.46
Interdepartmental	2,064	1,764	17.01	(.10)
Total Sales of Gas	1,745,031	1,824,490	(4.36)	1.45
Gas Produced and Purchased — therms	1,811,019	1,895,041	(4.43)	1.39
Effective Daily Capacity at December 31 — therms	18,933	19,449	(2.65)	4.66
Maximum 24-hour Gas Sendout — therms	14,006	12,803	9.40	4.16
Heating Degree Days (a)	5,155	5,349	(3.63)	(.37)
Average Annual Use per Residential Customer — therms	862	924	(6.71)	.45
Meters in Service at December 31	1,350	1,354	(.30)	.37

(a) Starting in 1973, revenues and sales by customer classification include accrued and unbilled dollar amounts and sales volumes from meter reading date to the end of the calendar year. To better match temperature effects on

these recorded sales, heating degree days are also reported on a calendar year basis effective with 1973. For years prior to 1973, heating degree days remain on a sales-year basis.



1975	1974	1973	1972	1967
\$ 413,005	\$ 364,674	\$ 274,974	\$ 238,025	\$ 136,434
429,428	377,184	264,450	230,176	125,878
341,749	336,250	216,543	188,667	113,456
23,375	20,473	17,086	15,773	11,107
1,207,557	1,098,581	773,053	672,641	386,875
1,573	1,183	750	646	455
1,209,130	1,099,764	773,803	673,287	387,330
4,358	1,201	1,305	1,546	342
\$1,213,488	\$1,100,965	\$ 775,108	\$ 674,833	\$ 387,672
\$ 419,154	\$ 414,798	\$ 141,081	\$ 107,582	\$ 19,354
7,598,964	7,514,365	8,008,127	7,399,963	5,144,861
8,994,855	8,687,964	8,916,829	8,289,066	5,308,914
10,144,917	11,244,117	11,830,307	11,375,579	9,613,821
256,755	253,395	249,837	246,496	219,977
26,995,491	27,699,841	29,005,100	27,311,104	20,287,573
39,910	31,072	29,160	25,807	25,018
27,035,401	27,730,913	29,034,260	27,336,911	20,312,591
29,255,628	29,730,774	31,164,926	29,509,136	21,863,292
53.3%	53.7%	52.2%	54.2%	57.9%
10,582	10,779	10,695	10,685	10,439
8,829	8,892	8,306	7,836	5,132
6,270	6,316	6,816	6,201	4,308
6,543	7,501	10,911	7,287	4,407
5,348	5,312	5,703	5,307	3,836
1,689	1,683	1,672	1,656	1,609
\$ 259,095	\$ 220,364	\$ 186,325	\$ 183,953	\$ 142,428
102,656	86,463	71,533	70,953	42,905
54,369	46,971	42,624	40,381	23,454
116	94	89	88	77
416,236	353,892	300,571	295,375	208,864
647	481	464	552	216
416,883	354,373	301,035	295,927	209,080
154	535	117	143	153
\$ 417,037	\$ 354,908	\$ 301,152	\$ 296,070	\$ 209,233
\$ 106,795	\$ 62,448	\$ 39,124	\$ 34,913	\$ 11,124
968,487	977,994	977,468	1,042,793	903,917
447,600	459,074	457,955	485,358	304,933
344,987	407,840	494,320	494,454	298,940
404	428	444	449	451
1,761,478	1,845,336	1,930,187	2,023,054	1,508,241
3,204	3,088	3,472	4,463	2,084
1,764,682	1,848,424	1,933,659	2,027,517	1,510,325
1,823,191	1,913,826	2,002,206	2,112,844	1,577,412
19,575	19,324	17,668	16,999	12,011
11,077	11,763	12,341	12,125	9,320
4,653	4,629	4,245	4,879	5,348
862	872	873	932	824
1,355	1,352	1,347	1,338	1,301



# Financial Statistics

(000 omitted where applicable) Condensed Statement of Income (a)	1977		1976	
	Amount	%	Amount	%
Operating Revenues				
Electric	\$1,470,118	72	\$1,316,077	70
Gas	562,677	28	553,458	30
Total Operating Revenues	2,032,795	100	1,869,535	100
Operating Expenses				
Fuel for Electric Generation	416,760	21	362,257	20
Interchanged Power — net	120,041	6	121,917	7
Gas Purchased and Materials for Gas Produced	257,897	13	261,190	14
Other Operation Expenses	253,831	12	227,395	12
Maintenance	124,876	6	99,617	5
Depreciation	147,652	7	133,087	7
Taxes Other than Federal Income Taxes	293,796	14	275,254	15
Federal Income Taxes	120,969	6	100,380	5
Total Operating Expenses	1,735,822	85	1,581,097	85
Operating Income				
Electric	250,385	13	236,359	12
Gas	46,588	2	52,079	3
Total Operating Income	296,973	15	288,438	15
Allowance for Funds Used During Construction (Debt and Equity)	49,540	2	43,547	3
Other Income — net	1,447		2,654	
Interest Charges	(133,718)	(7)	(130,615)	(7)
Income before cumulative effect of a change in accounting method	214,242	10	204,024	11
Cumulative effect to January 1, 1973 of accruing estimated unbilled revenues of \$41,488, net of related taxes				
Net Income	214,242	10	204,024	11
Preferred Stock Dividends	45,065	2	41,257	2
Balance Available for Common Stock	\$ 169,177	8	\$ 162,767	9
Shares of Common Stock Outstanding				
End of Year	59,806		58,976	
Average for Year	59,243		58,308	
Earnings per average share of Common Stock	\$2.86		\$2.79	
Dividends Paid per Share	\$1.92		\$1.78	
Payout Ratio	67%		64%	
Rate of Return on Average Common Equity (c)	10.96%		11.18%	
Ratio of Earnings to Fixed Charges Before Income Taxes (d)	3.52		3.34	
Book Value per Common Share (e)	\$25.57		\$24.71	
Utility Plant	\$5,654,097		\$5,255,286	
Accumulated Depreciation and Amortization	\$1,314,916		\$1,194,467	
Capitalization				
Mortgage Bonds	\$1,647,445	40	\$1,549,579	39
Debenture Bonds	330,812	8	341,511	9
Other Long-Term Debt	2,640		3,120	
Total Long-Term Debt	1,980,897	48	1,894,210	48
Preferred Stock	589,994	14	559,994	14
\$1.40 Dividend Preference Common Stock and Common Stock	919,752	22	900,384	22
Premium on Capital Stock	557		550	
Paid-In Capital	26,065		26,065	1
Retained Earnings	651,885	16	596,745	15
Total Common Equity	1,598,259	38	1,523,744	38
Total Capitalization	\$4,169,150	100	\$3,977,948	100

(a) See Summary of Significant Accounting Policies, page 23, and Notes to Financial Statements, page 31.

(b) Excludes non-recurring special credit equal to \$.41 per share.

(c) Balance available for \$1.40 Dividend Preference Common Stock and Common Stock divided by the average of beginning and end-of-year Total Common Equity.



1975		1974		1973		1972		1967	
Amount	%	Amount	%	Amount	%	Amount	%	Amount	%
\$1,213,488	74	\$1,100,965	76	\$ 775,108	72	\$ 674,833	70	\$ 387,672	65
417,037	26	354,908	24	301,152	28	296,070	30	209,233	35
1,630,525	100	1,455,873	100	1,076,260	100	970,903	100	596,905	100
339,296	21	374,519	26	221,724	21	171,638	18	73,440	12
139,016	9	81,920	6	19,376	2	31,737	3	(1,528)	
198,653	12	144,020	10	119,828	11	117,910	12	66,075	11
201,865	12	192,168	13	174,108	16	168,138	17	109,867	19
83,494	5	91,467	6	88,257	8	80,215	8	47,362	8
122,634	8	106,683	7	98,239	9	91,037	10	58,922	10
240,967	15	213,576	15	167,545	16	132,827	14	85,056	14
54,368	3	21,061	1	3,252		(991)		32,276	5
1,380,293	85	1,225,414	84	892,329	83	792,511	82	471,470	79
217,429	13	187,593	13	152,492	14	141,181	14	90,969	15
32,803	2	42,866	3	31,439	3	37,211	4	34,466	6
250,232	15	230,459	16	183,931	17	178,392	18	125,435	21
43,325	3	56,027	4	56,529	5	45,011	5	5,289	1
1,758		(2,037)		703		(5,166)	(1)	2,384	
(136,709)	(8)	(130,609)	(9)	(109,680)	(10)	(102,034)	(10)	(44,324)	(7)
158,606	10	153,840	11	131,483	12	116,203	12	88,784	15
				18,540	2				
158,606	10	153,840	11	150,023	14	116,203	12	88,784	15
36,008	2	31,813	3	30,761	3	21,117	2	7,603	1
122,598	8	\$ 122,027	8	\$ 119,262	11	\$ 95,086	10	\$ 81,181	14
56,523		52,531		47,861		43,861		31,004	
54,513		51,918		45,680		41,541		31,004	
\$2.25		\$2.35		\$2.20 (b)		\$2.29		\$2.62	
\$1.72		\$1.72		\$1.72		\$1.70		\$1.55½	
76%		73%		78%		74%		59%	
9.01%		9.68%		8.87%		9.37%		13.17%	
2.56		2.33		2.22		2.08		3.74	
\$24.02		\$24.25		\$24.14		\$23.48		\$19.21	
4,920,768		\$4,636,344		\$4,369,141		\$3,999,474		\$2,375,247	
1,078,124		\$ 965,160		\$ 916,346		\$ 831,673		\$ 536,934	
1,418,854	36	\$1,422,525	38	\$1,236,364	36	\$1,239,602	39	\$ 752,026	42
380,619	10	389,640	10	420,387	12	430,857	14	247,421	14
153,600	4	153,600	4	103,600	3				
1,953,073	50	1,965,765	52	1,760,351	51	1,670,459	53	999,447	56
509,994	13	434,994	12	434,994	13	374,994	12	149,994	8
855,874	22	797,386	21	710,078	21	622,878	20	333,398	19
550		550		550		539		252	
26,065	1	26,065	1	26,065	1	26,065	1	26,065	1
540,041	14	515,267	14	483,543	14	443,443	14	287,391	16
1,422,530	37	1,339,268	36	1,220,236	36	1,092,925	35	647,106	36
3,885,597	100	\$3,740,027	100	\$3,415,581	100	\$3,138,378	100	\$1,796,547	100

Net Income plus Income Taxes, Investment Tax Credits and Fixed Charges divided by Fixed Charges. Fixed Charges include Interest on Long-Term and Short-Term Debt and Other Interest Expense.

(e) Total Common Equity divided by year-end Common Stock shares plus doubled the \$1.40 Dividend Preference Common Stock shares.



## Management's Discussion and Analysis of the Statement of Income

The following factors had a significant effect on the Company's results of operations for the periods indicated.

### Electric Operating Revenues

Increases in electric operating revenues since 1974 have been due principally to rate increases and greater sales in 1976 and 1977. After a 3% decline in 1975, kilowatt-hour sales have increased 4% and 2%, respectively, in 1976 and 1977. These increases resulted from slightly improved economic conditions and higher than normal temperatures in the summer of 1977.

### Gas Operating Revenues

Increases in gas operating revenues in the years 1975 and 1976 were primarily attributable to rate increases, greater recovery of increased raw material costs through the adjustment clauses contained in the Company's rates, and a moderate sales increase in 1976. The 1977 increase is attributable to the 1976 increase in basic rates. Therm sales decreased 5% in 1975, as the result of a warmer than usual heating season, curtailments to interruptible customers, customer conservation efforts and the economic slowdown. In 1976, therm sales showed an increase of 3% due to the extremely cold weather during the last quarter of the year. Therm sales decreased in 1977 by 4% due to the return to more normal weather conditions in the last three months of the year, conservation and attrition of customers, and curtailments to commercial and industrial customers during the gas crisis in early 1977.

### Fuel for Electric Generation and Interchanged Power — net

The Company belongs to the Pennsylvania-New Jersey-Maryland Interconnection (PJM), and is therefore able to optimize its generation-interchange mix, using the lowest cost energy available in the interconnection system at any given time. Accordingly there can be fluctuations between Fuel for Electric Generation and Interchanged Power — net. The total of the two, however, represents the Company's aggregate energy cost and is a better measure than the two items taken separately.

On this basis, total energy costs increased by 5%, 1% and 11%, respectively, in 1975, 1976 and 1977. The moderate increases of 1975 and 1976 reflect the most economical use of the interchange, and greater generation by lower cost nuclear power. The increase in 1977 is principally due to a higher unit cost for liquid fuel burned and the greater demand by our customers.

### Gas Purchased and Materials for Gas Produced

Although gas therm sales to the Company's customers decreased 5% in 1975, the cost of gas purchased and materials for gas produced increased due to higher prices and the increased use of naphtha for the manufacture of synthetic natural gas. The cost of gas purchased and materials for gas produced increased in 1976 due to higher prices and the greater sales volume. In 1977 this cost declined 1% due to the decrease in sales volume.

### Other Operation Expenses

Increases since 1974 are due to higher costs of labor, services, and materials and supplies.

### Maintenance

The decrease in 1975 is primarily attributable to reduced maintenance of gas turbine units due to a decline in their usage caused by the availability of less expensive nuclear energy and purchased power. The increases in 1976 and 1977 were principally due to maintenance at certain of the Company's conventional steam generating stations, at the Peach Bottom nuclear generating station, and for 1977 at the Salem nuclear generating station. Also, for 1977, gas distribution maintenance rose principally due to the extremely cold weather at the beginning of 1977 and electric distribution maintenance increased due to higher costs of labor, services, and materials and supplies.

### Depreciation

The increase in 1975 was due to an increase in depreciable utility plant as Peach Bottom nuclear generating station and related transmission facilities, along with the Linden Synthetic Natural Gas Plant (Linden SNG), were placed in service in 1974. The increase in 1977 reflects depreciation on Unit No. 1 at Salem nuclear generating station which was placed in service on June 30, 1977.

In accordance with rate orders effective November 1975 and October 1976, the Company raised its depreciation rates, resulting in an increase of \$7,600,000 in 1976 and \$4,400,000 in 1977.

### Taxes Other than Federal Income Taxes

Taxes Other than Federal Income Taxes consist principally of the New Jersey gross receipts tax which varies in direct proportion to electric and gas operating revenues.

In 1977, Pennsylvania enacted a gross receipts tax affecting PSE&G because of our jointly owned generating stations in that state. The tax, amounting to \$7.2 million or 6¢ per share, is being challenged by the Company as to its constitutionality.

Also in 1977, the Company, after a successful court appeal, reversed an accrual of \$7.0 million or 6¢ a share for Pennsylvania Public Utility Realty taxes applicable to years after 1974.

### Federal Income Taxes

Increases in each period were due to greater pre-tax operating income and a decrease in tax depreciation in excess of book depreciation for which deferred taxes are not provided. (See Note 1 of Notes to Financial Statements.)

### Allowance for Funds Used During Construction (AFDC)

The decrease in AFDC in 1975 was primarily due to Peach Bottom and related transmission facilities and the Linden SNG plant being placed in service during 1974, and the discontinuance in the last half of 1975 of the accrual of AFDC on a portion of Construction Work in Progress in accordance with BPU rate orders. (See Summary of Significant Accounting Policies.) The increase in 1977 resulted principally from a greater level of Construction Work in Progress, offset somewhat by a transfer, on June 30, 1977, of Salem 1 to depreciable utility plant in service.



### Total Interest Charges

The increase in 1975 was principally due to the issuance of additional long-term debt. The decrease in 1976 was due to lower rates and prepayment of long-term debt. The 1977 increase is attributable to greater amounts of short-term borrowings outstanding at higher rates, and the issuance of additional long-term debt.

### Net Income

Regulatory accounting requirements followed by the Company during the test operation of Salem 1 resulted in a benefit to earnings of 32¢ per share in 1977. Under these requirements, the Company received the benefit of revenues at the prescribed rates for the test generation and continued to record AFDC. Operating expenses other than depreciation were charged to the costs of generation during the test period. The same accounting procedure used during test operation of Peach Bottom 2 and 3 resulted in a benefit to earnings of 21¢ per share in 1974.

---

### Form 10-K Available

The Company is required by Securities and Exchange Commission (SEC) regulations to file with that agency a Form 10-K annual report containing certain detailed financial and other data. There are no accounting differences between the financial statements presented in this Annual Report to Stockholders and those in the Form 10-K report, but it does provide other information as required by SEC regulations.

Stockholders or other interested persons who wish to have a copy of the Company's Form 10-K report may obtain one without charge after March 31, 1978, by writing to the Vice President and Treasurer, Public Service Electric and Gas Company, 80 Park Place, Newark, New Jersey 07101. The copy so obtained will be without exhibits. Exhibits may be purchased for a specified fee.

---

### Independent Accountants' Opinion

#### HASKINS & SELLS Certified Public Accountants

INTERNATIONALLY

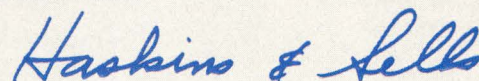
DELOITTE, HASKINS & SELLS

550 Broad Street, Newark, New Jersey 07102

To the Stockholders and Board of Directors of  
Public Service Electric and Gas Company:

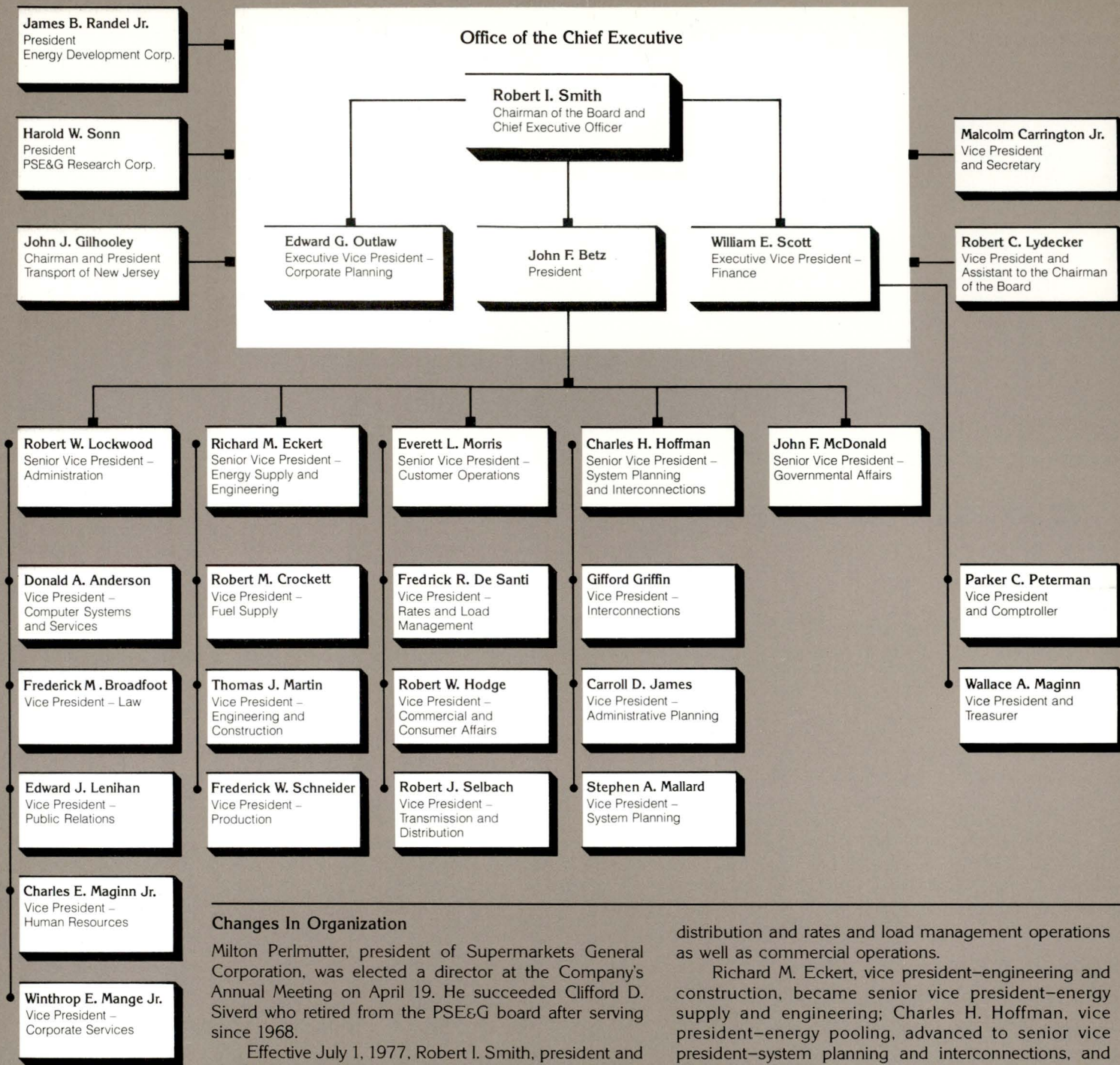
We have examined the balance sheets and statements of capital stock and long-term debt of Public Service Electric and Gas Company as of December 31, 1977 and 1976 and the related statements of income, retained earnings reinvested in business, and changes in financial position for the years then ended. Our examinations were made in accordance with generally accepted auditing standards and, accordingly, included such tests of the accounting records and such other auditing procedures as we considered necessary in the circumstances.

In our opinion, such financial statements, appearing on pages 23 to 33, inclusive, present fairly the financial position of Public Service Electric and Gas Company as of December 31, 1977 and 1976 and the results of its operations and the changes in its financial position for the years then ended, in conformity with generally accepted accounting principles applied on a consistent basis.



February 22, 1978





### Changes In Organization

Milton Perlmutter, president of Supermarkets General Corporation, was elected a director at the Company's Annual Meeting on April 19. He succeeded Clifford D. Siverd who retired from the PSE&G board after serving since 1968.

Effective July 1, 1977, Robert I. Smith, president and chief executive officer, was elected chairman of the board and John F. Betz, executive vice president, was elected president and chief operating officer. Mr. Smith continues as chief executive officer. These two men together with William E. Scott, executive vice president, who was named executive vice president-finance, and Edward G. Outlaw, formerly senior vice president-operations, who became executive vice president-corporate planning, make up the "Office of the Chief Executive."

Other changes effective the same date included Harold W. Sonn, a senior vice president, who was also named president of PSE&G Research Corporation, a new subsidiary formed to direct internal and external research operations; James B. Randel, Jr., a senior vice president, who was also named president of Energy Development Corporation, the Company's exploration subsidiary, and Everett L. Morris, formerly senior vice president-corporate development, who was named senior vice president-customer operations, a new position which coordinates all of the electric and gas transmission and

distribution and rates and load management operations as well as commercial operations.

Richard M. Eckert, vice president-engineering and construction, became senior vice president-energy supply and engineering; Charles H. Hoffman, vice president-energy pooling, advanced to senior vice president-system planning and interconnections, and Robert W. Lockwood, vice president-corporate services to senior vice president-administration.

Other appointments included Fredrick R. DeSanti, vice president-rates and load management, Winthrop E. Mange, Jr., vice president-corporate services, Stephen A. Mallard, vice president-system planning, and Thomas J. Martin, vice president-engineering and construction.

Charles E. Maginn, Jr., became vice president-human resources, effective September 8. Also effective the same date was the designation of Edward J. Lenihan, vice president-public and employee relations, as vice president-public relations.

Donald A. Anderson, former director of internal auditing for Southern Company Services, Inc., Atlanta, Ga., joined PSE&G October 1 as vice president-computer systems and services.

On October 18, Robert M. Crockett, vice president-fuel supply, also became president of Easogas LNG, Inc.

Gifford Griffin became vice president-interconnections, effective December 20.



---

## Board of Directors

### John F. Betz

President of the Company  
Member of Executive and Finance Committees

### Reynold E. Burch, M.D.

The Private Practice of Medicine in the specialty of gynecology, East Orange, New Jersey; Clinical Associate Professor of Obstetrics and Gynecology, New Jersey Medical School; and former Trustee of the College of Medicine and Dentistry of New Jersey, Newark, New Jersey  
Member of Audit Committee

### C. Malcolm Davis

Chairman of the Board and director, Fidelity Union Bancorporation, Newark, New Jersey  
Member of Executive and Finance Committees  
and Chairman of Nominating Committee

### W. Robert Davis

Chairman of the Board and director, Bancshares of New Jersey, Moorestown, New Jersey; Chairman of the Board and director, The Bank of New Jersey, Camden, New Jersey; and Chairman of the Board and director, The Bank of New Jersey N.A., Moorestown, New Jersey  
Chairman of Audit Committee and member of Nominating Committee

### Edward R. Eberle

Former Chairman of the Board of the Company  
Member of Finance and Nominating Committees

### Margery Somers Foster

University Professor of Economics and former Dean of Douglass College, Rutgers, The State University of New Jersey, New Brunswick, New Jersey  
Member of Audit Committee

### D. Wayne Hallstein

Director and former President, Ingersoll-Rand Company (diversified manufacturer of machinery, equipment and tools), Woodcliff Lake, New Jersey  
Member of Finance Committee and Organization  
and Compensation Committee

### Milton Perlmutter

President and Director, Supermarkets General Corporation (supermarkets, department stores, drug stores, home improvement centers and other retail and wholesale businesses), Woodbridge, New Jersey  
Member of Audit Committee

### Stewart G. Pollock

Partner of the firm Schenck, Price, Smith & King, Counsellors-at-Law, Morristown, New Jersey  
Member of Audit Committee

### Kenneth C. Rogers

President, Stevens Institute of Technology, Hoboken, New Jersey  
Member of Nominating Committee and Organization  
and Compensation Committee

### William E. Scott

Executive Vice President – Finance of the Company  
Member of Executive Committee and Chairman of Finance Committee

### Robert I. Smith

Chairman of the Board and Chief Executive Officer of the Company  
Chairman of Executive Committee and member of Finance Committee

### Robert V. Van Fossan

Chairman of the Board, Chief Executive Officer and director, The Mutual Benefit Life Insurance Company, Newark, New Jersey  
Member of Executive and Finance Committees  
and Chairman of the Organization and Compensation Committee

### Nathan H. Wentworth

Chairman of Executive Committee, director and former Chairman of the Board, The Continental Corporation (property and casualty, life and accident and health, and other types of insurance, and other financial services), and The Continental Insurance Companies, New York, New York.  
Member of Finance Committee and Organization  
and Compensation Committee

## Officers

### Robert I. Smith

Chairman of the Board and Chief Executive Officer

### John F. Betz

President

### Edward G. Outlaw

Executive Vice President – Corporate Planning

### William E. Scott

Executive Vice President – Finance

### James B. Randel, Jr.

Senior Vice President of the Company and President of Energy Development Corporation

### Harold W. Sonn

Senior Vice President of the Company and President of PSE&G Research Corporation

### Richard M. Eckert

Senior Vice President – Energy Supply and Engineering

### Charles H. Hoffman

Senior Vice President – System Planning and Interconnections

### Robert W. Lockwood

Senior Vice President – Administration

### John F. McDonald

Senior Vice President – Governmental Affairs

### Everett L. Morris

Senior Vice President – Customer Operations

### Donald A. Anderson

Vice President – Computer Systems and Services

### Frederick M. Broadfoot

Vice President – Law

### Malcolm Carrington, Jr.

Vice President and Secretary

### Robert M. Crockett

Vice President – Fuel Supply and President of Eascogas LNG, Inc.

### Fredrick R. DeSanti

Vice President – Rates and Load Management

### Gifford Griffin

Vice President – Interconnections

### Robert W. Hodge

Vice President – Commercial and Consumer Affairs

### Carroll D. James

Vice President – Administrative Planning

### Edward J. Lenihan

Vice President – Public Relations

### Robert C. Lydecker

Vice President and Assistant to the Chairman of the Board

### Charles E. Maginn, Jr.

Vice President – Human Resources

### Wallace A. Maginn

Vice President and Treasurer

### Stephen A. Mallard

Vice President – System Planning

### Winthrop E. Mange, Jr.

Vice President – Corporate Services

### Thomas J. Martin

Vice President – Engineering and Construction

### Parker C. Peterman

Vice President and Comptroller

### Frederick W. Schneider

Vice President – Production

### Robert J. Selbach

Vice President – Transmission and Distribution





1903-1978

YEARS OF  
SERVICE

U.S. Postage  
PAID  
Bulk Rate  
Public Service  
Electric and Gas  
Company

Public Service  
Electric and Gas  
Company

Newark, N. J. 07101