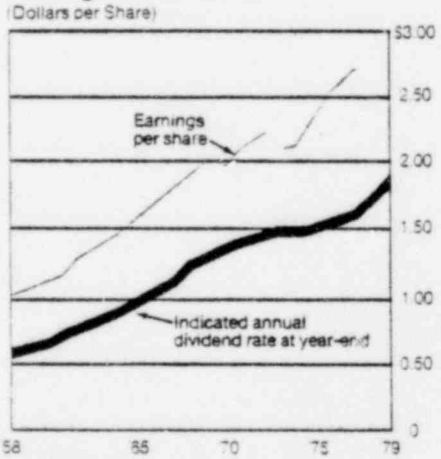
## 1979 Highlights

| | 1979 | 1978 | Percent Increase or (Decrease) |
|---|---|---|---|
| **Earnings Per Share** decreased 3¢. | **$2.41** | $2.44 | (1.2)% |
| **Annual Dividend Rate** on common stock increased 8¢ in June 1979. | **$1.78** | $1.70 | 4.7 |
| Electric and gas rates increased $26.0 million and $16.6 million, respectively, on an annual basis, effective May 4, 1979. Additional amounts totaling $6.9 million annually, filed January 25, 1980, primarily to offset higher property taxes, became effective February 8, 1980. | | | |
| Electric rate increase application for $25.6 million, or 2.5%, annually filed September 21, 1979. | | | |
| **Fuel Oil Consumed** for LILCO system electric energy requirements reduced by 7.5 million barrels, saving customers $42 million. | **15.3** | 22.8 | (32.7) |
| **Total Revenues** exceeded one billion dollars. | **$1.05** | $0.90 | 16.3 |
| **Equity of Owners of Common Stock** exceeded one billion dollars. | **$1.14** | $0.98 | 15.7 |
| **Total Electric System kWh Sales** up 30 million kWh. | **12,467** | 12,437 | 0.2 |
| **Number of Gas Space Heating Customers at Year End** increased 5,600. | **161,000** | 155,400 | 3.6 |
| **Total System Sales of Gas** up 1.6 billion cubic feet. | **43.6** | 42.0 | 3.8 |
| **Total Capital Requirements** up $50.3 million. | **$466.1** | $415.8 | 12.1 |
| **Permanent Financing** $312.7 million, up $112.8 million. | **$312.7** | $199.9 | 56.4 |
| **Tri-Counties Resources and Construction Trusts** provided an additional total of $97.7 million in 1979. | **$97.7** | $111.4 | (12.3) |

### Earnings and Dividends

(Dollars per Share)




LILCO's earnings per common share have been increased in 17 of the last 21 years. The dividend rate on the common stock has been raised in all but one of these 21 years.



8005220 648

## To Our Shareholders

By any measure, 1979 was a difficult time that tested the strengths and resources of all Americans. It was a year when the serious energy supply dislocations and intense inflationary pressures which marked the 1970's decade reached their most critical level. Despite these unfavorable external conditions, the reliability of gas and electric service to LILCO customers remains largely unaffected but its cost, as with all energy forms, has continued to increase. Meaningful progress continues to be made in our efforts to lessen our community's dependence on foreign oil, the single most important factor contributing to today's economic difficulties.

Income for the common stock rose to $128.8 million from $111.3 million in 1978, but with a 16.9% increase in the number of average common shares outstanding, the earnings per share declined slightly from $2.44 in 1978 to $2.41 in 1979. In June 1979, the annual dividend rate on the common stock was raised 8¢ to $1.78 per share. This is the 20th increase over the last 21 years.

Earnings benefited from the $26.0 million electric and $16.6 million gas rate increases which went into effect in May 1979. As part of the Public Service Commission's ruling in that rate case, additional increases totaling $6.9 million to cover higher property taxes have become effective in February 1980. The historically high inflationary pressures on the Company's operating costs and capital financing program continue, however, to outpace the response of the regulatory process in providing appropriate financial relief. As a consequence, the Company finds it necessary to apply for additional rate adjustments on a regular basis to compensate for the persistently growing cost burdens created by today's economic environment. In this regard, an application to increase electric rates by $25.6 million was filed this past September with the expectation that an increase will become effective no later than May 1980. Another rate filing for an increase to become effective in 1981 seems inevitable.

Sales of electricity and gas to LILCO customers in 1979 showed slight growth over the previous year, reflecting the effects of mild weather and lasting energy conservation. Consumer reaction to soaring heating oil prices indicates, however, that more favorable sales results in the heating area can be anticipated in 1980. More than 27,000 customers applied for gas heating service in 1979, with 5,600 space heating customers added by year end. The bulk of these additions occurred in the last quarter of 1979 with only a small effect on 1979 sales. The consumer interest in gas is expected to continue into 1980 stimulated by continued increases in oil prices. Sales of electricity and gas for heating purposes are especially beneficial to both earnings and stability of customer rates because of the small incremental capital investment required when the customer already has gas and electric service for general purposes.

1979 also marked the Centennial year of Edison's invention of the incandescent electric light. This remarkable achievement is an appropriate reminder of the many ways that electricity is capable of contributing to human progress. This thought is particularly noteworthy today as electricity seems destined to play a major role in our national effort to reduce reliance on foreign energy supplies. Electricity's versatility provides a matchless opportunity to substitute the use of many other energy forms for oil. Through conversion to electricity, all of today's domestic fuels — coal, gas, and nuclear — can be made conveniently available for residential, business, and transportation use. In addition, future technologies such as solar energy can either be converted to electricity

Charles R. Pierce
Chairman of the Board and
Chief Executive Officer

Wilfred O. Uhl
President

or used as a supplement for heating purposes.

A number of LILCO programs are aimed at taking advantage of this versatility through the development of electric vehicles, heat pumps, and solar energy projects. Their practical application in the years ahead will mean a significant decrease in petroleum consumption. The role of electricity in Long Island's total energy mix would, in turn, be expected to grow larger. In the meantime electricity's versatility is providing more immediate benefits. LILCO's ability to import energy supplies from nuclear, coal, and hydro sources in the form of electric purchases from neighboring utilities and the ability to burn natural gas at three LILCO power plants saved more than 7.5 million barrels of oil and $42 million for Long Island consumers last year.

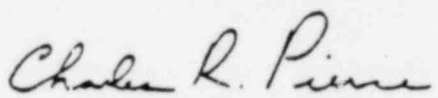
The use of nuclear power remains, however, the best opportunity to lessen Long Island's heavy reliance on oil. Introduction of nuclear energy into the LILCO system will not only provide meaningful relief from continually escalating OPEC prices, but will furnish a valuable measure of fuel supply security not available through dependence on foreign-based petroleum. Unfortunately, the day when that relief will arrive for our customers, with the operation of the Shoreham Nuclear Power Station, has been delayed until 1981. This delay results from the diversion of the Nuclear Regulatory Commission (NRC) staff from its regular licensing duties to the NRC's safety review of the Three Mile Island incident. At this time, we cannot predict when licensing will resume, but hopefully it will be quick enough to insure Shoreham operation some time in 1981. The delay in licensing is affecting the initial operation of at least eight nuclear plants nationwide and is creating hundreds of millions of dollars in additional interest costs and is causing the importation of millions of barrels of additional oil.

In regard to the investigations of the Three Mile Island events, we have looked very closely at the findings of the President's Kemeny Commission. The nuclear industry has responded in a timely and positive manner to the Commission's safety recommendations. LILCO has also pledged to implement the Commission's recommendations as they apply to the Company's operations. As a consequence, we believe that nuclear energy, which has an enviable safety experience record, can be made safer still, and we are in agreement with President Carter's assessment that nuclear power is necessary if our nation's vital energy needs are to be met.

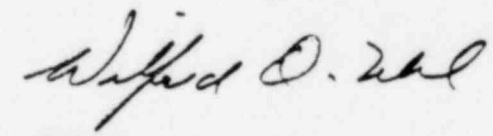
The fact is that the only options available to Long Island electric consumers in their quest for substantial relief from oil dependence are coal or nuclear. LILCO has closely investigated these options over the years as part of the decision making process for the Shoreham and Jamesport plants, and in response to the Federal Department of Energy's orders for the conversion to coal of a number of the Company's existing oil burning generating units. The results of these investigations demonstrate to our satisfaction that nuclear energy is cleaner, safer, and more economical than coal. However, the fact that our consumer constituency is not substantially convinced of these facts is evidenced by the recent actions of the New York State Siting Board for Jamesport in unanimously voting to license a coal-fired, rather than a nuclear plant. While the coal alternative will result in higher electric energy costs than a corresponding nuclear plant, coal is still substantially more attractive than continued reliance on oil, from both an economic and reliability standpoint. The Long Island community and the nation as a whole seem to be several years away from recognizing the nuclear advantage. A continuation of the struggle for a nuclear plant at Jamesport will further delay the day when LILCO's oil dependence can be reduced, and the capacity requirements of our partner utility can be met from this facility. However, the decision of the siting board has not been fully developed as of this writing. When it is issued, a full assessment of its impact will be made by the companies and reported promptly.

It is quite evident that electricity, and to a smaller degree natural gas, will have to fill greater roles in our economy's energy mix if the foreign oil dilemma is to be resolved. In addition to conservation efforts and measures to increase domestic petroleum supplies, a major switch from oil consumption to other energy forms is required for successful resolution. No other energy form has electricity's unique capacity to perform this task. The Shoreham and Jamesport Plants and the various development projects we describe in this Report are the results of LILCO's planning in this regard. Programs such as these, we believe, are in accord with our national economic and social goals and will work to make LILCO and Long Island stronger in the years ahead.

It has always been the case that planning and operating our gas and electric systems for achievement of adequate, reliable, and economical service has had to vary from what we would regard as the optimum because of the impact of government regulation in various forms. Because of the quantum leaps of government intervention and oversight at every level, the deviations from that optimum have not only become greater, but tend to move in many directions at once. Appropriate responses to these added impediments to orderly management and operation of our system have required even greater application of initiative and dedication from our fellow employees in every part of the organization, and we gratefully acknowledge this further manifestation of the value and importance of each.



**Chairman and Chief Executive Officer**



**President**

## Energy Needs

In 1979, the realities of an uncertain world energy supply were once more brought to the doorstep of the American consumer. Gasoline lines, closed service stations, and skyrocketing heating oil prices were clear reminders of our nation's precarious dependence on foreign oil.

The United States' foreign oil dependence has grown so extreme that the slightest tremor in the import supply network can cause massive political and economic dislocations. While there is widespread recognition of the need to reduce this dependence, specific federal programs to effect relief remain absent. Our country continues to be locked into an energy policy that the Arab oil embargo exposed as hazardous more than six years ago. Today the United States is more vulnerable than ever before, importing daily about two-and-one-half times as much foreign oil as in 1970.

This vulnerability is particularly pronounced in the Northeast. Long Island's energy supply, for example, is based almost completely on oil. Some 80% of the homes in the Nassau-Suffolk area are heated by oil. Nearly all of the electricity generated by LILCO power stations is produced by burning oil. Long Island consumers, as a consequence, have been particularly hard hit by soaring oil prices as evidenced in the cost of gasoline, heating oil, and electricity. They are also concerned about the future availability of these energy supplies at any price.

In 1979, Long Islanders looked more closely than ever for new ways to meet their energy needs. LILCO intensified its efforts to meet the changing nature of these consumer needs and to respond to the crisis in the world energy situation.

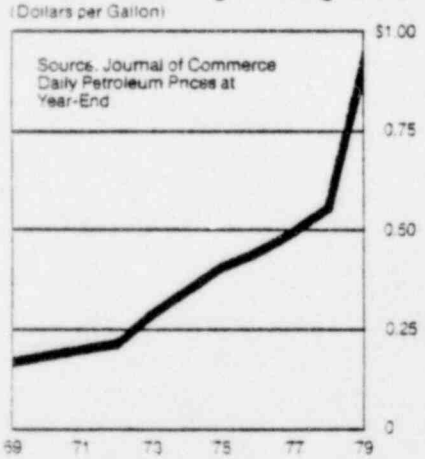
## Reducing Reliance on Oil

The keystone of the effort to improve the energy supply picture is the reduction of the overwhelming role that oil plays in meeting the nation's and Long Island's energy needs. Only in this way can the economic stranglehold of the OPEC nations on our country be eliminated. Three basic efforts are required to meet this goal. They are (1) substitution of other fuel forms for oil, (2) domestic energy supply enhancement, and (3) the conservation and efficient use of energy.

The most effective measure available to lessen Long Island's reliance on oil is a shift from petroleum fuel to nuclear. Under LILCO's plans, which included the Company's 50% share of the two recently denied nuclear units at Jamesport, about 70% of system-generated electricity would have been produced by nuclear power plants in the early 1990's. This would have reduced Long Island's reliance on residual oil by more than 20 million barrels a year —a volume greater than all the home heating oil that is now burned for residential space heating in the entire LILCO service area. The Shoreham Nuclear Power Station alone will displace eight million barrels of residual oil annually.

Another measure, which gained increasing attention during 1979, was the possibility of converting certain

**Average Cost per Gallon of Fuel Oil for Home Heating on Long Island**




**The average price of home heating oil on Long Island increased by 34¢ per gallon, or 60%, in 1979. This one-year increase is almost as great as the 38¢ per gallon rise over the previous nine-year period 1969-1978.**

**Hours of waiting. The return of the gasoline line, odd-even buying days, purchase limits, and skyrocketing prices forced the American consumer face-to-face, and bumper-to-bumper, with the nation's precarious dependence on foreign oil.**

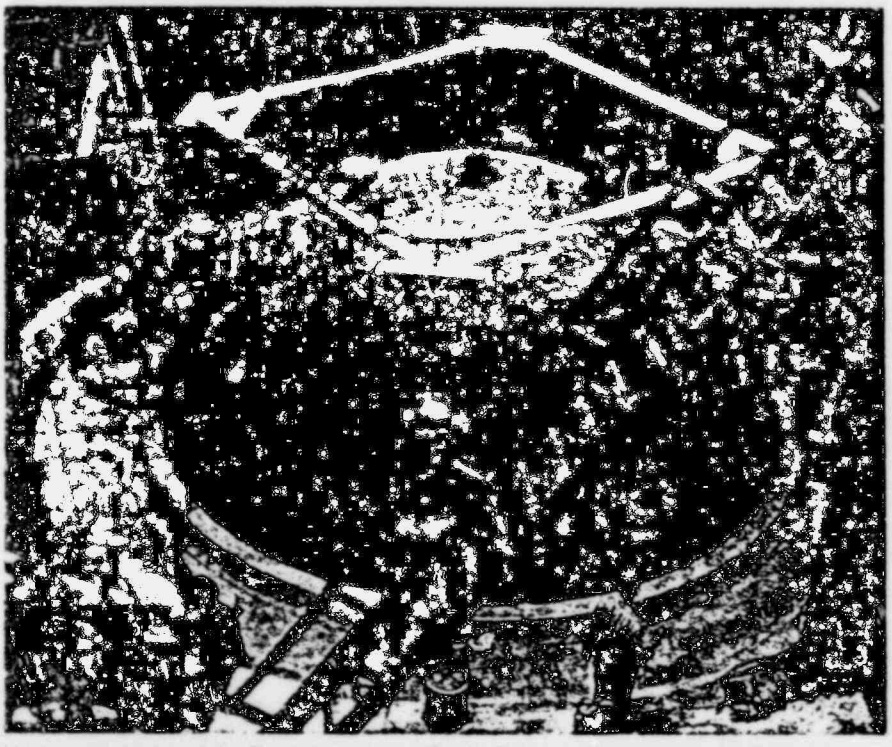
existing electric generating stations to coal from oil, and the construction of new coal-fired units in the event that proposed nuclear units were not authorized.

LILCO has also been taking other steps to lessen oil use. Interconnections with neighboring utility systems allow the Company to substitute lower-cost power generated off Long Island. LILCO's capability to exchange power with other utilities was more than doubled with the completion in late 1978 of the LILCO/Consolidated Edison intertie. With the new link playing a major role, 3.5 billion kWh of power was purchased from other utilities in 1979. A saving of $34 million was realized for LILCO customers as a result of these 1979 purchases. Approximately 45% of this power was produced by coal-fired plants, 20% by hydroelectric installations, 10% by nuclear power stations, and only 25% by oil-fired plants. The power substituted reduced LILCO's need to burn oil by some 5.7 million barrels. In addition, the Company was able to obtain special natural gas supply contracts to replace the use of fuel oil. The use of natural gas saved 1.8 million barrels of very high-priced, low sulfur oil and reduced electricity costs to customers by an additional $8 million.

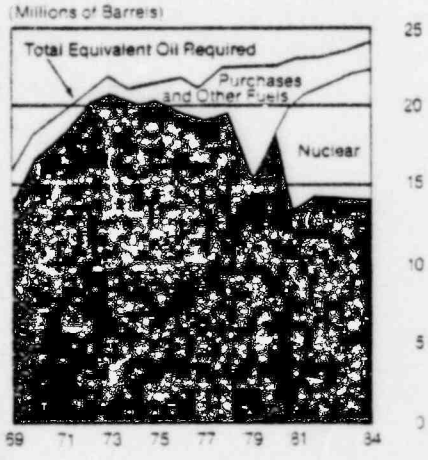
Long Island consumers, meanwhile, were waiting on long lines to pay more than a dollar a gallon for gasoline. Prices were advancing at a rate that made it only a matter of time before the dollar-a-gallon level would be reached for home heating oil as well. Compounding the price situation was the uncertainty of supply. Many consumers were concerned whether adequate heating oil supplies would be available throughout the 1979-1980 winter. Faced with these doubts, more and more people turned to natural gas as a way to protect themselves from the growing oil supply crunch, and the installation of electric heat pumps increased in popularity.

**The red area on the chart below indicates the actual barrels of oil consumed by LILCO in its plants to generate electricity for its system requirements for the years 1969-1979 and the estimates for 1980-1984. The light blue area indicates the additional oil consumption required if the Company were not able to substitute power purchased from other utilities or to use other fuels to generate electricity on its system. The dark blue area represents the barrels of oil to be saved through generation of electricity with nuclear fuel at the Shoreham Nuclear Power Station.**

**The chart shows that in 1979, by burning natural gas primarily obtained under special contracts and by purchasing economy power from other utilities, LILCO reduced fuel oil consumption for its system requirements by 7.5 million barrels, or 33%. The resultant savings of $42 million were passed directly to customers through their bills. It also shows that, through the use of nuclear fuel, and the substitution of purchased power and other fuels, LILCO's consumption of oil in the early 1980's will be reduced about 40% below the level that would be required if all the Company's electric system requirements were produced entirely by burning oil.**



Hydrostatic testing of the Shoreham Nuclear Power Station's reactor vessel and associated piping was successfully completed in September 1979. An example of the care that is a regular part of nuclear plant construction, this important milestone tested the integrity of the reactor at pressures far above those to be experienced during the plant's operation.



## Electric Energy's Versatility

In this time of fuel scarcity, the role of electricity in our economy's energy mix can be expected to grow larger. If society's needs are to be met, it will become increasingly essential to use effectively all available energy forms. This means the efficient use of all of today's available fuels—coal, gas, oil, and nuclear—as well as the employment of supplemental energy forms, such as solar and wind power. All these energy forms can be made conveniently available for use in the home and business by converting them to electricity. A number of LILCO projects continued in 1979 to demonstrate this versatility of electricity.

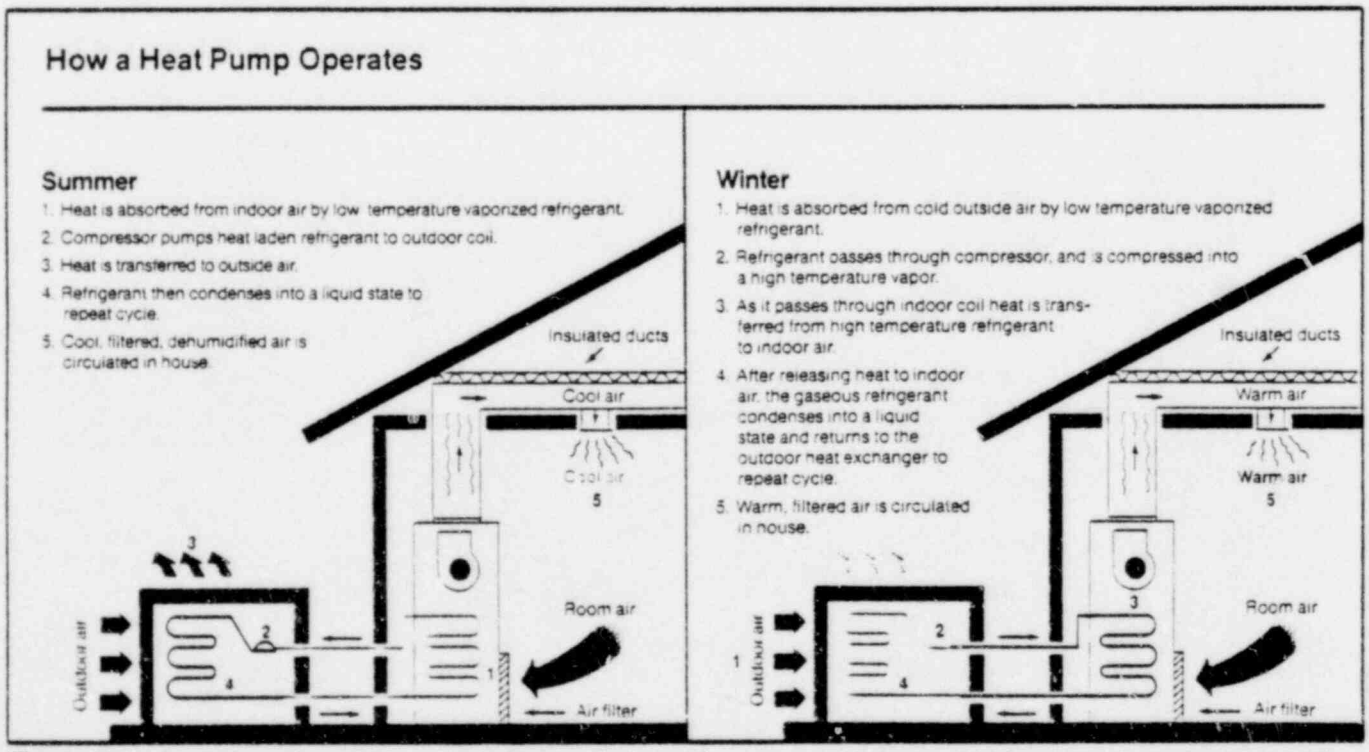
**The Solar-Electric Partnership.** The use of solar power on Long Island shows promise of making a significant contribution to reducing the use of oil for heating. About four out of every five Long Island homes use oil for space and water heating. As oil prices have risen, supplemental solar water heating has become more economically attractive to consumers. Electricity is becoming a natural partner in solar heating installations, conveniently supplying backup power for the periods when neither the sun nor storage capacities provide adequate energy. With growing numbers of such installations on Long Island, it is expected that greater amounts of off-peak electricity will be used as a result of this partnership arrangement.

The LILCO Solar Water Heating Program, begun in late 1978 and one of the largest of its kind in the nation, continues to attract substantial consumer interest. The original goal was 600 installations in a three-year period. By the end of 1979, there were 272 systems sold. The 600 mark is now expected to be reached by the end of 1980. Under the program, the system is sold and installation is arranged by LILCO. Backup energy for the solar system is provided by an electric heating element in the hot water storage tank. This element automatically provides added heat if necessary, using electricity during off-peak nighttime periods at LILCO's most economical energy storage rate. All the systems are monitored by the Company to provide operating and cost data. A unique feature of the program is a customer seminar series which covers the measures that can be taken to optimize use of the system. These seminars are enthusiastically received by solar system purchasers.

**Electric Heat.** Rising oil prices and supply uncertainty have also stimulated renewed consumer interest in electric heat. The cost of heating a home using conventional baseboard electric systems is now slightly below that of using oil heat. This competitive cost, combined with electric heat's natural advantages of cleanliness, convenience, reliability, and individual room thermostatic control to encourage conservation, should attract greater numbers of customers to electric heating. There were 913 conventional electric heating installations made on the LILCO system in 1979.

Heat pumps are the most economical heating and cooling systems available to LILCO customers, and they are important energy savers. The high energy efficiency of the electric heat pump is making this remarkable device increasingly popular with consumers concerned with stretching their heating dollars. Heat pumps cool as well as heat simply by reversing their operating cycle. They deliver approximately twice as much useful heat energy as they consume. This is possible because heat pumps use energy to extract heat already produced by the sun. The heat is available in the environment in the outdoor air or underground water. Heat pumps are increasingly being used in apartments, condominiums, single-family homes and office buildings. It is estimated that there are now some 3,000 heat pump installations in the LILCO service area, of which 681 were installed in 1979.

**Thermal Storage.** Electricity's




**The electric heat pump is a unique energy saving device capable of providing year-round indoor comfort. In summer, the heat pump cools like a conventional central air conditioner. In winter, the cycle is automatically reversed to provide space heating.**

versatility allows the development of many innovative ways to increase the efficiency and economy of its use. In 1979, LILCO introduced two experimental energy storage systems for cooling or heating that enable residential users to transfer electric consumption from peak to off-peak periods of demand. Operation of the two independent storage systems will be studied in a total of 100 Long Island homes in 1980 and 1981. The units use electricity mainly during off-peak periods at night to heat or freeze water, which is then stored in special tanks to be available for heating or cooling during the day. These experimental programs, which are a cooperative effort of LILCO, the United States Department of Energy (DOE), and the Empire State Electric Energy Research Corporation (ESEERCO), will provide valuable operating information on the efficiency of the systems and consumers' acceptance of them.

**Electric Vehicles.** The gasoline shortage of 1979 made millions of Americans aware of the inconvenience that can result from dependence upon a single form of fuel to meet transportation needs. For some wage earners and businesses, the difficulty in obtaining gasoline even threatened financial disaster. Electric vehicles, on the other hand, have the advantage of being powered by an energy form that is not solely dependent on petroleum. Electricity may also be derived from coal, nuclear, hydropower, refuse, and, in the future, from the sun or the wind. Electric vehicles have the further advantage that the longest line their users need extends only to the nearest electric outlet.

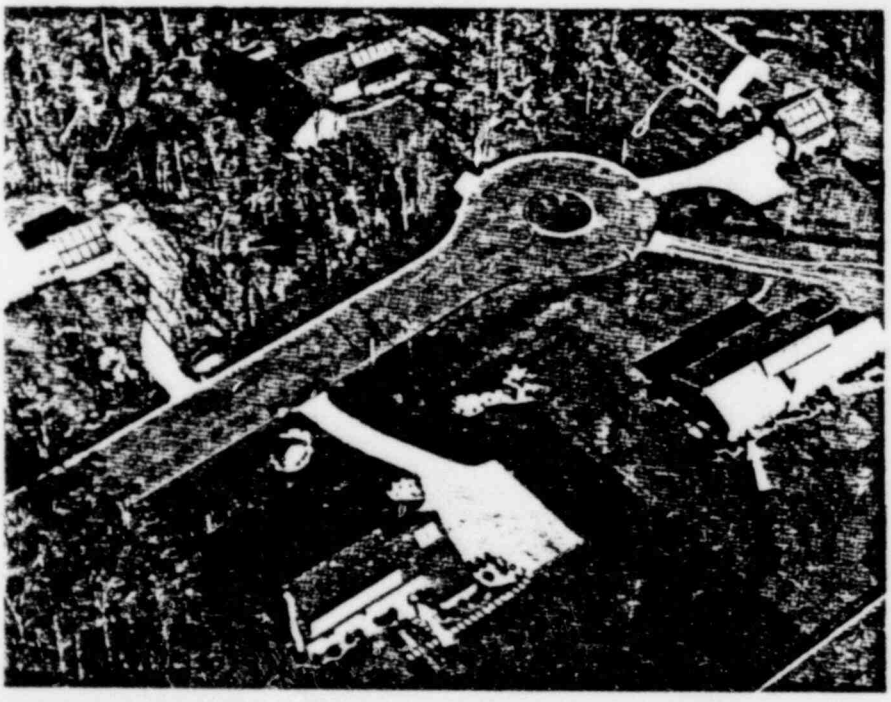
LILCO has become one of the largest owner-administrators of an electric vehicle fleet in the United States. Selected in late 1978 as one of five initial contractors in the DOE's national demonstration program, the Company is enlarging its own electric fleet. It will also administer DOE programs in which electric vehicles will be made available to local governments, businesses, and to a pilot commuter demonstration program. While significant developmental work is in progress to expand the electric vehicle's potential, experience to date has shown that it can now be considered for many special transportation needs. Moreover, the announcement by General Motors that it will begin producing electric vehicles in the mid-1980's heralds the advent of the electric car as a general purpose vehicle.

## The Consumer Turns to Gas

While the national oil supply picture again reached a crisis during 1979, the interstate natural gas supply situation brightened considerably. An important factor in this improvement has been the equalization of intrastate and interstate gas prices. In addition, congressional allowance of higher wellhead prices has stimulated gas exploration. Increased gas industry and federal interest in funding such projects as coal gasification, deep drilling, and the extraction of gas from shale should improve future gas supplies, although at higher costs than at present.

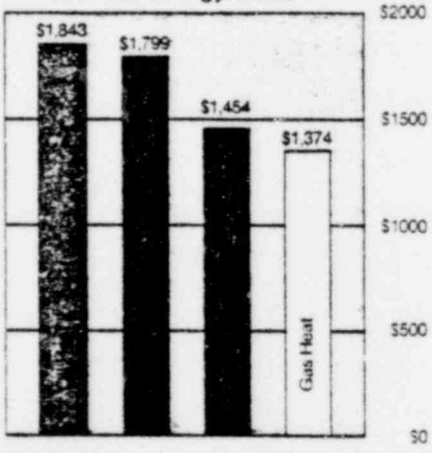
LILCO has contracts to store approximately 14 billion cubic feet of gas for use during the winter, or about 45% of the gas requirements for a winter with normal weather. In addition, LILCO has a liquefied natural gas plant that can store the equivalent of 600 million cubic feet of gas in liquid form, plus other facilities for making propane-air gas that can be used to meet the coldest-day needs of its gas customers. These storage and propane-air facilities enable LILCO to supply all its firm gas customers under the most severe daily winter conditions.

**Satisfying Customer Demands.** Total mcf sales of gas to LILCO customers in 1979 rose 3.8% above those in 1978. Firm gas sales in



A neighborhood of the future is being lived in today by five families in Wading River. Technology and nature team up to keep them comfortable. Each house is equipped with a different rooftop solar panel system, backed up by an electric heat pump. The compact, efficient heat pump (arrows) can extract warmth from outside air, or reverse its cycle to cool inside temperatures. LILCO was instrumental in the choice of Long Island as the site for this Electric Power Research Institute (EPRI) advanced research project, conducted by Arthur D. Little, Inc. As host utility, LILCO will assist in collecting extensive data during the next three to five years. EPRI will then publish reports evaluating the reliability and cost effectiveness of solar homes.

Annual Total Energy Costs




The costs shown above are LILCO estimates of the annual total cost of energy for domestic electricity, space, and water heating for a family of four in a 1,400 square foot ranch home on Long Island, based on LILCO electric and gas prices in effect in January 1980 and fuel oil at 90¢ per gallon. No energy costs for air conditioning or for the costs of service contracts are included. The comparisons show that the annual energy cost for an all-electric home using electric baseboard resistance units for space heating is below that of the home using oil for space and water heating. The cost for an all-electric home using an electric heat pump for space heating is approximately 20% below that for the oil fueled home and is comparable to the cost for the home using LILCO gas for space and water heating.

1979 totaled 39.4 billion cubic feet, down only 2.6% below 1978, despite much more moderate winter weather in 1979. Sales to interruptible customers of 4.2 billion cubic feet rose 170.5%. Due to the improving gas supply, LILCO was granted permission in 1978 by the PSC to add new gas customers and allow existing customers to expand their firm requirements by an additional 1.6 billion cubic feet of gas per year. In April 1979, again at the request of the Company, the PSC authorized an increase to allow a total annual firm sendout of 44 billion cubic feet. In October 1979, this sendout level was further increased to 46 billion cubic feet. A total of 27,000 customers applied in 1979 for new or additional gas use. These applications were primarily for conversion from oil to gas for residential space and hot water heating. During 1979, the number of LILCO gas space heating customers was increased 5,600. This was the largest increase since 1969. Gas heating equipment suppliers and licensed contractor personnel were not fully able to meet the initial upsurge in customer demand without installation delays. By the end of 1979, however, the completion rate of gas heating installations had increased significantly. It appears that this stepped-up pace can be maintained throughout 1980.

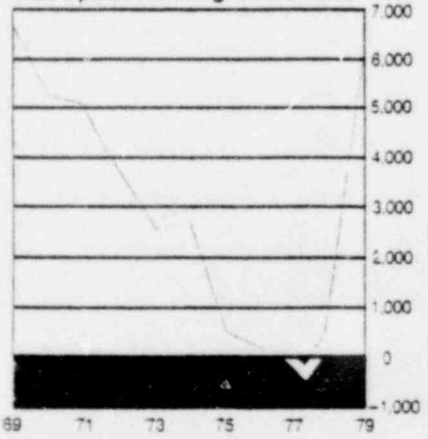
**Gas Marketing Benefits.** Since about two-thirds of the new gas space heating customers already have gas service to their homes, their increased gas use requires only a minimum capital expenditure by the Company. Consequently, this additional gas business provides significant profit potential to the Company's investors. Consumers benefit, as well, since these additional gas sales have the effect of spreading the fixed costs of the gas supply system. The long-range result is lower consumer rates than would otherwise be possible.

## Assuring LI's Energy Supply

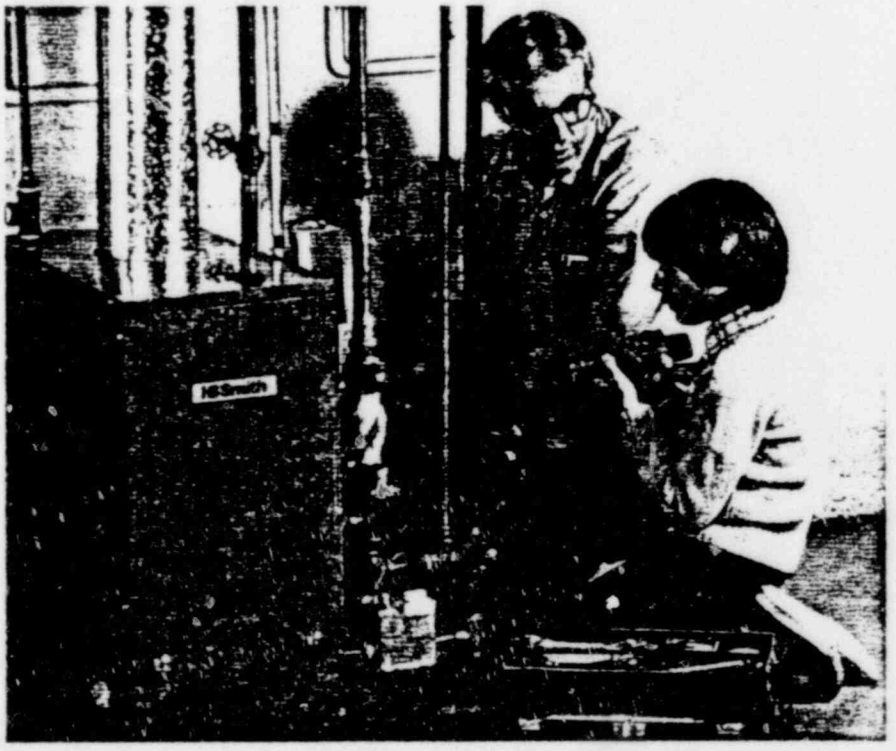
**Electric Sales Flat.** Customer efforts to conserve electricity, the continuing development of more efficient appliances, and slower growth in the population of the LILCO service area have combined to moderate the growth of electricity usage. Total kilowatt-hour sales of electricity to customers on the LILCO system in 1979 remained at essentially the same level as in 1978. Sales to residential customers were 0.7% greater in 1979 than those in 1978. The amount of electricity sold to commercial-industrial customers rose 0.5%. Sales to all other customers, which represented 4.6% of total system sales of electricity, were down 6.8%. Company forecasters expect LILCO's system kWh sales of electricity to increase an average of 1.6% annually over the next five years, with slower growth in the early years and higher growth in the later years. Reflecting the predicted recessionary economy, total system kWh sales in 1980 are expected to remain level with those in 1979 and 1978.

Peak demand in 1979 was 2,919,000 kW, reached on August 1. This was below the 1978 peak of 2,997,000 kW. The all-time Company peak of 3,107,000 kW was set July 21, 1977, following a period of very hot weather which was not repeated in either 1978 or 1979.

**Annual Change in Number of LILCO Gas Space Heating Customers**




**In 1969, the number of gas space heating customers served by LILCO increased by 7,000. Fewer customers were added annually in each of the next eight years. In 1977, the number served declined by 400. These changes resulted from restrictions against adding new customers combined with normal attrition. Increased availability of natural gas supplies enabled LILCO to obtain regulatory approval to resume adding gas load in 1978. As a result, the number of gas space heating customers increased by 5,600 in 1979.**



**(With a little help from our friends) LILCO is responding to the increased demand for gas space and water heating. Here, a LILCO serviceman inspects one of the new gas furnaces installed by customers during 1979. Improvement in gas supply has enabled LILCO to add new and conversion gas heating customers seeking an alternative to oil.**

**Service Area Economy Holding Up.** The economy of LILCO's service area held up well in 1979, despite the pressures of rising interest rates and continuing inflation. In 1979, a total of 94 new industrial plants and warehouses were opened in the LILCO service area and operations of 257 more were expanded, providing employment for 7,900 people. Overall employment among Nassau-Suffolk residents was 1,235,000 in December 1979, up 23,900 from a year earlier, and the unemployment rate was 6.0%, according to the New York State Department of Labor. This rate compares with the 7.0% unemployment rate for New York State and the 5.6% rate for the nation.

The total population of LILCO's service area is approximately 2.9 million persons. Among the nation's more than 270 Standard Metropolitan Statistical Areas, including all the largest population centers, the Nassau-Suffolk area ranks among the top 10 in population and in the top five in consumer spendable income per household. Retail sales in the area increased 17.7% compared to the same 10-month period of the previous year. While the dollar volume of new residential construction building permits issued in the first 10 months of 1979 declined $10.3 million to $124.4 million, the dollar volume of new non-residential construction was up $4.9 million to $147.2 million in the Nassau-Suffolk area. Among major projects are a 222-room Sheraton Inn, now under construction, and a planned 210-room Hilton Inn. Development of a $65 million, 800,000-square-foot, three-tower office complex near the Nassau Veterans Memorial Coliseum was announced in January 1980. In addition, an 1,100-acre complex is planned for Yaphank that would include a shopping center, an office building, a research and development park, condominiums, and a retirement community. The first technology park in New York State to be known as Stony Brook-haven Tech Park, is planned for development on a 100-acre site in South Setauket. Corporate science research and engineering companies will occupy the proposed 800,000 square feet, providing more than 1,000 jobs. There will be a tie-in with the adjacent State University at Stony Brook and with the Brookhaven National Laboratory.

1979 marked the first year of operation of the Action Committee for Long Island. Composed of outstanding leaders from the Island's business, educational, and professional community, the committee addresses itself to the long-range economic, cultural, and educational development of the area. Members of the Board of Directors, Corporate Officers, and other LILCO personnel have contributed their expertise to the Action Committee and to the wide network of other regional development groups, such as the Long Island Area Development Agency and the Long Island Association of Commerce and Industry. These groups work in concert to analyze problems, establish priorities for the present and the future, and implement programs to meet the challenges facing Long Island.

**The Nuclear Advantage.** LILCO expects to supply about 30% of its service area's electricity needs with nuclear generation by the early 1980's. The 820,000 kW Shoreham Nuclear Power Station will reduce the Company's use of foreign oil by about eight million barrels yearly when it is in full operation. By displacing the use of expensive imported oil, Shoreham is expected to save LILCO customers a total of $2.8 billion over a 30-year life as compared with alternative coal-fired generation. Equally important, the use of nuclear power will provide an assurance of energy supply not possible with the use of imported OPEC oil.

The future safety of nuclear power has come under intense public scrutiny as a result of the accident at the Three Mile Island Nuclear Generating Station near Harrisburg, Pennsylvania in March 1979. In late October, the Kemeny Commission, established by

Going ahead at the crossroads is construction of the new three-building office complex of The Jericho Quadrangle at the intersection of two major Long Island highways. The first building, shown here, will add 280,000 square feet of new office space to the area's economy, and is essentially complete. The second building is currently under construction. All three of these buildings will use electric heat pumps for heating and cooling, with LILCO gas for supplemental backup. Across the street, a three-story, 320,000-square-foot office building, to be called Number Two Jericho Plaza, is under construction for occupancy by the spring of 1980. This will be a companion to Number One Jericho Plaza, a 278,000-square-foot building occupied in mid-1978. Both of these buildings are electrically heated.

President Carter to investigate the accident, issued its report. A main finding of its review was that "the fundamental problems are people-related problems and not equipment problems." The report also recommended "fundamental changes" in the government's regulation of the nuclear industry, and in the nuclear industry itself. On December 7, 1979, the President's response to the report indicated that steps will be taken to implement many of the recommendations. The President reiterated that nuclear power must be included among the nation's energy options.

In January 1980, an independent group commissioned by the Nuclear Regulatory Commission (NRC) to investigate the Three Mile accident also issued a report. This Rogovin report is also critical of certain industry practices and the NRC.

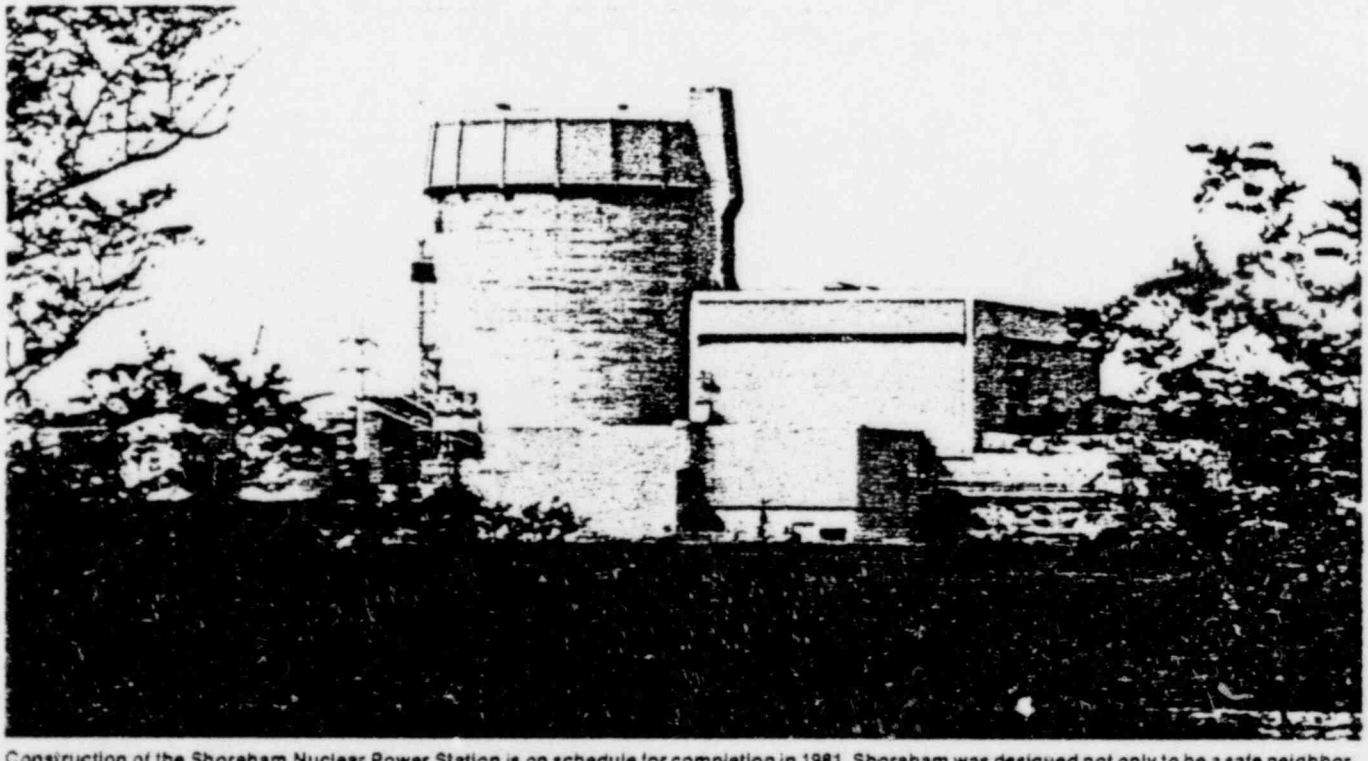
LILCO, and the utility industry in general, believe that the bulk of the Commissions' recommendations are constructive, and that they will help make a safe technology even safer. Since the Three Mile Island accident, the industry has responded vigorously and has formed several organizations for the more efficient exchange of intercompany safety information, upgraded plant operator training, and improved safety engineering. LILCO is acting on the Commissions' and industry's recommendations as they pertain to the Company's operations. It is also conducting an exhaustive review of its own to identify additional potential areas for safety improvement.

Construction of the Shoreham Nuclear Power Station is expected to be completed in 1981. However, operation of the plant is subject to the issuance of an operating license by the NRC. As a consequence of Three Mile Island, the NRC staff has been diverted from its normal nuclear plant licensing activities. Thus, the timing of receipt of the Shoreham operating license remains uncertain. A review to evaluate the possibilities of further delays and additional project costs is currently underway.

In 1978, Booz, Allen & Hamilton, Inc., completed a management study ordered by the PSC, which found LILCO's expenditures for Shoreham to be generally reasonable despite the escalation in costs of the project. Notwithstanding these findings, the PSC announced in 1979 the scheduling of a two-phase review of Shoreham's construction costs. In phase one, the Commission in late 1979 selected Kaiser Engineers Power Corporation to perform an audit to evaluate LILCO's construction schedule and projected expenditures for the completion of the plant. In phase two, the Commission will investigate the reasonableness and prudence of the cost of the Shoreham plant and determine if any of the cost should be excluded from the Company's rate base.

**Other Nuclear Projects.** LILCO had planned to build two 1,150,000 kW nuclear units at Jamesport to be shared equally with New York State Electric and Gas Corporation (NYSEG). On January 29, 1980, a New York State Board on Electric Generation Siting and the Environment voted to approve the construction and siting of an 800 megawatt coal-fired generating station on Long Island to meet the requirements of NYSEG and the Company. Although the Siting Board has not designated a final site, it has indicated that a Jamesport, New York site is favored. An order incorporating its decision is expected to be issued shortly. An Atomic Safety and Licensing Board of the NRC had rendered a decision in late 1978 authorizing the issuance of a permit for construction of the two Jamesport nuclear units. An appeal of this decision by opponents of the plant is still pending before an Atomic Safety and Licensing Appeal Board.

On October 12, 1979, a State Siting Board dismissed the joint application by NYSEG and LILCO to build two



**Construction of the Shoreham Nuclear Power Station is on schedule for completion in 1981. Shoreham was designed not only to be a safe neighbor but also to blend as much as possible with the local environment.**

nuclear generating units at the upstate New York community of New Haven. NYSEG and LILCO have requested a rehearing on this application.

LILCO has an 18% interest in Nine Mile Point Unit 2, a nuclear generating plant being constructed near Oswego, New York, by Niagara Mohawk Power Corporation. This unit, now estimated to be about one-third complete, is scheduled to add 194,000 kW of generating capacity to LILCO's system.

On January 30, 1980, Niagara Mohawk announced a revised construction schedule which projects a delay in the commercial operation date from late 1984 to late 1986. Niagara Mohawk is also reevaluating the plant's construction costs.

**Cost of Nuclear Energy.** In August 1979, the New York State Energy Office's (SEO) Draft Energy Master Plan was released. The report recognized a statewide need for new power plants not dependent upon oil. It recommended, however, that except for those now under construction (including Shoreham and Nine Mile Point Unit 2) any future units should be coal rather than nuclear fueled. The state plan also included recommendations that LILCO's existing oil-fired units at Northport, Island Park, and Fort Jefferson be converted to coal.

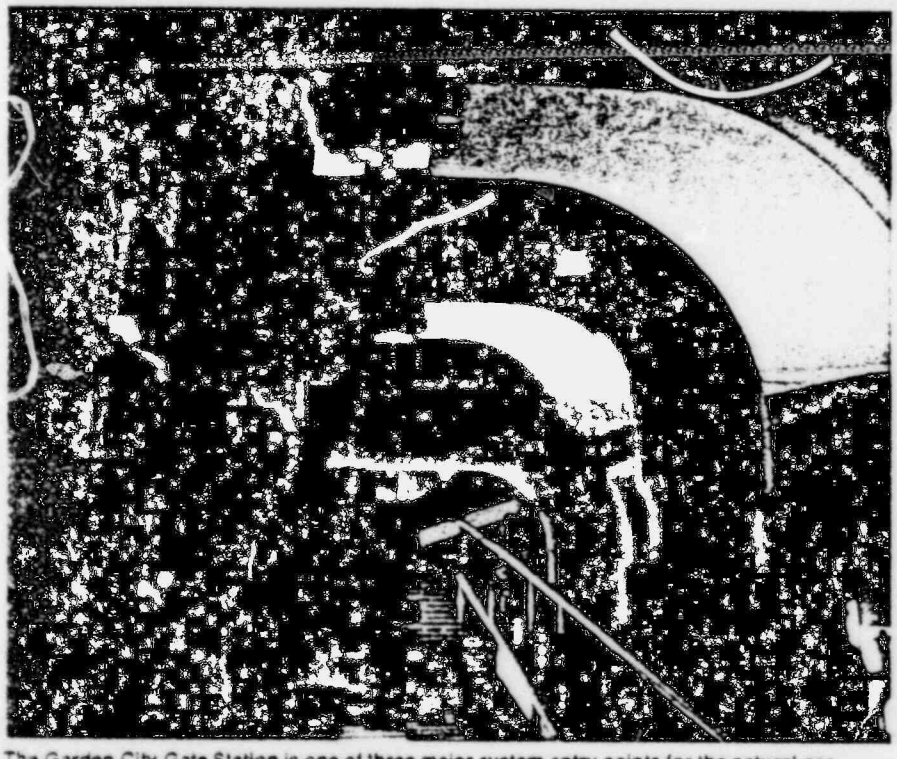
At public hearings, LILCO experts testified on the projected effect of the SEO plan. If the SEO recommendations to substitute a coal unit for the planned Jamesport nuclear units and to convert existing LILCO oil-fired plants to coal were followed, it would cost Long Islanders an additional $10 billion in higher electric costs over a 30-year period. LILCO also stressed that the aesthetic and environmental impacts of coal plants must be given serious consideration.

The coal versus nuclear fuel question was also raised by the Suffolk County Legislature. The county lawmakers asked LILCO to examine the feasibility of converting the Shoreham Nuclear Power Station to coal. The results of the study showed that such a "conversion" in the usual sense of the term was impractical. Changing Shoreham from nuclear to coal would require scrapping the nearly completed nuclear plant and building a new coal unit of comparable size. Over the life of the plant, this would cost Long Islanders $9.6 billion more than finishing Shoreham as planned. This estimate includes the cost of replacement electricity generated by oil plants during the seven-year delay until the coal plant would be ready for operation. The delay would also significantly increase exposure to the risk of oil supply disruption and higher cost.

On January 2, 1980, the DOE issued a proposed order which, if ultimately adopted, would prohibit the burning of oil at the four electric generating units at Northport. The Company is in the process of preparing an analysis to be submitted to DOE detailing the effects of converting these units to coal.

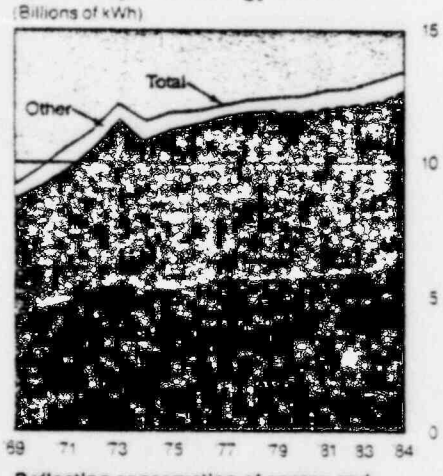
**Fuel Supply.** The Company's consumption of oil to generate electricity averages about 50 thousand barrels per day. All types of fuel oil used by LILCO have increased substantially in price during the past year, with 0.37% low sulfur residual oil — the highest in cost — doubling from $15 a barrel in December 1978 to $30 in December 1979. Continual efforts are being made to decrease our use of the higher-priced fuel oils. One approach is to displace higher-priced oil with natural gas. An extension of federal regulations will be required to allow the Company to buy gas specifically for this purpose from sources outside New York State after May 31, 1980. A second approach is to obtain permission to burn higher sulfur oil in Nassau County. Such permission has been obtained from New York State, but federal approval is also required. The Company is hopeful that it will receive this federal permission shortly.

**Uranium.** LILCO has sufficient uranium concentrates in inventory to



The Garden City Gate Station is one of three major system entry points for the natural gas LILCO purchases from its pipeline suppliers. Pipeline supplies plus LILCO storage facilities assure the Company's firm gas customers of adequate gas under the most severe winter weather conditions.

**Electric System Energy Sales**




**Reflecting conservation of energy and cooler than normal summer weather, total kWh sales of electricity in 1979 remained essentially the same as in 1978. Sales to residential customers, 45% of total sales, were up 0.7%. Sales to commercial-industrial customers, 50% of the total, rose 0.5%. Sales to all other customers, accounting for the remaining 5% of total sales, declined 6.8%. In 1980, total sales are expected to remain at present levels, in accord with recessionary economic forecasts. Total system sales are estimated to increase 8.3% from 1979 to 1984.**

fuel the Shoreham Nuclear Power Station through its first three years of operation. In addition, the Bokum Resources Corporation has contracted to supply LILCO with 10 million pounds of uranium concentrates. This is sufficient to fuel Shoreham throughout its operating life. Deliveries were scheduled to begin in 1979, but Bokum has been unable to meet this and other contract commitments. (See Note 7 to Notes to Financial Statements).

The trial has been concluded and a decision is pending in the litigation against the Westinghouse Corporation over contractual agreements to deliver a minimum of 8.3 million pounds of uranium concentrates to LILCO. Meanwhile, efforts continue to reach a settlement.

## Looking Further Ahead

**Industry-Wide Research.** LILCO's objective is to find ways to provide the most reliable, economical, and environmentally acceptable energy possible with today's technology. At the same time, it is exploring, individually and with other companies, the technology of the future. A total of $6.8 million was committed by LILCO last year to local and industry-wide research.

At the national level, the Electric Power Research Institute (EPRI), which came into being in 1972 under the voluntary sponsorship of the nation's electric utility industry, is increasingly directing its research strategy toward identifying and developing improvements in present technology to alleviate current problems. Between 50% and 60% of its 1979 expenditures of $200 million were devoted to this emphasis. Other long-term EPRI activities include investigation of emerging energy sources, including fusion, fluidized bed combustion, geothermal and solar power generation, the experimental fast breeder reactor, and electric vehicle development. LILCO provided $2.2 million to EPRI and related activites in 1979.

At the New York State level, the Empire State Electric Energy Research Corporation (ESEERCO) enables LILCO and other New York utilities to pool their resources and support projects of common interest which are of particular value to the state. The New York State Energy Research and Development Authority (NYSERDA) also supports a broad range of technical research and development projects to develop future energy supplies and to promote efficient energy use for New York State. The Company provided a total of $1.9 million toward ESEERCO and NYSERDA activities in 1979.

LILCO also supports the programs of the Gas Research Institute (GRI). Organized in 1976, GRI's efforts are aimed at increasing the supply, improving the transportation, and enhancing the efficient use of gaseous fuels. LILCO's support of these programs amounted to $0.2 million in 1979.

In 1979, $2.5 million was spent for LILCO's internal research and development programs. A cost-benefit analysis of these programs from 1973 through 1979 showed resultant savings of almost $320 million in 1979 dollars, about a ninefold return of initial research costs. The savings to date have come almost entirely from LILCO's Environmental Quality Control System (EQUAC). This pioneering air monitoring system allows the Company to burn lower-cost, high sulfur oil while at the same time maintaining acceptable levels of air quality. Significant ongoing savings are expected from EQUAC and a number of other projects.


**Reaching across 100 years, a little boy presses a button and sees the new light Thomas Alva Edison gave to the world in 1879, when he invented the first practical incandescent lamp. Long Islanders can still see LILCO's Centennial of Light exhibits at local schools, libraries, and other public facilities. Displayed are electric lights, appliances, and toys that have made people's lives easier, better, and more fun during the last century.**

## Service is LILCO's Business

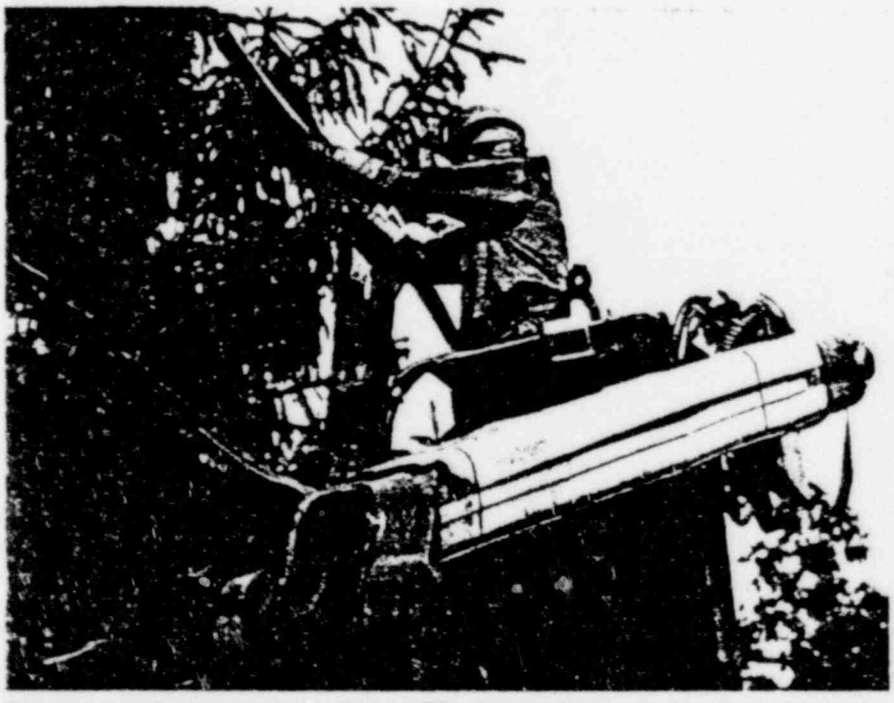
**Balanced Billing.** Balanced Billing — a new, convenient residential consumer bill payment plan — was introduced by the Company in the summer of 1979. The plan makes gas and electric bills more manageable by dividing a customer's annual energy costs into 12 equal monthly payments. This system smooths out the payments for fluctuating, seasonal peak consumption of energy. Since its inception, LILCO has placed about 94,000 customers (approximately 12% of all residential consumers) on this optional program. Balanced Billing is one way the Company is showing its concern for the consumer's ability to meet the rising cost of energy. The program is of particular advantage to senior citizens and to those who must budget themselves within a fixed income. An additional feature of Balanced Billing is that it eliminates the use of estimated bills for space heating customers.

**Energy Audit Program.** Legislation enacted in New York State requires utilities to establish a program to provide customers with energy audits of their homes. LILCO's promotion of its programs resulted in over 20,000 completed energy audits in 1979. The Energy Audit Program is available to homeowners and tenants of one- through four-family houses. The audits are designed to encourage energy conservation among consumers by showing them specific energy saving measures that can be applied in their homes. For only $10, as required by law (substantially below the actual cost), LILCO provides an energy audit conducted in the consumer's home. A mail energy audit ($2.00 charge) provides an energy saving evaluation based on information residents send in to LILCO. The Company also supplies free information to interested customers who wish to perform the energy saving evaluation themselves.

**Service Reliability and Productivity Programs.** In addition to the installation of many miles of "tree wire," pictured below, LILCO is working to improve its service reliability through use of a device called Thermovision, an infrared scanner which detects overheating in electric current-carrying equipment. Thermovision is used to detect abnormal operating conditions which would not be picked up by visual inspection. Repairs can then be made before service failure occurs. These surveys have made a significant contribution to holding down the cost of unscheduled repairs and in preventing service disruptions.

Throughout 1979, LILCO continued to expand its productivity improvement and performance management system programs. Currently, 64% of all physical and clerical employees and 40% of management employees are on some form of performance management system. The timely feedback of work performance data enables managers and supervisors to employ personnel, material, equipment, and facilities more effectively. The eventual goal is to .... have essentially all LILCO employees on similar systems.

A new centralized skills training center was established during 1979 in Hauppauge. Using the most modern techniques and facilities, the center will provide intensive "hands on" training under supervised conditions. Maintenance personnel for the Shoreham Nuclear Power Station and a wide range of other Company employees will be trained at the new center.



**Sheathed in a tough, protective coating, LILCO's "tree wire" stays up when the branches fall. The new wire, four times as strong as conventional wire, can withstand far greater impact from falling trees and limbs and also has electrical insulation qualities which can prevent service failures. In 1979, about 100 circuit miles of the new wire were installed to improve the reliability of electrical service to LILCO customers. A total of 5,250 circuit miles of "tree wire" has been installed since the late 1950's. This program is currently concentrating on the replacement of rear-property, bare-wire installations. "Tree wire" is the most effective and economical alternative to placing these lines underground. It is designed to reduce substantially a primary cause of extended outages after major storms.**

## Financial Analysis

### Earnings

Earnings of $2.41 per share in 1979 were 3¢, or 1.2%, below those in 1978. There were 16.9% more average common shares outstanding in 1979 than in 1978. Earnings per share have been increased in 17 of the past 21 years.

### Dividends

In June 1979, the quarterly dividend rate on the common stock was increased to 44½¢ from 42½¢ per share. This raised the equivalent annual rate by 8¢ to $1.78 per share. The dividend rate has been increased in 20 of the last 21 years.

Quarterly dividends were paid in 1979 and 1978 as follows:

**Dividends**

| Payment Dates | Paid per Share 1979 | 1978 |
|---|---|---|
| Feb. 1 | 42½¢ | 40¾¢ |
| May 1 | 42½¢ | 42½¢ |
| Aug. 1 | 44½¢ | 42½¢ |
| Nov. 1 | 44½¢ | 42½¢ |
| Total Paid | $1.74 | $1.68¼ |

The Company estimates that for federal income tax purposes certain percentages of the dividends paid in 1979 represented a return of capital and, therefore, may not be taxable as ordinary income. These percentages are 100% of the common stock and 63% of the dividends paid on all series of preferred stock. Such estimates are subject to audit by the Internal Revenue Service.

### Rate Increases

Higher annual electric and gas rates of $26.0 million and $16.6 million, respectively, were authorized by the Public Service Commission (PSC) and became effective May 4, 1979. Because the PSC denied the additional cash flow relief in electric rates the Company had sought in this case, a petition was filed on May 28, 1979, for a rehearing. This petition was denied on July 24, 1979. Second-stage electric and gas increases, primarily designed to reflect future higher property taxes, of $5.4 million and $1.5 million annually, respectively, were filed January 25, 1980.

An application was filed with the PSC by LILCO on September 21, 1979, to increase electric rates $25.6 million, or 2.5%, annually for the 12 months ended April 30, 1981. This request was designed to offset further inflation, additions to plant in service, and to reflect more modest kWh sales growth than previously estimated. Public hearings on this application were completed in January 1980.

### Revenues

Revenues totaled $1,045.5 million in 1979. Electric revenues were $860.8 million and gas revenues were $184.7 million. The increases from prior years were:

**Revenues** (Dollars in millions)

| Increase or (Decrease) from Prior Year | 1979 $ | 1979 % | 1978 $ | 1978 % |
|---|---|---|---|---|
| Electric | $122.4 | 16.6% | $55.3 | 8.1% |
| Gas | 24.1 | 15.0 | 19.6 | 13.9 |
| Total | $146.5 | 16.3% | $74.9 | 9.1% |

The principal changes in electric and gas revenues were due to:

(1) **Changes in Rates:** Electric revenues in 1979 reflect $16.3 million of the rate increase effective May 4, 1979, and the balance of the rate increases effective in 1978, discussed below.

Electric revenues in 1978 reflect $52.9 million of the $59.7 million electric rate increase effective January 17, 1978, of which $15.0 million became effective on a temporary basis August 1, 1977, and $1.6 million of the $4.9 million electric rate increase effective August 24, 1978 to offset increased wages.

Gas revenues in 1979 contained $6.9 million of the rate increase effective May 4, 1979. Gas revenues in 1978 contained the full effect of the $9.4 million rate increase effective August 16, 1977.

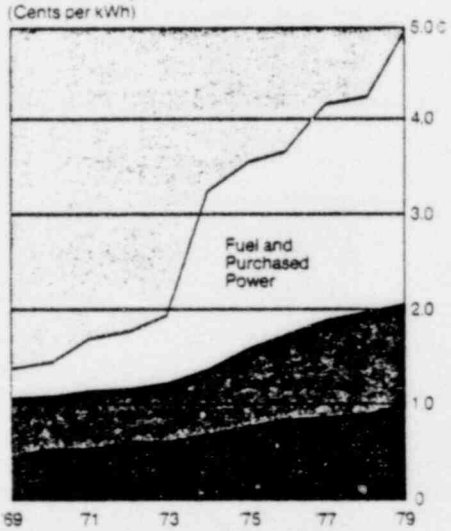
(2) **Changes in Energy Sales to Customers:** Approximately 45% of the Company's annual system kWh sales of electricity are to residential customers. This is one of the highest proportions of such sales in the electric utility industry, and results in relatively stable operations of the Company.

**Electric Sales** (kWh in millions)

| Increase or (Decrease) from Prior Year | 1979 kWh | 1979 % | 1978 kWh | 1978 % |
|---|---|---|---|---|
| System Sales | | | | |
| Residential | 40 | 0.7% | (61) | (1.1)% |
| Commercial and Industrial | 32 | 0.5 | 139 | 2.3 |
| Other | (42) | (6.8) | (15) | (2.3) |
| Total System Sales | 30 | 0.2 | 63 | 0.5 |
| Power Pool Sales | 62 | 7.9 | 444 | 128.2 |
| Total Sales | 92 | 0.7% | 507 | 4.0% |

**Electric Expenses**

(Cents per kWh)




**LILCO's average revenue per kWh sold has tripled from 2.1¢ per kWh in 1969 to 6.5¢ in 1979. This rise is due mainly to increases in fuel prices. The cost of fuel and purchased power per average kWh sold was 2.9¢ in 1979, about eight times the level 10 years ago. This increase in the cost of fuel was responsible for 60% of the total increase in average revenue per kWh. Operation and maintenance expenses, the expenses most subject to management control, have risen at a rate slightly above the 95% rise in the local consumer price index. Total taxes have slightly less than doubled. Both represent lower proportions of average revenue today than they did 10 years ago.**

Approximately three-quarters of the Company's annual gas revenues are derived from mcf sales of gas to space heating customers. Accordingly, total gas system revenues and sales are heavily influenced by seasonal temperature variations between periods, and the availability of gas for sale to interruptible customers.

**Gas Sales** (mcf in millions)

| Increase or (Decrease) from Prior Year | 1979 mcf | 1979 % | 1978 mcf | 1978 % |
|---|---|---|---|---|
| Firm System Sales | | | | |
| Space heating | (1.32) | (4.0)% | 0.30 | 0.9% |
| Non-space heating | 0.25 | 3.3 | 0.04 | 0.5 |
| Total Firm | (1.06) | (2.6) | 0.34 | 0.9 |
| Interruptible | 2.65 | 170.5 | (1.02) | (39.7) |
| Total System Sales | 1.59 | 3.8 | (0.68) | (1.6) |
| Sales to Other Utilities | — | — | — | — |
| Total Sales | 1.59 | 3.8% | (0.68) | (1.6)% |
| Degree Days Billed | (740) | (13.8)% | 75 | 1.4% |

(3) **Changes in Fuel Costs:** Both electric and gas revenues are affected by changes in the costs of electric fuels, purchased power, and gas fuels (see below) which flow to customers through the appropriate fuel adjustment clauses.

**Operation and Maintenance Expenses**
(Dollars in millions)

| Increase or (Decrease) from Prior Year | 1979 $ | 1979 % | 1978 $ | 1978 % |
|---|---|---|---|---|
| Electric fuels consumed | $ 50.9 | 20.8% | $(14.4) | (5.6)% |
| Purchased power | 65.2 | 149.7 | 12.8 | 41.7 |
| Electric fuel cost adjustment deferred | (21.4) | (314.3) | 6.0 | 712.7 |
| Gas fuels | 18.4 | 26.1 | 10.5 | 17.5 |
| Other Operation and Maintenance Expenses | 21.8 | 14.6 | 10.8 | 7.8 |
| Total | $ 134.9 | 26.2% | $25.7 | 5.3% |

## Operation and Maintenance Expenses

Changes in the costs of electric fuels, purchased power, and gas fuels between periods are influenced by changes in energy sales (see Revenues), the prices of fuel and purchased power, the mix of generation by the Company, and purchases of power. During 1979, the Company purchased record amounts of power from other utilities, thereby decreasing the use of high-cost, low sulphur content oil by about 5.7 million barrels. The use of substantial volumes of natural gas, principally obtained through special purchases, for use in electric generation saved an additional 1.8 million barrels. The Company estimates that these actions saved customers a total of $42 million in 1979, below the estimated cost of generating an equivalent amount of power on the LILCO system with oil, which increased in price during the period. The average costs were as follows:

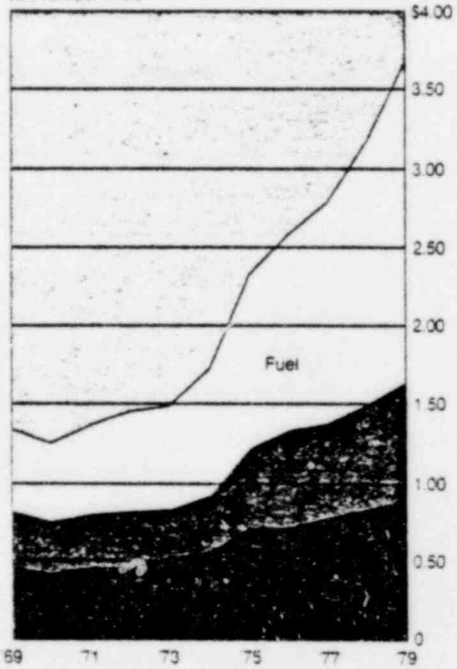
**Average Cost**

| Increase or (Decrease) from Prior Year | 1979 unit cost | 1979 % | 1978 unit cost | 1978 % |
|---|---|---|---|---|
| For Electric Operations ¢/kWh | | | | |
| Fuels consumed for Net Generation | 0.75¢ | 38.9% | (0.12)¢ | (5.8)% |
| Purchased power | 0.66¢ | 26.8 | (0.02)¢ | (0.9) |
| Electric fuel cost adjustment deferral | (0.05)¢ | (312.8) | 0.04¢ | 683.3 |
| For Gas sendout $/mcf | $0.32 | 20.3 | $0.22 | 16.1 |

As previously indicated, the changes in electric and gas fuel and purchased power costs were offset in each year by changes in revenues obtained through the appropriate fuel adjustment clause.

The changes in other operation and maintenance expenses between periods were primarily due to higher employee payroll and benefit costs, and other costs reflecting inflation. The increase in 1979 was greater than in 1978 because some normal operation and maintenance activities were not performed in the 1978 first quarter in order to divert manpower and funds to restoration and cleanup necessitated by the severe ice and snow storms during that period. The costs of this restoration were not charged to operating expenses. Portions of such costs have either been recovered through insurance or have been or are being charged to the Company's storm reserve. In addition, gas system and electric production plant maintenance expenses were higher in 1979 than in 1978.

**Gas Expenses**
(Dollars per mcf)




**During the last 10 years, LILCO's average revenue per mcf of gas sold has risen to $4.23, an increase of less than one-and-one-half times the $1.74 level in 1969. The primary reason for this increase has been the three fold increase in the cost of natural gas sold, which now accounts for almost 50% of the system average revenue per mcf sold compared to 29% in 1969. Operation and maintenance expenses per mcf, the most controllable expenses, rose 93%, tracking the increase in the consumer price index, and now account for 21% of revenue compared to 26% in 1969. Total taxes during the period doubled, declining from 21% of revenue per mcf sold in 1969 to 17% in 1979.**

## Other Items

Increases in depreciation generally result from the addition of plant in service. Increases in operating taxes are principally due to higher property taxes resulting from the addition of new plant and increased property tax rates, as well as higher state and local gross income and franchise taxes on increased revenues.

Changes in federal income taxes are due principally to variations in net income before income taxes, a decrease in the tax rate, utilization of investment tax credits, and items capitalized for financial statement purposes that are current deductions on the Company's tax return.

The increases in interest charges and preferred stock dividends result primarily from the sale of additional securities, increases in interest and dividend rates, and the use of Tri-Counties Resources Trust and Tri-Counties Construction Trust to finance the Company's continuing construction and nuclear fuel programs.

The amount of allowance for funds used during construction (AFC) (including AFC corresponding to Trust interest) fluctuates from period to period. These fluctuations are caused by changes in the cost of money, the level of construction activity, the amount of construction work in progress (CWIP) included in rate base, and modifications in regulatory policy.

The amount of electric CWIP included in rate base was increased effective February 1, 1978, from $175.0 million to $300.0 million. The total Company average amount of CWIP allowed in rate base was $304.1 million in 1979 and $288.4 million in 1978.

**Other Items**
(Dollars in millions)

| Increase or (Decrease) from Prior Year | 1979 | | 1978 | |
|---|---|---|---|---|
| | $ | % | $ | % |
| Depreciation | $ 2.9 | 5.6% | $ 6.1 | 13.6% |
| Operating taxes | 12.5 | 8.9 | 9.6 | 7.3 |
| Federal income taxes | (16.5) | (89.0) | 12.0 | 182.9 |
| Interest charges (excluding AFC related to borrowed funds and trusts) | 35.0 | 34.9 | 14.9 | 17.4 |
| Other income and deductions | 5.2 | 502.4 | 0.9 | 822.5 |
| Preferred stock dividends | 2.2 | 7.1 | 3.0 | 10.7 |
| AFC (including AFC related to borrowed funds and trusts) | 36.9 | 52.9 | 3.9 | 6.0 |

## Capital Requirements

LILCO's capital requirements, including AFC, totaled $466.1 million in 1979:

**Capital Requirements (Includes Trusts)** (Dollars in millions)

| | |
|---|---|
| Construction and nuclear fuel expenditures | |
| Electric property | $419.2 |
| Gas property | 13.3 |
| Common property | 7.0 |
| Nuclear fuel | 25.5 |
| Refunding senior securities | 1.1 |
| Total Capital Requirements | $466.1 |

Permanent financing in 1979 totaled a record $312.7 million, composed of:

**Permanent Financing**
(Dollars in millions)

| | |
|---|---|
| Mortgage bonds | $100.0 |
| Authority financing notes | 19.1 |
| Preferred stock | 75.0 |
| Common equity | 118.6 |
| Total Permanent Financing | $312.7 |

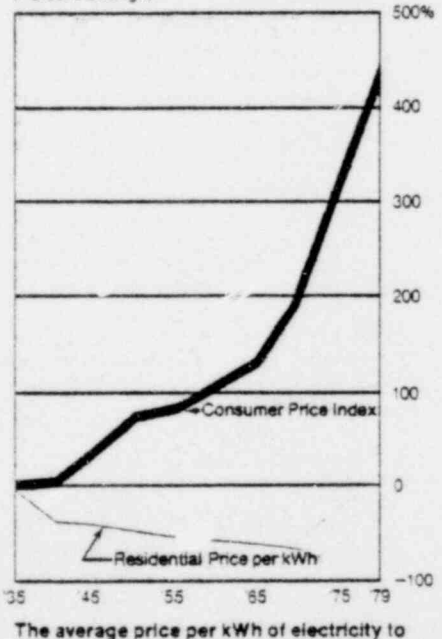
In addition, Tri-Counties Resources Trust borrowed $28.3 million, through agreements with its lending institutions, to finance LILCO expenditures for nuclear fuel. Tri-Counties Construction Trust provided $48.4 million to finance LILCO's share of expenditures on Nine Mile Point Unit 2. A further $21.0 million was provided through the Resources Trust to fund LILCO's loan to Bokum Resources Corporation. Additional information on the operation of the Trusts is provided in Note 6 of the Notes to Financial Statements.

The Company has authority from the Federal Energy Regulatory Commission to issue up to $250.0 million of unsecured short-term debt in the form of notes to banks and commercial paper. Commitments have been obtained from a number of banks to provide up to $250.0 million on a revolving credit basis for approximately five years. Authority is being sought from the PSC to borrow under these commitments.

No short-term debt was outstanding at the end of each of the last five years. (See Note 4 of the Notes to Financial Statements.)

LILCO's capital requirements are currently estimated at approximately $448 million in 1980. External financing is expected to total $288 million, and an additional $73 million is estimated to be provided through the Trusts. For the years 1980 through 1984, inclusive, LILCO's capital requirements are estimated at $2.6 billion. This includes $0.4 billion to repay maturing senior securities principally in 1981 through 1984. External sources are estimated to provide $1.1 billion and the Trusts will provide $0.5 billion.

**Consumer Price Index vs. Average Price per kWh of LILCO Residential Electricity**
(Percent Change)




**The average price per kWh of electricity to LILCO's residential consumer in 1979 was only 5.6% higher than in 1935. The consumer price index has risen 432% during the same period.**

## Shareowners' Investment

Of the total $128.8 million of income for common stock, $34.2 million, or 26.5%, was reinvested in LILCO for shareowners. At the end of 1979, common equity represented 39.7% of total capitalization compared with 35.5% at the end of 1977. These ratios exclude the Trusts from capitalization. Aiding in this increase was the conversion in 1979 of 34,090 shares of Series I Convertible Preferred Stock. Over 70% of all the Series I shares have now been converted. The total increase in common equity represented 48.7% of the total increase in capitalization.

During 1979, LILCO holders of common stock reinvested $16.6 million of their dividends and additional cash in new common shares through the Company's Automatic Dividend Reinvestment and Optional Cash Payment Plan. Over 22% of LILCO shareowners currently participate in this Plan, investing about 15% of the total common stock dividends and additional cash equivalent to up to 5% of the total dividends paid quarterly. Since its inception in December 1972, shareowners have invested $57.9 million in LILCO through the Plan. Nonparticipating common shareowners may obtain a copy of the current prospectus describing the terms and conditions of the Plan in full, including the optional cash feature and an authorization form for participation, by writing to Long Island Lighting Company, 250 Old Country Road, Mineola, New York 11501. Authorization forms from nonparticipating shareowners desiring to invest their May 1, 1980, dividend must be received no later than April 20, 1980.

LILCO continues to participate actively with other companies in the Committee on Capital Formation through Dividend Reinvestment. The purpose of the Committee is to seek federal legislation that would permit the deferred payment of personal federal income taxes on dividends reinvested in new issue common shares under such plans as LILCO's. Such legislation has been introduced in the Senate by Senator Gaylord Nelson (S.1543) and in the House of Representatives by Representative J.J. Pickle (H.R. 654). H.R. 654 is now included as Section 202 of H.R. 5665, which will come up for hearings in 1980. Passage of such legislation would provide a direct and cost-effective step towards reduction of double taxation on dividend reinvestment in such shares, thereby providing additional capital to finance essential energy facilities. We urge you to express your interest in these bills to your members of Congress.

In late 1979, the Association of Investors in New York Utilities (AINYU) was formed by security holders of investor-owned New York utilities. A brochure produced by AINYU was sent to LILCO investors in February. Additional copies may be obtained by writing to the Association at
Old Campy Road
Verbank, New York 12585
Attn: John Howley
or by contacting LILCO's Investor Relations Division.

## Directors and Officers

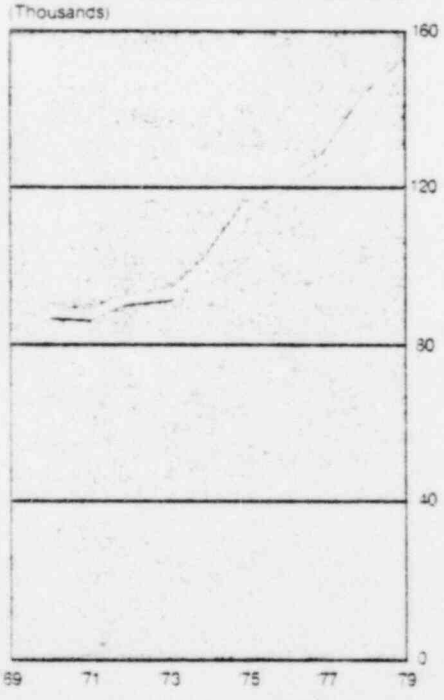
Appointment of two new vice presidents became effective April 1, 1979. Age 42 when elected Vice President—Purchasing, Hugh P. Boylan is responsible for the procurement of materials, including oil and nuclear fuel, and all equipment, supplies, and services. Matthew S. Procelli, then age 53, was elected Vice President—Employee Relations. Mr. Procelli directs LILCO's programs for employment, affirmative action, training and counseling, employee benefits, labor relations, accident prevention, health, and office services. Mr. Procelli filled the vacancy created by the retirement of Grant Brown, who had served the Company for 42 years.

## Insurance

The Company has restructured its Directors and Officers Liability insurance with the National Union Fire Insurance Company of Pittsburgh to provide coverage for wrongful acts by Directors and Officers as well as indemnification for the Company. Fiduciary Liability coverage is now included under this policy for the Company, its Directors and Officers, and any employee deemed to be a fiduciary or trustee, for any alleged breach of fiduciary liability under the Employee Retirement Income Security Act of 1974. This insurance coverage became effective on August 26, 1979, at an annual cost of $73,975.

No payments have been made under any policy of indemnification insurance issued to the Company for Directors, Officers or fiduciaries.

**Common Shareowners At Year End**




**The number of owners of LILCO's common stock totaled 151,800 at year end 1979, an increase of 83% in the last ten years.**

**Common and Preferred Stock Prices**

The Common Stock, the Preferred Stock $100 par value Series B, E, I, J, and K, and the Preferred Stock $25 par value Series O and P of the Company, are traded on the New York Stock Exchange. Trading in the Common Stock commenced December 20, 1979, on the Pacific Stock Exchange. Trading in the Preferred Stock, $100 par value, Series S, commenced on October 16, 1979, on the New York Stock Exchange. The table below indicates the high and low sale prices on the New York Stock Exchange listing of composite transactions for the years 1979 and 1978.

| | Common Stock | | Preferred Stock | | | | | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | | | Series B-5% | | Series E-4.35% | | Series I-5¾% | | Series J-8.12% | | Series K-8.30% | | Series O-$2.47 | | Series P-$2.43 | | Series S-9.80% | |
| | High | Low | High | Low | High | Low | High | Low | High | Low | High | Low | High | Low | High | Low | High | Low |
| **1978** | | | | | | | | | | | | | | | | | | |
| 1st Quarter | 19¼ | 17⅞ | 57 | 54 | 48⅝ | 45⅞ | 90 | 86 | 92¼ | 87 | 94 | 89½ | 27⅜ | 26 | 27¾ | 26 | — | — |
| 2nd Quarter | 19½ | 18½ | 52½ | 50 | 47½ | 44¾ | 92 | 88½ | 86⅛ | 80 | 92 | 80 | 27 | 24⅝ | 26¾ | 24½ | — | — |
| 3rd Quarter | 19¾ | 18½ | 54 | 52 | 48⅝ | 43 | 92½ | 91½ | 90 | 81 | 93¾ | 83 | 27¾ | 24¼ | 27 | 25 | — | — |
| 4th Quarter | 18⅞ | 17 | 52½ | 49 | 44½ | 43 | 85½ | 83 | 85 | 77 | 89½ | 80 | 26⅞ | 25⅛ | 26½ | 23 | — | — |
| **1979** | | | | | | | | | | | | | | | | | | |
| 1st Quarter | 18¼ | 17 | 49½ | 47½ | 43 | 41 | 85¾ | 83 | 82 | 77½ | 84½ | 79 | 26⅜ | 24¾ | 25⅛ | 23⅛ | — | — |
| 2nd Quarter | 17⅜ | 15⅛ | 48½ | 47 | 44⅜ | 40¼ | 82⅜ | 76 | 81¼ | 73½ | 83 | 75 | 26⅛ | 24¾ | 24⅞ | 21¼ | — | — |
| 3rd Quarter | 17¾ | 16 | 50 | 47 | 43½ | 41 | 85¼ | 80¼ | 82⅜ | 74 | 81¾ | 76½ | 25¾ | 23⅞ | 25¼ | 21½ | — | — |
| 4th Quarter | 16¼ | 13¾ | 49 | 40¼ | 40 | 37⅞ | 74½ | 72 | 72½ | 63 | 76 | 67½ | 24½ | 20¾ | 22 | 18⅛ | 96¼ | 89 |

The Series D-4.25% Preferred Stock is traded in the over-the-counter market. We have been advised of scattered trading at prices ranging between $29 and $41½ per share during 1979. Approximately 1,500 to 2,000 shares were traded during the year. The Series F, H, L, M, Q, and R Preferred Stock are held privately.

## Report of Independent Accountants

To the Shareowners and Board of Directors of Long Island Lighting Company

In our opinion, the financial statements appearing on pages 19 to 29 present fairly the financial position of Long Island Lighting Company at December 31, 1979 and 1978, and the results of its operations and the changes in its financial position for each of the five years ended December 31, 1979, in conformity with generally accepted accounting principles consistently applied. Our examinations of these statements 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 necesary in the circumstances.

**Price Waterhouse & Co.**

Huntington Station, NY
January 29, 1980

## Statement of Income for Year Ended December 31 (In thousands of dollars)

| | 1979 | 1978 | 1977 | 1976 | 1975 |
|---|---|---|---|---|---|
| **Revenues** | | | | | |
| Electric | **$860,798** | $738,339 | $682,997 | $589,665 | $557,971 |
| Gas | **184,700** | 160,632 | 141,083 | 134,924 | 113,556 |
| Total Revenues | **1,045,498** | 898,971 | 824,080 | 724,589 | 671,527 |
| **Expenses** | | | | | |
| Operations—fuel and purchased power | **478,416** | 365,307 | 350,465 | 292,707 | 280,455 |
| Operations—other | **118,644** | 104,384 | 97,289 | 89,263 | 80,720 |
| Maintenance | **52,206** | 44,660 | 40,935 | 39,476 | 37,164 |
| Depreciation | **54,060** | 51,192 | 45,049 | 42,737 | 40,715 |
| Operating taxes | **153,706** | 141,160 | 131,563 | 122,066 | 111,306 |
| Federal income tax—current | **(2,267)** | 7,297 | 7,860 | 228 | 4,737 |
| Federal income tax—deferred and other | **19,749** | 24,183 | 15,311 | 13,986 | 5,375 |
| Total Expenses | **874,514** | 738,183 | 688,472 | 600,463 | 560,472 |
| **Operating Income** | **170,984** | 160,788 | 135,608 | 124,126 | 111,055 |
| **Other Income and (Deductions)** | | | | | |
| Allowance for funds used during construction | **—** | — | — | 50,681 | 36,345 |
| Allowance for other funds used during construction | **58,086** | 47,294 | 44,654 | — | — |
| Other income and (deductions) | **4,129** | (1,026) | (142) | 256 | (814) |
| Federal income tax credit—current | **(2,417)** | 3,496 | 4,973 | 3,727 | 2,431 |
| Federal income tax credit—deferred and other | **17,855** | 9,471 | 11,655 | 5,079 | 123 |
| Total Other Income and (Deductions) | **77,653** | 59,237 | 61,140 | 59,743 | 38,085 |
| **Income Before Interest Charges** | **248,637** | 220,025 | 196,748 | 183,869 | 149,140 |
| **Interest Charges and (Credits)** | | | | | |
| Interest on long-term debt | **101,889** | 91,195 | 80,555 | 66,864 | 54,264 |
| Other interest | **7,119** | 5,720 | 5,030 | 5,436 | 7,596 |
| Allowance for borrowed funds used during construction | **(22,034)** | (18,883) | (21,147) | — | — |
| Interest capitalized by trusts | **26,496** | 3,562 | — | — | — |
| Allowance for borrowed funds used during construction—trusts | **(26,496)** | (3,562) | — | — | — |
| Total Interest Charges | **86,974** | 78,032 | 64,438 | 72,300 | 61,860 |
| **Net Income** | **161,663** | 141,993 | 132,310 | 111,569 | 87,280 |
| Preferred stock dividend requirements | **32,851** | 30,688 | 27,717 | 24,782 | 20,296 |
| **Income for Common Stock** | **$128,812** | $111,305 | $104,593 | $ 86,787 | $ 66,984 |
| **Average Common Shares Outstanding—(000)** | **53,366** | 45,670 | 40,399 | 34,437 | 28,949 |
| **Earned per Common Share** | **$ 2.41** | $ 2.44 | $ 2.59 | $ 2.52 | $ 2.31 |
| **Dividends Declared per Common Share** | **$ 1.76** | $ 1.70 | $ 1.63 | $ 1.56 | $ 1.50 |

See Notes to Financial Statements.

## Balance Sheet at December 31 (In thousands of dollars)

| Assets | | 1979 | 1978 |
|---|---|---|---|
| **Utility Plant** | Electric | **$1,568,311** | $1,506,659 |
| | Gas | **284,468** | 275,046 |
| | Common | **72,351** | 71,273 |
| | Construction work in progress | **1,444,631** | 1,145,445 |
| | Nuclear fuel in process | **—** | 3,675 |
| | Construction and nuclear fuel in trusts | **242,201** | 165,503 |
| | | **3,611,962** | 3,167,601 |
| | Less—Accumulated depreciation | **526,992** | 486,865 |
| | Total Net Utility Plant | **3,084,970** | 2,680,736 |
| **Other Property and Investments** | Nonutility property, principally at cost | **1,875** | 2,300 |
| | Investment in subsidiary companies, at equity | **379** | 385 |
| | Other investments and deposits | **74,731** | 68,099 |
| | Total Other Property and Investments | **76,985** | 70,784 |
| **Current Assets** | Cash | **8,626** | 7,221 |
| | Temporary cash investments | **3,480** | 3,000 |
| | Special deposits | **12,427** | 2,908 |
| | Note receivable—construction trust | **—** | 48,229 |
| | Accounts receivable (less allowance for doubtful accounts of $3,147,000 and $2,413,000) | **115,855** | 92,816 |
| | Accrued revenue on accounts billed bimonthly | **13,867** | 11,045 |
| | Materials and supplies at average cost | **24,605** | 21,896 |
| | Fuel oil at average cost | **42,320** | 23,108 |
| | Gas in storage at average cost | **24,323** | 18,222 |
| | Prepayments | **1,205** | 1,018 |
| | Total Current Assets | **246,709** | 229,463 |
| **Deferred Charges** | Electric fuel cost adjustment deferred | **22,709** | 8,131 |
| | Other | **28,210** | 27,599 |
| | Total Deferred Charges | **50,919** | 35,730 |
| | **Total Assets** | **$3,459,582** | $3,016,713 |

## Financial Statements

| Capitalization and Liabilities | | 1979 | 1978 |
|---|---|---|---|
| **Capitalization** | Long-term debt | **$1,274,722** | $1,175,662 |
| | Unamortized premium and discount on debt | **24** | 89 |
| | | **1,274,746** | 1,175,751 |
| | Preferred stock — redemption required | **294,100** | 226,950 |
| | Preferred stock — no redemption required | **160,090** | 163,499 |
| | Total Preferred Stock | **454,190** | 390,449 |
| | Common stock | **301,116** | 257,072 |
| | Premium on capital stock | **520,324** | 442,353 |
| | Capital stock expense | **(30,138)** | (28,321) |
| | Retained earnings | **346,001** | 311,838 |
| | Total Common Shareowners' Equity | **1,137,303** | 982,942 |
| | Total Capitalization | **2,866,239** | 2,549,142 |
| **Trust Obligations** | | **287,308** | 189,603 |
| **Current Liabilities** | Current maturities of long-term debt | **20,040** | 37 |
| | Sinking fund requirements on preferred stock | **7,850** | 1,050 |
| | Notes payable | **24,836** | — |
| | Accounts payable | **96,383** | 129,285 |
| | Accrued taxes, (including federal income tax of $2,092,000 and $3,773,000) | **32,467** | 31,403 |
| | Accrued interest | **22,195** | 18,499 |
| | Customer deposits | **8,080** | 8,125 |
| | Dividends payable | **30,864** | 25,984 |
| | Total Current Liabilities | **242,715** | 214,383 |
| **Deferred Credits** | Accumulated deferred income tax reductions | **54,901** | 49,926 |
| | Other | **2,458** | 7,213 |
| | Total Deferred Credits | **57,359** | 57,139 |
| **Reserves for Claims and Damages** | | **5,961** | 6,446 |
| **Commitments and Contingencies** | | **—** | — |
| | **Total Capitalization and Liabilities** | **$3,459,582** | $3,016,713 |

See Notes to Financial Statements.

## Statement of Changes in Financial Position for Year Ended December 31 (In thousands of dollars)

| | 1979 | 1978 | 1977* | 1976 | 1975 |
|---|---|---|---|---|---|
| **Source of Funds** | | | | | |
| **Operations** | | | | | |
| Net income | **$161,663** | $141,993 | $132,310 | $111,569 | $ 87,280 |
| Principal noncash charges and (credits) to income: | | | | | |
| Depreciation | **54,060** | 51,192 | 45,049 | 42,737 | 40,715 |
| Deferred and other federal income taxes | **1,894** | 14,712 | 3,656 | 8,907 | 5,252 |
| Allowance for funds used during construction | **(80,120)** | (66,177) | (65,801) | (50,681) | (36,345) |
| Other | **9,023** | 8,478 | 7,265 | 7,123 | 7,410 |
| Interest capitalized by trusts | **26,496** | 3,562 | — | — | — |
| Allowance for borrowed funds used during construction—trusts | **(26,496)** | (3,562) | — | — | — |
| Funds Provided from Operations | **146,520** | 150,198 | 122,479 | 119,655 | 104,312 |
| **Long-term Financing** | | | | | |
| Long-term debt | **119,100** | 75,287 | 85,000 | 150,375 | 170,000 |
| Preferred stock | **75,000** | — | 108,000 | 38,500 | 50,000 |
| Common stock | **121,999** | 127,862 | 120,325 | 90,558 | 88,445 |
| Trust obligations | **97,705** | 159,603 | 30,000 | — | — |
| **Other** | | | | | |
| Decrease in working capital | **11,087** | 29,534 | 763 | — | — |
| NYSEG reimbursements, prior periods, re: Jamesport | **—** | — | — | 16,254 | — |
| Other sources | **2,719** | 2,046 | 6,181 | 1,461 | 2,423 |
| **Total Source of Funds** | **$574,130** | $544,530 | $472,748 | $416,803 | $415,180 |
| **Use of Funds** | | | | | |
| Construction expenditures | **$392,062** | $292,519 | $359,420 | $314,125 | $281,455 |
| Nuclear fuel expenditures | **(3,675)** | (42,169) | 23,913 | 14,424 | 5,642 |
| Construction and nuclear fuel in trusts | **76,698** | 165,503 | — | — | — |
| Less—Allowance for funds used during construction | **80,120** | 66,177 | 65,801 | 50,681 | 36,345 |
| Total Construction and Nuclear Fuel Expenditures | **384,965** | 349,676 | 317,532 | 277,868 | 250,752 |
| Dividends on preferred stock | **32,215** | 30,651 | 27,223 | 24,459 | 20,474 |
| Dividends on common stock | **95,284** | 78,661 | 66,742 | 54,487 | 44,819 |
| Reduction of long-term debt | **20,040** | — | — | — | 40,000 |
| Preferred stock conversions and retirements | **11,259** | 2,937 | 44,995 | 8,549 | 2,026 |
| Increase in working capital | **—** | — | — | 39,031 | 40,404 |
| Electric fuel cost adjustment deferral | **14,578** | (6,801) | (836) | 995 | 41 |
| Other investments and deposits | **6,632** | 67,646 | 235 | — | — |
| Capital stock expense | **2,994** | 2,388 | 8,713 | 3,217 | 5,261 |
| Cost of removal | **2,367** | 4,074 | 1,510 | 3,220 | 1,908 |
| Other uses | **3,796** | 15,298 | 6,634 | 4,977 | 9,495 |
| **Total Use of Funds** | **$574,130** | $544,530 | $472,748 | $416,803 | $415,180 |
| **Increase (Decrease) in Working Capital by Element** | | | | | |
| Cash | **$ 1,405** | $ (1,126) | $ (609) | $ 1,035 | $ (5,843) |
| Temporary cash investments | **480** | 3,000 | — | — | — |
| Special deposits | **9,519** | (2,746) | (9,293) | 13,218 | 788 |
| Accounts and notes receivable | **(25,190)** | 45,791 | 9,509 | 9,030 | 4,251 |
| Accrued revenue | **2,822** | 523 | 733 | 989 | 763 |
| Materials, supplies, gas in storage and fuel | **28,022** | (4,315) | 4,412 | 11,344 | 7,543 |
| Prepayments | **187** | (126) | (70) | 598 | (221) |
| Current maturities on long-term debt | **(20,003)** | (37) | — | 25,000 | 625 |
| Sinking fund requirement on preferred stock | **(6,800)** | (1,050) | — | — | — |
| Notes Payable | **(24,836)** | — | — | — | 31,800 |
| Accounts payable | **32,902** | (58,585) | (615) | (9,681) | 13,072 |
| Accrued taxes | **(1,064)** | (4,591) | (750) | (8,840) | (4,318) |
| Accrued interest | **(3,696)** | (2,584) | (1,728) | (1,151) | (3,057) |
| Customer deposits | **45** | 174 | 834 | 28 | (1,127) |
| Dividends payable | **(4,880)** | (3,862) | (3,186) | (2,539) | (3,872) |
| **Net Increase (Decrease)** | **$(11,087)** | $(29,534) | $ (763) | $ 39,031 | $ 40,404 |

## Shareowners' Equity at December 31 (in thousands of dollars)

| | 1979 | 1978 | 1977 | 1976 | 1975 |
|---|---|---|---|---|---|
| **Statement of Retained Earnings** | | | | | |
| Balance, January 1 | **$311,838** | $279,157 | $242,147 | $209,524 | $187,537 |
| Add—Net income for the year | **161,663** | 141,993 | 132,310 | 111,569 | 87,280 |
| Less—Cost of issuance of retired preferred stock | **—** | — | 1,335 | — | — |
| Less—Capital Stock Expense | **1** | — | — | — | — |
| Less—Cash dividends declared: | | | | | |
| Preferred stock | **32,215** | 30,651 | 27,223 | 24,459 | 20,474 |
| Common stock | **95,284** | 78,661 | 66,742 | 54,487 | 44,819 |
| Balance, December 31 | **$346,001** | $311,838 | $279,157 | $242,147 | $209,524 |
| **Common Stock** Par Value $5 per Share | | | | | |
| Shares authorized | **80,000,000** | 80,000,000 | 60,000,000 | 60,000,000 | 40,000,000 |
| Shares outstanding | **60,223,283** | 51,414,352 | 44,041,453 | 37,639,385 | 32,073,338 |
| Increase in shares outstanding | **8,808,931** | 7,372,899 | 6,402,068 | 5,566,047 | 7,019,944 |
| Increases in $5 Par Value | **$ 44,044** | $ 36,865 | $ 32,010 | $ 27,830 | $ 35,100 |
| Increases in Premium on capital stock | **77,971** | 91,124 | 88,348 | 66,251 | 53,357 |
| Increases in Capital stock expense | **1,817** | 1,211 | 8,713 | 3,217 | 5,261 |
| **Preferred Stock** | | | | | |
| **Par Value $100 per Share**, Cumulative: | | | | | |
| Shares authorized | **5,050,000** | 5,050,000 | 5,050,000 | 5,050,000 | 3,800,000 |
| Shares outstanding | **3,770,403** | 3,064,993 | 3,024,360 | 2,464,306 | 2,549,795 |
| Shares subscribed | **—** | — | 70,000 | — | — |
| 5 % Series B | **$ 10,000** | $ 10,000 | $ 10,000 | $ 10,000 | $ 10,000 |
| 4.25% Series D | **7,000** | 7,000 | 7,000 | 7,000 | 7,000 |
| 4.35% Series E | **20,000** | 20,000 | 20,000 | 20,000 | 20,000 |
| 4.35% Series F | **5,000** | 5,000 | 5,000 | 5,000 | 5,000 |
| 5¼ % Series H | **20,000** | 20,000 | 20,000 | 20,000 | 20,000 |
| 5¼ % Series I Convertible | **8,090** | 11,499 | 14,436 | 19,431 | 27,980 |
| 8.12% Series J | **25,000** | 25,000 | 25,000 | 25,000 | 25,000 |
| 8.30% Series K | **30,000** | 30,000 | 30,000 | 30,000 | 30,000 |
| 7.40% Series L* | **33,950** | 35,000 | 35,000 | 35,000 | 35,000 |
| 8.40% Series M* | **35,000** | 35,000 | 35,000 | 35,000 | 35,000 |
| 13.00% Series N* | **—** | — | — | 40,000 | 40,000 |
| 7.50% Series Q* | **48,000** | 48,000 | 48,000 | — | — |
| 8.50% Series R* | **60,000** | 60,000 | 60,000 | — | — |
| 9.80% Series S* | **75,000** | — | — | — | — |
| Total Par Value $100 | **$377,040** | $306,499 | $309,436 | $246,431 | $254,980 |
| **Par Value $25 per Share**, Cumulative: | | | | | |
| Shares authorized | **7,200,000** | 7,200,000 | 7,200,000 | 7,200,000 | 7,200,000 |
| Shares outstanding | **3,400,000** | 3,400,000 | 3,400,000 | 3,400,000 | 1,920,000 |
| Shares subscribed | **—** | — | — | — | 80,000 |
| $2.47 Series O* | **$ 50,000** | $ 50,000 | $ 50,000 | $ 50,000 | $ 50,000 |
| $2.43 Series P | **35,000** | 35,000 | 35,000 | 35,000 | — |
| Total Par Value $25 | **85,000** | 85,000 | 85,000 | 85,000 | 50,000 |
| Less—Sinking fund requirements | **7,850** | 1,050 | — | — | — |
| Total Preferred Stock | **$454,190** | $390,449 | $394,436 | $331,431 | $304,980 |

*Redemption required.

See Notes to Financial Statements.

## Notes to Financial Statements

### Note 1. Summary of Significant Accounting Policies

The accounting records of the Company are maintained in accordance with the Uniform Systems of Accounts prescribed by the Public Service Commission of the State of New York (PSC) and the Federal Energy Regulatory Commission (FERC).

### Utility Plant

Additions to and replacements of utility plant are recorded at original cost, which includes material, labor, overheads, and an allowance for the cost of funds used during construction (AFC). The cost of renewals and betterments relating to units of property is added to utility plant. The cost of property replaced, retired or otherwise disposed of is deducted from utility plant and, generally, together with dismantling costs less any salvage, is charged to accumulated depreciation. The cost of repairs and minor renewals is charged to maintenance expense. Mass properties (such as poles, wire and meters) are accounted for on an average unit cost basis by year of installation.

### Allowance for Funds Used During Construction

The Uniform Systems of Accounts define AFC as the net cost of borrowed funds for construction purposes and a reasonable rate upon the utility's other funds when so used. AFC is computed monthly on that portion of construction work in progress (CWIP) which is not included in the Company's rate base. In June 1976, the Company began computing AFC on its Shoreham Unit at a reduced rate which reflects the income tax effect of the interest portion of AFC, and in 1978 the Company adopted the FERC method for calculating AFC.

The average annual AFC rate, without giving effect to compounding or the reduced Shoreham net of tax rate, was 8.9%, 9.25%, 9.38%, 9.72% and 9.99% for the years 1975 through 1979, respectively. The Shoreham net of tax annual AFC rate, without giving effect to compounding, was 7.34%, 7.63%, 7.93% and 8.21% for the years 1976 through 1979, respectively.

Based upon a five-year average of the Company's capitalization and upon the most current costs of preferred stock and long-term debt (without adjustment for income taxes, except with respect to the Shoreham Unit) in the respective periods, the portion of AFC attributable to funds provided by common stock equity for the years 1975 and 1976, was equivalent to 14% and 17% of Income for Common Stock.

In compliance with the FERC order, effective January 1, 1977, the Company has allocated the portion of AFC relating to borrowed funds to the Interest Charges section of the Statement of Income. Periods prior to 1977 have not been reclassified. The Company believes that such reclassification would be inappropriate since the allocation between the borrowed and other components for prior periods would not be comparable to the components of AFC determined subsequent to December 31, 1976, by using the FERC formula.

### Depreciation

The provisions for depreciation result from the application of straight-line rates to the original cost, by groups, of depreciable properties in service. The rates are determined by annual age-life studies of depreciable properties. Depreciation accruals were equivalent to 3% of average depreciable plant cost for each of the years 1975 through 1979.

### Revenues

Revenues are recorded when billed. Billings are rendered on a monthly or bimonthly cycle basis. The Company accrues estimated revenues for customers billed bimonthly in the month in which they normally are not billed.

The Company's tariffs for electric service include a fuel adjustment clause under which electric rates charged to most customers are adjusted to reflect changes in the average cost of fuels and of certain purchased power costs. The Company's tariffs for gas service contain a comparable clause.

### Deferred Electric Fuel Cost Adjustment

The Electric Fuel Cost Adjustment represents the difference between actual fuel costs and the fuel costs allowed in the Company's base tariff rates. The Company, to achieve a proper matching of costs and revenues, defers this difference along with the related income tax effects to those future periods in which it will be billed to customers. The Company believes that the PSC will continue to permit the recovery of deferred fuel costs.

**Federal Income Taxes**

An accelerated depreciation method, together with depreciation lives which are shorter than those referred to under Depreciation, is used for income tax purposes. Interest, pensions, taxes, research and development costs, etc., which are charged to plant or accumulated depreciation for financial statement purposes, are deducted currently where permitted by the tax laws. AFC is not subject to income tax. Property taxes are deducted on a lien date basis, in contrast to the fiscal year basis used for financial statements. For these and similar reasons, taxable income is less than financial statement income.

The Company's general policy is to reflect as income tax expense the amount of income taxes currently payable; however, in certain cases provision is made for income tax effects of the differences between net income before income taxes and taxable income, as disclosed in Note 5.

The major items which are part of the deferred tax provision are as follows:

- Income tax benefits resulting from reduced depreciation lives permitted by the Revenue Act of 1971.
- Income tax benefits relating to deferred fuel cost.
- The increases in investment tax credits initiated by the Tax Reduction Act of 1975, from 4% to 10% of eligible property additions and limits of allowability, are deferred and amortized over the average lives of related properties for financial accounting and rate-making purposes. Such deferred investment tax credits at December 31, 1979 and 1978 amounted to $29,508,000 and $28,341,000, respectively.

Investment tax credits allowable under the Revenue Act of 1971 are accounted for as a reduction of federal income tax expense. The credit is calculated on the basis of a 4% rate applied to eligible property additions but subject to applicable income limitations. The basis of accounting for these credits was modified by PSC rate orders, the effect of which has been to recognize $2,824,000—1979 and $86,000—1978 of additional credits for financial accounting and rate-making purposes. The utilization of such additional credits for tax purposes, however, continues to be subject to the provisions of the Internal Revenue Code.

**Capitalization-Premiums, Discounts and Expenses**

Premiums or discounts and expenses related to the issuance of long-term debt are amortized over the lives of the issues. Capital stock expense related to that portion of preferred stock required to be redeemed is written-off as an adjustment to retained earnings when the stock is retired.

**Reserves for Claims and Damages**

Losses arising from claims against the Company, from extraordinary storm losses, and from certain equipment damage are partially self-insured. Provisions to the reserves are based upon experience, risk of loss, and/or specific orders of the PSC.

**Note 2. Retirement Plans**

The Company maintains a pension plan which covers most employees. The total costs related to the plans were $11,694,000, $10,732,000, $9,712,000, $8,370,000 and $7,556,000 for the years 1979 through 1975 (of which $3,344,000, $2,904,000, $2,826,000, $2,191,000 and $2,131,000 were included in construction costs), respectively. All pension costs are borne by the Company. The Company's policy is to fund the costs accrued. The actuarially computed value of the vested benefits at January 1, 1979 (the date of the latest actuarial valuation) exceeds the funds accumulated by approximately $29,574,000. The total unfunded prior service cost at the date of the latest actuarial valuation was about $26,852,000, after a plan amendment in 1978, which amount is being amortized principally over a 30-year period.

**Note 3. Capital Stock**

Of the 80,000,000 shares of authorized common stock, 865,999 shares are reserved for sale to employees, 2,682,838 shares are committed to the Automatic Dividend Reinvestment Plan, and 418,103 shares are reserved for conversion of the Series I Convertible Preferred Stock at $19.35 per share. The Series I Convertible Preferred Stock is not considered, under generally accepted accounting principles, to have a dilutive effect on earnings per share.

In December 1977, the Company refunded its 13% Series N Preferred Stock with the issuance of 7.50% Series Q Preferred Stock. In accordance with a PSC order, the cost of issuance of Series N was charged to Retained Earnings and the cost of issuance of Series Q and the $6,000,000 call premium of Series N was charged to Capital Stock Expense and is being amortized and recovered in the Company's rates over seven years, the term of the Series Q issue.

Redemption of Series L, M, O, Q, R and S Preferred Stock is provided for through varying sinking fund provisions, certain of which commenced in 1979. The aggregate amount of preferred stock required to be redeemed in each of the years 1980 through 1984 is $7,850,000, $7,850,000, $11,600,000, $11,600,000 and $38,038,000, respectively.

**Note 4. Short-term Loans and Compensating Balances**

The Company has authority from FERC to issue up to a total of $250,000,000 in notes to banks and commercial paper. The Company has established bank lines of credit totaling $140,000,000 at December 31, 1979. Bank loans, which would have been obtained at the lending banks' prevailing prime interest rate, generally mature within 90 days. The Company, under informal arrangements, maintains compensating balances, which are not legally restricted, ranging 6% of the lines of credit or [illegible] fees in lieu thereof. Net of average "float," compensating balances at December 31, 1979, amounted to approximately $3,175,000. No bank loans were outstanding at either year-end. The Company maintains available bank lines of credit to backup 100% of the commercial paper outstanding.

Commercial paper is issued at various discount rates and usually matures within 30 to 45 days. No commercial paper was outstanding at either year-end. During 1979 and 1978, the maximum aggregate amount of short-term borrowings at any one month-end was $121,700,000 at August 1979 and $95,000,000 at August 1978, and the daily averages of short-term borrowings were $41,776,000 and $33,531,000, respectively.

The approximate weighted average interest rates (excluding the effects of compensating balances and lines of credit fees) on short-term borrowings were 11.2% and 7.6%, respectively.

The Company has obtained commitments from a number of banks to provide up to $250,000,000 on a revolving credit basis for approximately 5 years, and has applied to the PSC for authority to borrow under these commitments.

## Note 5. Federal Income Taxes

The Federal income tax amounts included in the Statement of Income differ from the amounts which result from applying the statutory Federal income tax rate to Net Income before income tax. The reasons are as shown below:

| (In thousands of dollars) | 1979 | | 1978 | | 1977 | | 1976 | | 1975 | |
|---|---|---|---|---|---|---|---|---|---|---|
| | Amount | % of Pre-tax Income | Amount | % of Pre-tax Income | Amount | % of Pre-tax Income | Amount | % of Pre-tax Income | Amount | % of Pre-tax Income |
| Federal income tax, per Statement of Income | | | | | | | | | | |
| Current | $ (2,267) | | $ 7,297 | | $ 7,860 | | $ 228 | | $ 4,737 | |
| Included in other income and deductions (current) | 2,417 | | (3,498) | | (4,973) | | (3,727) | | (2,431) | |
| | 150 | | 3,799 | | 2,887 | | (3,499) | | 2,306 | |
| Deferred and other (See Note 1) | | | | | | | | | | |
| Asset depreciation range system | 2,010 | | 692 | | 662 | | 2,784 | | 2,417 | |
| Fuel cost adjustments | 1,502 | | (3,604) | | (1,309) | | (1,074) | | 331 | |
| Investment tax credits— Tax Reduction Act of 1975 | 2,385 | | 11,461 | | 6,328 | | 5,909 | | 3,790 | |
| Other items, net | (4,003) | | 6,163 | | (2,025) | | 1,288 | | (1,286) | |
| | 1,894 | | 14,712 | | 3,656 | | 8,907 | | 5,252 | |
| Total | 2,044 | | 18,511 | | 6,543 | | 5,408 | | 7,558 | |
| Net income | 161,663 | | 141,993 | | 132,310 | | 111,569 | | 87,280 | |
| Income Before Taxes | $163,707 | | $160,504 | | $138,853 | | $116,977 | | $ 94,838 | |
| Statutory Federal income tax | $ 75,305 | 46.0% | $ 77,042 | 48.0% | $ 66,649 | 48.0% | $ 56,149 | 48.0% | $ 45,522 | 48.0% |
| Reductions in Federal income tax resulting from: | | | | | | | | | | |
| Excess of tax depreciation over book depreciation | (4,147) | (2.5) | (6,830) | (4.3) | (10,967) | (7.9) | (7,775) | (6.7) | (8,052) | (8.5) |
| AFC, which does not constitute taxable income | (36,855) | (22.5) | (31,765) | (19.8) | (31,585) | (22.7) | (24,327) | (20.8) | (17,446) | (18.4) |
| Costs charged to plant but deducted currently | (11,567) | (7.1) | (10,142) | (6.3) | (10,143) | (7.3) | (6,670) | (5.7) | (4,245) | (4.5) |
| Property taxes deducted on a lien date basis | (961) | (0.6) | (2,266) | (1.4) | (1,911) | (1.4) | (3,775) | (3.2) | (2,803) | (2.9) |
| Interest capitalized by Trusts | (12,262) | (7.5) | (1,666) | (1.0) | — | — | — | — | — | — |
| Investment tax credits | (9,811) | (6.0) | (5,973) | (3.7) | (10,257) | (7.4) | (7,984) | (6.8) | (4,198) | (4.4) |
| Other items, net | 2,342 | 1.4 | 111 | — | 4,757 | 3.4 | (210) | (0.2) | (1,220) | (1.3) |
| Total Federal income tax expense | 2,044 | 1.2% | $ 18,511 | 11.5% | $ 6,543 | 4.7% | $ 5,408 | 4.6% | $ 7,558 | 8.0% |

At December 31, 1979, the Company had an investment tax credit carryforward for financial statement purposes, in accordance with PSC orders, of approximately $60,000,000. In accordance with the Company's accounting policy, approximately $43,000,000 of the carryforward will be deferred when utilized. The amount of ITC carryforward available as credits to tax returns for years after 1978 is $87,000,000. These credits expire by 1986.

## Note 6. Trust Obligations

The Company entered into arrangements with Tri-Counties Resources Trust (Resources Trust), in September 1977, and Tri-Counties Construction Trust (Construction Trust), in August 1978, providing for the Trusts to finance, respectively, the acquisition of the Company's nuclear fuel and its 18% share of construction and nuclear fuel costs for Nine Mile Point Unit 2. The Resources Trust and the Construction Trust principally have revolving credit arrangements which together with certain term loans provide for borrowings of up to $135,000,000 and $300,000,000, respectively. The primary revolving credit loan of the Resources Trust matures in September 1983 and provides that the lending banks may, each year, elect to extend the maturity date for one additional year. The Construction Trust loan is payable according to a repayment schedule with quarterly payments beginning not earlier than March 31, 1985 and ending not later than June 30, 1988. The Trusts may, with available funds not immediately needed for such financing, make certain investments, including investments in the Company's promissory notes. The Trusts' total obligation of $287,308,000 at December 31, 1979, is comprised of $242,208,000 for financing construction and nuclear fuel expenditures and $45,100,000 utilized by the Company for general corporate purposes.

The Company is obligated to arrange to purchase nuclear fuel owned by the Resources Trust, or heat from such fuel, just prior to loading the fuel in the Company's reactors or upon termination of the Trust. Similarly, the Company is obligated to arrange to reimburse the Construction Trust for nuclear fuel and construction just prior to Nine Mile Point Unit 2 going into operation.

The Resources Trust and the Construction Trust interest on borrowings is calculated, principally at 105% of the prevailing prime rate and commitment fees of ½ of 1% or less are calculated on unused lines of credit (based upon the respective Trusts' revolving credit arrangements). The Trusts' interest costs of borrowings utilized to finance construction and nuclear fuel are reflected in the Company's Construction and Nuclear Fuel in Trusts

accounts and is deducted currently for tax purposes on the Company's tax return.

The Trusts' average annual interest rate (excluding commitment fees) for average borrowings of $231,550,000 and $69,062,000 outstanding during the years 1979 and 1978 was 13.2% and 10.6%, respectively. Of the total average borrowings, $35,018,000 and $39,303,000 related to general corporate purposes for the respective periods.

**Note 7. Commitments and Contingencies**

The Company's expenditures for construction and nuclear fuel for the years 1980 through 1984 as estimated at December 31, 1979, total approximately $2.2 billion and assume timely and adequate rate relief and financing.

Substantial commitments have been made for the Company's construction program, including commitments for the nuclear generating stations at Shoreham and Nine Mile Point Unit 2 which are under construction. Subject to the results of continuing review, the estimated costs at completion of the Shoreham Unit and the Company's share of Nine Mile Point Unit 2 are $1.6 billion and $388 million, respectively. In 1979, the PSC initiated a review to consider the reasonableness of the costs of the Shoreham Unit and the extent to which such costs should be included in the Company's rate base. The Company is unable to evaluate the likelihood of an unfavorable outcome of the proceeding or to estimate the financial impact, if any, upon the Company. It is the Company's judgment that the costs have been prudently incurred and that it believes it can so demonstrate to the PSC. Substantial commitments have also been made for the proposed nuclear generating stations at Jamesport and New Haven / Stuyvesant for which regulatory approvals are pending. The Company, which is the sole owner of Shoreham, has a 50% interest in Jamesport and New Haven, an 18% interest in Nine Mile Point Unit 2 and is responsible for financing its respective share of each of the units. The Company's studies continue to support the conclusion that the generation of electricity by nuclear power will be more economic and more compatible with health and environmental standards than generation by fossil fuels. The Company therefore believes that its capital investment programs for nuclear generation facilities and fuel supplies are prudent and provide the most reasonable means of meeting expected demands for electric power and replacing reliance upon imported supplies of oil at the lowest cost to consumers. Despite this conclusion, the Company recognizes, that recent events, such as the incident at Metropolitan Edison Company's Three Mile Island Nuclear Generating Station, are having a nationwide impact on nuclear capital investment to an extent in large part undetermined. There can be no assurance that necessary licenses and approvals will be granted to the Company by the appropriate Federal and State governmental agencies for the Company's nuclear projects. The Company believes that under present statutes and regulations, the necessary licenses and approvals will be received for the Shoreham and Nine Mile Point Unit 2 projects.

On January 29, 1980, a New York State Board on Electric Generation Siting and the Environment which had been considering the application for the nuclear generating station at Jamesport voted to approve the construction of an 800 megawatt coal-fired unit on Long Island. Before construction can begin, a final order must be entered, appeals, if any, must be exhausted, environmental permits must be obtained and the unit must be designed. The application for a certificate for the construction of the proposed New Haven / Stuyvesant Nuclear Power Station has been dismissed by another Siting Board. A petition for rehearing is pending. Should the rehearing be denied, consideration will be given to an appeal to the courts. The Company will request the PSC to grant appropriate relief which will permit the Company to recover from customers, in a timely manner, its expenditures for costs incurred in connection with the Jamesport and New Haven / Stuyvesant projects which cannot be utilized for other purposes. It is anticipated that the PSC will grant the requested relief.

The Company has, at December 31, 1979, expenditures for CWIP of $1,261,743,000 for Shoreham, $48,723,000 representing its 50% interest in Jamesport, $148,974,000 representing its 18% interest in Nine Mile Point 2 and $34,211,000 representing its 50% interest in New Haven and expenditures for nuclear fuel of $93,228,000 relating to these projects. In addition to the $34,211,000 referred to above, the Company has recorded in Other investments and deposits $24,836,000 which together with the related nuclear fuel brings its total investment in New Haven to $62,245,000 of which $24,836,000 is included in Notes Payable on the balance sheet.

In connection with its nuclear projects, the Company has made substantial long-range commitments for nuclear fuel, including contracts with Bokum Resources Corporation (a development stage company) for 10 million pounds of uranium concentrates. The contracts for uranium concentrates provide for advance payments of $20,000,000, $15,350,000 of which has been paid by the Company and the balance by New York State Electric and Gas Corporation. Bokum has notified the Company that Bokum is in default under the contracts providing for the delivery of the uranium concentrates and also under the provisions of a financing agreement providing for loans to Bokum of $51,100,000 to develop a uranium mine and to construct an ore-processing mill. At December 31, 1979, the amount owed the Company by Bokum for loans and interest was $49,557,000. The loan bears interest at 10.5% per annum and is secured by, among other rights, an assignment of leases and a mortgage on certain of Bokum's assets. The terms of the financing agreement provide for repayment of LILCO's loans and interest thereon from 1981 to 1986. The Company has recorded its loans to Bokum in Other investments and deposits. The Company believes that the assets secured under its several contracts with Bokum provide adequate protection for the Company's investment in Bokum. In addition, the Company may, at its option, determine to provide Bokum with up to an additional $1,300,000 at a rate based on the Company's cost of the money borrowed for such purposes, the disbursement of all but $211,000 of which is subject, in part, to the continuation of certain mine and mill activities.

The Company has also entered into substantial long-range commitments for fuel and gas supply. The costs of fuel and gas supply are normally recovered from customers through provisions in the Company's rate schedules. The Company believes similar treatment will be accorded nuclear fuel costs. For further discussion respecting the Company's construction and fuel commitments, see pages 9-12.

There are currently pending in the Federal courts, before the U.S. Equal Employment Opportunity Commission and the New York State Division of Human Rights, complaints by employees alleging that the Company has discriminated against them on the basis of race. The Company believes it has meritorious defenses to these complaints, but it cannot predict the ultimate outcome of these matters.

**Note 8. Long-term Debt at December 31**

All of the First Mortgage Bonds are issued under the First Mortgage. The General and Refunding Bonds are issued under the General and Refunding Indenture (G & R Mortgage). The First Mortgage is a direct first lien on substantially all of the Company's properties. The lien of the G & R Mortgage on substantially all of the same properties is junior to the lien of the First Mortgage. All First Mortgage Bonds, issued on and after June 1, 1975, are held by the Trustee of the G & R Mortgage as additional security for G & R Bonds and are excluded from long-term debt because they do not create additional debt in the Company's capital structure.

**Long-term Debt** at December 31 (In thousands of dollars)

| Rate of Interest | Series | Due | 1979 | 1978 |
|---|---|---|---|---|
| **First Mortgage Bonds** | | | | |
| 3 % | A | 1980 | $ 20,000 | $ 20,000 |
| 3⅜ | E | 1982 | 20,000 | 20,000 |
| 3½ | F | 1983 | 25,000 | 25,000 |
| 3¼ | G | 1984 | 15,000 | 15,000 |
| 3⅜ | H | 1985 | 15,000 | 15,000 |
| 4¾ | I | 1986 | 20,000 | 20,000 |
| 4⅛ | J | 1988 | 20,000 | 20,000 |
| 5 | L | 1991 | 25,000 | 25,000 |
| 4.40 | M | 1993 | 40,000 | 40,000 |
| 4⅝ | N | 1994 | 25,000 | 25,000 |
| 4.55 | O | 1995 | 25,000 | 25,000 |
| 5¼ | P | 1996 | 40,000 | 40,000 |
| 5½ | Q | 1997 | 35,000 | 35,000 |
| 8.20 | R | 1999 | 35,000 | 35,000 |
| 9⅛ | S | 2000 | 25,000 | 25,000 |
| 7¼ | U | 2001 | 40,000 | 40,000 |
| 7½ | V | 2001 | 50,000 | 50,000 |
| 7⅝ | W | 2002 | 50,000 | 50,000 |
| 8⅛ | X | 2003 | 60,000 | 60,000 |
| 10 | Y | 1981 | 60,000 | 60,000 |
| 9¼ | Z | 1982 | 50,000 | 50,000 |
| † 9¼ | AA | 1983 | 80,000 | 56,000 |
| † 9⅞ | BB | 1984 | 90,000 | 44,000 |
| † 9⅝ | CC | 2006 | 70,000 | 63,000 |
| † 8⅝ | DD | 2006 | 50,000 | 50,000 |
| † 8⅝ | EE | 2007 | 85,000 | 50,000 |
| † 9.20 | FF | 2008 | 42,000 | 40,000 |
| † 9.75 | GG | 1999 | 73,000 | — |
| | | | 1,185,000 | 998,000 |
| †Less—Deposited with Trustee of the General and Refunding Indenture as additional security for General and Refunding Bonds | | | 490,000 | 303,000 |
| | | | 695,000 | 695,000 |
| Less—current maturities | | | 20,000 | — |
| Total First Mortgage Bonds | | | 675,000 | 695,000 |
| **General and Refunding Bonds** | | | | |
| 9¼ % Series Due 1983 | | | 80,000 | 80,000 |
| 9⅞ % Series Due 1984 | | | 90,000 | 90,000 |
| 9⅝ % Series Due 2006 | | | 70,000 | 70,000 |
| 8⅝ % Series Due 2006 | | | 50,000 | 50,000 |
| 8⅝ % Series Due 2007 | | | 85,000 | 85,000 |
| 9.20% Series Due 2008 | | | 75,000 | 75,000 |
| 9.75% Series Due 1999 | | | 100,000 | — |
| Total General and Refunding Bonds | | | 550,000 | 450,000 |
| **Other Long-term Debt** | | | | |
| 7½%—Authority Financing Notes | | 2006 | 30,375 | 30,375 |
| 7.8%—Authority Financing Note | | 2009 | 19,100 | — |
| 8½% Promissory Notes | | 1985 | 287 | 324 |
| Less—Current Maturity on 8½% Promissory Notes | | | 40 | 37 |
| Total Other Long-term Debt | | | 49,722 | 30,662 |
| **Total Long-term Debt** | | | $1,274,722 | $1,175,662 |

The aggregate of the Company's long-term debt due in the five years ended December 31, 1984 is: $20,000,000 (1980), $60,000,000 (1981), $72,000,000 (1982), $107,000,000 (1983) and $107,000,000 (1984).

## Note 9. Segments of Business

The Company is a public utility operating company engaged in the generation, distribution, and sale of electric energy and the purchase, distribution, and sale of natural gas.

| (In thousands of dollars) | 1979 Electric | 1979 Gas | 1979 Total Company | 1978 Electric | 1978 Gas | 1978 Total Company |
|---|---|---|---|---|---|---|
| **Operating Information** | | | | | | |
| (Year ended December 31): | | | | | | |
| Revenue | **$ 860,798** | **$184,700** | **$1,045,498** | $ 738,339 | $160,632 | $ 898,971 |
| Expenses (excluding income tax) | **698,648** | **158,384** | **857,032** | 573,589 | 133,114 | 706,703 |
| Operating income (before income tax) | **$ 162,150** | **$ 26,316** | **$ 188,466** | $ 164,750 | $ 27,518 | $ 192,268 |
| AFC and other | | | **62,215** | | | 46,268 |
| Interest charges | | | **86,974** | | | 78,032 |
| Income taxes—operating | | | **17,482** | | | 31,480 |
| Income taxes—nonoperating credit | | | **15,438** | | | 12,969 |
| Net income per accompanying Statement of Income | | | **$ 161,663** | | | $ 141,993 |
| **Other Information** | | | | | | |
| (Year ended December 31): | | | | | | |
| Depreciation expense | **$ 47,872** | **$ 6,188** | **$ 54,060** | $ 45,217 | $ 5,975 | $ 51,192 |
| Capital expenditures for construction and nuclear fuel | **450,549** | **14,537** | **465,086** | 407,032 | 8,821 | 415,853 |
| **Investment Information** | | | | | | |
| (At December 31): | | | | | | |
| Assets (a) | **$2,921,914** | **$246,676** | **$3,168,590** | $2,492,055 | $234,111 | $2,726,166 |
| Nonutility plant | | | **1,875** | | | 2,300 |
| Other investments (b) | **74,414** | **358** | **75,110** | 52,726 | 385 | 68,484 |
| Assets utilized for overall Company operations | | | **214,007** | | | 219,763 |
| Total Assets | | | **$3,459,582** | | | $3,016,713 |

(a) Includes net utility plant and deferred charges (excluding common), materials and supplies, accrued revenues, gas in storage and fuel.

(b) Consisting of, in 1979, $49,557,000 Bokum Resources Corporation, $24,036,000 New Haven Units, $379,000 subsidiary companies ($21,000 electric, $358,000 gas), $338,000 other investments; and in 1978, $24,595,000 Bokum Resources Corporation, $28,131,000 New Haven Units, $365,000 subsidiary company, $14,956,000 Tri-Counties Resources Trust, and $417,000 other investments.

## Note 10. Quarterly Financial Information (Unaudited)

| (In thousands of dollars) | Operating Revenues | Operating Income | Net Income | Income for Common Stock | Earned per Common Share |
|---|---|---|---|---|---|
| First Quarter | | | | | |
| **1979** | **$266,031** | **$49,610** | **$46,965** | **$39,305** | **$0.76** |
| 1978 | 247,890 | 48,919 | 45,546 | 37,880 | 0.86 |
| Second Quarter | | | | | |
| **1979** | **231,682** | **36,177** | **33,235** | **25,599** | **0.49** |
| 1978 | 203,259 | 34,339 | 29,539 | 21,854 | 0.49 |
| Third Quarter | | | | | |
| **1979** | **291,953** | **56,673** | **53,707** | **45,587** | **0.87** |
| 1978 | 238,472 | 49,256 | 43,540 | 35,868 | 0.80 |
| Fourth Quarter | | | | | |
| **1979** | **255,832** | **28,524** | **27,756** | **18,321** | **0.32** |
| 1978 | 209,350 | 28,274 | 23,368 | 15,703 | 0.32 |

## Note 11. Supplementary Information Concerning the Effects of Inflation (Unaudited)

Throughout the decades following World War II, the utility industry has constantly pointed out to economists, regulators and law makers that calculating depreciation on the original cost of the utility plant would not permit the recovery of the cost required to replace a piece of equipment which became obsolete or fully depreciated if any degree of inflation were experienced over the life of the property. The solution suggested by the industry was to calculate depreciation on the reproduction cost of existing facilities, or to use a depreciation rate which reflects inflation. In an attempt to have information available to inform investors of the consequence of this inflationary erosion throughout the business world, the Financial Accounting Standards Board and the Securities and Exchange Commission have developed certain standards for quantifying and providing this information to investors. While we believe the concept has merit if it leads to wiser governmental decisions as to taxation and utility regulation, we wish to point out to our shareowners the theoretical nature of this information, and to suggest caution in its use for the purpose of making investment decisions in the utility field and for comparing one company to another in terms of expected future performance.

The data which follows, adjusted for general inflation, was developed by restating the historical cost of property, plant and equipment (by approximate year of expenditure), the related accumulated depreciation, and 1979 depreciation expense using the Consumer Price Index for All Urban Consumers.

### Effect of Inflation on 1979 Net Income and Common Stock Earnings Per Share

| | (Average 1979 Dollars) (In thousands of dollars) |
|---|---|
| Net income as shown on the Statement of Income | $161,663 |
| Increase in depreciation expense if adjusted for inflation | 46,011 |
| Net income as adjusted | $115,652 |
| Earned per Common Share as adjusted | $ 1.55 |

### Effect of Inflation on Net Plant Investment

The effect of 1979 inflation, of about 13%, on the Company's January 1, 1979 undepreciated plant investment, less the $46 million increase in depreciation expense shown above, amounted to $306 million. If this were to be applied as a loss in 1979, to Net Income as adjusted, it would have resulted in a net loss of $191 million.

At December 31, 1979, the cost of property, plant and equipment, net of accumulated depreciation, restated for inflation since year of expenditure, was $4.5 billion while historical cost net of accumulated depreciation was $3.1 billion.

### Effect of Inflation on Certain Assets and Liabilities

During periods of inflation, monetary assets such as cash and receivables lose their purchasing power. Similarly, monetary liabilities such as long-term debt can be a benefit because they will be repaid in dollars having less purchasing power. The net monetary amounts owed by the Company during the year resulted in an unrealized benefit of $184 million. The Company's net assets (total assets less total liabilities) at year-end of $1.6 billion when restated in average 1979 dollars amount to $1.5 billion.

### Effect of Inflation on Common Stock Dividends and Market Price

Cash dividends declared per common share in 1979 were $1.76. Dividends declared in prior years restated in terms of 1979 purchasing power (average 1979 dollars) for the years 1978 through 1975, respectively, would have been $1.89, $1.95, $1.99 and $2.02 per share. The average consumer price indices for the years 1979 through 1975 were 217.4, 195.4, 181.5, 170.5 and 161.2, respectively. The market price per common share restated in year-end 1979 dollars for the years 1979 through 1975 would have been $14.63, $19.52, $22.98, $24.04 and $21.92, respectively.

## Electric Operating Income (In thousands of dollars)

| | 1979 | 1978 | 1977 | 1976 | 1975 | 1974 | 1969 |
|---|---|---|---|---|---|---|---|
| **Revenues** | | | | | | | |
| Residential | **$ 400,936** | $348,307 | $326,035 | $284,774 | $266,077 | $232,431 | $101,097 |
| Commercial and industrial | **393,040** | 337,521 | 315,952 | 270,513 | 256,762 | 223,204 | 87,985 |
| Street and highway lighting | **12,209** | 12,743 | 12,817 | 12,619 | 12,472 | 10,869 | 8,626 |
| Other public authorities | **15,240** | 13,615 | 13,647 | 11,005 | 11,988 | 10,680 | 2,465 |
| Other utilities | **564** | 921 | 1,287 | 543 | 725 | 731 | 435 |
| Other | **5,949** | 4,885 | 3,578 | 2,747 | 2,228 | 709 | 83 |
| System revenue | **827,938** | 717,992 | 673,316 | 582,201 | 550,252 | 478,624 | 200,692 |
| Power pools | **32,860** | 20,347 | 9,681 | 7,464 | 7,719 | 7,710 | 5,852 |
| Total Revenues | **860,798** | 738,339 | 682,997 | 589,665 | 557,971 | 486,334 | 206,544 |
| **Expenses** | | | | | | | |
| Operations — fuel and purchased power | **389,622** | 294,911 | 290,576 | 238,185 | 236,329 | 219,406 | 34,190 |
| Operations — other | **89,071** | 78,328 | 72,860 | 66,101 | 59,182 | 52,841 | 31,290 |
| Maintenance | **43,587** | 37,086 | 32,665 | 32,501 | 30,164 | 24,803 | 16,431 |
| Depreciation | **47,872** | 45,217 | 39,451 | 37,399 | 35,267 | 32,604 | 22,728 |
| Operating taxes | **128,496** | 118,047 | 109,285 | 100,102 | 91,326 | 79,925 | 38,999 |
| Federal income tax — current | **(7,816)** | 1,110 | 4,800 | (4,398) | 5,655 | (3,098) | 15,235 |
| Federal income tax — deferred and other | **18,933** | 24,249 | 15,399 | 13,752 | 3,695 | 5,195 | (324) |
| Total Expenses | **709,765** | 598,948 | 565,066 | 483,642 | 461,618 | 411,676 | 158,549 |
| **Operating Income** | **$151,033** | $139,391 | $117,931 | $106,023 | $ 96,353 | $ 74,658 | $ 47,995 |

## Gas Operating Income (In thousands of dollars)

| | 1979 | 1978 | 1977 | 1976 | 1975 | 1974 | 1969 |
|---|---|---|---|---|---|---|---|
| **Revenues** | | | | | | | |
| Residential—Space heating* | **$ 93,077** | $ 88,168 | $ 75,626 | $ 74,225 | $ 61,592 | $ 52,308 | $ 38,957 |
| —other | **23,361** | 21,098 | 18,672 | 17,734 | 16,672 | 14,988 | 12,324 |
| Non-residential, firm—space heating* | **32,903** | 30,726 | 25,505 | 25,394 | 20,118 | 17,229 | 11,620 |
| —other | **17,383** | 14,742 | 12,490 | 11,874 | 10,685 | 8,927 | 6,597 |
| Total firm sales revenue | **167,224** | 154,734 | 132,293 | 129,227 | 109,067 | 93,452 | 69,498 |
| Interruptible | **15,674** | 4,127 | 7,247 | 4,217 | 2,980 | 4,564 | 2,710 |
| Total system sales revenue | **182,898** | 158,861 | 139,540 | 133,444 | 112,047 | 98,016 | 72,208 |
| Other utilities | **1,467** | 1,485 | 1,463 | 1,462 | 1,463 | 2,126 | 1,400 |
| Total sales revenue | **184,365** | 160,346 | 141,003 | 134,906 | 113,510 | 100,142 | 73,608 |
| Other revenue | **335** | 286 | 80 | 18 | 46 | 27 | 6 |
| Total operating revenue | **$184,700** | $160,632 | $141,083 | $134,924 | $113,556 | $100,169 | $ 73,614 |
| **Expenses** | | | | | | | |
| Operations—fuel | **88,794** | 70,396 | 59,889 | 54,522 | 44,126 | 31,310 | 21,359 |
| Operations—other | **29,573** | 26,056 | 24,429 | 23,162 | 21,538 | 18,984 | 15,049 |
| Maintenance | **8,619** | 7,574 | 8,270 | 6,975 | 7,000 | 6,346 | 3,868 |
| Depreciation | **6,188** | 5,975 | 5,598 | 5,338 | 5,448 | 5,368 | 4,633 |
| Operating taxes | **25,210** | 23,113 | 22,278 | 21,964 | 19,980 | 17,983 | 11,280 |
| Federal income tax—current | **5,549** | 6,187 | 3,030 | 4,626 | (918) | 2,386 | 3,962 |
| Federal income tax—deferred and other | **816** | (66) | (88) | 234 | 1,680 | (151) | — |
| Total Expenses | **164,749** | 139,235 | 123,406 | 116,821 | 98,854 | 82,226 | 60,151 |
| **Operating Income** | **$ 19,951** | $ 21,397 | $ 17,677 | $ 18,103 | $ 14,702 | $ 17,943 | $ 13,463 |

*In the heating classifications, the revenues shown cover all gas used, including heating use.

## Common Stock Data

| | 1979 | 1978 | 1977 | 1976 | 1975 | 1974 | 1969 |
|---|---|---|---|---|---|---|---|
| Income for common stock ($000) | **$128,812** | $111,305 | $104,593 | $ 86,787 | $ 66,984 | $ 47,721 | $35,324 |
| Average common shares outstanding (000) | **53,366** | 45,670 | 40,399 | 34,437 | 28,949 | 23,565 | 18,209 |
| Earned per common share | **$ 2.41** | $ 2.44 | $ 2.59 | $ 2.52 | $ 2.31 | $ 2.03 | $ 1.94 |
| Dividends paid per share | **$ 1.74** | $ 1.68¼ | $ 1.61¼ | $ 1.54½ | $ 1.49 | $ 1.46 | $ 1.28½ |
| Book value per share at year-end | **$ 18.88** | $ 19.12 | $ 18.70 | $ 17.93 | $ 17.19 | $ 17.81 | $ 15.40 |
| Common shareowners at year-end | **151,752** | 143,267 | 130,018 | 123,057 | 116,008 | 102,251 | 82,940 |

## Operating Ratios

| | 1979 | 1978 | 1977 | 1976 | 1975 | 1974 | 1969 |
|---|---|---|---|---|---|---|---|
| **Percent of Total Revenues** | | | | | | | |
| Electric | **82.3%** | 82.1% | 82.9% | 81.4% | 83.1% | 82.9% | 73.7% |
| Gas | **17.7** | 17.9 | 17.1 | 18.6 | 16.9 | 17.1 | 26.3 |
| **Percent of Electric Revenue** | | | | | | | |
| Operations expense—fuel and purchased power | **45.3%** | 39.9% | 42.5% | 40.4% | 42.4% | 45.1% | 16.5% |
| Operations expense—other | **10.3** | 10.6 | 10.7 | 11.2 | 10.6 | 10.9 | 15.2 |
| Maintenance expense | **5.1** | 5.0 | 4.8 | 5.5 | 5.4 | 5.1 | 8.0 |
| Total Operations and Maintenance Expense | **60.7%** | 55.5% | 58.0% | 57.1% | 58.4% | 61.1% | 39.7% |
| Operating Income | **17.5%** | 18.9% | 17.2% | 18.0% | 17.3% | 15.4% | 23.2% |
| **Percent of Gas Revenue** | | | | | | | |
| Operations expense—fuel | **48.1%** | 43.8% | 42.5% | 40.4% | 38.9% | 31.3% | 29.0% |
| Operations expense—other | **16.0** | 16.2 | 17.3 | 17.2 | 18.9 | 18.9 | 20.4 |
| Maintenance expense | **4.7** | 4.7 | 5.9 | 5.2 | 6.2 | 6.3 | 5.3 |
| Total Operations and Maintenance Expense | **68.8%** | 64.7% | 65.7% | 62.8% | 64.0% | 56.5% | 54.7% |
| Operating Income | **10.8%** | 13.3% | 12.5% | 13.4% | 12.9% | 17.9% | 18.3% |
| **Percent of Total Operating Income Before Income Taxes** | | | | | | | |
| Electric | **86.0%** | 85.7% | 87.0% | 83.4% | 87.2% | 79.2% | 78.3% |
| Gas | **14.0** | 14.3 | 13.0 | 16.6 | 12.8 | 20.8 | 21.7 |

## Operations and Maintenance Expense Details (In thousands of dollars)

| | 1979 | 1978 | 1977 | 1976 | 1975 | 1974 | 1969 |
|---|---|---|---|---|---|---|---|
| Total payroll and employee benefits | **$150,479** | $139,334 | $126,013 | $118,379 | $107,400 | $100,008 | $68,756 |
| Less—Charged to construction and other | **49,065** | 47,367 | 39,873 | 37,558 | 32,888 | 31,335 | 20,992 |
| Charged to operations | **101,414** | 91,967 | 86,140 | 80,821 | 74,512 | 68,673 | 47,764 |
| Fuels—electric operations | **295,428** | 244,546 | 258,988 | 216,264 | 228,151 | 224,105 | 33,942 |
| Fuels—gas operations | **88,794** | 70,396 | 59,889 | 54,522 | 44,126 | 31,310 | 21,359 |
| Purchased power costs | **108,772** | 43,564 | 30,752 | 22,916 | 8,219 | 5,664 | 248 |
| Electric fuel cost adjustment deferred | **(14,578)** | 6,801 | 836 | (995) | (41) | (10,363) | — |
| Total Fuel and Purchased Power | **478,416** | 365,307 | 350,465 | 292,707 | 280,455 | 250,716 | 55,549 |
| All other | **69,436** | 57,077 | 52,084 | 47,918 | 43,372 | 34,301 | 18,875 |
| Total Operations and Maintenance | **$649,266** | $514,351 | $488,689 | $421,446 | $398,339 | $353,690 | $122,188 |
| Employees at December 31 | **5,563** | 5,442 | 5,381 | 5,444 | 5,446 | 5,426 | 5,468 |

## Electric Operations

| | 1979 | 1978 | 1977 | 1976 | 1975 | 1974 | 1969 |
|---|---|---|---|---|---|---|---|
| **Energy** — millions of kWh | | | | | | | |
| Net generation | **11,085** | 12,739 | 12,710 | 12,450 | 12,854 | 12,795 | 10,710 |
| Power purchased and (sold) — net | **2,636** | 980 | 889 | 868 | 159 | (89) | (732) |
| Total system requirements | **13,721** | 13,719 | 13,599 | 13,318 | 13,013 | 12,706 | 9,978 |
| Company use and unaccounted for | **(1,254)** | (1,282) | (1,225) | (1,326) | (1,301) | (1,285) | (977) |
| System sales | **12,467** | 12,437 | 12,374 | 11,992 | 11,712 | 11,421 | 9,001 |
| Power pool sales | **852** | 790 | 346 | 250 | 290 | 314 | 753 |
| Total Sales | **13,319** | 13,227 | 12,720 | 12,242 | 12,002 | 11,735 | 9,754 |
| **Peak Demand** — net MW | | | | | | | |
| Station coincident demand | **2,718** | 2,899 | 2,994 | 2,566 | 2,597 | 2,553 | 2,065 |
| Purchased or (sold) | **201** | 98 | 113 | 153 | 335 | 246 | (60) |
| System Peak Demand | **2,919** | 2,997 | 3,107 | 2,719 | 2,932 | 2,799 | 2,005 |
| **Capability at Time of Peak** — net MW | | | | | | | |
| LILCO stations | **3,842** | 3,842 | 3,709 | 3,727 | 3,727 | 3,457 | 2,362 |
| Firm purchase or (sale) | **108** | 126 | 121 | 136 | 89 | — | (78) |
| Total Capability | **3,950** | 3,968 | 3,830 | 3,863 | 3,816 | 3,457 | 2,284 |
| **Fuel Consumed for Electric Operations** | | | | | | | |
| Coal — thousands of tons | **—** | — | — | — | — | — | 107 |
| Oil — thousands of barrels | **16,671** | 21,017 | 20,669 | 20,287 | 21,142 | 20,773 | 15,035 |
| Gas — thousands of mcf | **10,909** | 75 | 1,980 | 1,195 | 1,227 | 3,444 | 11,892 |
| Total — billions of Btu | **115,376** | 131,096 | 130,904 | 127,244 | 131,135 | 131,414 | 109,815 |
| Cents per million Btu | **256.1¢** | 186.5¢ | 197.9¢ | 170.0¢ | 174.0¢ | 170.5¢ | 30.9¢ |
| Mills per kWh of net generation | **266.5** | 19.20 | 20.38 | 17.37 | 17.75 | 17.52 | 3.17 |
| Heat rate — Btu per net kWh | **10,480** | 10,304 | 10,299 | 10,221 | 10,202 | 10,271 | 10,253 |

## Gas Operations

| | 1979 | 1978 | 1977 | 1976 | 1975 | 1974 | 1969 |
|---|---|---|---|---|---|---|---|
| **Energy** — thousands of mcf (1,000 Btu) | | | | | | | |
| Natural gas | **46,799** | 44,611 | 44,103 | 46,034 | 42,552 | 47,176 | 45,267 |
| Manufactured gas and change in storage | **(4)** | 19 | (11) | (77) | 105 | — | 18 |
| Total natural and manufactured gas | **46,795** | 44,630 | 44,092 | 45,957 | 42,657 | 47,176 | 45,285 |
| Gas sold | **—** | — | — | — | — | (349) | — |
| Total system requirements | **46,795** | 44,630 | 44,092 | 45,957 | 42,657 | 46,827 | 45,285 |
| Company use and unaccounted for | **(3,170)** | (2,596) | (1,377) | (2,809) | (2,143) | (2,270) | (3,084) |
| System sales | **43,625** | 42,034 | 42,715 | 43,148 | 40,514 | 44,557 | 42,201 |
| Sales to other utilities | **—** | — | — | — | — | 349 | — |
| Total Sales | **43,625** | 42,034 | 42,715 | 43,148 | 40,514 | 44,906 | 42,201 |
| **Maximum Day Sendout** — mcf (1,000 Btu) | **336,996** | 303,844 | 340,684 | 325,836 | 273,100 | 301,500 | 265,700 |
| **Capability at Time of Peak** — mcf per day | | | | | | | |
| Natural gas | **307,200** | 303,500 | 326,500 | 326,500 | 328,900 | 314,700 | 285,600 |
| Manufactured, LP or LNG gas | **142,300** | 142,300 | 148,300 | 148,300 | 148,300 | 153,300 | 79,600 |
| Total Capability | **449,500** | 445,800 | 474,800 | 474,800 | 477,200 | 468,000 | 365,200 |
| **Natural Gas Purchased** | | | | | | | |
| Electric operations — thousands of mcf | **2,726** | 75 | 1,978 | 1,195 | 1,227 | 3,444 | 11,892 |
| Gas operations — thousands of mcf | **46,103** | 43,967 | 44,638 | 45,690 | 42,535 | 46,817 | 44,372 |
| Total Natural Gas Purchased | **48,829** | 44,042 | 46,616 | 46,885 | 43,762 | 50,261 | 56,264 |
| **Calendar Degree Days** (53-year average 5,095) | **4,622** | 5,432 | 5,178 | 5,373 | 4,739 | 4,921 | 5,028 |

## Electric Sales and Customers

| | 1979 | 1978 | 1977 | 1976 | 1975 | 1974 | 1969 |
|---|---|---|---|---|---|---|---|
| **Sales**—millions of kWh | | | | | | | |
| Residential | **5,599** | 5,559 | 5,620 | 5,486 | 5,334 | 5,185 | 4,131 |
| Commercial and industrial | **6,291** | 6,259 | 6,120 | 5,905 | 5,757 | 5,621 | 4,442 |
| Street and highway lighting | **188** | 188 | 189 | 190 | 182 | 187 | 154 |
| Other public authorities | **370** | 399 | 397 | 386 | 405 | 394 | 224 |
| Other utilities | **19** | 32 | 48 | 25 | 34 | 34 | 50 |
| System sales | **12,467** | 12,437 | 12,374 | 11,992 | 11,712 | 11,421 | 9,001 |
| Power pool sales | **852** | 790 | 346 | 250 | 290 | 314 | 753 |
| Total Sales | **13,319** | 13,227 | 12,720 | 12,242 | 12,002 | 11,735 | 9,754 |
| **Customers**—monthly average | | | | | | | |
| Residential | **806,325** | 798,288 | 791,808 | 784,359 | 776,178 | 766,612 | 702,273 |
| Commercial and industrial | **81,955** | 81,071 | 80,205 | 78,535 | 77,317 | 76,108 | 66,547 |
| Others | **4,137** | 4,014 | 3,881 | 3,882 | 4,027 | 2,790 | 3,355 |
| **Customers**—total monthly average | **892,417** | 883,373 | 875,894 | 866,776 | 857,522 | 845,510 | 772,175 |
| **Customers**—total at year end | **892,772** | 885,591 | 877,022 | 869,126 | 859,527 | 848,236 | 776,680 |
| **Residential** | | | | | | | |
| kWh per customer | **6,944** | 6,964 | 7,098 | 6,994 | 6,872 | 6,763 | 5,882 |
| Revenue per kWh | **7.16¢** | 6.27¢ | 5.80¢ | 5.19¢ | 4.99¢ | 4.48¢ | 2.45¢ |
| **Commercial and Industrial** | | | | | | | |
| kWh per customer | **76,762** | 77,204 | 76,309 | 75,197 | 74,455 | 73,849 | 66,755 |
| Revenue per kWh | **6.25¢** | 5.39¢ | 5.16¢ | 4.58¢ | 4.46¢ | 3.97¢ | 1.97¢ |

## Gas Sales and Customers

| | 1979 | 1978 | 1977 | 1976 | 1975 | 1974 | 1969 |
|---|---|---|---|---|---|---|---|
| **Sales—thousands of mcf (1,000 Btu)** | | | | | | | |
| Residential—space heating* | **22,874** | 24,085 | 23,887 | 24,357 | 22,544 | 23,023 | 21,661 |
| —other | **3,496** | 3,386 | 3,396 | 3,390 | 3,368 | 3,359 | 3,260 |
| Non-residential—firm—space heating* | **8,746** | 8,851 | 8,746 | 9,092 | 8,370 | 8,780 | 7,906 |
| —other | **4,297** | 4,155 | 4,105 | 4,201 | 4,217 | 4,372 | 3,553 |
| Total firm sales | **39,413** | 40,477 | 40,134 | 41,040 | 38,499 | 39,534 | 36,380 |
| Interruptible | **4,212** | 1,557 | 2,581 | 2,108 | 2,015 | 5,023 | 5,821 |
| Total system sales | **43,625** | 42,034 | 42,715 | 43,148 | 40,514 | 44,557 | 42,201 |
| Other utilities | **—** | — | — | — | — | 349 | — |
| Total sales | **43,625** | 42,034 | 42,715 | 43,148 | 40,514 | 44,906 | 42,201 |
| **Customers**—monthly average | | | | | | | |
| Residential—space heating* | **139,671** | 137,486 | 137,580 | 137,724 | 137,461 | 136,110 | 115,941 |
| —other | **217,173** | 219,062 | 219,929 | 220,769 | 221,602 | 222,413 | 235,042 |
| Non-residential—firm—space heating* | **17,514** | 17,361 | 17,505 | 17,537 | 17,623 | 17,800 | 15,413 |
| —other | **12,867** | 13,026 | 13,218 | 13,443 | 13,646 | 13,906 | 13,897 |
| Total firm customers | **387,225** | 386,935 | 388,232 | 389,473 | 390,332 | 390,229 | 380,293 |
| Interruptible | **76** | 88 | 91 | 92 | 94 | 96 | 66 |
| **Customers**—total monthly average | **387,301** | 387,023 | 388,323 | 389,565 | 390,426 | 390,325 | 380,359 |
| **Customers**—total at year end | **387,310** | 386,091 | 386,830 | 388,147 | 389,122 | 389,260 | 380,605 |
| **Degree days**—billed | **4,612** | 5,352 | 5,277 | 5,277 | 4,660 | 4,911 | 4,988 |
| **Residential** | | | | | | | |
| mcf per customer | **73.9** | 77.1 | 76.3 | 77.4 | 72.2 | 73.6 | 71.0 |
| Revenue per mcf | **$ 4.43** | $ 3.98 | $ 3.46 | $ 3.31 | $ 3.02 | $ 2.55 | $ 2.06 |
| **Non-residential—firm** | | | | | | | |
| mcf per customer | **429.3** | 428.0 | 418.2 | 429.1 | 402.5 | 414.8 | 391.0 |
| Revenue per mcf | **$ 3.85** | $ 3.49 | $ 2.96 | $ 2.80 | $ 2.44 | $ 1.99 | $ 1.59 |

*In the heating classifications, the sales shown cover all gas used, including nonheating use.

## Balance Sheet (in thousands of dollars)

| | 1979 | 1978 | 1977 | 1976 | 1975 | 1974 | 1969 |
|---|---|---|---|---|---|---|---|
| **Assets** | | | | | | | |
| Utility Plant | **$3,611,962** | $3,167,601 | $2,775,231 | $2,398,900 | $2,097,019 | $1,825,666 | $1,100,042 |
| Less—Accumulated depreciation | **526,992** | 486,865 | 456,019 | 413,305 | 377,720 | 349,935 | 223,660 |
| Total Utility Plant | **3,084,970** | 2,680,736 | 2,319,212 | 1,985,595 | 1,719,299 | 1,475,731 | 876,382 |
| Other Property and Investments | **76,985** | 70,784 | 3,972 | 3,803 | 3,892 | 1,193 | 672 |
| Current Assets | **246,708** | 229,463 | 188,462 | 183,780 | 147,566 | 140,285 | 52,631 |
| Deferred Charges: | | | | | | | |
| Electric fuel cost adjustment deferred | **22,709** | 8,131 | 14,932 | 15,768 | 14,773 | 14,732 | — |
| Other | **28,210** | 27,599 | 19,967 | 18,775 | 17,091 | 7,548 | 2,787 |
| Total Assets | **$3,459,582** | $3,016,713 | $2,546,545 | $2,207,721 | $1,902,621 | $1,639,489 | $ 942,472 |
| **Capitalization and Liabilities** | | | | | | | |
| Capitalization | | | | | | | |
| Long-term debt | **$1,274,722** | $1,175,662 | $1,100,375 | $1,015,375 | $ 865,000 | $ 735,000 | $ 470,125 |
| Unamortized premium and discount on debt | **24** | 89 | 1,628 | 2,602 | 2,475 | 2,614 | 1,582 |
| Preferred stock—redemption required | **294,100** | 226,950 | 228,000 | 160,000 | 160,000 | 110,000 | — |
| Preferred stock—no redemption required | **160,090** | 163,499 | 166,436 | 171,431 | 144,980 | 147,006 | 92,189 |
| Common stock and premium | **821,440** | 699,425 | 571,436 | 451,078 | 356,997 | 268,540 | 164,051 |
| Capital stock expense | **(30,138)** | (28,321) | (27,110) | (18,397) | (15,180) | (9,919) | (5,000) |
| Retained earnings | **346,001** | 311,838 | 279,157 | 242,147 | 209,524 | 187,537 | 121,862 |
| Total Capitalization | **2,866,239** | 2,549,142 | 2,319,922 | 2,024,236 | 1,723,796 | 1,440,778 | 844,809 |
| Trust Obligations | **287,308** | 189,603 | 30,000 | — | — | — | — |
| Current Liabilities | **242,715** | 214,383 | 143,848 | 138,403 | 141,220 | 174,343 | 85,978 |
| Deferred Credits: | | | | | | | |
| Accumulated deferred income tax reductions | **54,901** | 49,926 | 42,835 | 35,264 | 27,519 | 19,891 | 8,209 |
| Other | **2,458** | 7,213 | 2,008 | 2,640 | 3,171 | 799 | 341 |
| Total Deferred Credits | **57,359** | 57,139 | 44,843 | 37,904 | 30,690 | 20,690 | 8,550 |
| Reserves for Claims and Damages | **5,961** | 6,446 | 7,932 | 7,178 | 6,915 | 3,678 | 3,135 |
| Total Capitalization and Liabilities | **$3,459,582** | $3,016,713 | $2,546,545 | $2,207,721 | $1,902,621 | $1,639,489 | $ 942,472 |

## Construction Expenditures (In thousands of dollars)

| | 1979 | 1978 | 1977 | 1976 | 1975 | 1974 | 1969 |
|---|---|---|---|---|---|---|---|
| **Electric** | | | | | | | |
| Production (includes construction trust) | **$362,689** | $321,181 | $279,207 | $249,045 | $215,512 | $169,043 | $24,643 |
| Transmission | **25,991** | 31,865 | 39,788 | 27,466 | 25,770 | 29,234 | 10,136 |
| Distribution: | | | | | | | |
| • New business facilities | **9,704** | 9,537 | 10,871 | 9,907 | 9,497 | 11,195 | 13,127 |
| • Other facilities | **19,163** | 16,566 | 15,400 | 15,753 | 17,923 | 23,712 | 15,884 |
| General | **1,617** | 2,716 | 1,502 | 2,016 | 936 | 1,810 | 1,953 |
| Total Electric | **419,164** | 381,865 | 346,768 | 304,187 | 269,638 | 234,994 | 65,743 |
| **Gas** | | | | | | | |
| Production and storage | **396** | 483 | 525 | 486 | 279 | 75 | 2,494 |
| Transmission and distribution: | | | | | | | |
| • New business facilities | **5,512** | 1,559 | 1,083 | 303 | 530 | 1,787 | 5,422 |
| • Other facilities | **5,338** | 5,196 | 5,507 | 5,101 | 6,118 | 4,652 | 5,248 |
| General | **2,099** | 906 | 1,133 | 938 | 264 | 500 | 725 |
| Total Gas | **13,345** | 8,144 | 8,248 | 6,828 | 7,191 | 7,014 | 13,889 |
| **Common** | | | | | | | |
| Operations centers | — | — | — | — | 11 | 97 | 1,480 |
| Other | **7,037** | 3,999 | 4,404 | 3,110 | 4,615 | 2,070 | 1,003 |
| Total Common | **7,037** | 3,999 | 4,404 | 3,110 | 4,626 | 2,167 | 2,483 |
| Total Construction Expenditures | **$439,546** | $394,008 | $359,420 | $314,125 | $281,455 | $244,175 | $ 82,115 |
| **Retirements of Utility Plant** | **$ 19,860** | $ 23,420 | $ 7,002 | $ 10,387 | $ 17,400 | $ 8,787 | $ 13,364 |

## Directors

**William J. Casey**
Counsel to Rogers & Wells
Law Firm

**William J. Catacosinos**
Chairman and
Chief Executive Officer
Applied Digital Data Systems, Inc.
Electronics

**Edward C. Duffy**
Retired Vice Chairman of the Board
Long Island Lighting Company

**Winfield E. Fromm**
Vice President
Eaton Corporation
Electronics

**Nathaniel M. Giffen**
Chairman of the Board
and Chief Executive Officer
Suffolk County Federal
Savings and Loan
Association

**Lionel M. Goldberg**
Vice President
Alexander & Alexander, Inc.
Insurance

**John D. Maxwell**
Chairman and Director
Kollmorgen Corp.
Vice President and Director
Powers Chemco, Inc.
Manufacturing

**Charles R. Pierce**
Chairman of the Board and
Chief Executive Officer
Long Island Lighting Company

**Eben W. Pyne**
Senior Vice President
Citibank, N.A.

**Wilfred O. Uhl**
President
Long Island Lighting Company

**Phyllis S. Vineyard**
Member
N.Y. Statewide
Health Coordinating
Council
Voluntary Nonprofit
Planning Agency

## Officers

**Charles R. Pierce**
Chairman of the Board
and Chief Executive Officer

**Wilfred O. Uhl**
President

**Charles J. Davis**
Senior Vice President
Engineering and Project
Management

**James W. Dye, Jr.**
Senior Vice President
Operations, Transmission/
Distribution and Purchasing

**Frank C. Mackay**
Senior Vice President
Commercial Operations

**Thomas H. O'Brien**
Senior Vice President
Finance

**Joseph G. Acker**
Vice President
Transmission/Distribution and
Service Operations

**Hugh P. Boylan**
Vice President
Purchasing

**Matthew C. Cordaro**
Vice President
Engineering

**Ira L. Freilicher**
Vice President
Public Affairs

**John R. Gummersall, Jr.**
Vice President
Operations and Construction

**Matthew S. Procelli**
Vice President
Employee Relations

**John J. Russell**
Vice President
Customer Relations

**Andrew W. Wofford**
Vice President
Project Management

**Michael Czumak**
Controller

**Edward W. Eacker**
Treasurer

**Raymond J. Forrer**
Associate Controller

**John J. Kearney, Jr.**
Secretary

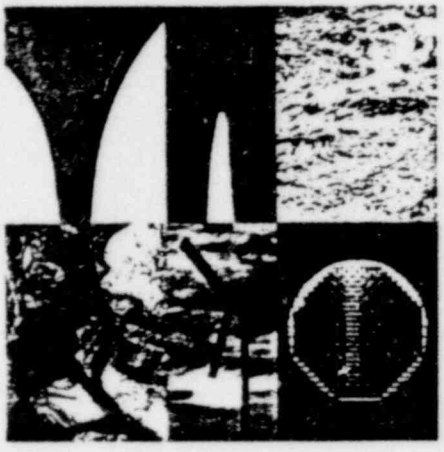
**Kathleen M. Brown**
Assistant Secretary

**Edward M. Barrett**
General Counsel

**Edward J. Walsh, Jr.**
General Attorney

**Francis M. Walsh**
General Claims Attorney

# COVER



A new energy decade beckons.

Prime energy sources—fossil fuels, hydroelectric and nuclear—form the long-established power generation mix Niagara Mohawk will continue to deploy for the most efficient generation of electricity. At the same time, our firm commitment to developing alternate energy sources—the sun and wind included—will prevail as we enter the 1980s.

# OUR SERVICE AREA

With the largest and most diverse service territory in New York State, Niagara Mohawk Power Corp. is recognized as one of the nation's major investor-owned utilities. Electricity from our massive system, extending from Lake Erie to New England's borders, to Canada and Pennsylvania, serves the energy needs of 1,348,000 customers. Our natural gas system serves 416,000 customers in central, eastern and northern New York, nearly all within our electric service area. Two Canadian subsidiaries, St. Lawrence Power Company and Canadian Niagara Power Company, Ltd., provide electric service to parts of southern Ontario. Our corporate headquarters is 300 Erie Boulevard West, Syracuse, N.Y. 13202.

ELECTRIC SERVICE AREA


GAS SERVICE AREA


# INVESTOR NOTES

**Annual Meeting**
The annual meeting of stockholders will be held on May 6, 1980 at the Company's principal office in Syracuse. A formal notice of meeting, proxy statement and proxy form will be sent to holders of common stock in early April.

**Transfer Agents**
*Preferred Stock and Preference Stock:*
Marine Midland Bank—New York
2 Broadway, New York, N.Y. 10004

*Common Stock:*
Morgan Guaranty Trust Company of New York
30 W. Broadway, New York, N.Y. 10015

**Disbursing Agent**
*Preferred, Preference and Common Stocks:*
Niagara Mohawk Power Corporation
300 Erie Boulevard West
Syracuse, N.Y. 13202

**Stock Exchanges**
*Common and Certain Preferred Series:*
Listed on New York Stock Exchange

*Common Stock:*
Also traded on Amsterdam (Netherlands), Boston, Cincinnati, Detroit, Midwest, Pacific Coast and PBW stock exchanges.

**Ticker Symbol: NMK**

**Form 10-K Report**
A copy of the Company's Form 10-K report filed annually with the Securities and Exchange Commission is available after March 31, 1980 by writing the Vice President and Treasurer at 300 Erie Boulevard West, Syracuse, N.Y. 13202.



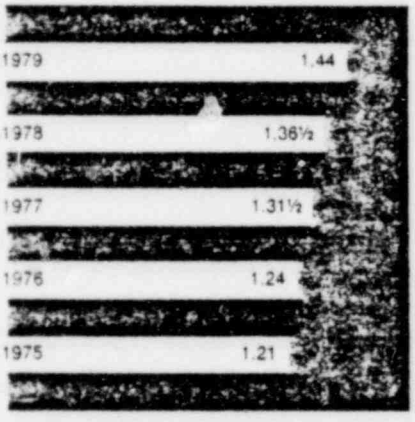
Printed in U.S.A.

# HIGHLIGHTS OF 1979

| | 1979 | 1978 | % Change |
|---|---|---|---|
| Total operating revenues | $1,516,503,000 | $1,280,248,000 | 18 |
| Income available for common stockholders | $ 128,186,000 | $ 112,502,000 | 14 |
| Earnings per common share | $2.00 | $1.89 | 6 |
| Dividends per common share | $1.44 | $1.36½ | 5 |
| Common shares outstanding *(average)* | 63,976,000 | 59,661,000 | 7 |
| Utility plant *(gross)* | $4,218,528,000 | $3,905,374,000 | 8 |
| Gross additions to utility plant | $ 374,530,000 | $ 316,280,000 | 18 |
| Kilowatt-hour sales to customers | 33,315,000,000 | 32,382,000,000 | 3 |
| Electric customers at end of year | 1,348,000 | 1,336,000 | 1 |
| Electric peak load *(kilowatts)* | 5,641,000 | 5,485,000 | 3 |
| Natural gas sales to customers *(dekatherms)* | 96,618,000 | 98,002,000 | (1) |
| Gas customers at end of year | 416,000 | 413,000 | 1 |
| Maximum day gas sendout *(dekatherms)* | 750,666 | 655,408 | 15 |

DIVIDENDS PER COMMON SHARE

Dollars

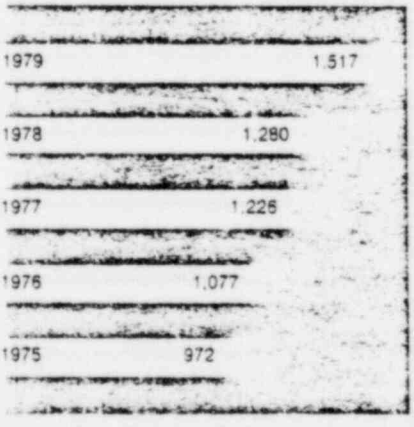



EARNINGS PER COMMON SHARE

Dollars


TOTAL OPERATING REVENUES

Millions of dollars




# CONTENTS

# TO OUR STOCKHOLDERS

We achieved a moderate improvement in our earnings in 1979, as they reached $2.00 per common share compared to $1.89 per share in the prior year.

**A portion of this 6% rise** can be attributed to a $16.2-million annual rate adjustment approved by the N.Y. State Public Service Commission and put into effect during the first quarter. Despite this modest increase, double-digit inflation again continued to overwhelm our strongest cost control efforts and we were compelled to pursue further rate improvement. In April 1979, we filed for electric and natural gas rate increases of $180.1 million. The Commission's decision was expected as this report neared publication. As in previous years, we shall continue to file for increased rates whenever the need arises—not only to provide you with a fair return on your investment as a stockholder but to maintain the reliable, efficient energy services which our consumers expect.

During the year, electric sales increased 2.9% while gas sales decreased 1.4% due to warmer than normal weather.

Presently, our best forecasts indicate that Niagara Mohawk's annual electric growth rate into the 1990s will be only about half that projected from the early 1970s, before OPEC's oil embargo, inflation and the general economic slowdown which has hurt N.Y. State and our service area. Even with the reduced prospects we must plan and construct new generation and related electric facilities to meet the energy requirements of our consumers, whatever the future may hold.

**To that end, Unit No. 6 at our Oswego Steam Station** produced its first electricity in 1979. This jointly owned 850,000-kilowatt addition to our diverse generation mix will help lower requirements for purchased power at peak load periods and improve reliability through expansion of our power reserve margin.

We anticipate announcement soon of the final Master Energy Plan for New York State, administered by the State Energy Office. This long-awaited blueprint will have a significant future bearing on Niagara Mohawk, particularly on scheduling and siting of generation and transmission projects. Its treatment of proposed nuclear-electric units should be especially relevant to us in the years ahead.

**Our commitment to nuclear technology is no less firm** today than before events at the Three Mile Island nuclear plant. Three Mile Island has strengthened our dedication and motivation to advance nuclear power's well-established safety and performance record to as close to perfection as humanly possible. Some of these efforts are discussed in detail on page 7.

Total project completion of the jointly owned Nine Mile Point Nuclear Unit No. 2 reached the halfway mark in 1979. However, because of regulatory uncertainties affecting the nuclear industry and possible modifications required in the construction and operation of nuclear plants, we are in the process of revising our entire construction schedule for completion of the plant in 1986. This two-year extension will accommodate necessary modifications to the reactor's containment and radiation protection structures, further geological studies and new requirements expected from the Nuclear Regulatory Commission arising from the Three

John G. Haehl, Jr.

Mile Island incident. As a result, manpower and engineering design work have been temporarily reduced pending resolution of probable modifications. We do not expect any power supply difficulties related to the delay, and we will strive as ever to maintain adequate electric power sources for customer needs at all times.

We were pleased with a decision by the State Board on Electric Generation Siting and the Environment giving us a go-ahead to build an 850,000-kilowatt coal-fired unit on Lake Erie, south of Dunkirk. The ruling followed many months of public hearings and exhaustive legal and environmental proceedings. The Board indicated approval of a second proposed unit would be contingent on proof of need, either by Niagara Mohawk alone or in concert with other utilities. We feel confident that this principal power producer can be constructed and operated without harm to air, land or water quality. We are especially sensitive and concerned over the vital grape-growing industry in the region.

As the new year began, announcement by the State Board on Electric Generation Siting disallowing construction of the proposed Sterling Nuclear Station came to us as a severe disappointment. Sterling's design was part of the Standardized Nuclear Unit Power Plant System Program already approved by the U.S. Nuclear Regulatory Commission. We firmly believe this project, of which Niagara Mohawk owned 22%, would have been totally compatible with the environment. Moreover, it would have provided significant economic benefits for upstate New York consumers besides reducing foreign-oil dependence and helping to assure stable energy supply in the decades ahead. Together with the co-owners, we have filed with the Public Service Commission to recover our investment in the Sterling project.

In a similar vein, references appear throughout this report to other difficulties and costly delays stemming from regulatory influences over every facet of our business. Of particular note are some of the barriers we must clear to expand our hydroelectric capacity on waterways in our system, discussed on page 8.

**Financing during the year included the public sale of 3.5 million shares** of common stock and issuance of $100 million of 25-year mortgage bonds. Financing requirements for 1980 are expected to exceed $270 million, including receipts from common stock sales through our Dividend Reinvestment and Stock Purchase Plan and the Employee Savings Fund Plan. Construction needs and refunding of $80 million of 30-year bonds will make 1980 a heavy financing year.

The proposal of the Town of Massena to acquire by condemnation major parts of our electric distribution system in Massena remains undecided as various courts and the Federal Energy Regulatory Commission consider matters in the case.

**We value the loyalty of our employees and stockholders** more than ever as we enter the decade of the Eighties. Your continuing support is deeply appreciated.

John G. Haehl, Jr.
*President and Chief Executive Officer*

February 1, 1980

# FINANCIAL REVIEW

Niagara Mohawk's earnings in 1979 were $2.00 per share, up 11¢ over 1978 when fewer shares were outstanding. The following factors, which may not be indicative of future operations or earnings, have had a significant effect upon the results of operations during 1978 and 1979:

Total revenues were $1.517 billion in 1979, an increase of $236 million or 18.5% for the year. Operating revenues increased significantly in 1979, primarily the result of: (1) recovery of increased energy and purchased gas costs through the electric and gas adjustment clauses of the Company's tariffs, (2) base rate increases and (3) increased electric sales. Gas sales decreased due to warmer than normal weather during the last few months of 1979. The tables on page 5 show changes in electric and gas revenues and sales.

**The Company's electric revenues increased** $191 million in 1979, to $1.211 billion, compared with a rise of $33 million in 1978. Electric sales to ultimate consumers in 1979 were up 2.0% over 1978. Residential sales rose by 1.7%, while sales to commercial and industrial customers showed increases of 1.8% and 2.3%, respectively.

At year end, our customers numbered 1,348,000, some 12,000 more than in 1978. The average price per kilowatt-hour paid by residential consumers was 4.33¢ in 1979, compared with 3.93¢ in 1978, a rise of 10.2%, while the Consumer Price Index climbed 13.3%.

**A new electric peak load of 5,641,000 kilowatts** was recorded on February 14, 1979, some 156,000 kw over the 1978 peak.

**A $46 million increase in natural gas revenues** was noted in 1979, compared with a rise of $22 million in 1978. The change resulted primarily from price increases authorized by the Federal Energy Regulatory Commission to Consolidated Gas Supply Corp., our only supplier of gas, and recovered from customers through the gas adjustment clause.

Total gas sales for the year fell 1.4% in 1979, against a climb of 5.0% in 1978. Residential customers led the decline with a decrease of 5.3% and commercial sales decreased 1.3%, while industrial sales increased 9.5%. The lower gas usage was due to warmer than normal weather partially offset by conversions to gas for heating because of its price advantage over other fuel sources. Gas customers numbered 416,000 at the end of 1979, up 3,000 over 1978. The average revenue per unit of use (dekatherm) for residential customers was $3.40, 17.6% more than in 1978.

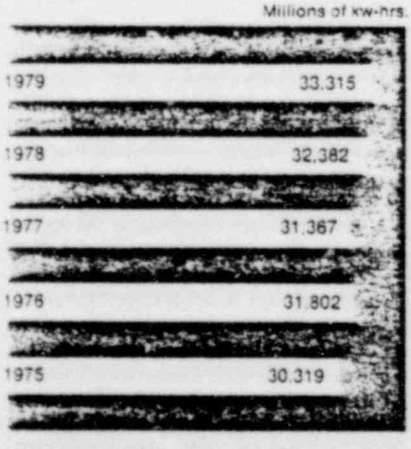
**We filed with the New York State Public Service Commission (PSC)** on April 6, 1979 for a total $180.1 million in electric and natural gas rate increases, based on forecast operations for the rate year ending March 31, 1981. The request was for an overall 13.6% revision, including $159.7 million (15.5%) electric and $20.4 million (7.0%) gas, all within Federal price guidelines.

In early December, the Administrative Law Judge in the case recommended that electric rates be allowed to increase $91.3 million annually and gas rates be allowed to rise $800,000 per year supplemented by accounting procedures designed to partially offset the immediate need for higher revenues. The interim recommendation was far short of our request and we took strong exception to it in our response to the Commission. Because of the nearly year-long regulatory proceedings for any rate case, any increase, as finally determined by the PSC, is not expected to go into effect until March 1980.

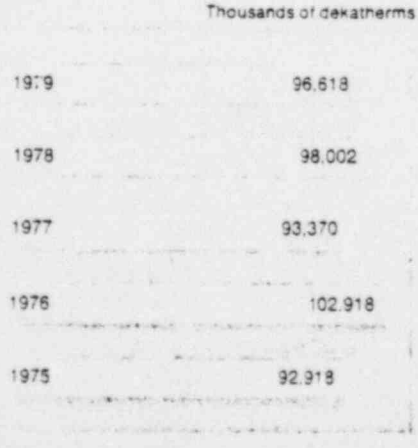
**In 1978, the Company petitioned the Commission** for a reopening of an earlier electric rate case on the basis of changes in demand for electricity which had caused Niagara Mohawk's forecast of sales and revenues for the first rate year ending June 30, 1979 to be overstated. The PSC granted the petition and on March 14, 1979 we were allowed to increase electric rates by $16.3 million yearly.

**In 1979, the cost of fuel for electric generation went up $69 million** and electricity purchased rose $60 million. These added costs were due to higher unit costs of fuel and purchased power and to necessary reliance on higher-cost sources of power during the shutdown of Nine Mile Point Nuclear Station for scheduled refueling and maintenance. Through our energy and pur-

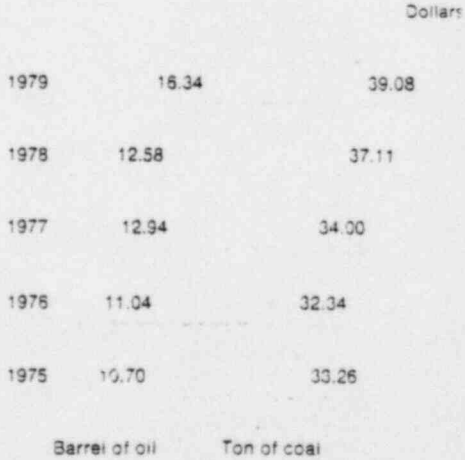
ELECTRIC SALES




GAS SALES




AVERAGE COST OF FUEL BURNED



ELECTRIC

| Revenues | Increase (decrease) from prior period in millions of dollars 1979 | 1978 |
|---|---|---|
| Increase in base rates | $ 24.5 | $14.9 |
| Fuel and purchased power cost increases | 108.8 | (2.6) |
| Sales to ultimate consumers | 20.7 | 16.7 |
| Sales to other electric systems | 23.7 | 0.8 |
| Miscellaneous operating revenues | 13.1 | 2.8 |
| | $190.8 | $32.6 |

| Class of Service | % of total electric revenues | % increase from 1978 Electric revenues | Kilowatt-hours |
|---|---|---|---|
| Residential | 29.5 | 11.9 | 1.7 |
| Commercial | 32.5 | 17.8 | 1.8 |
| Industrial | 25.8 | 20.9 | 2.3 |
| Municipal service | 2.0 | 10.8 | (0.7) |
| *Total to ultimate consumers* | 89.8 | 16.5 | 2.0 |
| Other electric systems | 6.9 | 39.9 | 13.0 |
| Miscellaneous | 3.3 | 48.0 | — |
| | 100.0% | 18.7 | 2.9 |

GAS

| Revenues | Increase (decrease) from prior period in millions of dollars 1979 | 1978 |
|---|---|---|
| Increase in base rates | $ 4.6 | $ 2.2 |
| Purchased gas cost increases | 42.3 | 9.8 |
| Gas sales | (1.4) | 9.9 |
| | $45.5 | $21.9 |

| Class of service | % of total gas revenues | % increase from 1978 Gas revenues | Dekatherms |
|---|---|---|---|
| Residential | 57.8 | 11.3 | (5.3) |
| Commercial | 23.3 | 17.0 | (1.3) |
| Industrial | 15.1 | 42.7 | 9.5 |
| *Total to ultimate consumers* | 96.2 | 16.7 | (1.8) |
| Other gas systems | 3.3 | 46.0 | 9.2 |
| Miscellaneous | 0.5 | 15.3 | — |
| | 100.0% | 17.5 | (1.4) |

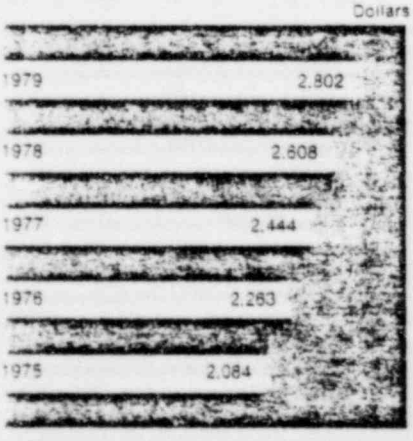
chased gas adjustment clauses, the higher costs of fuel, purchased power and purchased gas related to sales to ultimate consumers eventually result in higher revenues. Such higher costs associated with sales to neighboring utilities are recovered immediately in prices charged to them.

**The cost of gas purchased climbed** $38 million in 1979, compared with a $16 million increase in 1978. The increases reflect the effects of the Natural Gas Policy Act, enacted by the Congress in 1978, and renegotiation of a 10-year contract between El Paso Corp., Consolidated's liquefied natural gas (LNG) supplier, and Sonatrach, Algeria's national oil and gas company. The Natural Gas Policy Act gradually phases out domestic price controls at the wellhead to create incentives for further exploration and drilling of new wells to improve gas supplies. LNG forms about 15% of Consolidated's supply, and its higher cost in turn adds to the price of gas purchased by Niagara Mohawk and sold to customers.

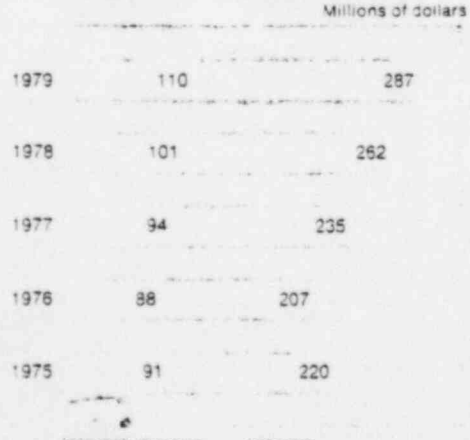
Increases in other operating expenses of $19 million in 1979 and $16 million in 1978 are largely due to wage increases and a rise in prices paid for materials and supplies. Maintenance expenses for 1979 were $19 million above those in 1978, largely the result of work performed at the Company's nuclear plant during refueling and higher levels of maintenance required at our steam generating stations and on our electric distribution system.

**Federal and Canadian income taxes (net) rose** $1 million in 1979 and $2 million in 1978. The 1979 increase is the result of an increase in deferred federal income taxes which was partially offset by a decrease in current federal income tax expense. The 1978 increase was attributable to higher taxable earnings. (See Note 10 to the Consolidated Financial Statements.)

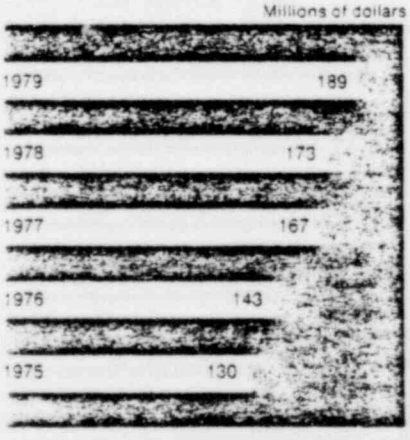
AVERAGE GROSS ELECTRIC UTILITY PLANT PER ELECTRIC CUSTOMER




INCOME (BEFORE INTEREST AND INCOME TAXES) AND INTEREST CHARGES




TOTAL TAXES, INCLUDING INCOME TAXES



| In thousands of dollars | Change from 1978 | | |
|---|---|---|---|
| $534,385 | 12% | 35¢ | Residential customers |
| 464,312 | 18 | 31¢ | Commercial customers |
| 359,093 | 23 | 24¢ | Industrial customers |
| 158,713 | 37 | 10¢ | All others |

THE 1979 REVENUE DOLLAR AND WHERE IT WENT

| | | In thousands of dollars | Change from 1978 |
|---|---|---|---|
| Fuel for production of electricity | 25¢ | $380,101 | 22% |
| Wages, salaries, employee benefits | 13¢ | 198,469 | 12 |
| Gas purchased | 13¢ | 196,711 | 24 |
| Income and other taxes | 12¢ | 188,758 | 9 |
| Electricity purchased | 11¢ | 159,453 | 60 |
| Interest and other costs—net | 10¢ | 152,769 | 9 |
| Dividends to stockholders | 8¢ | 119,980 | 9 |
| Depreciation | 6¢ | 84,212 | 4 |
| Retained in business | 2¢ | 36,050 | 20 |

Allowance for funds used during construction increased $13 million in 1979 and $11 million in 1978 due to higher amounts of construction work in progress and additionally in 1979, due to higher accrual rates being charged. The increase in other interest of $3 million in 1979 reflects both the need for greater short-term borrowing to temporarily finance the construction program and a drastic rise in interest rates during the year.

**Preferred and common stock dividends were paid** on March 31, June 30, September 30 and December 31. We presently estimate that 65% of the 1979 common stock dividends is a return of capital and therefore is not taxable as dividend income for income tax purposes. The remaining percentage on common dividends and 100% of preferred stock dividends are taxable as dividend income.

The table below shows dividends per share for our common stock and quoted market prices:

| 1979 | Dividend paid per share | Price range High | Low |
|---|---|---|---|
| 1st quarter | $ .36 | $15⅜ | $13½ |
| 2nd quarter | .36 | 14⅛ | 13 |
| 3rd quarter | .36 | 14⅞ | 12¾ |
| 4th quarter | .36 | 14 | 12 |
| | $1.44 | | |
| **1978** | | | |
| 1st quarter | $ .33½ | $15¾ | $14½ |
| 2nd quarter | .33½ | 15 | 13¾ |
| 3rd quarter | .33½ | 15⅛ | 13¾ |
| 4th quarter | .36 | 14⅞ | 13⅝ |
| | $1.36½ | | |

**1979 financing included the public sale of 3.5 million shares** of Niagara Mohawk common stock at the approximate market price of $13¼ per share, 2.3 million common shares sold through our Dividend Reinvestment and Stock Purchase Plan and Employee Savings Fund Plan and a total of $100 million of 25-year mortgage bonds issued through private placement at the comparatively favorable rate of 9.95%. Proceeds from these sales provided construction funds.

In the fourth quarter, interest rates rose sharply to record high levels for both short and long-term financings. In 1980, we must refund $80 million of bonds coming due which were issued 30 years earlier at interest rates under 3%. The average interest rate for all debt outstanding at the end of December was about 7.4%. High priority in rate increase filings is given to seeking an adequate earnings level on stockholders' investment and improving our current bond credit ratings of A and A-minus from key rating agencies.

**To broaden our financing opportunities,** we have established Niagara Mohawk Finance N.V., in the Netherlands Antilles. This subsidiary will give us access to the Eurodollar market to obtain capital needed for construction projects. Overseas financing is desirable when the Eurodollar market offers lower interest rates than in the U.S. The Company will still have to obtain Public Service Commission approval for each borrowing, as with domestic financing. The PSC authorized formation of the subsidiary in 1979.

**Productivity gains and new efficiency measures** were again noted at Niagara Mohawk during the year. Especially significant was the revamping of our Information Systems Department into the new Management Systems and Services Department. Its expanded activities are expected to yield gross annual savings of about $5 million beginning in 1986 due to startup of several new computer systems. Project teams have been organized to begin work on the first of these, including customer, corporate and construction and maintenance systems.

**The cost impact of regulation upon virtually all aspects** of our business, especially environmental affairs, is growing more pronounced every year. Proceedings, for instance, in the New York State "Article VIII" siting law for proposed power generating facilities cost the Company $2.7 million in 1979. Since 1976, when we filed for certification for our planned Lake Erie Generation Station, we have spent over $17.3 million solely for environmental and legal affairs in the case. This includes an estimated $2 million just for analyses of projected effect of the station upon regional grape crops. Regulatory requirements, including environmental assessments for our hydroelectric expansion program alone, amounted to some $300,000 during the year. All of these costs of doing business are borne by our customers. ■

# NUCLEAR ACTIVITIES

The accident at the Three Mile Island nuclear plant in Pennsylvania in March 1979 fostered a number of measures by Niagara Mohawk and others in the industry to further safety refinements and promote nationwide public understanding of nuclear energy.

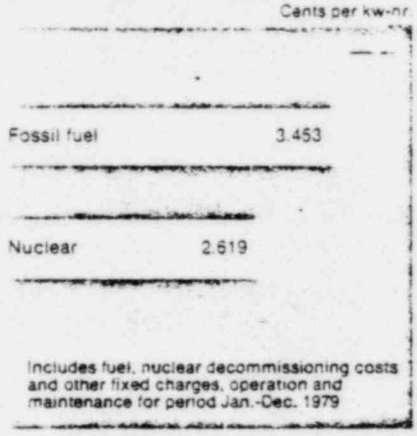
**Foremost among these was the creation by the industry of two new organizations,** the Institute of Nuclear Power Operations to achieve improved operator training and to audit and evaluate safety programs, and the Nuclear Safety Analyses Center to serve as a clearing house for Three Mile Island study results.

Based at Electric Power Research Institute headquarters in Palo Alto, California, the Center will disseminate the results of safety reviews and analyses to reactor owners and other groups. In addition, preliminary studies have begun jointly by Niagara Mohawk and other utilities to learn the feasibility of establishing an insurance pool to cover costs of replacement power in case of an emergency at a nuclear power plant.

**December 1979 marked the tenth anniversary of operation** for Niagara Mohawk's Nine Mile Point Nuclear Station Unit No. 1. Recognized throughout the industry for its safety and fine performance record, the 610,000-kilowatt unit has produced some 32.4 billion kilowatt-hours over the past decade. Generating the same power from fossil fuels over that period would have taken 54 million barrels of oil or 14 million tons of coal. The station was cited in 1979 by General Electric Company for attaining the highest combined availability and capacity factors of any boiling water reactor in the U.S. in 1978. The unit was available for service 347 days out of 365 days and produced 86% of the power it would have generated had it been operating at full output for the entire 12 months.

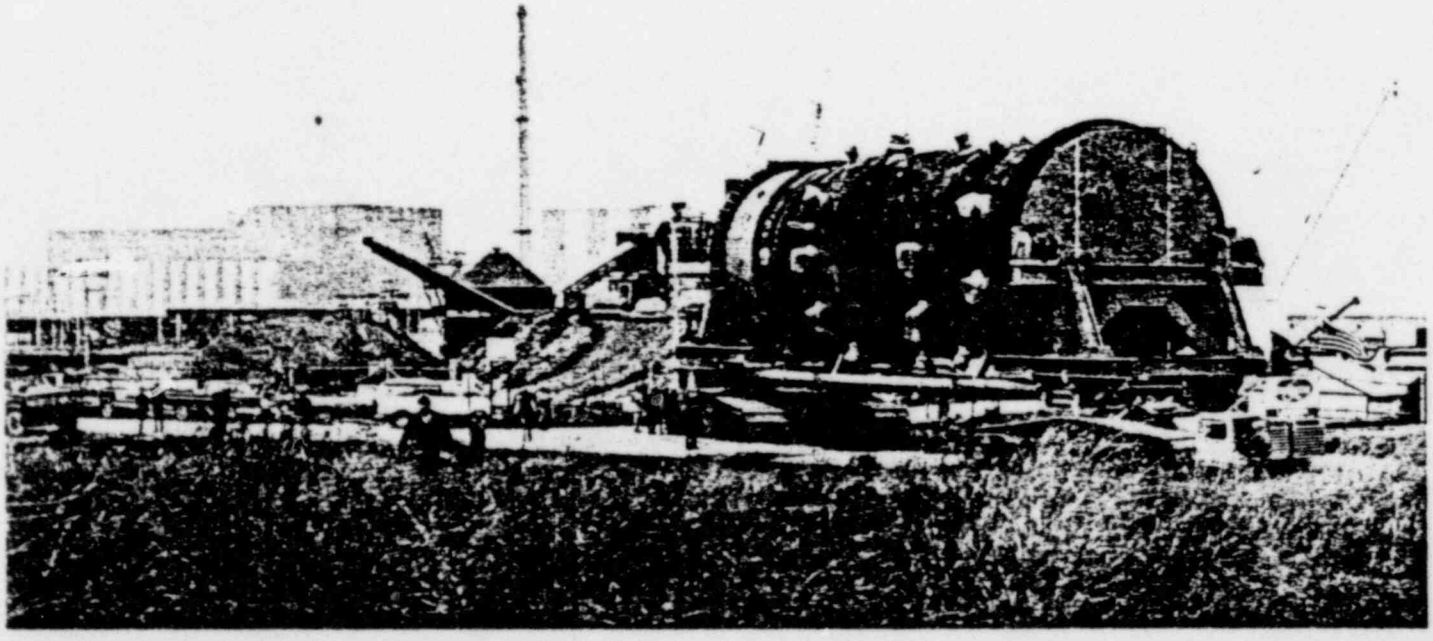
With startup now scheduled in late 1986, we are now halfway toward total project completion at our 1.08 million-kilowatt nuclear unit No. 2 at Nine Mile Point on Lake Ontario. In late 1979, the unit's 1,100-ton reactor pressure vessel arrived at the plant site following shipment by barge over the Great Lakes some 2,000 miles from Memphis, Tennessee. In December and again in early 1980 major reductions in work force were conducted at the site, not only to accommodate winter weather conditions but also to enable completion of studies to re-examine the work program in light of current regulatory uncertainties at both federal and state levels. Shares owned in the unit include Niagara Mohawk 41%, Long Island

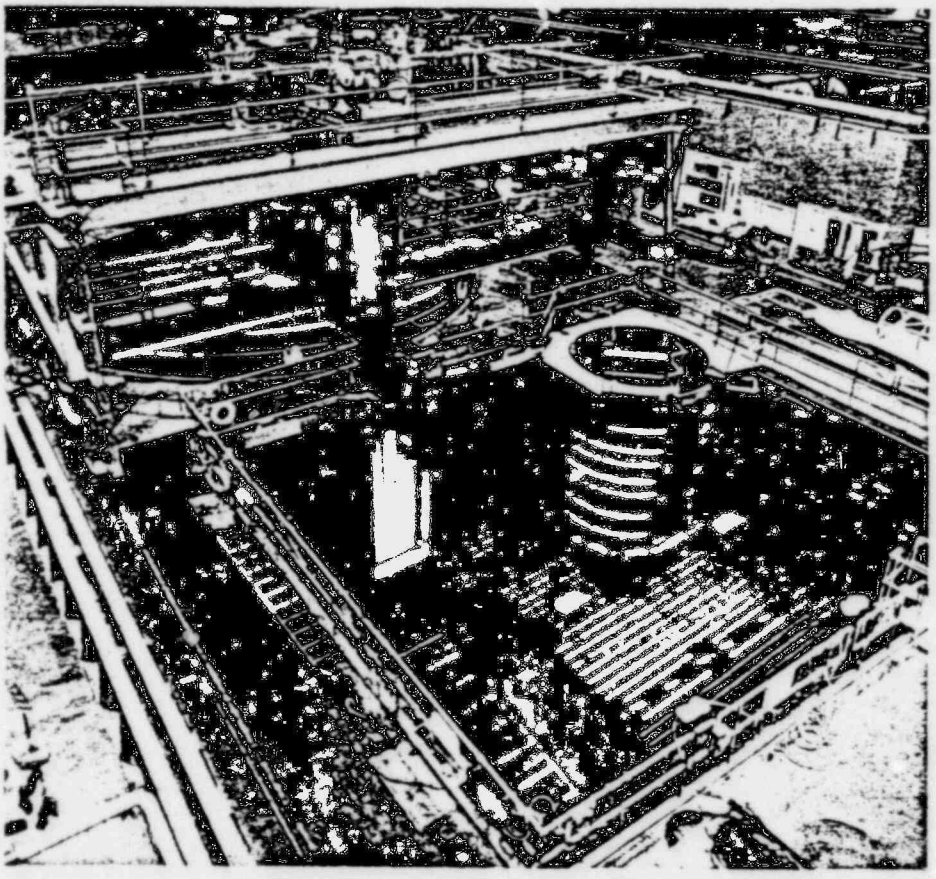
TOTAL GENERATING COSTS: FOSSIL FUEL VS NUCLEAR




Includes fuel, nuclear decommissioning costs and other fixed charges, operation and maintenance for period Jan.-Dec. 1979

Giant 1,100-ton boiling water reactor vessel, mounted on crawlers, inches toward 1.08 million-kilowatt Nine Mile Point Nuclear Unit No. 2 construction site on Lake Ontario after 2,000-mile barge trip up Mississippi River and across Great Lakes. Large building in background at left is our 610,000-kilowatt nuclear Unit No. 1.





View of refueling operation at Nine Mile Point Nuclear Unit No. 1 shows spent fuel rods being removed from uncapped reactor, upper left, for transfer to storage pool. In service since 1969, unit has been cited for outstanding performance.

Lighting Co. 18%, New York State Electric & Gas Corp. 18%, Rochester Gas and Electric Corp. 14%, and Central Hudson Gas & Electric Corp. 9%.

**Early in 1980,** the New York State Board on Electric Generation Siting and the Environment withdrew its originally issued certificate of environmental compatibility and public need for a 1.15 million-kilowatt nuclear unit planned jointly at Sterling, near Lake Ontario. We are studying the Board's decision and reviewing our plans before making alternate decisions to replace this lost generation. Niagara Mohawk was to receive 22% of the plant's output, with Rochester Gas & Electric, lead utility in the project, receiving 28%. Central Hudson's share was 17% and Orange and Rockland Utilities, Inc. 33%.

To assure future supply of fuel for our nuclear operations at Nine Mile Point, N M Uranium, Inc., a Niagara Mohawk subsidiary, owns half a uranium mine in southern Texas. United States Steel Corp. owns the other half and manages operation of the facility, the largest solution mining development in the world. The N.Y. State Public Service Commission has ruled that our electric rates must reflect the cost of NMU uranium at either production cost or the market price, whichever is lower. The first full year of operation of the expanded facilities was 1979, with production exceeding 900,000 pounds. The PSC ruling and the revision of the startup date of Nine Mile Point Nuclear Station Unit No. 2 resulted in the sale of $36 million of NMU-produced uranium during 1979. Proceeds from sales at the mine were applied to cover operating expenses and to reduce the investment in NMU, thereby reducing associated financing costs. ■

# HYDRO PROGRESS

Despite another year of unanticipated regulatory hurdles in hydroelectric project work, we are moving ahead with an extensive expansion program to add some 205,000 kilowatts of water-powered energy to our system.

**Most of this effort entails development of the upper Hudson River basin** (146,000 kilowatts), while the remainder includes northern and central New York waterways. The largest project consists of a new dam and powerhouse to generate 60,000 kilowatts at Hudson Falls, and we plan to file an application for this development with the Federal Energy Regulatory Commission in early 1980. Its on-line target date is the mid-1980s.

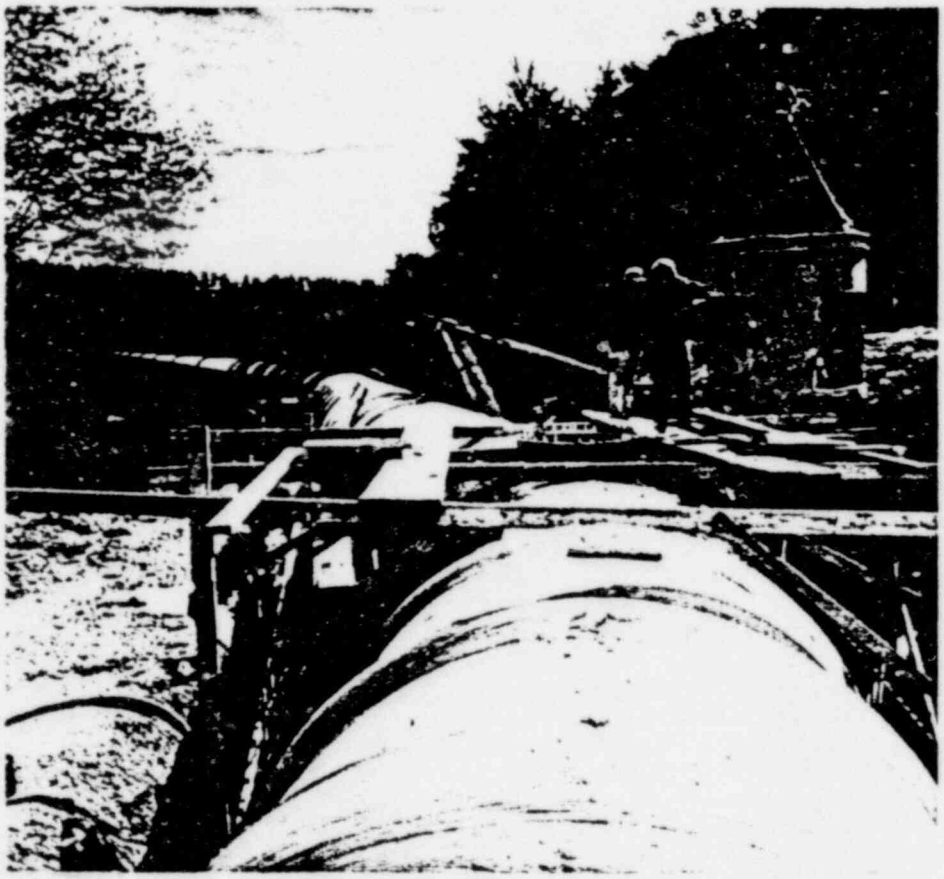
**Because of regulatory delays over water quality certification,** plans to replace the 65-year-old Granby Hydro Station on the Oswego River were set back by at least a year in 1979. The first project in our hydro expansion plan, Granby will have its 3,000-kilowatt unit replaced with a new 10,000-kilowatt

facility. Its rescheduled commercial startup is 1983.

Besides hydro areas pinpointed in our expansion program, constantly rising coal, oil and nuclear fuel prices are making previously marginal hydro prospects look more and more economically feasible. Weighing these factors, we are continually re-examining rivers and streams in our service territory for future kilowatt potential.

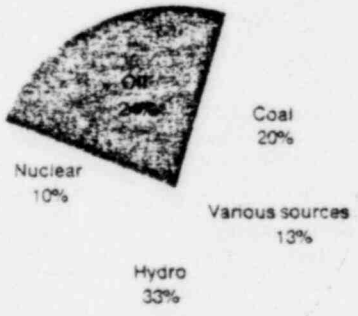
**Niagara Mohawk is involved in joint, cooperative hydro plans with other parties,** primarily communities and private firms. In an especially unique arrangement, the City of Little Falls, Burrows Paper Co. and Niagara Mohawk completed a hydro feasibility study in 1979 and are currently evaluating a proposal to build an 8,000 to 11,000-kilowatt station on the Mohawk River. Also, with the State Energy Research and Development Authority, we are examining a proposal to reactivate a retired hydro project on the Barge Canal in Western New York.

Recent experience has shown that, not unlike conditions for future fossil fuel generation plans, considerable delay in scheduling hydro power units can arise over a variety of environmental concerns. Historically, however, Niagara Mohawk has earned much favorable recognition for its stewardship of many thousands of acres of prime forestland at hydro installations. As long ago as the early 1900s, from reforestation and tree farming on the Black and Salmon Rivers to creation of public campsites and recreation areas at our Raquette and Sacandaga projects, we have always placed high priority on land and water quality and will continue to do so. ■



Renovation at 70-year-old Ephratah Hydro Station, left, near Gloversville, involves pouring thousands of tons of concrete for new dam walls at 5,150-kilowatt plant while modern fiberglass piping, above, replaces penstock serving 50-year-old, 8,000-kilowatt Moshier Hydro Station east of Watertown. Hydro plants owned and leased by Niagara Mohawk generated some 3.6 billion kilowatt-hours in 1979, saving equivalent of 6.1 million barrels of imported oil.

ELECTRICITY GENERATED AND PURCHASED BY TYPE OF FUEL

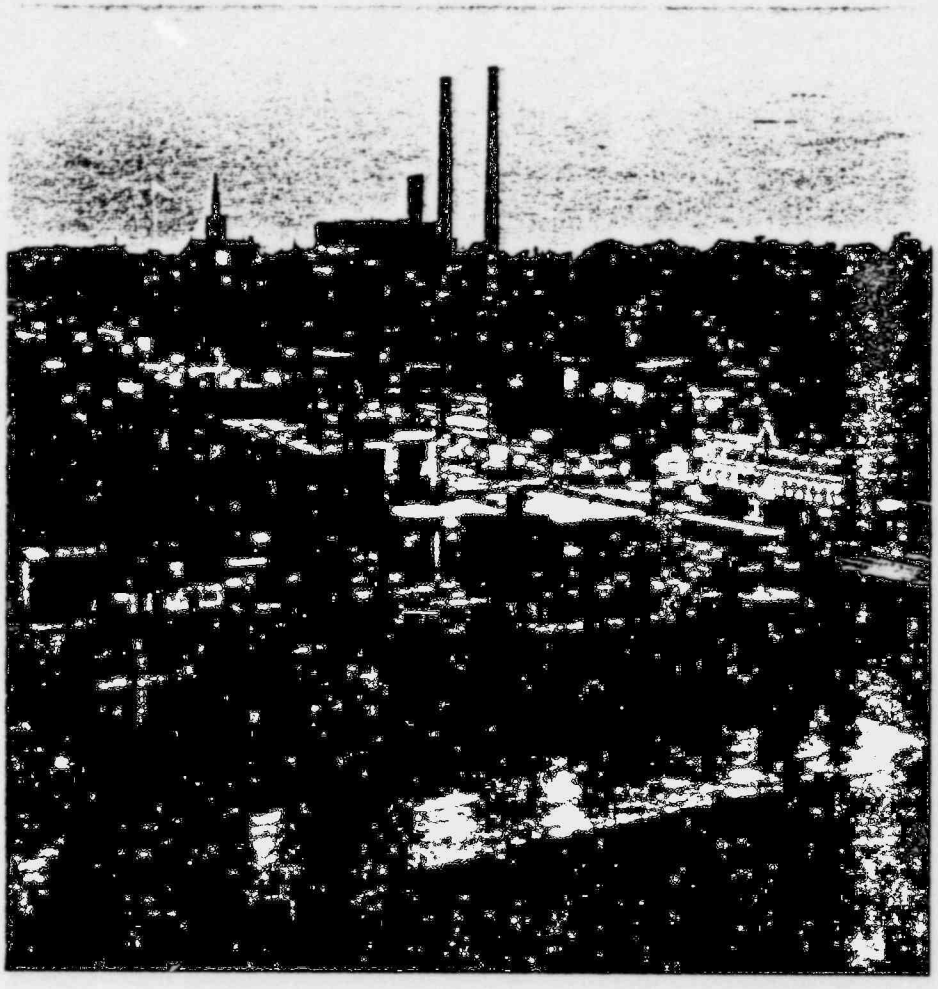


# FOSSIL FUELS IN OUR ENERGY MIX

Unit No. 6 at Oswego Steam Station, a new oil-fired 850,000-kilowatt project we began constructing more than a year before OPEC's oil embargo of 1973, produced its first electricity in December 1979.

**The unit is the latest addition to our generation mix** and its ownership and output are shared, with Niagara Mohawk holding 646,000 kilowatts (76%) and Rochester Gas & Electric Corp. 204,000 kilowatts (24%) of net capability. Construction costs, excluding financing costs, amount to only $300 per installed kilowatt, substantially less than for any steam-electric plant planned in New York State over the next decade. It will not only increase our reserve margin, but also will cut costs during peak load periods, compared with more expensive purchased power or gas turbine capacity.

**The year also saw completion of rail line facilities** to deliver oil to a tank farm serving Oswego Steam Station. A leased system of interconnected tank cars is available to haul the fuel to Oswego. The rail operation, which began deliveries in January 1980, complements the usual barge shipments over Lake Ontario, seasonally restricted to non-winter months. The trains are capable of carrying more than 45,000 barrels per trip and can be unloaded in less than six hours.



Niagara Mohawk's steam station is landmark on Oswego skyline as night settles in historic Port City. Two stacks serve six generating units, with recently completed sixth unit boosting output to 2,050,000 kilowatts at power plant, now among Northeast's largest. Oswego River, flowing in foreground to Lake Ontario, is artery of N.Y. State Barge Canal System.

**In January 1980,** after three years of public hearings and review of hundreds of wide-ranging environmental and economic details, the State Board on Electric Generation Siting approved and certified the primary location for the 1.7 million-kilowatt Lake Erie Generating Station planned in southwestern New York. The Board also gave unconditional approval of the first 850,000-kilowatt unit, but stated that authorization of the second unit would depend on proof of need either by Niagara Mohawk or a group of utilities. The coal-fired units are targeted for commercial operation in the late 1980s and early 1990s and will save the equivalent of more than 11 million barrels of imported oil per year. We are proceeding with the plant's design and formulating plans for coal supply, transportation arrangements, labor agreements and necessary environmental controls.

During the past year, various measures and studies were undertaken, all consistent with national goals toward energy independence, to cut down on oil burned to generate electricity. We continue to emphasize, however, that full-scale conversion of our oil-fired Albany Steam Station to coal could require an added capital investment ranging from $50 million to $130 million depending upon pollution controls required. Presently, our six generating units at Oswego are not considered candidates for conversion. The capital costs for environmental controls would be prohibitive. In addition, technical problems with availability and delivery of fuel and conversions of fuel handling and boiler equipment represent unreasonable expenditures.

**In cooperation with federal and state environmental agencies,** we are continuing to seek corrective measures at Oswego Steam Station to reduce stack emission problems that have been experienced since its four original coal-fueled units were converted to oil in 1972. While hampered by the age of the boilers and their basic design (intended for coal), we are determined to find adequate remedies. ■

# THE PROMISE OF NATURAL GAS

Our natural gas business is showing positive contrast against previous years, when shortages and an uncertain supply picture curtailed growth and new markets for the fuel.

In 1979, permits were issued to attach 10,600 residential, 1,000 commercial and 50 industrial customers to our gas system which promise additional sales. This growth has entailed construction of 38 miles of new mains, 6,100 laterals and other gas service facilities over the past year.

**The gradual easing of restrictions on gas usage** and new sales started in the late 1970s, due primarily to voluntary conservation by consumers and increased delivery from our wholesale supplier, Consolidated Gas Supply Corp. The improved conditions are expected to encourage commercial and industrial expansion and create new jobs in our service area.

During 1979, approval was granted by the Public Service Commission to modify customer billing methods for gas, basing rates on heat content rather than volume consumed. The new therm billing became necessary as Consolidated Gas started delivering Niagara Mohawk a mixture of domestic and imported natural gas with varying heat contents. Because the imported gas contains about 10% more heat energy (Btu) per cubic foot than domestic gas, the billing units are now therms instead of cubic feet. The new method, now employed by many utilities, protects consumers by uniformly charging for gas based on actual heat received. The change does not represent a rate increase or affect our revenues.

**Despite price increases which are sure to occur,** natural gas is still likely to hold economic and environmental advantages over home heating oil and other petroleum-based fuels.■

Gas crew installs service lateral to new residential customer in Schenectady area. In 1979, more than 2,600 new residential customers were attached to our gas system. Many were conversions from home heating oil.

# SERVING CONSUMERS

Through our heavily promoted Home Energy Audit Program we are offering direct help to consumers in their efforts to reduce heating and energy costs. Initiated in mid-1978 under the state's Home Insulation and Energy Act, the service is making marked gains, producing some 22,700 individual home energy audits in 1979, compared with 860 for 1978.

**In this widely recognized program,** specially trained Consumer Relations representatives work first-hand with customers to upgrade efficiency and cut back on energy usage through any of three types of audits. These range from our representatives visiting and inspecting homes to completion of questionnaires and do-it-yourself audits by customers themselves. Also included is a financing plan with repayment options of up to seven years and liberal credit terms. Consumers are also given lists of local contractors specializing in energy conservation work. As the 1979 heating season began, the Company received as many as 200 requests per day for the audits.

In related activities, late in 1979 we launched "Low-Cost, No-Cost" home energy savings workshops for consumers on a trial basis in various upstate cities. Publicized and promoted locally in advance, these sessions were conducted by Company specialists who instruct audiences of homeowners on the many inexpensive ways, including weatherstripping, caulking and plastic storm windows, to reduce energy costs. In view of its immediate acceptance, we more than likely will expand the "Low-Cost, No-Cost" concept and schedule these helpful, informal seminars in other communities across our system. At the same time, we are continuing meetings and workshops with industrial and commercial customers.

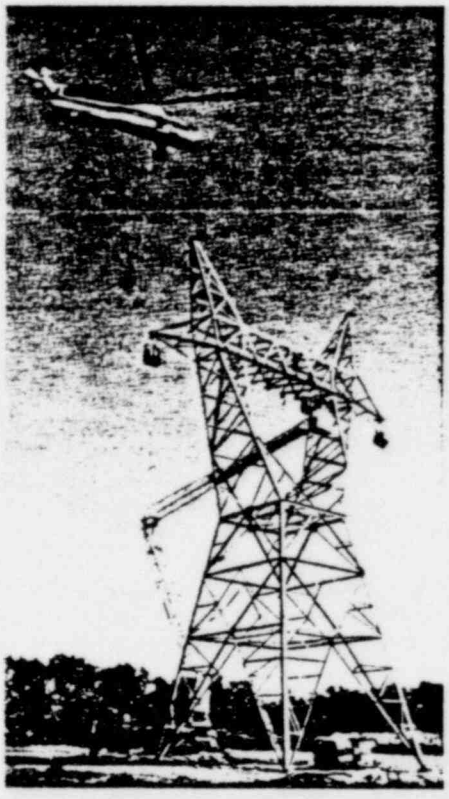
**In 1979, an irregular metering unit was organized** to detect and prevent meter tampering and theft of electric and gas service. As energy costs climb, so do incidents involving theft and attempts to by-pass meters. The new unit is responsible for coordination of Company-wide computer alert and meter-sealing efforts, field inspections, a manual on irregular metering and cash rewards to employees reporting

suspected theft or tampering situations. Allied with our Security function, investigations by the new unit resulted in 65 arrests for theft of service during the year.

To reinforce service reliability for our consumers, tree-trimming and clearance work on transmission and distribution lines was stepped up during the year. The work is critical not only to maintain a high degree of dependability but also to hold emergency repair costs down when storms and severe winds strike our region. Trees and branches falling on wires cause about 90% of the few power interruptions which do occur, and line clearance schedules are keyed to special problem areas.

**Again last year, the Consumer Advisory Council on Energy Affairs**—comprised of 26 citizens representing a cross-section of consumer and community interests—proved uniquely helpful in engendering two-way communications with the many public segments we serve. Following independent studies on nuclear-electric energy and presentations by prominent spokesmen both pro and con, Council members, with one dissenter, co-authored their own "issues paper" urging continued nuclear development. The paper drew considerable attention and positive coverage by upstate news media. The Council is now analyzing energy and consumer-related bills pending before the State Legislature and we look forward to its comments. In addition, members will continue advising the Company to help make us more sensitive to changing consumer needs.

**To that end, a host of other new and continuing programs and efforts are under way** for our consumers. These recognize today's need for service at a more individual, personal level and better assist consumers with their own special energy problems. Activities include a new senior consumers program, a new extended billing due date plan for the retired and disabled, an upgrading of our budget-payment plan, a winter referral procedure for hardship cases, a third-party notification plan for customers who may need help, modified disconnection procedures and maintenance of lists of customers requiring electrically operated



Helicopter assists in construction of transmission tower south of Syracuse, part of new 345,000-volt overhead line delivering bulk power from enlarged Oswego Steam Station to Central New York region.

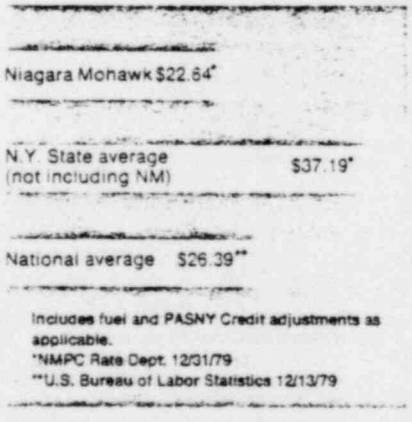
life-support equipment. At the same time, we have intensified Company communications and ties with many social services agencies and concerned government and community groups.

This work closely parallels the informational objectives of our Public Affairs and Corporate Communications Department. In recent years, continually rising energy costs and a multitude of utility and other energy-oriented issues—nearly all coupled with our complex role as principal electric and gas supplier—underscore need for communications effectiveness. For these reasons, corporate communications assignments and goals were expanded in 1979 to generate added public awareness and understanding of Niagara Mohawk and the problems we face. While directed primarily at print and electronic media through daily news coverage and advertising, our information programs also include Community Relations as a two-way link with government officials and opinion leaders, our volunteer Speakers Bureau, Energy Information Center at Nine Mile Point and display and educational services. In spring 1979, Three Mile Island cast an entirely new light on our nuclear information capabilities. These were broadened in response to a sharp increase in requests for nuclear information across our service territory.

**High among several current concepts to reduce consumers' energy costs** through a change in rate design is a proposal to price electricity sales according to the time of day it is used. "Time-of-day" rate plans have been under review by the Public Service Commission, and we are actively involved in proceedings, including public hearings, to examine these proposals. We anticipate the Commission's overall decision on revised rate structures by early 1980.

As shown by the chart below, Niagara Mohawk's rates at year-end were below those of major New York State utilities and compare favorably with the national average. ■

MONTHLY RESIDENTIAL ELECTRIC COST FOR 500 KW-HRS.




Includes fuel and PASNY Credit adjustments as applicable.
*NMPC Rate Dept. 12/31/79
**U.S. Bureau of Labor Statistics 12/13/79

# SEARCHING FOR OTHER ENERGY SOURCES

Prospects of rising costs, scarcity of energy fuels and potential enactment of still further environmental directives place a new urgency upon research and development as we enter the 1980s.

**Last year, Niagara Mohawk's R&D programs** encompassed 53 separate projects, including both independent "in-house" assignments by the Company as well as cooperative studies with other utility and research groups. In 1979 alone, Niagara Mohawk spent over $11 million for R&D. This amounts to about eight dollars for every electric customer in our service area, with more than half spent for further refining electric generation technology.

A project attracting worldwide interest is a major electric load management and energy storage experiment at the living quarters for contestants and officials in the 1980 Winter Olympic Games at Lake Placid. With Niagara Mohawk as originator and manager of the project, athletes from nearly 40 nations will play an important role in this one-of-a-kind study. Its objective: to collect information and data on different types of heat storage devices and to weigh their possible effect on utility electric supply systems in the years ahead. Under joint sponsorship with federal and state agencies and private companies, the $2-million experiment will continue through 1982. The Olympic Village structures are currently planned to function as a Federal minimum security institution when the Winter Games are over.

**A large-scale research effort** related to sulfur emissions and holding promise of both cost and environmental breakthroughs was initiated jointly by the Empire State Electric Energy Research Corp., U.S. Environmental Protection Agency, Electric Power Research Institute, N.Y. State Energy Research and Development Authority, and Rockwell International. Niagara Mohawk is host utility and managing agent. Construction activity started last fall at our Huntley Steam Station near Buffalo. In the planning stage for several years, the work consists of designing, procurement, construction, start-up, testing and demonstrating the reliability of an experimental prototype to reduce sulfur dioxide emissions to meet environmental standards. The facility, including the demonstration, is budgeted at about $55 million and will have many desirable features not present in current $SO_2$ "scrubbing" technology. Moreover, it is designed to receive gases from the combustion of high-sulfur Eastern coal. Since this coal is in abundant supply and less expensive to burn than low-sulfur Western coals, the project offers potential for reduced costs of generation consistent with environmental standards.

In October, Niagara Mohawk and federal and state agencies jointly announced an R&D program aimed at reducing home-heating costs by using community-wide energy resources at Radisson, a new community north of Syracuse. This experiment, under direction of the State Energy Research and Development Authority, seeks methods to employ the earth's heating and cooling potential to fill basic energy needs. Water source heat pumps, using individual wells, common wells, or river or pond water, will serve to supplement customary home heating equipment in the three-year project. Put into widespread future use in our system, the equipment would help reduce peak ..... loads that power stations must supply, thus lowering fuel and operating costs for both the utility and its consumers.

**We are also making continuing strides in other high technology energy research** and environmentally oriented projects recently initiated or under way for some time. The list includes a 4,800-kilowatt fuel cell prototype scheduled for startup in 1981; conversion of coal to clean-liquid or gaseous fuel; wind and solar energy research; and varied power transmission, distribution and substation improvements. All focus upon improving efficiency and reducing operating costs and adverse impacts on air, water and land.

In concert with the state's other investor-owned utilities, we will continue maintaining vigorous R&D efforts. Our mutual goals seek to reduce dependence upc . foreign oil, encourage energy conservation and hold energy costs down for consumers. ■

Artist's concept of Radisson community-wide research project where several homes are warmed and cooled by heat pumps using same water from ground sources is discussed by Richard C. Clancy, right, vice president of research and environmental affairs, and Howard Reynolds, display specialist. Project also seeks to increase water's heat content by recapturing community's low-grade heat.

# OUR PEOPLE

At the year end, Niagara Mohawk's work force numbered 9,600, about the same as in 1957, when the Company served 347,000 fewer customers.

**The total payroll in 1979 was $224 million,** of which $163 million was charged to operations and the balance primarily for new construction. These figures were $197 million and $145 million for 1978. Overtime costs were $23 million in 1979, compared with $14 million in 1978.

A 7.1% wage increase on June 1, 1979 was part of a two-year contract with 12 locals in System Council U-11 of the International Brotherhood of Electrical Workers (AFL-CIO). Approximately 7,500 employees are represented in the contract, which expires May 31, 1980.

**Employee training continued at increased levels** in all Niagara Mohawk operations in 1979. Our safety training is recognized throughout the utility industry for its on-going, innovative approach to day-to-day accident prevention. The Training Department has been formalizing additional new programs and instruction methods, including customer service telephone and fossil generation training and a system-wide campaign to keep employees informed on prime points and issues in our recent rate application.

About 6,600 or 76% of all eligible employees subscribe to the Company's Employee Savings Fund Plan, allocating from 2% to 6% of their wages toward purchase of common stock or U.S. Government bonds. The Company matched their contributions by 50% for a total $3,356,000 in 1979. The Plan holds 5,883,000 shares or 9% of the outstanding common stock. In addition, employees may make unmatched contributions of up to 4% of their wages.

**About 210,000 stockholders** presently own common shares of Niagara Mohawk and 11,000 hold preferred and preference stock. The chart below indicates many stockholders own fewer than 100 shares.

| *Size of holding (Shares)* | *Total stockholders* | *Total shares held* |
|---|---|---|
| 1 to 99 | 61,092 | 2,078,575 |
| 100 to 999 | 141,375 | 32,343,435 |
| 1,000 or more | 7,198 | 33,530,033 |
| | 209,665 | 67,952,043 |

For the second year, a series of seminars was held in various communities in our service area to offer our stockholders an opportunity for direct, informal communication with top management. The popular sessions, attended by more than 600 stockholders from all walks of life, leave no doubt that security holders have a strong desire for information about the Company. Questionnaires completed by those attending meetings at Dunkirk, Gloversville, Hudson, Niagara Falls, Olean and Watertown stressed interest in Niagara Mohawk's position on national energy policies, nuclear power, alternate energy sources, research and environmental matters and future energy supplies and costs. More of these helpful stockholder forums are planned for the 1980s.

**Security holders with an interest in New York State investor-owned utilities** have formed an independent, non-profit organization, the Association of Investors in New York Utilities, Inc. (AINYU). The new group's announced purpose is "to protect the financial integrity of New York investor-owned utilities so they can supply the power needs of the State at reasonable cost to users and reasonable profit to owners." Further information may be obtained by writing AINYU at Old Camby Road, Verbank, N.Y. 12585.

**The Board of Directors in June approved a revised and more comprehensive Code of Conduct** for Niagara Mohawk employees. The Code underscores our firm commitment to a practical, effective ethics policy and explains guidelines best serving interests of the Company, its employees and consumers. The guidelines cover the matter of gifts, invitations and awards from vendors and establish standards regarding outside employment, use of Company personnel, equipment and facilities. Also presented are standards for employees holding public office, relationships with governmental authorities, disclosure of proprietary information and accurate maintenance of Company records. Management and most supervisory employees signed a Certificate of Compliance and Disclosure after reviewing the Code at meetings across the System. The certificates are to be renewed every two years.

**Starting in 1979, Niagara Mohawk assumed responsibility** for the administration of our constantly growing Dividend Reinvestment and Stock Purchase Plan. Preferred and preference stockholders became eligible to participate and the limit on optional cash contributions was increased to $5,000 quarterly. Under the Plan, purchases of newly issued stock are made directly from the Company without incurring brokerage commissions or service charges. These purchases are made from the reinvestment of dividends and optional cash payments from participants.

A portion of funds the Company requires for periodic financing is provided by the Plan. In 1979, 34,000 participants, representing 16% of all common stockholders, invested $14,528,000 in new common shares. Application forms and literature describing the Plan are available by writing:

NMPC Dividend Reinvestment Plan
P.O. Box 131
Syracuse, N.Y. 13201 ■

# REPORT OF MANAGEMENT

The consolidated financial statements of Niagara Mohawk Power Corporation and its subsidiaries were prepared by and are the responsibility of management. Financial information contained elsewhere in this Annual Report is consistent with that in the financial statements.

To meet its responsibilities with respect to financial information, management maintains and enforces a system of internal accounting controls, which is designed to provide reasonable assurance, on a cost effective basis, as to the integrity, objectivity and reliability of the financial records and protection of assets. This system includes communication through written policies and procedures, an organizational structure that provides for appropriate division of responsibility and the training of personnel. This system is also tested by a comprehensive internal audit program. In addition, the Company has a Code of Conduct which requires all employees to maintain the highest level of ethical standards and requires key management employees to formally affirm their compliance with the Code.

The financial statements have been examined by Price Waterhouse & Co., the Company's independent accountants, in accordance with generally accepted auditing standards. As a part of their examination, they made a study and evaluation of the Company's system of internal accounting control. The purpose of such study was to establish a basis for reliance thereon in determining the nature, timing and extent of other auditing procedures that were necessary for expressing an opinion as to whether the financial statements are presented fairly. Their examination resulted in the expression of their opinion which follows this report. The independent accountants' examination does not limit in any way management's responsibility for the fair presentation of the financial statements and all other information, whether audited or unaudited, in this Annual Report.

The Audit Committee of the Board of Directors, consisting of three directors who are not employees, meets regularly with management, internal auditors and Price Waterhouse & Co., to review and discuss internal accounting controls, audit examinations and financial reporting matters. Price Waterhouse & Co. and the Company's internal auditors have free access to meet individually with the Audit Committee at any time, without management present.

# REPORT OF INDEPENDENT ACCOUNTANTS

PRICE WATERHOUSE & CO.

To the Stockholders and the Board of
Directors of Niagara Mohawk Power Corporation

In our opinion, the accompanying consolidated balance sheets and the related consolidated statements of income and retained earnings and of changes in financial position present fairly the financial position of Niagara Mohawk Power Corporation and its subsidiaries at December 31, 1979 and 1978, and the results of their operations and the changes in their financial position for each of the five years in the period ended December 31, 1979, in conformity with generally accepted accounting principles consistently applied. Our examinations of these statements 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.

Price Waterhouse & Co.

Syracuse, New York
January 25, 1980

# CONSOLIDATED STATEMENT OF INCOME AND RETAINED EARNINGS

NIAGARA MOHAWK POWER CORPORATION AND SUBSIDIARIES

| For the year ended December 31, | 1979 | 1978 | 1977 | 1976 | 1975 |
|---|---|---|---|---|---|
| | | | *In thousands of dollars* | | |
| **Operating revenues:** | | | | | |
| Electric | **$1,211,068** | $1,020,313 | $ 987,760 | $ 863,012 | $795,917 |
| Gas | **305,435** | 259,935 | 238,072 | 214,218 | 176,289 |
| | **1,516,503** | 1,280,248 | 1,225,832 | 1,077,230 | 972,206 |
| **Operating expenses:** | | | | | |
| Operation: | | | | | |
| Fuel for electric generation | **380,101** | 311,000 | 311,185 | 241,040 | 223,095 |
| Electricity purchased | **159,453** | 99,536 | 93,019 | 99,297 | 86,533 |
| Gas purchased | **196,711** | 158,229 | 142,071 | 124,811 | 94,960 |
| Other operation expenses | **200,917** | 181,995 | 166,297 | 152,759 | 136,470 |
| Maintenance | **99,857** | 80,759 | 84,536 | 66,171 | 58,724 |
| Depreciation *(Note 2)* | **84,212** | 80,683 | 77,113 | 77,629 | 69,228 |
| Federal and Canadian income taxes *(Note 10)* | **34,646** | 31,123 | 22,124 | 17,896 | 14,630 |
| Other taxes | **166,666** | 152,550 | 148,989 | 131,817 | 113,997 |
| | **1,322,563** | 1,095,875 | 1,045,334 | 911,420 | 797,637 |
| **Operating income** | **193,940** | 184,373 | 180,498 | 165,810 | 174,569 |
| **Other income and deductions:** | | | | | |
| Allowance for other funds (total funds 1976 and prior) used during construction *(Note 1)* | **39,063** | 28,971 | 21,660 | 20,711 | 29,376 |
| Income tax refunds *(Note 10)* | **—** | — | — | 8,986 | — |
| Federal income tax *(Note 10)* | **13,782** | 11,690 | 5,043 | 718 | — |
| Other items (net) | **524** | 1,545 | (1,398) | 533 | 2,153 |
| | **53,369** | 42,206 | 25,305 | 30,948 | 31,529 |
| **Income before interest charges** | **247,309** | 226,579 | 205,803 | 196,758 | 206,098 |
| **Interest charges:** | | | | | |
| Interest on long-term debt | **105,399** | 99,874 | 91,563 | 87,270 | 84,018 |
| Other interest | **4,416** | 1,573 | 2,892 | 1,039 | 7,285 |
| Allowance for borrowed funds used during construction *(Note 1)* | **(18,536)** | (16,030) | (12,484) | — | — |
| | **91,279** | 85,417 | 81,971 | 88,309 | 91,303 |
| **Net income** | **156,030** | 141,162 | 123,832 | 108,449 | 114,795 |
| Dividends on preferred stock | **27,844** | 28,660 | 25,705 | 23,546 | 19,430 |
| **Balance available for common stock** | **128,186** | 112,502 | 98,127 | 84,903 | 95,365 |
| Dividends on common stock | **92,136** | 81,261 | 74,033 | 65,642 | 56,590 |
| Retained earnings for the year | **36,050** | 31,241 | 24,094 | 19,261 | 38,775 |
| Miscellaneous charges *(Note 6)* | **—** | (1,180) | — | — | — |
| Retained earnings at beginning of year | **367,895** | 337,834 | 313,740 | 294,479 | 255,704 |
| Retained earnings at end of year | **$ 403,945** | $ 367,895 | $ 337,834 | $ 313,740 | $294,479 |
| **Average number of shares of common stock outstanding** *(in thousands)* | **63,976** | 59,661 | 56,279 | 52,731 | 47,089 |
| **Per average share of common stock:** | | | | | |
| Balance available for common stock | **$ 2.00** | $ 1.89 | $ 1.74 | $ 1.61 | $ 2.03 |
| Dividends paid | **$ 1.44** | $ 1.36½ | $ 1.31½ | $ 1.24 | $ 1.21 |

*( ) Denotes deduction.*

# CONSOLIDATED BALANCE SHEET

NIAGARA MOHAWK POWER CORPORATION AND SUBSIDIARIES

| At December 31, | In thousands of dollars 1979 | 1978 |
|---|---|---|
| **ASSETS** | | |
| **Utility plant, at original cost** *(Note 3 and Page 26)* | $4,218,528 | $3,905,374 |
| Less accumulated depreciation and amortization *(Note 2)* | 1,110,563 | 1,021,417 |
| | 3,107,965 | 2,883,957 |
| **Other property and investments** | 16,149 | 14,535 |
| **Current assets:** | | |
| Cash, including time deposits of $650 and $5,595, respectively | 8,527 | 10,786 |
| Accounts receivable (less allowance for doubtful accounts of $2,400 and $2,000, respectively) | 179,490 | 127,219 |
| Materials and supplies, at average cost: | | |
| Coal and oil for production of electricity | 109,278 | 70,232 |
| Other | 35,543 | 29,736 |
| Prepayments | 6,709 | 4,383 |
| | 339,547 | 242,356 |
| **Deferred debits:** | | |
| Unamortized debt expense | 14,124 | 13,848 |
| Deferred recoverable energy costs | 44,170 | 27,966 |
| Other | 6,982 | 6,450 |
| | 65,276 | 48,264 |
| | $3,528,937 | $3,189,112 |
| **LIABILITIES** | | |
| **Capitalization** *(Note 6):* | | |
| Common stockholders' equity: | | |
| Common stock—$1 par value; authorized 85,000,000 shares; issued 67,952,043 shares and 62,180,277 shares, respectively | $ 67,952 | $ 62,180 |
| Premium on capital stock | 716,386 | 646,878 |
| Capital stock expense | (10,558) | (10,977) |
| Retained earnings *(Page 16)* | 403,945 | 367,895 |
| | 1,177,725 | 1,065,976 |
| Redeemable preferred stock *(Note 7 and Page 27)* | 189,650 | 198,600 |
| Non-redeemable preferred stock *(Page 27)* | 210,000 | 210,000 |
| Long-term debt *(Page 26)* | 1,443,056 | 1,414,997 |
| **Total capitalization** | 3,020,431 | 2,889,573 |
| **Current liabilities:** | | |
| Short-term debt *(Note 4)* | 82,040 | 24,000 |
| Long-term debt due within one year *(Page 26)* | 88,500 | 10,450 |
| Sinking fund requirements on redeemable preferred stock *(Note 7)* | 6,950 | 1,800 |
| Accounts payable | 118,727 | 86,854 |
| Customers' deposits | 4,934 | 4,902 |
| Accrued taxes | 25,537 | 22,184 |
| Accrued interest | 30,727 | 28,605 |
| Accrued vacation pay | 14,569 | 13,228 |
| Other | 17,315 | 8,385 |
| | 389,299 | 200,408 |
| **Deferred credits:** | | |
| Income tax refunds *(Note 10)* | 21,606 | 21,606 |
| Other | 11,933 | 10,945 |
| | 33,539 | 32,551 |
| **Accumulated deferred Federal income taxes** *(Note 10)* | 85,668 | 66,580 |
| **Commitments and contingencies** *(Note 12)* | — | — |
| | $3,528,937 | $3,189,112 |

*( ) Denotes deduction.*

# CONSOLIDATED STATEMENT OF CHANGES IN FINANCIAL POSITION

NIAGARA MOHAWK POWER CORPORATION AND SUBSIDIARIES

*In thousands of dollars*

| For the year ended December 31, | 1979 | 1978 | 1977 | 1976 | 1975 | Total |
|---|---|---|---|---|---|---|
| **Financial resources were provided by:** | | | | | | |
| **Operations:** | | | | | | |
| Net income | **$156,030** | $141,162 | $123,832 | $108,449 | $ 114,795 | $ 644,268 |
| Charges (credits) to income not requiring (not providing) working capital— | | | | | | |
| Depreciation | **84,212** | 80,683 | 77,113 | 77,629 | 69,228 | 388,865 |
| Allowance for funds used during construction | **(57,599)** | (45,001) | (34,144) | (20,711) | (29,376) | (186,831 |
| Amortization of nuclear fuel | **28,090** | 27,107 | 21,458 | 22,555 | 11,481 | 110,691 |
| Provision for deferred Federal income taxes (net) | **14,566** | 7,955 | 13,333 | 14,628 | 11,800 | 62,282 |
| | **225,299** | 211,906 | 201,592 | 202,550 | 177,928 | 1,019,275 |
| **Outside financing:** | | | | | | |
| Sale of common stock | **75,266** | 70,462 | 21,522 | 70,105 | 72,557 | 309,912 |
| Sale of preferred stock | **—** | 74,000 | — | 30,000 | 70,000 | 174,000 |
| Sale of mortgage bonds | **118,500** | 31,500 | 125,000 | — | 100,000 | 375,000 |
| Sale of promissory note (net) | **—** | — | 2,338 | 5,671 | 10,839 | 18,848 |
| Issuance of long-term notes payable | **—** | — | 15,000 | 18,000 | — | 33,000 |
| Increase (decrease) in short-term debt | **58,040** | (15,200) | (1,550) | (8,114) | (117,786) | (84,610 |
| | **251,806** | 160,762 | 162,310 | 115,662 | 135,610 | 826,150 |
| **Other sources:** | | | | | | |
| Sale of utility plant *(Note 5)* | **—** | 34,955 | — | — | 53,366 | 88,321 |
| Deferred recoverable energy costs | **(16,204)** | (3,015) | 4,654 | 8,785 | (591) | (6,371 |
| Income tax refunds | **—** | 1,885 | 300 | (8,686) | 1,241 | (5,260 |
| Sale of uranium *(Note 3)* | **35,987** | — | — | — | — | 35,987 |
| (Increase) decrease in working capital other than short-term debt *(see below)* | **33,660** | 22,006 | 1,667 | 30,465 | (122,388) | (34,590 |
| Miscellaneous (net) | **5,313** | (5,049) | 52 | 4,203 | 7,592 | 12,111 |
| | **58,756** | 50,782 | 6,673 | 34,767 | (60,780) | 90,198 |
| **Total resources provided** | **$535,861** | $423,450 | $370,575 | $352,979 | $ 252,758 | $1,935,623 |
| **Financial resources were used for:** | | | | | | |
| Construction additions | **$347,544** | $277,758 | $264,913 | $195,676 | $ 194,155 | $1,280,046 |
| Nuclear fuel | **26,986** | 38,522 | 25,018 | 87,026 | 11,959 | 189,511 |
| Allowance for funds used during construction | **(57,599)** | (45,001) | (34,144) | (20,711) | (29,376) | (186,831 |
| Net additions | **316,931** | 271,279 | 255,787 | 261,991 | 176,738 | 1,282,726 |
| Reduction of long-term debt | **90,000** | 10,450 | 13,250 | — | — | 113,700 |
| Reduction of preferred stock *(Note 6)* | **8,950** | 31,800 | 1,800 | 1,800 | — | 44,350 |
| Dividends | **119,980** | 109,921 | 99,738 | 89,188 | 76,020 | 494,847 |
| **Total resources used** | **$535,861** | $423,450 | $370,575 | $352,979 | $ 252,758 | $1,935,623 |
| **(Increase) decrease in working capital other than short-term debt:** | | | | | | |
| Cash | **$ 2,259** | $ (4,207) | $ 475 | $ 13,620 | $ (3,067) | $ 9,080 |
| Accounts receivable | **(52,271)** | (5,364) | (5,250) | (11,041) | (16,310) | (90,236 |
| Receivable from plant sharing | **—** | — | — | 12,402 | (12,402) | — |
| Income tax refund claims | **—** | 8,391 | (1,353) | (300) | 15,639 | 22,377 |
| Coal and oil for production of electricity | **(39,046)** | 9,710 | (13,017) | (15,433) | (626) | (58,412 |
| Other materials and supplies | **(5,807)** | (3,369) | (1,490) | 1,193 | 1,213 | (8,260 |
| Long-term debt due within one year | **78,050** | 200 | 10,250 | — | (103,867) | (15,367 |
| Sinking fund requirements on redeemable preferred stock | **5,150** | — | — | 1,800 | — | 6,950 |
| Accounts payable | **31,873** | 7,823 | 1,001 | 18,982 | (855) | 58,824 |
| Accrued taxes and interest | **5,475** | 4,349 | 9,317 | 6,205 | 2,435 | 27,781 |
| Other (net) | **7,977** | 4,473 | 1,734 | 3,037 | (4,548) | 12,673 |
| | **$ 33,660** | $ 22,006 | $ 1,667 | $ 30,465 | $(122,388) | $ (34,590 |

# NOTES TO CONSOLIDATED FINANCIAL STATEMENTS

**NOTE 1. Summary of Significant Accounting Policies**

The Company is subject to regulation by the New York State Public Service Commission (PSC) and the Federal Energy Regulatory Commission (FERC) with respect to its rates for service and the maintenance of its accounting records. The Company's accounting policies conform to generally accepted accounting principles, as applied to regulated public utilities, and are in accordance with the accounting requirements and ratemaking practices of the regulatory authorities. (See Note 12).

*Utility Plant:* The cost of additions to utility plant and of replacements of retirement units of property is capitalized. Cost includes direct material, labor, overhead and an allowance for funds used during construction (AFC). The cost of current repairs and maintenance is charged to expense. Whenever utility plant is retired, its original cost, together with the cost of removal, less salvage, is charged to accumulated depreciation.

*Allowance for Funds Used During Construction:* The Company capitalizes AFC in amounts equivalent to the cost of funds devoted to plant under construction (8% for the period January 1, 1975 through June 30, 1976, 9% for the period July 1, 1976 through December 31, 1978, 9.25% for the period January 1, 1979 through October 31, 1979 and 9.6% effective November 1, 1979). As a result of rate proceedings, effective December 1, 1976 for its Oswego Steam Station Unit #6 and Nine Mile Point Nuclear Station Unit #2 and July 1, 1978 for capitalized costs associated with its investment in N M Uranium, Inc. (see Note 3), the Company began computing AFC at a rate which is reduced to reflect the income tax effect of the borrowed funds component of AFC. The net of tax rate was 7.2% through December 31, 1978, 7.5% from January 1, 1979 through October 31, 1979 and 7.75% thereafter.

Effective January 1, 1977, FERC revised its accounting procedures for determining the AFC rate and required segregation of AFC into its two component parts, borrowed funds and other funds. The revision had no effect on income in 1977. The Company, since January 1, 1977, has reflected the borrowed funds component in the Interest Charges section of the income statement. The Company has not reclassified AFC into its borrowed and other funds components for periods prior to January 1, 1977.

*Depreciation and Nuclear Generating Plant Decommissioning Costs:* For accounting purposes, depreciation is computed on the straight-line basis using the estimated useful lives by classes of depreciable property. For Federal income tax purposes, the Company computes depreciation using accelerated methods and shorter allowable depreciable lives.

As a result of a PSC rate decision, estimated decommissioning costs (costs to take the plant out of service in the future) of the Company's Nine Mile Point Nuclear Station Unit #1 began to be recovered in rates and charged to operations in July 1978 through revised depreciation charges. The change in the annual nuclear plant depreciation rate, from 4.00% to 4.33%, reflects an increase in the estimated service life of the plant from 25 to 30 years and the establishment of an allowance for decommissioning costs at the annual rate of 1% of the plant's cost. Prior to July 1978, decommissioning costs were not charged to current operations and were not recognized in rates charged to customers. There is no assurance that the additional revenues provided by the decommissioning allowance will ultimately aggregate a sufficient amount to decommission the plant. The Company believes that decommissioning costs, if higher than currently provided, will ultimately be recovered in the rate process, although no such assurance can be given.

*Amortization of Nuclear Fuel:* The cost of nuclear fuel, plus estimated disposal cost, is charged to operating expenses on the basis of the quantity of heat produced for the generation of electric energy. These costs are charged to customers through base rates or through the fuel adjustment clause. Until June 1979, the Company had assumed that spent nuclear fuel would be disposed of by reprocessing and that uranium recovered through such reprocessing would have value. At that time, because of proposed Federal action and because there is no reprocessing facility in operation, the Company abandoned its reprocessing plans in favor of a permanent storage assumption. The Company has concluded that under either its permanent storage assumption or the reprocessing assumption previously utilized, costs are approximately equal. The Company believes that nuclear fuel disposal costs, which may be higher than presently estimated, will continue to be recovered in the rate process, although no such assurance can be given.

Prior to 1978, estimated nuclear fuel disposal costs were deducted currently for Federal income tax purposes. Due to the uncertainties concerning disposal cost alternatives and attendant cost estimation criteria, beginning in 1978, the Company has assumed that nuclear fuel disposal costs are not currently deductible for Federal income tax purposes. Prior years' tax liabilities were not materially affected by such change in assumption. In December 1978, the PSC granted the Company permission to provide deferred taxes on the accounting-tax timing differences of current and prior period nuclear fuel disposal costs.

*Revenues:* Revenues are based on cycle billings rendered to certain customers monthly and others bi-monthly. The Company does not accrue revenues for energy sold and not billed at the end of any fiscal period. The Company's tariffs include electric and gas adjustment clauses under which energy and purchased gas costs, respectively, above or below the levels allowed in approved rate schedules are billed or credited to customers. The Company, as authorized by the PSC, charges operations for energy and purchased gas cost increases in the period of recovery. The PSC has periodically authorized the Company to make changes in its electric adjustment clause. As a result of such changes, a portion of deferred energy costs would not be recovered under the normal operation of the electric adjustment clause. However, the Company has been permitted to amortize and bill such portions to customers, through the electric adjustment clause, over 36 months from the effective date of each change.

*Federal Income Taxes:* The general policy, in accordance with PSC requirements, is to flow through the tax effect of timing differences between book and taxable income, that is, to record only income taxes currently payable. However, de-

ferred taxes are provided on benefits realized from the class life system of depreciation permitted under the Revenue Act of 1971 (shorter depreciable lives, repair allowance and cost of removal), on energy and purchased gas costs, on nuclear fuel disposal costs and on certain other items, as approved by the PSC (see Notes 3 and 10). No deferred taxes are provided for other depreciation differences (including accelerated methods of depreciation), except under necessity certificates in prior years, or for other items (such as taxes, a portion of AFC, pensions and certain other employee benefits) which are deducted currently for tax purposes but capitalized for accounting purposes.

Effective January 1, 1975, the benefits resulting from an increase in the investment tax credit from 4% to 10% and from the change in the limitation on the amount of credit which may be claimed in any year has been deferred. One-half of the 4% investment tax credits realized have been allocated to Other Income and Deductions, consistent with PSC directives. For the major projects specified in the AFC section above, the imputed tax benefit of the borrowed funds component of AFC has been credited to Other Income and Deductions.

As directed by the PSC, the Company deferred a portion of the increase in Federal income taxes for the year 1978 associated with the tax gain on the sale of a portion of its interest in the Roseton Steam Station. The PSC authorized the Company to recover increased taxes through its electric adjustment clause over a one-year period commencing July 1978.

*Pension Plans:* The cost of pension plans is based upon current costs, amortization of unfunded past service benefits over periods ranging from 15 to 40 years and amortization over 15 years of unfunded past service benefits arising from plan amendments, as determined by consulting actuaries.

**NOTE 2. Depreciation**

The percentage relationship between the total provision for depreciation and average depreciable property was 2.7% in 1979, 1978 and 1977 and 2.8% in 1976 and 1975. The Company makes depreciation studies on a continuing basis and adjusts the rates of its various classes of depreciable property, when considered appropriate, subject to PSC approval. Effective December 1, 1976, consistent with a PSC rate decision, electric depreciation provisions were modified resulting in a reduction in depreciation expense of $4,300,000 for the year 1977. As a result of the rate decision which became effective July 1, 1978, the electric depreciation provision for 1978 was increased approximately $1,100,000.

**NOTE 3. N M Uranium, Inc.**

During 1976, through a wholly-owned subsidiary, N M Uranium, Inc. (NMU), the Company purchased a 50 percent undivided interest in uranium deposits and associated mining equipment to be held by a jointly-owned mining venture. The venture is basically an operating arrangement whereby the Company pays its share of the capital and operating costs and in turn receives its proportionate share of production. Although acquisition of this interest was made primarily to provide a more assured future supply of nuclear fuel for the Nine Mile Point Nuclear Station Units #1 and #2, the Company has previously indicated it would sell a portion of the output to reduce net assets and associated carrying charges. In connection therewith, during 1979 the Company sold uranium produced by NMU for approximately $36,000,000. The Company expects to sell additional portions of the NMU output in the future. The investment in the subsidiary, which includes costs incurred since acquisition and AFC, has been reduced by the proceeds from the sale of uranium, net of tax. Such investment totaled $72,000,000 and $87,600,000 at December 31, 1979 and 1978, respectively, and is included in Nuclear Fuel in the consolidated financial statements.

On September 8, 1978, the PSC issued an order approving the Company's investment in NMU, its guaranty of the NMU notes and permitting, with prior approval, such subsequent advances as may be necessary to finance the uranium project. Further, effective July 1, 1978, all benefits associated with NMU accounting-tax timing differences have been deferred. The approval was subject to the condition that rates the PSC will approve in the future will reflect the cost of NMU uranium at the lower of cost or the market price. Subject to PSC approval, the comparison of cost to market will be on an aggregate basis over the life of the project. While management believes that such aggregate costs will be less than the aggregate market price of the uranium produced over the life of the project, no such assurance can be given.

**NOTE 4. Short-term Debt and Compensating Balances**

The Board of Directors has authorized the Company to obtain short-term unsecured loans of up to $250,000,000, including the issuance of commercial paper equal to the amount of unused bank lines of credit available to the Company. At December 31, 1979, the Company had available $233,500,000 of bank credit arrangements consisting of a $55,000,000 contractual commitment with several banks under a Credit Agreement, lines of credit of $103,500,000 and a Bankers Acceptance Facility Agreement of $75,000,000. All of these arrangements are renewable on an annual basis. The Credit Agreement and most of the lines of credit require the Company to maintain compensating balances which are averaged over time. Net of "float", approximately $5,300,000 of cash at December 31, 1979 represented compensating balances. The Company has elected to pay fees in lieu of maintaining compensating balances on its other lines of credit. The Bankers Acceptance Facility Agreement provides for the payment of fees only upon the issuance of each acceptance. Acceptances are used to finance the fuel oil inventory at one of the Company's generating stations.

On March 6, 1979, the Company entered into arrangements with Oswego Facilities Trust (OFT) providing for OFT to finance the acquisition of a fuel oil storage terminal at Oswego, New York and for construction of certain railroad loading and unloading facilities associated with the terminal. OFT has a $25,000,000 Letter of Credit Facility and Revolving Credit Agreement which are used to support its commercial paper obligations. The Company is obligated, under a Distribution Contract with OFT, to make certain payments for its use of these facilities and to purchase, or otherwise arrange for, the distribution of the facilities upon the termination of the Trust. The Letter of Credit Facility and Revolving Credit Agreement of OFT require payment of fees which are based upon the amount of commercial paper outstanding.

The following table summarizes additional information applicable to short-term debt:

| | In thousands of dollars 1979 | 1978 |
|---|---|---|
| *At December 31:* | | |
| Short-term debt: | | |
| Notes payable | $ — | $21,000 |
| Commercial paper | 68,040* | 3,000 |
| Bankers Acceptances | 14,000 | — |
| | $ 82,040 | $24,000 |
| Weighted average interest rate (1) | 13.85%* | 10.59% |
| *For year ended December 31:* | | |
| Daily average outstanding | $ 35,888* | $10,744 |
| Daily weighted average interest rate (1) | 11.40%* | 8.17% |
| Maximum amount outstanding | $102,100* | $39,200 |

(1) Excluding compensating balances and fees.
*Includes Oswego Facilities Trust

### NOTE 5. Jointly-Owned Generating Facilities

The following table reflects the Company's share of jointly-owned generating facilities at December 31, 1979. The Company is required to provide financing for the units in process of construction and for any additions to the Roseton units. The Company's share of expenses associated with the Roseton units are included in the appropriate operating expenses in the consolidated statement of income.

| | Percentage ownership | In thousands of dollars Utility plant | Accumulated depreciation | Construction work in progress |
|---|---|---|---|---|
| Roseton Steam Station Units #1 and 2 *(a)* | 30 | $101,488 | $14,213 | $ 2,275 |
| Oswego Steam Station Unit #6 *(b)* | 76 | — | — | 222,882 |
| Nine Mile Point Nuclear Station Unit #2 *(b) (d)* | 41 | — | — | 313,304 |
| Sterling Nuclear Station *(c) (d)* | 22 | — | — | 18,962 |

(a) The Company sold to Central Hudson Gas and Electric Corporation ¼ of its original 40% ownership for book value of approximately $30,400,000 in December 1978. Central Hudson is obligated from time to time to acquire additional portions of the Company's interest.

(b) During 1975, the Company sold a 24% interest in the ownership of Unit #6 and a 59% interest in the ownership of Unit #2 for book value of approximately $53,400,000 and, in 1978, sold certain additional property associated with these units, for book value of approximately $4,600,000. (See Note 12).

(c) During 1975, the Company purchased a 22% interest in the ownership of Rochester Gas & Electric Corporation's Sterling Nuclear Station for an initial investment of approximately $4,300,000. (See Note 12).

(d) Excludes amounts spent for nuclear fuel.

### NOTE 6. Capital Stock

In 1978, the authorized shares of common stock were increased by 20,000,000. Premium on capital stock increased $69,500,000 in 1979 and $65,400,000 in 1978 from the sale of 5,771,766 and 5,057,636 shares of common stock, respectively. As a result of the foregoing and the 1978 issuance of 1,600,000 shares of $25 par value perferred stock, 8.375% series, and 1,360,000 shares of $25 par value preference stock, 7.75% series, capital stock expense increased $200,000 in 1979 and $600,000 in 1978.

In August 1978, $30,000,000 (300,000 shares) of 11.75% series preferred stock was redeemed. In accordance with a PSC directive, the $3,500,000 call premium on the redemption was charged to capital stock expense and is being amortized over the life of the 7.75% preference series. Expenses of issuing the 11.75% preferred series of $1,200,000 were charged to retained earnings.

### NOTE 7. Redeemable Preferred Stock

Certain of the Company's preferred and preference stock series provide for a mandatory sinking fund for the annual redemption, at par, as follows:

| | | Number of shares | Beginning |
|---|---|---|---|
| Preferred $100 par value | 7.45% Series | 18,000 | June 30, 1977 |
| | 10.60% Series | 20,000 | March 31, 1980* |
| Preferred $25 par value | 8.375% Series | 100,000 | April 1, 1983 |
| | 9.75% Series | 66,000 | October 1, 1980 |
| Preference $25 par value | 7.75% Series | 140,000 | September 30, 1980 |

These series also have optional sinking funds through which the Company may redeem, at par, a like amount of additional shares (limited to 120,000 shares of the 7.45% series and 300,000 shares of the 9.75% series). The mandatory sinking fund for the 7.75% series increases by 20,000 shares and 80,000 shares beginning September 30, 1982 and 1984, respectively.

The Company's five year mandatory sinking fund redemption schedule is as follows:

| Series | Par Value | Thousands of dollars 1980 | 1981 | 1982 | 1983 | 1984 |
|---|---|---|---|---|---|---|
| 7.45% | $100 | $1,800 | $1,800 | $1,800 | $ 1,800 | $ 1,800 |
| 10.60% | $100 | * | 2,000 | 2,000 | 2,000 | 2,000 |
| 8.375% | $ 25 | — | — | — | 2,500 | 2,500 |
| 9.75% | $ 25 | 1,650 | 1,650 | 1,650 | 1,650 | 1,650 |
| 7.75% | $ 25 | 3,500 | 3,500 | 4,000 | 4,000 | 6,000 |
| | | $6,950 | $8,950 | $9,450 | $11,950 | $13,950 |

*Sinking fund requirements for 1980 have been met by the advance purchase of preferred stock during 1979.

### NOTE 8. Pension Plans

The Company and its subsidiaries have non-contributory pension plans covering substantially all their employees. The total pension cost was $28,900,000 for 1979, $25,700,000 for 1978, $22,500,000 for 1977, $20,800,000 for 1976 and $18,800,000 for 1975 (of which $6,800,000 for 1979, $5,800,000 for 1978, $4,700,000 for 1977, $3,900,000 for 1976 and $3,300,000 for 1975, was included in construction costs).

The Company's policy is to fund pension costs accrued. Preliminary studies indicate that the estimated amount of unfunded vested benefits at December 31, 1979 exceeded the net assets of the plans by approximately $104,000,000.

**NOTE 9. Information Regarding the Electric and Gas Businesses**

The Company is engaged in the electric and gas utility businesses. Certain information regarding these segments is set forth in the following table. General corporate expenses, property common to both segments and depreciation of such common property have been allocated to the segments in accordance with practices established for regulatory purposes. Identifiable assets includes net utility plant, materials and supplies and deferred recoverable energy costs. Corporate assets consist of other property and investments, cash, accounts receivable, income tax refund claims, prepayments, unamortized debt expense and other deferred debits.

| | In thousands of dollars | | | | |
|---|---|---|---|---|---|
| | **1979** | 1978 | 1977 | 1976 | 1975 |
| Operating revenues: Electric | **$1,211,068** | $1,020,313 | $ 937,760 | $ 863,012 | $ 795,917 |
| Gas | **305,435** | 259,935 | 238,072 | 214,218 | 176,289 |
| Total | **$1,516,503** | $1,280,248 | $1,225,832 | $1,077,230 | $ 972,206 |
| Operating income before taxes: Electric | **$ 200,718** | $ 188,236 | $ 176,819 | $ 159,425 | $ 168,468 |
| Gas | **27,868** | 27,260 | 25,803 | 24,281 | 20,731 |
| Total | **$ 228,586** | $ 215,496 | $ 202,622 | $ 183,706 | $ 189,199 |
| Pretax operating income, including AFC: Electric | **$ 257,954** | $ 233,006 | $ 210,810 | $ 180,077 | $ 197,788 |
| Gas | **28,231** | 27,491 | 25,956 | 24,340 | 20,787 |
| Total | **286,185** | 260,497 | 236,766 | 204,417 | 218,575 |
| Income taxes | **34,646** | 31,123 | 22,124 | 17,896 | 14,630 |
| Other income and deductions | **14,306** | 13,235 | 3,645 | 10,237 | 2,153 |
| Interest charges | **109,815** | 101,447 | 94,455 | 88,309 | 91,303 |
| Net income | **$ 156,030** | $ 141,162 | $ 123,832 | $ 108,449 | $ 114,795 |
| Depreciation: Electric | **$ 74,957** | $ 71,750 | $ 68,400 | $ 69,128 | $ 60,936 |
| Gas | **9,255** | 8,933 | 8,713 | 8,501 | 8,292 |
| Total | **$ 84,212** | $ 80,683 | $ 77,113 | $ 77,629 | $ 69,228 |
| Construction expenditures (including nuclear fuel): | | | | | |
| Electric | **$ 351,972** | $ 301,583 | $ 277,828 | $ 272,422 | $ 196,956 |
| Gas | **22,558** | 14,697 | 12,103 | 10,280 | 9,158 |
| Total | **$ 374,530** | $ 316,280 | $ 289,931 | $ 282,702 | $ 206,114 |
| Identifiable assets: Electric | **$2,981,005** | $2,717,224 | $2,552,446 | $2,359,038 | $2,174,452 |
| Gas | **315,951** | 294,667 | 290,876 | 285,642 | 285,846 |
| Total | **3,296,956** | 3,011,891 | 2,843,322 | 2,644,680 | 2,460,298 |
| Corporate assets | **231,981** | 177,221 | 175,732 | 171,620 | 192,327 |
| Total assets | **$3,528,937** | $3,189,112 | $3,019,054 | $2,816,300 | $2,652,625 |

**NOTE 10. Federal and Canadian Income Taxes**

*Current Federal Tax Expense:* The current Federal tax expense includes credits of $2,600,000 for investment tax credit generated in 1979 and carried back to 1978.

*Income Tax Refunds:* The Company received refunds in 1974 and 1975 totaling $21,400,000, including interest, as a result of the retroactive adoption of "guideline" lives in computing tax depreciation for the years 1966 through 1968. In a 1976 Opinion and Order on a Company rate proceeding, the PSC directed that $12,400,000 of the amounts received for the years 1966 through 1968 be treated as a reduction in rate base. The PSC, however, reserved the right to treat such amount differently in future rate proceedings contingent on the then prevailing circumstances. During 1976, the portion of the refunds and interest for the years 1966 through 1968, previously included in Deferred Credits totaling approximately $9,000,000 ($.17 per share), that was no longer subject to a future contingency, was credited to Other Income and Deductions.

In 1978, the Company received a refund of $9,200,000, including interest net of tax, resulting from the settlement of all audit issues for the year 1969, including the adoption of the "guideline" method of depreciation. The total tax refunds and interest recorded in Deferred Credits at December 31, 1979 approximated $21,600,000. In the Company's current rate case the PSC is considering the proper accounting and ratemaking treatment of such total amount.

*Income Tax Assessment:* In October 1972, the Company paid a net assessment of $16,800,000 for the years 1957 through 1962 relating to the deductions taken for the loss of the Company's water rights at Niagara Falls terminated in connection with the redevelopment of Niagara power by the Power Authority of the State of New York. The Company has instituted suit for recovery of this amount.

*Net Operating Loss:* During 1977, 1976 and 1975, the Company utilized for Federal income tax purposes $300,000

$20,100,000 and $22,600,000, respectively, of net operating tax loss carryforwards.

*Investment Tax Credits:* The Company has deferred the net benefit of investment tax credits approximating $15,100,000 ($.24 per share), $6,900,000 ($.12 per share), $6,100,000 ($.11 per share), $4,800,000 ($.09 per share) and $12,500,000 ($.27 per share) for the years ended December 31, 1979, 1978, 1977, 1976 and 1975, respectively, in accordance with the general policy as stated in Note 1.

The Company has unused credits at December 31, 1979 of approximately $19,900,000 which may be utilized to reduce current tax expense in subsequent years until they expire in 1986.

The oil-fired Oswego Unit #6 attained in-service status for Federal income tax purposes in late 1979. As a result, investment tax credit in the amount of $14,400,000 was generated and became available for use. The commercial in-service date of the unit is presently estimated to be in the first quarter of 1980. In his Recommended Decision (issued on December 6, 1979) in the Company's current rate case, the Administrative Law Judge recommended that Oswego Unit #6 investment tax credit not be recognized in 1979 when such credits would normally be recognized under the Company's previously approved Federal income tax accounting policies. Instead, such investment tax credit would be recognized coincident with the plant being recognized for ratemaking purposes.

Although the Company opposes the Judge's recommendation, the Company has deferred the effect of Oswego Unit #6 investment tax credit pending final decision of the PSC, expected in early March 1980. The effect of such deferral on the 1979 results of operations was to increase tax expense and thereby decrease income by $6,500,000 ($.10 per share). The Company is unable to predict the ultimate outcome of this matter.

*Summary Analysis:*

| | *in thousands of dollars* | | | | |
|---|---|---|---|---|---|
| | **1979** | 1978 | 1977 | 1976 | 1975 |
| Components of Federal and Canadian income taxes | | | | | |
| Current tax expense: | | | | | |
| Federal | **$ 1,618** | $ 7,608 | $ 434 | — | — |
| Canadian | **4,680** | 3,870 | 3,314 | $ 2,550 | $ 2,830 |
| | **6,298** | 11,478 | 3,748 | 2,550 | 2,830 |
| Deferred Federal income tax expense | **28,348** | 19,645 | 18,376 | 15,346 | 11,800 |
| Income taxes included in operating expenses | **34,646** | 31,123 | 22,124 | 17,896 | 14,630 |
| Deferred Federal income taxes included in Other Income and Deductions | **(13,782)** | (11,690) | (5,043) | (718) | — |
| Total | **$20,864** | $19,433 | $17,081 | $17,178 | $14,630 |
| Timing differences resulting in deferred Federal income taxes *(see Note 1)* | | | | | |
| Depreciation | **$ 8,227** | $22,753 | $ 7,146 | $ 6,223 | $ 1,313 |
| Cost of removal of property | **(1,010)** | 2,310 | 245 | 566 | (899) |
| Investment tax credit | **15,149** | 6,899 | 6,077 | 4,847 | 12,523 |
| Recoverable energy and purchased gas costs | **(239)** | 7,012 | 69 | 3,650 | (477) |
| Necessity certificates | **(700)** | (700) | (700) | (700) | (700) |
| Nuclear fuel disposal cost | **(5,388)** | (28,411) | — | — | — |
| Sales and loans of nuclear fuel | **(5,678)** | — | — | — | — |
| Gain on Roseton sale | **3,962** | (3,962) | — | — | — |
| Other | **243** | 2,054 | 496 | 42 | 40 |
| Deferred Federal income taxes (net) | **$14,566** | $ 7,955 | $13,333 | $14,628 | $11,800 |
| Reconciliation between Federal and Canadian income taxes and the tax computed at prevailing U.S. statutory rate on income before income taxes | | | | | |
| Computed tax | **$81,372** | $77,086 | $67,638 | $60,301 | $62,124 |
| Reduction attributable to flow-through of certain tax adjustments: | | | | | |
| Depreciation | **13,329** | 13,931 | 19,703 | 19,741 | 20,123 |
| Allowance for funds used during construction | **26,496** | 21,601 | 16,389 | 9,942 | 14,100 |
| Taxes, pensions and employee benefits capitalized for accounting purposes | **10,202** | 8,537 | 7,071 | 5,731 | 7,920 |
| Real estate taxes on an assessment date basis | **2,178** | 560 | 1,042 | 2,813 | 3,035 |
| Investment tax credit | **2,775** | 10,874 | 9,500 | — | — |
| Income tax refunds | **—** | — | 619 | 4,313 | — |
| Deferred taxes provided at other than the statutory rate | **6,752** | 1,824 | (7,351) | (5,905) | 6,083 |
| Other | **(1,224)** | 326 | 3,584 | 6,488 | (3,767) |
| | **60,508** | 57,653 | 50,557 | 43,123 | 47,494 |
| Federal and Canadian income taxes | **$20,864** | $19,433 | $17,081 | $17,178 | $14,630 |

**NOTE 11. Supplementary Information to Disclose the Effects of Changing Prices (Unaudited)**

Continued inflation, resulting in a decline in the purchasing power of the dollar, has become one of our nation's principal concerns. Inflation has an enormous impact on all sectors of the economy, including consumers, wage earners, investors, government and industry.

The consolidated financial statements are based on historical events and transactions when the purchasing power of the dollar was substantially different than at the present. The effects of inflation on most utilities, including Niagara Mohawk, are most significant in the areas of depreciation and utility plant and amounts owed on borrowed funds.

In recognition of the fact that users of financial reports need to have an understanding of the effects of inflation on a business enterprise, the accounting profession's standard setting body has issued a statement requiring that inflation adjusted data be presented in 1979 annual reports to stockholders. The following supplementary information is supplied in accordance with the requirements of such statement for the purpose of providing certain information about the effects of both general inflation and changes in specific prices. It should be viewed as an estimate of the approximate effect of inflation, rather than as a precise measure.

***Statement of income from continuing operations adjusted for changing prices for the year ended December 31, 1979***

| | *In thousands of dollars* | | |
|---|---|---|---|
| | Conventional historical cost | Constant dollar average 1979 dollars | Current cost average 1979 dollars |
| Operating revenues | $1,516,503 | $1,516,503 | $1,516,503 |
| Fuel for electric generation | 380,101 | 380,101 | 380,101 |
| Electricity purchased | 159,453 | 159,453 | 159,453 |
| Gas purchased | 196,711 | 196,711 | 196,711 |
| Depreciation | 84,212 | 186,432 | 242,256 |
| Other operating and maintenance expenses | 467,440 | 467,440 | 467,440 |
| Federal and Canadian income taxes | 34,646 | 34,646 | 34,646 |
| Interest charges | 91,279 | 91,279 | 91,279 |
| Other income and deductions—net | (53,369) | (53,369) | (53,369) |
| | 1,360,473 | 1,462,693 | 1,518,517 |
| Income (loss) from continuing operations (excluding reduction to net recoverable cost) | $ 156,030 | $ 53,810* | $ (2,014) |
| Increase in specific prices (current cost) of utility plant held during year** | | | $ 588,420 |
| Reduction to net recoverable cost | | $ (308,561) | (42,609) |
| Effect of increase in general price level | | | (798,548) |
| Excess of increase in general price level over increase in specific prices after reduction to net recoverable cost | | | (252,737) |
| Gain from decline in purchasing power of net amounts owed | | 227,257 | 227,257 |
| Net | | $ (81,304) | $ (25,480) |

*Including the reduction to net recoverable cost, the income (loss) from continuing operations on a constant dollar basis would have been $(254,751) for 1979.

**At December 31, 1979, current cost of utility plant, net of accumulated depreciation, was $6,440,205 while historical cost or net cost recoverable through depreciation was $3,186,205.

Constant dollar amounts attempt to adjust for general inflation and represent historical costs stated in terms of dollars of equal purchasing power, as measured by the Consumer Price Index for all Urban Consumers. Current cost amounts reflect the changes in specific prices of plant from the date the plant was acquired to the present and differ from constant dollar amounts to the extent that specific prices have increased more or less rapidly than prices in general.

The current cost of utility plant net of accumulated depreciation and amortization, represents the estimated cost of replacing existing plant assets in kind. Since existing utility plant is not expected to be replaced precisely in kind due to technological changes, current cost does not necessarily represent the replacement cost of the Company's utility plant. The portion of the accumulated amortization relating to disposal costs of nuclear fuel was not used in the calculation of current costs but rather reclassified to a monetary liability. In most cases, current costs were determined by indexing surviving plant dollars by the Handy-Whitman Index of Public Utility Construction Costs. However, when an account could not be indexed by Handy-Whitman, other appropriate indices were used. The current year's provision for depreciation and amortization on the constant dollar and current cost amounts of utility plant was determined by applying the Company's average annual depreciation rates to the indexed plant amounts.

Fuel inventories, the cost of fuel used in generation, and electricity and gas purchased have not been restated from their historical cost in nominal dollars. The recovery of energy and purchased gas costs are limited to historical costs through the operation of the Company's electric and gas adjustment clauses. For this reason fuel inventories and deferred recoverable energy costs are effectively monetary assets. As prescribed, income taxes were not adjusted.

The Company is subject to the jurisdiction of regulatory commissions in the determination of a fair rate of return on its investment. Current ratemaking policy provides for the recovery of historical costs. Therefore, the cost of utility

plant, stated in terms of constant dollars or current cost, that exceeds the historical cost of plant is not presently recoverable in rates as depreciation, and is reflected as a reduction to net recoverable cost. While the ratemaking process gives no recognition to the current cost of replacing utility plant, based on past practices, the Company believes it will be allowed to earn on the increased cost of its net investment when replacement of facilities actually occurs.

To properly reflect the economics of rate regulation in the Statement of Income from Continuing Operations, the reduction of net utility plant to net recoverable cost should be offset by the gain from the decline in purchasing power of net amounts owed on borrowed funds. During a period of inflation, holders of monetary assets suffer a loss of general purchasing power while holders of monetary liabilities experience a gain. The gain from the decline in purchasing power of net amounts owed is primarily attributable to the substantial amount of debt which has been used to finance utility plant. Since the depreciation on this plant is limited to the recovery of historical costs, the Company does not have the opportunity to realize a holding gain on debt and is limited to recovery only of the embedded cost of debt capital.

**Five year comparison of selected supplementary financial data adjusted for effects of changing prices**

| Years ended December 31, | 1979 | 1978 | 1977 | 1976 | 1975 |
|---|---|---|---|---|---|
| | *In thousands of average 1979 dollars* | | | | |
| Operating revenues | $1,516,503 | $1,425,046 | $1,468,972 | $1,374,179 | $1,311,754 |
| **Historical cost information adjusted for general inflation** | | | | | |
| Income (loss) from continuing operations (excluding reduction to net recoverable cost) | $ 53,810 | | | | |
| Income (loss) per common share (after dividend requirements on preferred stock and excluding reduction to net recoverable cost) | $ 0.41 | | | | |
| Net assets at year-end at net recoverable cost | $1,304,929 | | | | |
| **Current cost information** | | | | | |
| Income (loss) from continuing operations (excluding reduction to net recoverable cost) | $ (2,014) | | | | |
| Income (loss) per common share (after dividend requirements on preferred stock and excluding reduction to net recoverable cost) | $ (0.47) | | | | |
| Excess of increase in general price level over increase in specific prices after reduction to net recoverable cost | $ 252,737 | | | | |
| Net assets at year-end at net recoverable cost | $1,304,929 | | | | |
| **General information** | | | | | |
| Gain from decline in purchasing power of net amounts owed | $ 227,257 | | | | |
| Cash dividends declared per common share | $ 1.44 | $ 1.52 | $ 1.58 | $ 1.58 | $ 1.63 |
| Market price per common share at year-end | $ 12.63 | $ 15.58 | $ 18.73 | $ 18.34 | $ 17.54 |
| Average consumer price index | 217.5 | 195.4 | 181.5 | 170.5 | 161.2 |

**NOTE 12. Commitments and Contingencies**

*Construction Program:* The Company presently estimates that the construction program for the years 1980 through 1982 will require approximately $744,000,000, excluding AFC and certain overheads capitalized. At December 31, 1979, substantial construction commitments existed, including those for the Company's share of Unit #2 at Nine Mile Point Nuclear Station and the Sterling Nuclear Station.

*Sterling Nuclear Station:* The Company has been sharing in the costs of constructing the jointly-owned Sterling Nuclear Station generating facility (see Note 5). On January 23, 1980, the New York State Board on Electric Generation Siting and the Environment (Siting Board) voted to vacate the construction permit it had issued two years ago, because it could no longer find a public need for the proposed plant. Since the Siting Board has withdrawn certification of the proposed plant, the project will be discontinued. Through December 31, 1979, the Company's cost associated with the Sterling Nuclear Station, when reduced for Federal income taxes, approximated $13,000,000. The Company has petitioned the PSC to seek recovery of these and all subsequently incurred costs associated with cancellation of this project. While management believes such costs will be recovered, no such assurance can be given.

*Nine Mile Point Nuclear Station Unit #2:* In January 1980, the Company and the other joint-owners of Nine Mile Point Nuclear Station Unit #2 (see Note 5) rescheduled the date of planned commercial operation from 1984 to 1986. The new construction schedule was made necessary by a number of continuing technical and regulatory uncertainties and a decision to reevaluate geologic design criteria. A revised cost estimate has not yet been prepared to reflect the new completion date, however, it is reasonable to expect a significant increase in cost based on the new construction schedule.

*Litigation:* Several electric customers have brought suit against the Company and the Power Authority of the State of New York (PASNY) requesting that certain power purchased from PASNY be allocated exclusively for their benefit and are asking monetary damages for the difference between rates charged by the Company and rates that would otherwise have been charged if this power had been furnished to them over the past six years. In the opinion of management, the ultimate liability, if any, resulting from this suit will not materially affect the consolidated financial statements of the Company.

*FERC Audit:* The staff of FERC has conducted a compliance audit of the Company covering the years 1973 through 1978. Among other things, a question concerning the base cost of nuclear fuel on which AFC should be applied was raised. If the associated recommended adjustment is sustained by FERC, the resulting reduction in retained earnings would approximate $13,000,000 through 1978. The Company believes that the adjustment is not justified and is contesting it. The recommended adjustment results from the FERC staff taking exception to regulatory accounting treatment prescribed by the PSC, the Company's primary rate setting body. Although FERC has ratemaking jurisdiction over only 6% of the Company's electric revenues, representing sales to other electric systems, it has the power to prescribe books of account on which reports to stockholders are based. Due to the extensive jurisdiction which the PSC has over the Company's affairs, it is the opinion of the Company that the financial statements based on the requirements of the PSC represent the proper presentation of the financial position and the results of operations of the Company.

**NOTE 13. Quarterly Financial Data (Unaudited)**

Operating revenues, operating income, net income and earnings per common share by quarters for 1979 and 1978 are shown in the following table. The Company, in its opinion, has included all adjustments (consisting only of normal recurring accruals except for giving effect to the deferral of Oswego Unit #6 investment tax credit during the quarter ending December 31, 1979—see Note 10) necessary for a fair statement of the results of operations for the quarters. Due to the seasonal nature of the utility business, the annual amounts are not generated evenly by quarter during the year.

| | *In thousands of dollars* | | | |
|---|---|---|---|---|
| Quarters ended | Operating revenues | Operating income | Net income | Earnings per common share |
| December 31 | | | | |
| 1979 | $416,066 | $41,570 | $28,005 | $.31 |
| 1978 | $321,788 | $33,881 | $26,977 | $.32 |
| September 30 | | | | |
| 1979 | $335,944 | $34,764 | $25,511 | $.29 |
| 1978 | $276,442 | $37,571 | $27,273 | $.32 |
| June 30 | | | | |
| 1979 | $352,107 | $50,114 | $41,878 | $.56 |
| 1978 | $309,666 | $47,976 | $35,527 | $.49 |
| March 31 | | | | |
| 1979 | $412,386 | $67,492 | $60,636 | $.86 |
| 1978 | $372,352 | $64,945 | $51,385 | $.78 |

# SUMMARY OF UTILITY PLANT

| At December 31, | *In thousands of dollars* 1979 | % | 1978 |
|---|---|---|---|
| **Utility plant:** | | | |
| Electric plant | **$2,859,533** | **68** | $2,680,99 |
| Nuclear fuel *(Note 3)* | **206,206** | **5** | 215,20 |
| Gas plant | **367,652** | **9** | 350,02 |
| Common plant | **63,920** | **1** | 59,72 |
| Construction work in progress | **721,217** | **17** | 599,41 |
| **Total utility plant** | **$4,218,528** | **100** | $3,905,37 |

# LONG-TERM DEBT

| At December 31, | *In thousands of dollars* 1979 | 1978 |
|---|---|---|
| *First Mortgage Bonds:* | | |
| 2¾% Series due January 1, 1980 | **$ 40,000** | $ 40,00 |
| 2⅞% Series due October 1, 1980 | **40,000** | 40,00 |
| 12.6% Series due October 1, 1981 | **125,000** | 125,00 |
| 3⅜% Series due December 1, 1981 | **15,000** | 15,00 |
| 3½% Series due February 1, 1983 | **25,000** | 25,00 |
| 3¼% Series due October 1, 1983 | **40,000** | 40,00 |
| 3⅛% Series due August 1, 1984 | **25,000** | 25,00 |
| 10⅝% Series due September 1, 1985 | **47,000** | 47,00 |
| 3⅝% Series due May 1, 1986 | **30,000** | 30,00 |
| 4⅞% Series due September 1, 1987 | **50,000** | 50,00 |
| 3⅞% Series due June 1, 1988 | **50,000** | 50,00 |
| 4¾% Series due April 1, 1990 | **50,000** | 50,00 |
| 4½% Series due November 1, 1991 | **40,000** | 40,00 |
| 4⅝% Series due December 1, 1994 | **40,000** | 40,00 |
| 5⅞% Series due November 1, 1996 | **45,000** | 45,00 |
| 6¼% Series due August 1, 1997 | **40,000** | 40,00 |
| 6½% Series due August 1, 1998 | **60,000** | 60,00 |
| 9⅛% Series due December 1, 1999 | **75,000** | 75,00 |
| 7⅜% Series due February 1, 2001 | **65,000** | 65,00 |
| 7⅝% Series due February 1, 2002 | **80,000** | 80,00 |
| 7¾% Series due August 1, 2002 | **80,000** | 80,00 |
| 8¼% Series due December 1, 2003 | **80,000** | 80,00 |
| 9½% Series due December 1, 2003 | **50,000** | 31,50 |
| 9.95% Series due September 1, 2004 | **100,000** | — |
| 10.2% Series due March 1, 2005 | **44,000** | 47,00 |
| 8.35% Series due August 1, 2007 | **75,000** | 75,00 |
| 8⅝% Series due December 1, 2007 | **50,000** | 50,00 |
| *Paul Smith's Electric Light & Power & Railroad Company First Mortgage Bonds:* | | |
| 4½% Series due July 1, 1979 | **—** | 45 |
| 5½% Series due May 1, 1985 | **450** | 45 |
| *Promissory Note*, 8% Series A due June 1, 2004 | **46,600** | 46,60 |
| *Notes payable:* | | |
| 7¾% due in equal installments, November 1, 1979 and 1980 | **6,000** | 12,00 |
| Prime rate plus ½% (not to exceed 7½%) due in equal quarterly installments through April 1, 1984 | **11,250** | 13,75 |
| *Unamortized premium* | **6,256** | 6,69 |
| **Total long-term debt** | **1,531,556** | 1,425,44 |
| Less long-term debt due within one year | **88,500** | 10,45 |
| | **$1,443,056** | $1,414,99 |

# PREFERRED STOCK

*Cumulative preferred stock, authorized 3,400,000 shares, $100 par value and 9,600,000 shares, $25 par value*
*Cumulative preference stock, authorized 4,000,000 shares, $25 par value*

| At December 31. | In thousands of dollars 1979 | 1978 | Redemption price per share (Before adding accumulated dividends) December 31, 1979 | Eventual Minimum |
|---|---|---|---|---|
| **Non-redeemable (optionally redeemable)** | | | | |
| **Preferred $100 par value** | | | | |
| 3.40% Series; 200,000 shares | **$ 20,000** | $ 20,000 | **$103.50** | $103.50 |
| 3.60% Series; 350,000 shares | **35,000** | 35,000 | **104.85** | 104.85 |
| 3.90% Series; 240,000 shares | **24,000** | 24,000 | **106.00** | 106.00 |
| 4.10% Series; 210,000 shares | **21,000** | 21,000 | **102.00** | 102.00 |
| 4.85% Series; 250,000 shares | **25,000** | 25,000 | **102.00** | 102.00 |
| 5.25% Series; 200,000 shares | **20,000** | 20,000 | **102.00** | 102.00 |
| 6.10% Series; 250,000 shares | **25,000** | 25,000 | **103.00** | 101.00 |
| 7.72% Series; 400,000 shares | **40,000** | 40,000 | **107.37** | 102.36 |
| | **$210,000** | $210,000 | | |
| **Redeemable (mandatorily redeemable—Note 7)** | | | | |
| **Preferred $100 par value** | | | | |
| 7.45% Series; 546,000 and 564,000 shares | **$ 54,600** | $ 56,400 | **106.01** | 100.00 |
| 10.60% Series; 380,000 and 400,000 shares | **38,000** | 40,000 | **110.60** | 102.65 |
| **Preferred $25 par value** | | | | |
| 8.375% Series; 1,600,000 shares | **40,000** | 40,000 | **26.98** | 25.00 |
| 9.75% Series; 1,200,000 shares | **30,000** | 30,000 | **27.055** | 25.00 |
| **Preference $25 par value** | | | | |
| 7.75% Series; 1,360,000 shares | **34,000** | 34,000 | * | 25.00 |
| | **196,600** | 200,400 | | |
| **Less sinking fund requirements** | **6,950** | 1,800 | | |
| | **$189,650** | $198,600 | | |

*Not redeemable until October 1, 1981

# FINANCIAL STATISTICS

| | 1979 | 1978 |
|---|---|---|
| **Capitalization ratios:** | | |
| Common stock equity | **39.0%** | 36.9% |
| Preferred stock | **13.2** | 14.1 |
| Long-term debt | **47.8** | 49.0 |
| **Ratio of earnings to fixed charges** | **2.61** | 2.58 |
| **Ratio of earnings to fixed charges and preferred stock dividends** | **2.03** | 1.95 |
| **Other ratios—% of operating revenues:** | | |
| Maintenance and depreciation | **12.1** | 12.6 |
| Taxes | **13.3** | 14.3 |
| Operating income | **12.8** | 14.4 |
| Balance available for common stock | **8.5** | 8.8 |
| **Ratio of depreciation reserve to gross utility plant** | **26.3%** | 26.2% |
| **Ratio of mortgage bonds to net utility plant** | **47.0%** | 46.7% |

# ELECTRIC AND GAS STATISTICS

## Electric capability

| Thermal | At January 1, | Thousands of kilowatts 1980 | % | 1979 |
|---|---|---|---|---|
| *Coal fuel* | | | | |
| Huntley, Niagara River | | 785 | 11 | 785 |
| Dunkirk, Lake Erie | | 585 | 8 | 585 |
| *Total coal fuel* | | 1,370 | 19 | 1,370 |
| *Residual oil fuel* | | | | |
| Albany, Hudson River | | 400 | 6 | 400 |
| Oswego, Lake Ontario | | 1,200 | 17 | 1,190 |
| Roseton, Hudson River | | 360 | 5 | 360 |
| *Middle distillate oil fuel* | | | | |
| 20 Combustion turbine and diesel units | | 354 | 5 | 354 |
| *Total oil fuel* | | 2,314 | 33 | 2,304 |
| *Nuclear fuel* | | | | |
| Nine Mile Point, Lake Ontario | | 610 | 9 | 610 |
| Purchased—firm contract | | | | |
| Power Authority— | | | | |
| FitzPatrick, Lake Ontario | | 154 | 2 | 176 |
| *Total nuclear fuel* | | 764 | 11 | 786 |
| **Total thermal sources** | | 4,448 | 63 | 4,460 |
| **Hydro** | | | | |
| Owned and leased hydro stations (81) | | 733 | 10 | 733 |
| Purchased—firm contracts | | | | |
| Power Authority—Niagara River | | 1,122 | 16 | 1,122 |
| Power Authority—St. Lawrence River | | 115 | 2 | 115 |
| Power Authority— | | | | |
| Blenheim-Gilboa Pumped Storage Plant | | 550 | 8 | 550 |
| Other | | 76 | 1 | 76 |
| **Total hydro sources** | | 2,596 | 37 | 2,596 |
| **Total capability*** | | 7,044 | 100 | 7,056 |

| | 1979 | 1978 |
|---|---|---|
| **Electric peak load during year** | 5,641 | 5,485 |

*Available capability can be increased during heavy load periods by purchases from neighboring interconnected systems. Hydro station capability is based on average December stream-flow conditions.

## Electricity generated and purchased *(Millions of kw-hrs.)*

| | 1979 | % | 1978 | % |
|---|---|---|---|---|
| *Thermal* | | | | |
| Generated | | | | |
| Coal | 7,275 | 20 | 7,016 | 20 |
| Oil | 8,534 | 24 | 8,691 | 25 |
| Nuclear | 3,005 | 8 | 4,467 | 13 |
| Purchased—Nuclear from | | | | |
| Power Authority | 722 | 2 | 886 | 2 |
| *Total thermal* | 19,536 | 54 | 21,060 | 60 |
| *Hydro* | | | | |
| Generated | 3,641 | 10 | 3,472 | 10 |
| Purchased from Power Authority | 8,263 | 23 | 8,563 | 24 |
| *Total hydro* | 11,904 | 33 | 12,035 | 34 |
| *Other purchased power—various sources* | 4,621 | 13 | 2,118 | 6 |
| **Total generated and purchased** | 36,061 | 100 | 35,213 | 100 |

| | 1979 | 1978 |
|---|---|---|
| **Electric sales** *(Millions of kw-hrs.)* | | |
| Residential | 8,269 | 8,127 |
| Commercial | 9,279 | 9,117 |
| Industrial | 12,474 | 12,187 |
| Municipal service | 274 | 276 |
| Other electric systems | 3,022 | 2,675 |
| | 33,315 | 32,382 |
| **Electric revenues** *(Thousands of dollars)* | | |
| Residential | $ 357,818 | $ 319,667 |
| Commercial | 393,173 | 333,862 |
| Industrial | 312,833 | 258,649 |
| Municipal service | 23,832 | 21,515 |
| Other electric systems | 83,188 | 59,445 |
| Miscellaneous | 40,224 | 27,175 |
| | $1,211,068 | $1,020,313 |
| **Electric customers** *(Average)* | | |
| Residential | 1,206,469 | 1,197,060 |
| Commercial | 130,119 | 128,481 |
| Industrial | 2,906 | 2,873 |
| Other | 3,189 | 2,257 |
| | 1,342,683 | 1,330,671 |
| **Residential** *(Average)* | | |
| Annual kw-hr. use per customer | 6,854 | 6,790 |
| Cost to customer per kw-hr. | 4.33¢ | 3.93¢ |
| Annual revenue per customer | $296.58 | $267.04 |

| | 1979 | 1978 |
|---|---|---|
| **Gas sales** *(Thousands of dekatherms)* | | |
| Residential | 51,895 | 54,793 |
| Commercial | 23,415 | 23,734 |
| Industrial | 17,109 | 15,630 |
| Other gas systems | 4,199 | 3,845 |
| | 96,618 | 98,002 |
| **Gas revenues** *(Thousands of dollars)* | | |
| Residential | $176,567 | $158,599 |
| Commercial | 71,139 | 60,794 |
| Industrial | 46,260 | 32,422 |
| Other gas systems | 10,014 | 6,858 |
| Miscellaneous | 1,455 | 1,262 |
| | $305,435 | $259,935 |
| **Gas customers** *(Average)* | | |
| Residential | 383,617 | 382,691 |
| Commercial | 29,009 | 28,451 |
| Industrial | 525 | 522 |
| Other | 2 | 2 |
| | 413,153 | 411,666 |
| **Residential** *(Average)* | | |
| Annual use per customer *(dekatherms)* | 135.3 | 143.2 |
| Cost to customer *(per dekatherm)* | $3.40 | $2.89 |
| Annual revenue per customer | $460.27 | $414.43 |
| Maximum day gas sendout *(dekatherms)* | 750,666 | 655,408 |

# OFFICERS

**John G. Haehl, Jr.**
President and Chief Executive Officer

**James Bartlett**
Executive Vice President

**William J. Donlon**
Senior Vice President

**James J. Miller**
Senior Vice President

**John H. Terry**
Senior Vice President, General Counsel and Secretary

**Richard F. Torrey**
Senior Vice President

**Richard C. Clancy**
Vice President—Research and Environmental Affairs

**Donald P. Dise**
Vice President—Engineering

**John J. Ehlinger**
Vice President—Employee Relations

**John M. Endries**
Vice President and Controller

**William C. Franklin**
Vice President—Purchasing

**John M. Haynes**
Vice President and Treasurer

**John P. Hennessey**
Vice President—Management Systems and Services

**Eugene J. Morel**
Vice President—Employee Services and Risk Management

**James F. Morrell**
Vice President—Corporate Planning

**Gerald K. Rhode**
Vice President—System Project Management

**Rudolph R. Schneider***
Vice President—Electric Production

**Kenneth A. Tramutola**
Vice President—Rates

**Robert M. Cleary, Jr.**
Vice President and General Manager—Western Division

**Raymond Kolarz**
Vice President and General Manager—Central Division

**Richard H. Kukuk**
Vice President and General Manager—Eastern Division

**Edward P. Gueth, Jr.**
Assistant General Counsel

**Herman B. Noll**
Assistant General Counsel

**Anthony J. Baratta, Jr.**
Assistant Controller

**Adam F. Shaffer**
Assistant Controller

**Henry B. Wightman, Jr.**
Assistant Controller

**John W. Powers**
Assistant Treasurer

**Harold J. Bogan**
Assistant Secretary

**Joseph F. Cleary**
Assistant Secretary—Eastern Division

**Frederick C. McCall**
Assistant Secretary—Western Division

*Retired as of Dec. 31, 1979

# DIRECTORS

**James Bartlett**
Executive Vice President, Syracuse

**Thomas J. Brosnan**
Consultant (formerly Vice President—Research and Development, Environmental Matters), Syracuse

**Edmund M. Davis**
Partner, Hiscock, Lee, Rogers, Henley & Barclay, attorneys-at-law, Syracuse

**Edward W. Duffy**
Chairman of the Board and Chief Executive Officer, Marine Midland Banks, Inc., a bank holding company, Buffalo

**John G. Haehl, Jr.**
President and Chief Executive Officer, Syracuse

**Edwin F. Jaeckle**
Senior Partner, Jaeckle, Fleischmann & Mugel, attorneys-at-law, Buffalo

**Lauman Martin**
Consultant (formerly Senior Vice President and General Counsel), Syracuse

**Baldwin Maull**
Director of various corporations, New York

**Martha Hancock Northrup**
Housewife, former President, Crouse-Irving Memorial Hospital Board, Syracuse

**Frank P. Piskor**
President, St. Lawrence University, Canton

**Donald B. Riefler**
Chairman, Sources and Uses of Funds Committee, Morgan Guaranty Trust Company of New York, commercial bank, New York

**Lewis A. Swyer**
President, L.A. Swyer Company, Inc., builders and construction managers, Albany

**John G. Wick**
President and Chief Executive Officer, Merchants Insurance Group, Buffalo

BOARD COMMITTEES

**Executive Committee**
John G. Haehl, Jr., Chairman
Edmund M. Davis
Edwin F. Jaeckle
Frank P. Piskor
Baldwin Maull
John H. Terry, Secretary

**Compensation Committee**
Baldwin Maull, Chairman
Edwin F. Jaeckle
Edmund M. Davis

**Audit Committee**
Edward W. Duffy, Chairman
Lewis A. Swyer
Frank P. Piskor

**Committee on Corporate Public Policy**
Frank P. Piskor, Chairman
Martha H. Northrup
Lewis A. Swyer

**Finance Committee**
Donald B. Riefler, Chairman
John G. Wick
Edmund M. Davis

300 ERIE BOULEVARD WEST
SYRACUSE, NEW YORK 13202

Whiteface Mountain and other rugged Adirondack peaks rise in distance as Niagara Mohawk line mechanic works on new 115,000-volt line built to meet energy demands of 1980 Olympic Winter Games at Lake Placid. Construction of 10-mile circuit, achieved in only a few months time, was termed "spectacular accomplishment" in report by N.Y. State Public Service Commission.