CHAPTER 4100
DEPARTMENT OF ENERGY AND ECONOMIC DEVELOPMENT
ENERGY INFORMATION REPORTING

ELECTRICAL UTILITIES

4100.0200 DEFINITIONS.

Subpart 1. **Scope.** For purposes of parts 4100.0200 to 4100.2900, the following definitions shall apply.

Subp. 2. **Adjusted net demand.** "Adjusted net demand" means system demand, minus firm purchases, plus firm sales.

Subp. 3. **Agency.** "Agency" means the Minnesota Department of Energy and Economic Development.

Subp. 4. **Annual adjusted net demand.** "Annual adjusted net demand" means annual system demand, minus firm purchases, plus firm sales.

Subp. 5. **Annual electrical consumption.** "Annual electrical consumption" means sales of megawatt-hours of electricity to ultimate consumers over a 12-month period beginning January 1 and ending December 31 of the reporting year.

Subp. 6. **Annual system demand.** "Annual system demand" means the highest system demand occurring during the 12-month period ending with the current month. For seasonal reporting the current month is the last month of the season being reported.

Subp. 7. **Capacity factor.** "Capacity factor" is the ratio, expressed as a percent, of gross generation in megawatt-hours to the product of period-hours times maximum dependable capacity. There are 8,760 period-hours per year, except during a leap year when there are 8,784. Maximum dependable capacity is the dependable plant capacity in winter or summer, whichever is smaller.

Subp. 8. **Director.** "Director" means the director of the Minnesota Department of Energy and Economic Development.

Subp. 9. **Distribution-only utility.** "Distribution-only utility" means a utility that distributes electricity to ultimate consumers but does not generate electricity except on a standby emergency basis. Such emergency power shall not consist of more than five percent of total megawatt-hours sales to ultimate consumers.

Subp. 10. **Firm purchases; firm sales.** "Firm purchases" and "firm sales" mean the amount of power to be purchased or sold and intended to have assured availability.

Subp. 11. **Forced outage rate.** "Forced outage rate" is a measure of the total time the plant was unavailable due to forced outage. It is the ratio, expressed as a percent of forced outage hours to the sum of the total number of hours the plant was actually operated with breakers closed to the station bus plus the forced outage hours.

Subp. 12. **Generating and transmission utility.** "Generating and transmission utility" means any utility that generates in excess of five percent of its total megawatt-hours sales to its own ultimate consumers.

Subp. 13. **Heat rate.** "Heat rate" is the measure of thermal efficiency of a generating station or plant expressed in Btu's per net kilowatt-hour and computed by dividing the total Btu content of fuel burned for electric generation by the resulting net kilowatt-hour generation.

Subp. 14. **Last calendar year.** "Last calendar year" means the calendar year immediately preceding the year in which reports are required to be filed.

Subp. 15. **Load factor.** "Load factor" means the ratio of the average load in megawatts supplied during a designated period to the maximum load in megawatts that was supplied during that designated period.

Subp. 16. **Minnesota service area.** "Minnesota service area" means that portion of a utility's system lying within Minnesota.

Subp. 17. **Minnesota Wisconsin Power Suppliers Group; MWPSG.** "Minnesota Wisconsin Power Suppliers Group" or "MWPSG" means the planning group that represents the following utilities: Northern States Power Company, Minnesota Power, Ottertail Power Company, Interstate Power Company, Minnkota Power Cooperative, Cooperative Power Association, United Power Association, Dairyland Power Cooperative, and the Southern Minnesota Municipal Power Agency.

Subp. 18. **Municipal power agency.** "Municipal power agency" means a municipal corporation incorporated pursuant to Minnesota Statutes, sections 453.51 to 453.62. For purposes of these parts, a municipal power agency may elect to supply in aggregate the data required by these parts for its members. All data submitted in such fashion shall be in the format specified by the director.

Subp. 19. **Net generating capacity.** "Net generating capacity" means the total

amount of kilowatts, less station use, that all the generating facilities of a system could supply at the time of its maximum system demand, including the capacity of the generating units that are temporarily out of service for maintenance or repair.

Subp. 20. **Net generation.** "Net generation" means gross generation minus megawatt-hours used for station use.

Subp. 21. **Net reserve capacity obligation.** "Net reserve capacity obligation" means the annual adjusted net demand multiplied by the percent reserve capacity requirement.

Subp. 22. **Operating availability.** "Operating availability" is a measure of the total time during which a plant is available. It is the ratio, expressed as a percent, of available hours to period hours. Available hours are the sum of service hours and reserve shutdown hours.

Subp. 23. **Participation power.** "Participation power" means power and energy that are sold from a specific generating unit or units for a period of six or more months on a continuously available basis (except when such unit or units are temporarily out of service for maintenance, during which time the delivery of energy from other generating units is at the seller's option).

Subp. 24. **Participation purchases; participation sales.** "Participation purchases" and "participation sales" mean purchases and sales under a participation power agreement or a seasonal participation power agreement.

Subp. 25. **Peak demand.** "Peak demand" means the highest megawatt demand during a designated period recorded on a one-hour integrated reading basis.

Subp. 26. **Residential electrical space heating customer.** "Residential electrical space heating customer" means a residential customer who uses electricity as a source of space heating throughout the entire premises from permanently installed electric heating equipment.

Subp. 27. **Seasonal adjusted net demand.** "Seasonal adjusted net demand" means seasonal system demand, minus firm purchases, plus firm sales.

Subp. 28. **Seasonal participation power.** "Seasonal participation power" means participation power sold and bought on a seasonal (summer or winter) basis.

Subp. 29. **Seasonal system demand.** "Seasonal system demand" means the maximum system demand on the applicant's system that occurs or is expected to occur in any normal summer season or winter season.

Subp. 30. **Summer season.** "Summer season" means the period from May 1 through October 31.

Subp. 31. **System.** "System" means that combination of generating, transmission, and distribution facilities that makes up the operating physical plant of the utility, whether owned or nonowned, for the delivery of electrical energy to ultimate consumers, and includes the geographic area where the utility's ultimate consumers are located.

Subp. 32. **System demand.** "System demand" means the number of megawatts that is equal to the megawatt-hours required in any clock hour, attributable to energy required by the system during such hour for supply of firm energy to ultimate consumers, including system losses, and also including any transmission losses occurring on other systems and supplied by the system for transmission of firm energy, but excluding generating station uses and excluding transmission losses charged to another system.

Subp. 33. **Ultimate consumers.** "Ultimate consumers" means consumers purchasing electricity for their use and not for resale.

Subp. 34. **Utility.** "Utility" means any entity engaged in the generation, transmission, or distribution of electrical energy, including but not limited to a private investor-owned utility or a public or municipally owned utility.

Subp. 35. **Winter season.** "Winter season" means the period from November 1 through April 30.

Statutory Authority: *MS s 116J.10*

History: *L 1983 c 289 s 115 subd 1*

4100.0300 PURPOSE AND SCOPE.

Subpart 1. **Purpose.** The purpose of parts 4100.0200 to 4100.2900 is to implement the forecasting, statistical, and informational reporting requirements of Minnesota Statutes, sections 116J.17 and 116J.18. These parts are adopted pursuant to the powers of the director conferred by Minnesota Statutes, section 116J.10, clause (a), and are designed to identify emerging energy trends based on supply and demand, conservation and public health and safety factors, and to determine the level of statewide and service area energy needs.

Subp. 2. **Scope.** Each electric utility serving the state of Minnesota shall submit the information required by these parts to the director in the form specified by him.

Statutory Authority: *MS s 116J.10*

4100.0400 REGISTRATION.

Any electric utility that commences operations in the state shall file a registration statement with the director within 30 days after commencing operation. Each registration statement shall be on forms issued by the director and shall contain the name and headquarter address of the utility, the type of utility, the names and addresses of all officers of the utility, and the name, address, and telephone number of a person who may be contacted for information about the utility. Registration statements must be updated as a part of each utility's annual report.

Statutory Authority: *MS s 116J.10*

4100.0500 REPORTING DATES.

Subpart 1. **Annual.** Except as provided by the director, each generating and transmission utility shall file with the director the information required by parts 4100.0400, 4100.0900, and 4100.1100 to 4100.2800 by July 1 of each year.

Except as provided by the director, each distribution-only utility shall file with the director only the information required by parts 4100.0400, 4100.0900, and 4100.2800 by July 1 of each year.

Subp. 2. **Quarterly.** Except as provided by the director, each utility shall file with the director the information required by part 4100.2900 on a quarterly basis as follows:

A. information for the period of January 1 to March 31 shall be filed by April 30;

B. information for the period of April 1 to June 30 shall be filed by July 31;

C. information for the period of July 1 to September 30 shall be filed by October 31; and

D. information for the period of October 1 to December 31 shall be filed by January 31 of the following year.

Subp. 3. **Changes to quarterly reports.** No changes shall be made in reporting dates set forth in subpart 2 unless each reporting utility that would be affected has been given written notice of such change 30 or more days before the effective date of such change.

Statutory Authority: *MS s 116J.10*

4100.0600 CORRECTIONS.

Substantial corrections of any report or statement must be filed with the agency within ten days following the date of the event prompting the change in reported information or the date upon which the person filing became aware of

the inaccuracy. The change or correction shall identify the form and the paragraph of the information to be changed or corrected.

Statutory Authority: *MS s 116J.10*

4100.0700 FEDERAL OR STATE DATA SUBSTITUTION.

Upon written request by any utility, the director may allow it to substitute data provided to the federal government or another state agency in lieu of data required by these parts if the data required by both agencies is substantially the same.

Statutory Authority: *MS s 116J.10*

4100.0800 MINNESOTA WISCONSIN POWER SUPPLIERS GROUP.

For purposes of parts 4100.0200 to 4100.2900 the MWPSG may provide a joint report to either the agency or both the agency and the Minnesota Environmental Quality Board (MEQB) on behalf of its member utilities. Such a joint report shall contain all information required by these parts and shall be in a format deemed acceptable by the director. Such a joint report shall fulfill the obligations of the member utilities in meeting these parts and the statutory informational requirements of Minnesota Statutes, sections 116J.17 and 116J.18.

Within these parts, where the agency's reporting requirements and those of the MEQB are similar, the MWPSG in its report need file only one joint listing of the required information so long as that listing provides all the data requirements of these parts and is in a format acceptable to the director.

The following parts within these reporting requirements shall be considered similar to those of the MEQB: parts 4100.1700, items D to G, and 4100.2200 to 4100.2500, subpart 2. In addition to these parts, the director may designate other rules similar as well.

Statutory Authority: *MS s 116J.10*

4100.0900 FEDERAL REPORTS FILED BY UTILITIES.

Each utility shall identify to the director all forms and reports that it regularly files with the Federal Power Commission, the Rural Electrification Administration, and other federal agencies. Upon request of the director, each utility shall make copies of any such forms or reports available to the director.

Statutory Authority: *MS s 116J.10*

BASIC FORECAST AND CURRENT DATA

4100.1100 ANNUAL DATA AND FORECAST.

Each utility shall submit annually to the director data for the last calendar year and a forecast for the present year and the 14 subsequent years of the generation, the peak demand, and the consumption of electrical energy.

Statutory Authority: *MS s 116J.10*

4100.1200 BASIC FORECAST AND DATA.

The basic forecast and current data shall contain the following data for each year cited in part 4100.1100 in the form requested below.

The annual electrical consumption, generation, and peak demand forecast shall include:

A. annual total electrical consumption in megawatt-hours by ultimate consumers within the utility's Minnesota service area;

B. annual total electrical consumption in megawatt-hours by the utility's ultimate consumers outside its Minnesota service area;

C. the number of megawatt-hours the utility has received or expects to receive from other systems for sale to its ultimate consumers or to other utilities;

D. the number of megawatt-hours the utility has delivered or expects to deliver to other systems for resale;

E. total annual net generation of electrical energy by the utility in megawatt-hours;

F. electrical energy loss in megawatt-hours due to transmission line and substation losses;

G. peak demand for the system during the summer season and during the winter season; and

H. load factor for the system during the summer season and during the winter season.

Statutory Authority: *MS s 116J.10*

4100.1300 LAST CALENDAR YEAR HISTORICAL DATA.

For the last calendar year historical data shall be supplied. If recorded figures are not available, estimates shall be used and shall be identified as such. When the recorded figures become available, they shall be supplied as a supplement to the data. For each other reporting year, a forecast shall be made using the methodology that yields the most meaningful results for the utility's system. The forecast shall be based on the factors that the reporting utility deems most likely to occur in its Minnesota service area. The procedures, assumptions, and factors used in arriving at the forecast shall be stated in writing. Each utility shall comment on probable deviations from the projection. Any utility required to file an extended forecast pursuant to parts 4100.1600 to 4100.1900 need not file the forecast documentation required in this part.

Statutory Authority: *MS s 116J.10*

EXTENDED FORECAST

4100.1600 WHO MUST FILE.

The following utilities must file an extended forecast: Northern States Power Company, Minnesota Power, Otter Tail Power Company, Interstate Power Company, Minnkota Power Cooperative, Cooperative Power Association, United Power Association and Dairyland Power Cooperative, and the Southern Minnesota Municipal Power Agency. Data that is compiled within the same calendar year for either an extended forecast or a certificate of need application may be substituted interchangeably to satisfy those portions of both sets of rules that have identical data requirements. In such cases, references to the material substituted and a copy of the appropriate reference material shall be submitted to meet the reporting requirements.

Statutory Authority: *MS s 116J.10*

4100.1700 CONTENT OF EXTENDED FORECAST.

The following data shall be provided:

A. annual electrical consumption by ultimate consumers and number of customers at year's end within the utility's system and for its Minnesota service area only for the past calendar year, the present calendar year, and the subsequent 14 years, for each of the following categories:

(1) farm, excluding irrigation and drainage pumping (for reporting purposes, any tract of land used primarily for agricultural purposes);

(2) irrigation and drainage pumping;

(3) nonfarm residential (including electricity supplied through a single meter for both residential and commercial uses reported according to its principal use and apartment buildings reported as residential even if not separately metered);

(4) commercial (including wholesale and retail trade; communications industries; public and private office buildings, banks, and dormitories; insurance, real estate and rental agencies; hotels and motels; personal business and auto repair services; medical and educational facilities; governmental units,

excluding military bases; warehouses other than manufacturer-owned; electric, gas, water, and water pumping other than pumping for irrigation, and other utilities);

(5) mining;

(6) industrial (including all manufacturing industries, construction operations, and petroleum refineries);

(7) street and highway lighting;

(8) electrified transportation (including energy supplied for the propulsion of vehicles, but not energy supplied for office buildings, depots, signal lights, or other associated facilities that shall be reported as commercial or industrial);

(9) other (including municipal water pumping facilities, oil and gas pipeline pumping facilities, military camps and bases, and all other consumers not reported in subitems (1) to (8)); and

(10) the sum of subitems (1) to (9);

B. an estimate of the demand for power by ultimate consumers in the utility's system for each of the categories listed in item A at the time of the last annual system peak demand;

C. the utility's system peak demand by month for the last calendar year;

D. the utility's seasonal firm purchases and seasonal firm sales for each utility involved in each transaction for the last year, the present year, and the 14 subsequent years;

E. the utility's seasonal participation purchases and participation sales for each utility involved in each transaction for the last year, the present year, and the 14 subsequent years;

F. for the summer season and for the winter season of the last year, the present year, and the 14 subsequent years, the load and generation capacity data requested in subitems (1) to (13), including all anticipated purchases, sales, capacity retirements, and capacity additions, including those that may depend upon certificates of need not yet issued:

(1) seasonal system demand;

(2) annual system demand;

(3) total seasonal firm purchases;

(4) total seasonal firm sales;

(5) seasonal adjusted net demand (subitem (1) minus subitem (3) plus subitem (4));

(6) annual adjusted net demand (subitem (2) minus subitem (3) plus subitem (4));

(7) net generating capacity;

(8) total participation purchases;

(9) total participation sales;

(10) adjusted net capability (subitem (7) plus subitem (8) minus subitem (9));

(11) net reserve capacity obligation;

(12) total firm capacity obligation (subitem (5) plus subitem (11)); and

(13) surplus or deficit (-) capacity (subitem (11) minus subitem (13));

G. for the present calendar year and the subsequent 14 years, each utility shall provide a list in megawatts of proposed additions and retirements in generating capability; and

H. the utility's method of determining its system reserve margin and the appropriateness of the margin.

Statutory Authority: *MS s 116J.10*

4100.1900 FORECAST DOCUMENTATION.

Subpart 1. **Forecast methodology.** Each applicant may use the forecast methodology that yields the most useful results for its system. However, the applicant shall detail in written form the forecast methodology employed to obtain the forecasts provided under parts 4100.1100 to 4100.1700, including:

A. the overall methodological framework that is used;

B. the specific analytical techniques that are used, their purpose, and the components of the forecast to which they have been applied;

C. the manner in which these specific techniques are related in producing the forecast;

D. where statistical techniques have been used, the purpose of the technique, typical computations (e.g., computer printouts, formulas used) specifying variables and data, and the results of appropriate statistical tests;

E. forecast confidence levels or ranges of accuracy for annual peak demand and annual electrical consumption;

F. a brief analysis of the methodology used, including its strengths and weaknesses, its suitability to the system, cost considerations, data requirements, past accuracy, and any other factors considered significant by the utility; and

G. an explanation of any discrepancies that appear between the forecasts presented by the utility in part 4100.1700 and those contained in parts 4100.1100 to 4100.1300 this year or in the past years.

Subp. 2. **Data base for forecasts.** The utility shall discuss in written form the data base used in arriving at the forecast presented in parts 4100.1100 to 4100.1700, including:

A. a complete list of all data sets used in making the forecast, including a brief description of each data set and an explanation of how each was obtained, (e.g., monthly observations, billing data, consumer survey, etc.) or a citation to the source (e.g., population projection from the state demographer); and

B. a clear identification of any adjustments made to raw data to adapt them for use in forecasts, including the nature of the adjustment, the reason for the adjustment, and the magnitude of the adjustment.

Subp. 3. **Discussion.** The utility shall discuss in writing each essential assumption made in preparing the forecasts, including the need for the assumption, the nature of the assumption, and the sensitivity of forecast results to variations in the essential assumptions.

Subp. 4. **Subject of assumption.** The utility shall discuss the assumptions made regarding the availability of alternative sources of energy, the expected conversion from other fuels to electricity or vice versa, future prices of electricity for customers in the utility's system and the effect that such price changes will likely have on the utility's system demand, the assumptions made in arriving at any data requested in parts 4100.1100 to 4100.1700 that is not available historically or not generated by the utility in preparing its own internal forecast, the effect of existing energy conservation programs under federal or state legislation on long-term electrical demand, the projected effect of new conservation programs that the utility deems likely to occur through future state and federal legislation on long-term electrical demand, and any other factor considered by the utility in preparing the forecast. In addition the utility shall state what assumptions were made, if any, regarding current and anticipated saturation levels of major electric appliances and electric space heating within the utility's service area. If a utility makes no assumptions in preparing its forecast with regard to current and anticipated saturation levels of major electrical appliances and electric space heating it shall simply state this in its discussion of assumptions.

Subp. 5. **Coordination of forecasts with other systems.** The utility shall provide in writing:

A. a description of the extent to which the utility coordinates its load forecasts with those of other systems, such as neighboring systems, associate systems in a power pool, or coordinating organizations; and

B. a description of the manner in which such forecasts are coordinated, and any problems experienced in efforts to coordinate load forecasts.

Statutory Authority: *MS s 116J.10*

GENERATING FACILITIES

4100.2100 PRESENT FACILITIES.

Each utility required to report under part 4100.0500, subpart 1, item A shall provide the following information with regard to each power plant serving or capable of serving its Minnesota service area as of January 1 of the current year:

A. the name and type of the plant;

B. its location and address;

C. actual summer and winter plant capacity as measured by the maximum load that could be supplied by present equipment on a peaking basis;

D. the total number of net megawatt-hours generated by the plant for nonplant use during the last calendar year;

E. the annual heat rate of the plant;

F. the quantities of primary and secondary fuels consumed during the last calendar year;

G. the year in which the plant or each unit of a multiunit plant began operation;

H. the type of unit and name plate megawatt rating for each unit of generating equipment in the plant; and

I. if available, for all base load plants provide the capacity factor, operating availability, and forced outage rate.

Statutory Authority: *MS s 116J.10*

4100.2200 FUTURE FACILITY ADDITIONS.

Each utility required to report under part 4100.0500, subpart 1, item A, shall estimate the additional power plants or additions to existing plants necessary to provide for the energy growth predicted by the forecasts in parts 4100.1100 to 4100.1900. Each utility shall supply the following information about each additional plant or addition:

A. the proposed general location of each plant currently in the planning stage, or the actual location of each plant currently under construction;

B. the year the plant is to begin operation;

C. the estimated cost of the new facility at the time of construction;

D. the estimated summer and winter plant capacity of anticipated generating equipment;

E. the estimated total annual net megawatt-hours generated for nonplant use by the plant operating at normal conditions under normal maintenance and circumstances, during its first full calendar year of operation;

F. the estimated type and amount of fuel to be used to operate the plant on an annual basis under conditions set forth in item E;

G. the estimated heat rate of the plant; and

H. the type of unit or units proposed for the plant.

Statutory Authority: *MS s 116J.10*

4100.2300 FUTURE FACILITY RETIREMENTS.

Each utility required to report under part 4100.0500, subpart 1, item A, shall list any planned facility retirements that will take place within the next 15 years.

Each utility shall provide the following information about each facility retirement: the location and type of the plant; the forecasted retirement date; and the plant's actual summer and winter capacity.

Statutory Authority: *MS s 116J.10*

4100.2400 FUEL REQUIREMENTS AND GENERATION BY FUEL TYPE.

Subpart 1. **Quantity used.** Based on the data reported under part 4100.2100 each utility shall report the quantity of coal, natural gas, middle distillates, heavy oils, nuclear energy, and other fuels used by its Minnesota power plants during the last calendar year, and the net megawatt-hours of electrical energy generated by each type of fuel. Net generation from Minnesota hydropower plants shall also be provided. If data is reported for other fuels, the type of fuel shall be specified.

Subp. 2. **Estimated quantity necessary.** Each utility shall estimate the quantities of the fuel which will be necessary for use by its Minnesota power plants to provide for the electrical energy growth predicted by the forecast projected in parts 4100.1100 to 4100.1900. Each utility shall also estimate by fuel type the net megawatt-hours electricity which will be produced by its Minnesota power plants under the forecast. A forecast of net generation from Minnesota hydropower plants shall also be provided. In preparing such estimates, each utility shall consider increases in fuel use by existing facilities and possible conversions between fuel types.

Statutory Authority: *MS s 116J.10*

TRANSMISSION LINES

4100.2500 TRANSMISSION LINES.

Subpart 1. **Existing transmission lines.** Each utility shall report the following information in regard to each transmission line over 200 kilovolts now in existence:

A. a map showing the location of each line;

B. the design voltage of each line;

C. the size and type of conductor;

D. the approximate location of d.c. terminals or a.c. substations; and

E. the approximate length of each line in Minnesota.

Subp. 2. **Transmission line additions.** Each generating and transmission utility, as defined in part 4100.0200, shall report the information required in subpart 1 for all future transmission lines over 200 kilovolts that the utility plans to build within the next 15 years.

Subp. 3. **Transmission line retirements.** Each generation and transmission utility, as defined in part 4100.0200, shall identify all present transmission lines over 200 kilovolts that the utility plans to retire within the next 15 years.

Statutory Authority: *MS s 116J.10*

OTHER INFORMATION REPORTED ANNUALLY

4100.2800 OTHER INFORMATION REPORTED ANNUALLY.

Each utility shall provide the following information for the last calendar year:

A. a table and a graphed curve of the demand in megawatts by hour over a 24-hour period for:

(1) the 24-hour period during the summer season when the megawatt demand on the system was the greatest; and

(2) the 24-hour period during the winter season when the megawatt demand on the system was the greatest;

B. the names, addresses, and the kilowatt-hours of electricity consumed by customers of the utility who annually consume over 600,000 kilowatt-hours;

C. the names and addresses of the utility's suppliers of primary fuels, providing for each supplier of primary fuels the type of fuel purchased;

D. a detailed map, on which the scale is indicated, of the utility's Minnesota service area, identifying power plants, principal substations, and transmission lines over 200 kilovolts, identified by voltage;

E. a listing of the purchases and sales for resales the utility had with other utilities, including the name of any such utility and megawatt-hours purchased or sold for resale during the last year;

F. its present rate schedules as of June 1 of the present year;

G. a copy of whichever of the following reports it files with either the Energy Information Administration of the U.S. Department of Energy or the U.S. Department of Agriculture:

(1) F.P.C. Form Number 12; or

(2) Part D. of the financial and statistical report to the United States Department of Agriculture;

H. for distribution-only utilities the megawatt-hours generated on an emergency standby basis and the amount of fuel used to generate such electricity;

I. actual data on the number of residential electric space heating customers and units it has and the total megawatt-hours of electricity sold these customers during the past calendar year (if a utility cannot provide actual data estimates may be accepted); and

J. its deliveries to ultimate consumers for the last calendar year broken down by categories determined by the director (this item is not applicable to electric utilities completing part 4100.1700, item A).

Statutory Authority: *MS s 116J.10*

QUARTERLY REPORTS

4100.2900 QUARTERLY REPORTS OF ENERGY DELIVERED TO ULTIMATE CONSUMERS.

Subpart 1. **Content.** Beginning in the year 1976 all utilities, except municipal utilities with sales of under 20,000,000 kilowatt-hours annually, shall report quarterly the kilowatt-hours delivered each month during the preceding quarter to ultimate consumers, broken down by customer class/geographic area combination:

A. Geographic areas will be defined by the customer's county.

B. Customer class will be defined by standard industrial classification (SIC) codes with extensions for more detailed breakdown of households and governmental units.

C. In each customer class/geographic area combination the utility shall report the number of customers and the total kilowatt-hours consumed.

Subp. 2. **Form.** Information required under subpart 1 shall be in the form determined by the director. Upon written application, the director may allow a utility to report said information in a different form.

Statutory Authority: *MS s 116J.10*

GAS AND GAS PIPELINE UTILITIES

4100.4100 DEFINITIONS.

Subpart 1. **Scope.** For purposes of these rules, the following definitions shall apply.

Subp. 2. **Agency.** "Agency" means the Minnesota Department of Energy and Economic Development.

Subp. 3. **Annual gas consumption.** "Annual gas consumption" means the total amount of gas used or disposed of in Minnesota for all purposes by either a gas

utility or interstate pipeline company. This definition shall not include natural gas in storage at the end of the reporting year.

Subp. 4. **Annual sales to ultimate consumers.** "Annual sales to ultimate consumers" means gas sales to end-use customers in a utility's or pipeline company's Minnesota service area.

Subp. 5. **Basic forecast.** "Basic forecast" refers to that more elementary, less documented forecast required of all Minnesota gas utilities. While all utilities must file a basic forecast, only specifically designated utilities must in addition file an extended forecast that requires additional data and greater documentation.

Subp. 6. **Construction.** "Construction" means any significant physical alteration of a site to install or enlarge a large energy facility but shall not include activities incident to preliminary engineering or environmental studies.

Subp. 7. **Curtailment.** "Curtailment" means a reduction or cutoff of supply to firm or interruptible customers that is related directly to deficiencies in gas supply.

Subp. 8. **Design day.** "Design day" means the 24-hour period of the greatest theoretical gas demand at a given 24-hour average temperature.

Subp. 9. **Design day availability.** "Design day availability" means the volume of each type of gas available on the design day and the maximum total volume of such supplies.

Subp. 10. **Director.** "Director" means the director of the Department of Energy and Economic Development.

Subp. 11. **Firm contract customers.** "Firm contract customers" means customers served under schedules or contracts that neither anticipate nor permit interruption.

Subp. 12. **Gas.** "Gas" means any form of gaseous fuel distributed as a vapor through distribution systems to ultimate consumers, including natural gas and all gaseous fuels equivalent in performance to natural gas.

Subp. 13. **Gas volume.** "Gas volume" means the volume of gas as measured at 14.73 psia at 60 degrees Fahrenheit. All volumes shall be in thousands of cubic feet (MCF) unless otherwise stated.

Subp. 14. **Interruptible contract customers.** "Interruptible contract customers" means customers served under schedules or contracts that anticipate or permit interruption of service during the term of the contract.

Subp. 15. **Interstate gas pipeline company.** "Interstate gas pipeline company" means an entity that operates an interstate gas pipeline that provides gas to any utility located in Minnesota, also referred to in these rules as "pipeline company" or "interstate pipeline company."

Subp. 16. **Large energy facility.** "Large energy facility" means any pipeline for transporting natural or synthetic gas at pressure in excess of 200 pounds per square inch with more than 50 miles of its length in Minnesota, any facility designed for or capable of storing on a single site more than 100,000 gallons of liquefied natural gas or synthetic gas, or any underground gas storage facility requiring a permit pursuant to Minnesota Statutes, section 84.57.

Subp. 17. **Last calendar year.** "Last calendar year" means the calendar year immediately preceding the year in which reports are required to be filed.

Subp. 18. **Liquefied natural gas.** "Liquefied natural gas" means natural gas stored as a liquid at or near atmospheric pressure at a temperature of approximately minus 260 degrees Fahrenheit.

Subp. 19. **Minnesota service area.** "Minnesota service area" means the geographical area within the state of Minnesota where a gas utility or interstate pipeline company serves ultimate consumers. The Minnesota service area for an interstate pipeline company shall also include all Minnesota utilities which it services.

Subp. 20. **Natural gas.** "Natural gas" means a naturally occurring mixture of hydrocarbons and nonhydrocarbon gases found in porous geologic formations beneath the earth's surface, the principal constituent of which is methane.

Subp. 21. **Peak day.** "Peak day" means the 24-hour period of greatest gas sendout.

Subp. 22. **Substitute natural gas.** "Substitute natural gas" means any gaseous fuel equivalent in performance to natural gas that is created from other gases, liquids, or solid hydrocarbons. Substitute natural gas shall include manufactured gas, gas produced from liquid petroleum gases such as propane, butane, and gas produced from naphtha. Whenever the term "synthetic gas" is used within these parts it shall be construed to mean the same as substitute natural gas.

Subp. 23. **Ultimate consumer.** "Ultimate consumer" means end-use customers who do not sell gas for resale.

Subp. 24. **Utility.** "Utility" means any entity in Minnesota whose primary business is the distribution of gas to ultimate consumers, including but not limited to a private investor-owned utility or a public or municipally owned utility.

Statutory Authority: *MS s 116J.10*

History: *L 1983 c 289 s 115 subd 1*

4100.4200 PURPOSE AND SCOPE.

Subpart 1. **Purpose.** The purpose of parts 4100.4100 to 4100.6600 is to implement the forecasting, statistical, and informational reporting requirements of Minnesota Statutes, sections 116J.17 and 116J.18. These parts are adopted pursuant to the powers of the director conferred by Minnesota Statutes, section 116J.10(a), and are designed to identify emerging energy trends based on supply and demand, conservation and public health and safety factors, and to determine the level of statewide and service area energy needs.

Subp. 2. **Scope.** Each gas utility serving ultimate consumers in the state of Minnesota and each interstate gas pipeline company serving any gas utility located in the state of Minnesota or ultimate consumers in the state shall submit the information required by these parts to the director in the form specified by him.

Any entity that is both a gas utility company and an interstate gas pipeline company shall file one report on its pipeline operations and one report on its utility operations.

Statutory Authority: *MS s 116J.10*

4100.4300 REPORTING DATES.

Subpart 1. **Gas utilities.** Except as provided by the director or in these parts, each utility shall file with the director the information required by parts 4100.4600, 4100.4700 to 4100.5900, and 4100.6600 by November 1, 1977, and by July 1 of each year thereafter.

Subp. 2. **Quarterly reports of gas disposition.** Except as provided by the director, each utility shall file with the director the information required by part 4100.6600 on a quarterly basis as follows:

A. the information for the period of January 1 to March 31 shall be filed by April 30;

B. the information for the period of April 1 to june 30 shall be filed by July 31;

C. the information for the period of July 1 to September 30 shall be filed by October 31; and

D. the information for the period of October 1 to December 31 shall be filed by January 31 of the following year.

Subp. 3. **Interstate gas pipeline companies.** Except as provided by the director, each interstate pipeline company shall file with the director the information required by parts 4100.4700, 4100.6000, and 4100.6500 to 4100.6700 by July 1 of each year.

Statutory Authority: *MS s 116J.10*

4100.4400 CORRECTIONS.

Corrections of a substantial nature to any report or statement which pertain to historical data and not forecasts shall be filed with the agency within ten days following the date of the event prompting the change in reported information or the date upon which the person filing became aware of the inaccuracy. The change or correction shall identify the form and the paragraph of the information to be changed or corrected.

Statutory Authority: *MS s 116J.10*

4100.4500 FEDERAL OR STATE DATA SUBSTITUTION FOR ENERGY AGENCY DATA REQUIREMENTS.

Upon written request by any utility, the director may allow it to substitute data provided to the federal government or another state agency in lieu of data required by these parts if the data required by both agencies is substantially the same.

Statutory Authority: *MS s 116J.10*

4100.4600 REGISTRATION.

Each gas utility serving ultimate consumers and each interstate gas pipeline company serving any utility in Minnesota must file a registration statement with the director. Any utility or interstate pipeline company that commences operation in the state after June 1, 1975, shall file a registration statement with the director within 30 days after commencing operation. Each registration statement shall be on forms issued by the director and available from the agency and shall contain the name and headquarters address of the utility or interstate pipeline company, the names and addresses of all officers of the utility or interstate pipeline company, and the name, address, and telephone number of a person who may be contacted for information about the utility or interstate pipeline company.

Statutory Authority: *MS s 116J.10*

4100.4700 FEDERAL REPORTS FILED BY GAS UTILITIES AND INTERSTATE GAS PIPELINE COMPANIES.

Each utility and interstate pipeline company shall identify to the director all forms and reports pertaining to gas supply and demand that it regularly filed with the Federal Power Commission, Federal Bureau of Mines, and other federal agencies. Upon request of the director, any utility or pipeline company shall make copies of any forms or reports available to the director.

Statutory Authority: *MS s 116J.10*

BASIC FORECASTS AND CURRENT STATISTICS FOR GAS UTILITIES

4100.5100 YEARS COVERED.

Each gas utility shall submit annually to the director for the last calendar year, the present calendar year, the subsequent first, fifth, tenth, and 15th years, actual data and forecasts of anticipated annual gas consumption and supply.

Statutory Authority: *MS s 116J.10*

4100.5200 CONTENT OF ANNUAL REPORT.

The basic forecast and current data shall contain the following data for each year cited in part 4100.5100:

A. annual sales to ultimate consumers within the utility's Minnesota service area;

B. the annual volume of gas delivered or expected to be delivered to other utilities for resale;

C. the annual volume of gas used in the operation of the utility within its Minnesota service area;

D. the annual volume of gas used in the utility's Minnesota service area but unaccounted for in items A to C;

E. the total annual gas consumption, for all purposes, in the utility's Minnesota service area (total consumption equals items A plus B plus C plus D equals item E) excluding gas held in storage at year's end;

F. the total annual volume of substitute natural gas provided by the utility to supplement the utility's supply of natural gas for use in its Minnesota service area;

G. the total annual volume of liquefied natural gas supply withdrawn from storage by the utility for use in its Minnesota service area;

H. the total volume of natural gas withdrawn from underground storage by the utility for use in its Minnesota service area;

I. the total annual volume of gas received or estimated to be received from the interstate pipeline company for use in its Minnesota service area;

J. the design day maximum gas demand volume for the utility's Minnesota service area firm customers;

K. the maximum winter peak day volume of gas sent out or expected to be sent out in the utility's Minnesota service area;

L. the design day availability of each type of gas and the maximum one-day volume of gas such supplies will provide;

M. the amount of substitute natural gas the utility can produce from the feedstock it will have in storage at the beginning of the winter heating season for use in its Minnesota service area;

N. the amount of liquid natural gas the utility will have for use in storage at the beginning of the winter heating season for use in its Minnesota service area;

O. the amount of natural gas the utility will have in underground storage for use at the beginning of the winter heating season;

P. the type and amount of fuel used or to be used in Minnesota to produce substitute natural gas; and

Q. the actual historic data and a forecast of direct sales to ultimate customers and the number of such customers in each of the following categories:

(1) residential firm;

(2) commercial firm customers who use less than 200 MCF on peak day;

(3) commercial firm customers who use 200 MCF or greater on peak day;

(4) commercial interruptible;

(5) industrial firm customers who use less than 200 MCF on peak day;

(6) industrial firm customers who use 200 MCF or greater on peak day;

(7) industrial interruptible;

(8) other consumers firm;

(9) other consumers interruptible;

(10) own company use;

(11) unaccounted for gas;

(12) gas delivered to other utilities for sale; and

(13) total annual gas consumed in Minnesota (total of subitems (1) to (12) should equal item E).

Statutory Authority: *MS s 116J.10*

4100.5300 LAST CALENDAR YEAR HISTORICAL DATA.

For the last calendar year historical data shall be supplied. For each other reporting year, the forecasts shall be made using the utility's or pipeline company's best estimate for each of the items requested. The agency recognizes five- to 15-year forecasts can be difficult to calculate and subject to considerable error, but utilities shall prepare these forecasts to the best of their ability and knowledge. The forecasts shall be based on those assumptions and factors that the reporting utility deems most likely to occur. The assumptions and factors used in deriving the forecasts shall be stated in writing. Each utility shall evaluate the size of the estimating error, given the conditions and factors used in the estimate. Each utility shall comment on possible deviations from the forecast and what factors might create such changes. Any utility required to file an extended forecast pursuant to parts 4100.5600 and 4100.5700 need not file forecast documentation required in this part.

Statutory Authority: *MS s 116J.10*

EXTENDED FORECAST AND DOCUMENTATION

4100.5600 WHO MUST FILE.

The following utilities must file an extended forecast with documentation: Minnesota Gas Company, North Central Public Service Company, Northern States Power Company, and Peoples Natural Gas Company. Each utility required to file its extended forecast pursuant to this part shall identify or estimate the demand for gas by ultimate consumer categories listed in part 4100.5200, item Q, on the peak sendout day for each of the reporting years cited in part 4100.5100.

Statutory Authority: *MS s 116J.10*

4100.5700 FORECAST DOCUMENTATION.

Subpart 1. **Forecast methodology.** Each utility may use whatever forecast methodology it believes is most appropriate for its Minnesota service area. However, those utilities required under parts 4100.5100 to 4100.5700 to file forecasts shall describe the forecast methodology employed by providing the following documentation:

A. the overall methodological framework used;

B. the specific analytical techniques used, their purpose, and the components of the forecast to which they have been applied;

C. the manner in which these specific techniques are related in producing the forecast;

D. where statistical techniques have been used, the purpose of the techniques, typical computations (e.g., computer printouts, formulas used) specifying variables and data, and the results of appropriate statistical tests;

E. forecast confidence levels or ranges of accuracy for annual peak demand and annual gas consumption;

F. a brief analysis of the methodology used, including its strengths and weaknesses, its suitability to the utility's service area, cost considerations, data requirements, past accuracy, and any other factors considered significant by the utility; and

G. an explanation of any discrepancies between the forecasts presented by the utility and forecasts submitted in past years.

Subp. 2. **Data base for forecasts.** The utility shall provide a written discussion

of the data base used in arriving at the forecast presented in parts 4100.5100 to 4100.5700 including:

A. a complete list of all data sets used in making the forecast, including a brief description of each data set and an explanation of how it was obtained, (e.g., monthly observations, billing data, consumer survey, etc.) or a citation to the source (e.g., population projection from the state demographer); and

B. a clear explanation of any adjustments made to raw data to adapt them for use in forecasts, including the nature of the adjustments, the reasons for the adjustments, and the magnitude of the adjustments.

Subp. 3. **Discussion of assumptions.** The utility shall discuss in writing each essential assumption made in preparing the forecasts, including the need for the assumption, the nature of the assumption, and the sensitivity of forecast results to variations in the essential assumption.

Subp. 4. **Subject of assumption.** The utility shall discuss the assumptions made regarding the availability of alternative sources of energy, any expected conversion from other fuels to gas or vice versa, future prices of gas for customers in the utility's Minnesota service area and the effect that such price changes will likely have on demand, the assumptions made in arriving at any data requested in parts 4100.5100 to 4100.5700 that are not available historically or not generated by the utility in preparing its own internal forecast, the effect of existing energy conservation programs under federal or state legislation or long-term gas demand, the projected effect of new conservation programs that the utility deems likely to occur through future state and federal legislation on long-term gas demand, and any other factor considered by the utility in preparing the forecast.

Statutory Authority: *MS s 116J.10*

FACILITY REQUIREMENTS FOR GAS UTILITY COMPANIES

4100.5800 PRESENT FACILITIES.

Each gas utility shall provide the following information with regard to existing facilities serving its Minnesota service area as of January 1 of the current year:

A. The name and geographic location of all underground storage facilities for natural gas. For each facility include:

(1) the total storage capacity of the facility in MCF minus the required reserves of gas;

(2) the actual volume of gas in storage in MCF at the beginning of the winter heating season not including required reserves of gas;

(3) the maximum single-day withdrawal capacity of the facility in MCF; and

(4) the anticipated facility retirement date.

B. The name and geographic location of all liquefied natural gas facilities. For each facility include:

(1) the total storage capacity of the facility in MCF of natural gas minus the required reserves;

(2) the actual equivalent volume in MCF of natural gas in storage in the facility at the beginning of the winter heating season minus the required reserves;

(3) the maximum single-day withdrawal capacity of natural gas in MCF; and

(4) the anticipated facility retirement date.

C. The name and geographic location of all substitute natural gas facilities. For each facility include:

(1) the maximum storage capacity of the substitute natural gas facility in converted MCF of substitute natural gas;

(2) the volume in storage at the beginning of the winter heating season in MCF;

(3) the maximum single-day production capacity in MCF that can be injected into the utility's pipeline;

(4) the anticipated facility retirement year; and

(5) the type of fuel to be converted to substitute natural gas.

D. A map, on which the general scale is indicated, of the utility's Minnesota service area, identifying municipalities served, substitute natural gas facilities, underground natural gas storage facilities, liquefied natural gas facilities, major distribution lines, interconnections with other utilities, and delivery points with interstate pipeline companies.

Statutory Authority: *MS s 116J.10*

4100.5900 FUTURE FACILITY REQUIREMENTS.

Each utility shall estimate the additional facilities or additions to existing facilities necessary to meet the level of gas consumption predicted in its forecast under parts 4100.5100 to 4100.5300. Each utility shall supply the following information:

A. The name and geographic location of all new underground natural gas storage facilities or additions to existing facilities. For each facility include:

(1) the anticipated year and month the facility will be ready for operation;

(2) the estimated storage capacity of the new facility in MCF minus necessary reserves that must be kept in storage;

(3) the estimated actual storage in MCF of the volume that will be available for usage at the beginning of each heating season (this figure should not include necessary reserves of gas); and

(4) the maximum single-day withdrawal capacity of the proposed facility.

B. The name and geographic location of all new liquefied natural gas storage facilities or additions to existing facilities. For each facility include:

(1) the anticipated year and month the facility will be ready for operation;

(2) the estimated storage capacity in equivalent MCF of natural gas of the new facility minus reserves that must be kept in storage;

(3) the estimated actual storage in equivalent MCF of natural gas that will be available at the beginning of each heating season when the facility is in operation; and

(4) the maximum single-day withdrawal capacity of the proposed facility.

C. The name and geographic location of all new substitute natural gas facilities or additions to existing facilities. For each facility include:

(1) the type of fuel which will be converted to substitute natural gas;

(2) the month and year in which the plant is predicted to begin operation;

(3) the storage capability of the facility in equivalent MCF of substitute natural gas;

(4) the estimated actual storage in equivalent MCF of substitute natural gas that will be available for use at the beginning of each heating season when plant begins operation; and

(5) the maximum daily volume of substitute natural gas that can be produced by the facility and injected into the utility's system.

Statutory Authority: *MS s 116J.10*

4100.6000 QUARTERLY DISPOSITION OF GAS BY UTILITIES.

Beginning in the year 1976, all utilities shall report quarterly the monthly volume of gas delivered to ultimate consumers, broken down by customer class and geographic area.

Geographic areas shall be defined by county. Customer class shall be defined by standard industrial classification (SIC) codes. In each customer class and geographic area combination, the utility shall report the number of customers and the total gas volume consumed. This information shall be in the form determined by the director. Upon written application, the director may allow a utility to report this information in a different form.

Statutory Authority: *MS s 116J.10*

4100.6200 OTHER INFORMATION TO BE REPORTED BY GAS UTILITIES.

Subpart 1. **General data.** Gas utilities must also report:

A. an annual load curve for the last calendar year consisting of a single graph and accompanying data table indicating the total monthly consumption of gas in the following classifications:

(1) residential firm;

(2) commercial industrial firm;

(3) small volume interruptible;

(4) large volume interruptible;

(5) electric generation;

(6) gas to storage;

(7) other dispositions and losses; and

(8) level of contract demand;

B. any additional municipalities or geographic areas outside the utility's current service area which it expects to serve and the year when service will begin;

C. a list of customers who will be curtailed or completely phased out in the five years following the year of filing;

D. the criteria used to determine the classification of a customer as a firm or interruptible customer; and

E. its total sales in MCF to ultimate customers by county for the last calendar year.

Subp. 2. **Customers and addresses.** For the last calendar year, provide a list of customers and their addresses:

A. Who have gas requirements in excess of 200 MCF on their peak day each year. For each customer so identified list:

(1) annual actual sales;

(2) annual estimated curtailment;

(3) annual estimated requirements (sum of subitems (1) and (2) should equal subitem (3));

(4) alternative fuel used; and

(5) curtailment priority rank.

B. Who are small volume interruptible users. For each small volume interruptible user identify the volume of gas consumed during the last calendar year and the curtailment priority rank.

C. Who are firm customers and consume 6,000 MCF or greater annually. For each customer so identified list the volume of gas consumed during the last calendar year and the curtailment priority rank.

Statutory Authority: *MS s 116J.10*

INTERSTATE PIPELINE COMPANIES

4100.6500 BASIC FORECAST AND CURRENT STATISTICS FOR INTERSTATE GAS PIPELINE COMPANIES.

Subpart 1. **Requirement.** Each interstate pipeline company shall annually submit to the director, for the last calendar year, the present calendar year, and the subsequent first, fifth, tenth, and 15th years, actual data and forecasts of anticipated annual Minnesota service area consumption and supply of natural gas.

Subp. 2. **Contents of report.** The basic forecast and current data report shall contain the following data for each year cited in subpart 1:

A. the annual sales to Minnesota gas utility distribution companies for resale;

B. the maximum one-day amount of gas that must be provided to the Minnesota service area to meet contractual obligations to the gas utilities served.

Subp. 3. **Basis of forecasts.** In meeting the requirements of subpart 1, historical data for the last calendar year shall be supplied.

For each other reporting year the forecasts shall be made using the interstate pipeline company's best estimate for each of the items. The agency recognizes that five- to 15-year forecasts can be difficult to calculate and subject to considerable error, but interstate pipeline companies should prepare these forecasts to the best of their ability and knowledge. The forecasts shall be based on those assumptions and factors that the reporting utility deems most likely to occur. The assumptions and factors used in deriving the forecasts shall be stated in writing. Each interstate pipeline company shall evaluate the size of estimating error possible given the conditions and factors used in the estimate. Each utility company shall comment on possible deviation from the forecast and what factors might create such changes.

Statutory Authority: *MS s 116J.10*

4100.6600 PRESENT FACILITIES.

Each interstate pipeline company shall provide the following information with regard to existing facilities serving its Minnesota service area as of January 1 of the current year:

A. The name and geographic location of all underground storage facilities owned, operated, or leased by the interstate pipeline company in Minnesota. For each facility include:

(1) the total storage capacity in MCF of the facility minus the required reserves of gas;

(2) the actual volume of gas in storage in MCF at the beginning of the winter heating season, not including required reserves of gas;

(3) the maximum single day withdrawal capacity of the facility in MCF; and

(4) the anticipated facility retirement date.

B. The name and geographic location of all liquefied natural gas facilities owned, operated, or leased by the interstate pipeline company in Minnesota. For each facility include:

(1) the total storage capacity of the facility in MCF of natural gas minus required reserves;

(2) the actual volume of natural gas in MCF in storage at the beginning of the winter heating season minus the required reserves;

(3) the maximum single day withdrawal capacity in MCF of natural gas; and

(4) the anticipated facility retirement date.

C. The name and geographic location of all substitute natural gas facilities owned, operated, or leased by the interstate pipeline company in Minnesota. For each facility include:

(1) the maximum storage capacity of the facility in MCF of converted substitute natural gas;

(2) the maximum volume in storage in converted MCF of substitute natural gas at the beginning of the winter heating season;

(3) the maximum single day withdrawal capacity of the facility in MCF that can be injected into the pipeline;

(4) the anticipated date of facility retirement; and

(5) the type of fuel to be converted to substitute natural gas.

D. A map, on which the general scale is indicated, of the utility's Minnesota service area identifying distribution utility companies served, underground natural gas storage facilities, underground liquid natural gas facilities, substitute natural gas facilities, major transmission lines, and interconnection with other interstate pipeline companies.

Statutory Authority: *MS s 116J.10*

4100.6700 FUTURE FACILITY REQUIREMENTS.

Each interstate pipeline company shall estimate the additional facilities or additions to existing facilities necessary to meet the level of gas consumption predicted in its forecast in part 4100.6500. Each interstate pipeline company shall supply the following information regarding its own planned or projected operations or facilities:

A. The name and geographic location of all new underground natural gas storage facilities or additions to existing facilities. For each facility include:

(1) the anticipated year and month the facility will be in operation;

(2) the estimated storage capacity in MCF of the new facility minus necessary reserves of gas;

(3) the estimated actual storage in MCF that will be available for usage at the beginning of each heating season, not including necessary reserves of gas; and

(4) the maximum single-day withdrawal capacity of the proposed facility.

B. The name and geographic location of all new underground liquefied natural gas storage facilities or additions to existing facilities. For each facility include:

(1) the anticipated year and month the facility will be ready for operation;

(2) the estimated storage capacity in converted MCF of natural gas of the new facility minus any necessary reserves that must be kept in storage;

(3) the estimated actual storage in converted MCF of natural gas that will be available at the beginning of each heating season when the facility is in operation, not including necessary reserves that must be kept in storage; and

(4) the maximum single-day withdrawal capacity of the proposed facility in converted MCF of natural gas;

C. The name and geographic location of all new substitute natural gas facilities or additions to existing facilities. For each facility include:

(1) the type of fuel which is to be converted into substitute natural gas;

(2) the month and year in which the plant is predicted to begin operation;

(3) the theoretical storage capability of the facility in MCF of converted substitute natural gas;

(4) the estimated actual storage in converted MCF of substitute natural gas that will be available at the beginning of each heating season not including required reserves; and

(5) the maximum daily volume of substitute natural gas in MCF that will be available to be withdrawn from the facility and injected into the pipeline.

D. Based on your 15-year forecast, provide a Minnesota service area map identifying future transmission lines, natural gas storage facilities, liquefied natural gas storage facilities, substitute natural gas storage facilities, any additional distribution utility companies to be served and any additional interconnections with other interstate natural gas pipeline companies.

Statutory Authority: *MS s 116J.10*

4100.6800 DISPOSITION OF GAS BY INTERSTATE PIPELINE COMPANIES.

Each interstate pipeline company shall file a copy of its annual FPC forms 2 and 16 with the agency.

Statutory Authority: *MS s 116J.10*

PRIME PETROLEUM SUPPLIERS AND PETROLEUM PIPELINE COMPANIES

4100.7100 DEFINITIONS.

Subpart 1. **Scope.** For the purposes of parts 4100.7100 to 4100.9200, the following definitions shall apply.

Subp. 2. **Agency.** "Agency" means the Department of Energy and Economic Development.

Subp. 3. **Aviation gasoline.** "Aviation gasoline" means all of the various grades of aviation gasoline as defined in American Society for Testing and Materials (ASTM) D 910-70.

Subp. 4. **Construction.** "Construction" means significant physical alteration of a site to install or enlarge a large energy facility but does not include activities incident to preliminary engineering or environmental studies.

Subp. 5. **Director.** "Director" means the director of the Department of Energy and Economic Development.

Subp. 6. **End-user.** "End-user" means any person who is an ultimate consumer of a petroleum product other than a wholesale purchaser-consumer.

Subp. 7. **Jet fuel.** "Jet fuel" means those fuels commonly known as kerosene-base jet fuel and naphtha-base jet fuel.

Subp. 8. **Large energy facility.** "Large energy facility" means any facility on a single site designed for or capable of storing more than 1,000,000 gallons of crude petroleum, petroleum fuels, oil, or derivatives thereof, or any pipeline greater than six inches in diameter and having more than 50 miles of its length in Minnesota used for the transportation of crude petroleum, petroleum fuels, oil, or derivatives thereof.

Subp. 9. **Middle distillate.** "Middle distillate" means any derivative of petroleum including kerosene, home heating oil, range oil, stove oil, and diesel fuel that has a 50 percent boiling point in the ASTM D86 standard distillation test falling between 371 degrees Fahrenheit and 700 degrees Fahrenheit. "Middle distillate" shall not include kerosene-based and naphtha-based jet fuel, heavy fuel oils grades numbers 4, 5, and 6, intermediate fuel oils that are blends containing number 6 oil, and all specialty items such as solvents, lubricants, waxes, and process oil.

Subp. 10. **Motor gasoline.** "Motor gasoline" means a mixture of volatile hydrocarbons, suitable for operation of an internal combustion engine, whose major components are hydrocarbons with boiling points ranging from 140 degrees

Fahrenheit to 390 degrees Fahrenheit and whose source is distillation of petroleum and cracking, polymerization, and other chemical reactions by which naturally occurring petroleum hydrocarbons are converted to those that have superior fuel properties.

Subp. 11. **Petroleum pipeline company.** "Petroleum pipeline company" means any company that owns or operates in Minnesota any pipeline greater than six inches in diameter and having more than 50 miles of its length in Minnesota used for the transportation of crude petroleum, petroleum fuels, oil, or derivatives thereof.

Subp. 12. **Prime petroleum supplier.** "Prime petroleum supplier" means the supplier or producer that makes the first sale of any petroleum product into the state distribution system for consumption within the state. Any supplier or producer that is considered a Minnesota prime supplier by the Federal Energy Agency shall be deemed to be a prime petroleum supplier under these rules. "Prime petroleum supplier" shall not include any licensed petroleum distributor or propane retailer who takes delivery of a product in another state for use in Minnesota, if he has in his possession a letter from his supplier stating that the supplier has or will report the sales of said product to the Federal Energy Agency and the state, or if the total amount of any single product so received by the distributor or retailer is less than 500,000 gallons per year.

Subp. 13. **Propane.** "Propane" means the chemical C_3H_8 in its commercial forms including propane-butane mixes in which propane constitutes greater than ten percent of the mixture by weight. Included within the definition of propane is the propane content of natural gas liquids and refinery gas when used for refinery fuel use.

Subp. 14. **Residual fuel oil.** "Residual fuel oil" means the fuel oil commonly known as: numbers 4, 5, and 6 fuel oils; bunker C; Navy special fuel oil; crude oil when burned directly as a fuel; and all other fuel oils which have a 50 percent boiling point over 700 degrees Fahrenheit in the ASTM D-86 standard distillation test.

Subp. 15. **Total petroleum products.** "Total petroleum products" means propane, butane, propane/butane mix, motor gasoline, kerosene, number 2 heating oil, diesel fuel, other middle distillates, aviation gasoline, jet fuel, number 4 for utilities, numbers 5 and 6 for utilities, number 4 for nonutilities, numbers 5 and 6 for nonutilities, bunker C, Navy special, other residuals, lubricants, special naphthas, and solvents.

Subp. 16. **Wholesale purchaser-consumer.** "Wholesale purchaser-consumer" means any ultimate consumer that, as part of its normal business practices, purchases or obtains a product from a supplier and receives delivery of that product into a storage tank substantially under the control of that consumer at a fixed location; and that: purchased or obtained more than 20,000 gallons of that allocated product for its own use in agricultural production in any completed calendar year subsequent to 1971; or purchased or obtained more than 50,000 gallons of that allocated product in any completed calendar year subsequent to 1971 for use in one or more multifamily residences; or purchased or obtained more than 84,000 gallons of that allocated product in any completed calendar year subsequent to 1971.

Subp. 17. **Wholesale purchaser-reseller.** "Wholesale purchaser-reseller" means any firm that purchases, receives through transfer, or otherwise obtains (as by consignment) an allocated product and resells or otherwise transfers it to other purchasers without substantially changing its form.

Statutory Authority: *MS s 116J.10*

History: *L 1983 c 289 s 115 subd 1*

4100.7200 PURPOSE.

The purpose of parts 4100.7100 to 4100.9200 is to implement the forecasting, statistical, and informational requirements of Minnesota Statutes 1974, sections 116H.10 and 116H.11. These parts are adopted pursuant to the powers of the director conferred by Minnesota Statutes 1974, section 116H.08, clause (a), and are designed to identify emerging energy trends based on supply and demand, conservation, and public health and safety factors, and to determine the level of statewide and service area energy needs.

Statutory Authority: *MS s 116J.10*

4100.7300 SCOPE.

Each prime petroleum supplier and petroleum pipeline company in the state shall submit the information required by these parts to the director in the form specified by him.

Statutory Authority: *MS s 116J.10*

4100.7400 REPORTING DATES.

Subpart 1. **Prime petroleum suppliers.** Except as provided by the director, each prime petroleum supplier shall file with the director or its trade association, as applicable, the information required by parts 4100.7600, 4100.7800 to 4100.8700, and 4100.9200 by July 1 of each reporting year. Except as provided by the director, each prime petroleum supplier shall file with the director the information required by part 4100.9100 on a quarterly basis as follows:

A. Information for the period of January 1 to March 31 shall be filed by April 30.

B. Information for the period of April 1 to June 30 shall be filed by July 31.

C. Information for the period of July 1 to September 30 shall be filed by October 31.

D. Information for the period of October 1 to December 31 shall be filed by January 31 of the following year.

Subp. 2. **Pipeline companies.** Each petroleum pipeline company shall file with the director the information required by parts 4100.7800, 4100.8600, and 4100.8700, by July 1 of each reporting year.

Subp. 3. **Changes.** No changes shall be made in reporting dates set forth in this part unless each prime petroleum supplier or petroleum pipeline company has been given written notice of such change 30 or more days before the effective date of such change.

Statutory Authority: *MS s 116J.10*

4100.7500 CORRECTIONS.

Corrections of any report or statement must be filed with the agency within ten days following the date of the event prompting the change in reported information or the date upon which the person filing became aware of the inaccuracy. The change or correction shall identify the form and the paragraph of the information to be changed or corrected.

Statutory Authority: *MS s 116J.10*

4100.7600 FEDERAL OR STATE DATA SUBSTITUTION.

The director may, upon written request, allow any prime petroleum supplier or petroleum pipeline company to substitute data provided to the federal government or another state agency in lieu of data required by these parts if the data required by both agencies is substantially the same.

Statutory Authority: *MS s 116J.10*

4100.7700 REGISTRATION.

Each prime petroleum supplier and petroleum pipeline company operating in Minnesota must file a registration statement with the director by July 1, 1975. Any prime petroleum supplier or petroleum pipeline company that commences operations in the state after June 1, 1975, shall file a registration statement with the director within 30 days after commencing operation. Each registration statement shall be on forms issued by the director and shall contain the name and headquarter address of the prime petroleum supplier or petroleum pipeline company, the names and addresses of all officers of the supplier or company, and the name, address, and telephone number of a person who may be contacted for information about the prime petroleum supplier or petroleum pipeline company.

Statutory Authority: *MS s 116J.10*

4100.7800 FEDERAL REPORTS FILED BY PRIME PETROLEUM SUPPLIERS AND PETROLEUM PIPELINE COMPANIES.

Each prime petroleum supplier and petroleum pipeline company shall identify to the director all forms and reports pertaining to energy supply and demand that it regularly files with any federal agency. Upon request of the director, each firm shall make copies of any such forms or reports available to the director.

Statutory Authority: *MS s 116J.10*

FORECASTS

4100.8100 ANNUAL FORECASTS.

Each prime petroleum supplier shall submit annually to the director five-, ten-, and 15-year forecasts of petroleum supply and demand within its Minnesota service area.

Statutory Authority: *MS s 116J.10*

4100.8200 CONTENT OF FORECASTS.

The energy forecast required under part 4100.8100 shall contain the following data for each reporting year:

A. the annual supply of motor gasoline, middle distillates, jet fuels, aviation gasoline, residual fuel oil, propane, and total petroleum products that the supplier provides or will provide to its Minnesota service area;

B. the annual demand for motor gasoline, middle distillates, jet fuels, aviation gasoline, residual fuel oil, propane, and total petroleum products if sufficient product were available to meet all demands within the supplier's Minnesota service area; and

C. the annual volume of crude oil in number of barrels available to the supplier's refineries located in Minnesota.

Statutory Authority: *MS s 116J.10*

4100.8300 REPORTING YEARS.

The data required in part 4100.8200 shall be supplied for the following years:

A. the last calendar year;

B. the present calendar year;

C. the year five years after the present calendar year;

D. the year ten years after the present calendar year; and

E. the year 15 years after the present calendar year.

In 1975, data shall also be supplied for the calendar year 1973.

Statutory Authority: *MS s 116J.10*

4100.8400 CRITERIA FOR FORECAST.

For the last calendar year and for the year 1973, historical data shall be

supplied. If recorded figures are not available, estimates shall be used and shall be identified as such. For each other reporting year, the forecast shall be made using the supplier's best estimates of the amount of each petroleum product that will be supplied or consumed. These estimates shall be based on the factors that the supplier deems most likely to occur in its Minnesota service area. The data for each reporting year shall be calculated by applying these factors to the data for the last calendar year for which actual data required in part 4100.8200 is available. The assumptions and factors used in arriving at the forecast shall be stated in writing. Each prime petroleum supplier shall evaluate the size of the estimating error given the conditions and factors used in the estimate. Each prime petroleum supplier shall comment on probable deviations from the forecast.

Statutory Authority: *MS s 116J.10*

FACILITY REQUIREMENTS

4100.8600 PRESENT FACILITIES.

Each prime petroleum supplier or pipeline company shall provide to the director the following information with regard to any facilities which it owns in Minnesota as of January 1 of the current year:

A. refineries:

(1) the name of the refinery;

(2) the location and address;

(3) the year constructed;

(4) average barrels per day production; and

(5) present maximum barrel per day production capacity;

B. storage tanks at any one site in excess of 1,000,000 gallons:

(1) the location and address of the site;

(2) the total storage capacity for the site; and

(3) the total storage capacity for the site by product stored;

C. pipelines:

(1) a geographical description of the pipeline from its origin to its termination in Minnesota;

(2) the diameter of the pipeline;

(3) whether it is a crude or refined product pipeline; and

(4) the maximum volume in barrels that can be delivered through the pipeline in a single day.

Statutory Authority: *MS s 116J.10*

4100.8700 FUTURE FACILITY REQUIREMENTS.

Each prime petroleum supplier and pipeline company shall supply the director with an estimate of the additional Minnesota facilities or additions to existing facilities necessary to provide for the forecast of supply that will be available to its Minnesota service area as projected in part 4100.8200, item A, or, in the case of pipeline companies, the facilities the company estimates will be necessary for the reporting years specified in part 4100.8300. Each prime petroleum supplier or pipeline company shall provide the following information to the director about each additional facility or addition to existing facility:

A. refineries:

(1) the location and address of any new facility or construction of an addition;

(2) the year of anticipated commencement and completion of construction; and

(3) the maximum barrel per day capacity of the facility after completion;

B. storage tanks:

(1) the location and address of any new storage tank location with a storage capacity of over 1,000,000 gallons or an addition to an existing storage tank location with a storage capacity of over 1,000,000 gallons; and

(2) the total storage capacity of the site by product stored;

C. pipelines:

(1) a geographical description of any new pipeline from its origin to its termination in Minnesota;

(2) the diameter of the new pipeline;

(3) whether the new facility will transport crude or refined product; and

(4) maximum volume of product that can be delivered through the pipeline in a single day.

Statutory Authority: *MS s 116J.10*

4100.8800 REFINERY FUEL REQUIREMENTS.

Each prime petroleum supplier shall identify for each of its Minnesota refineries the annual volume of each petroleum product used in the refinery process for each of the requested forecasting years in part 4100.8300.

Statutory Authority: *MS s 116J.10*

ADDITIONAL INFORMATION REQUIRED

4100.9100 PETROLEUM DELIVERED TO CUSTOMERS.

Subpart 1. **Quarterly report.** Beginning in the year 1976, each prime petroleum supplier shall report quarterly its volume of each of the following petroleum products delivered to its customers: motor gasoline, middle distillates, residual fuel oil, jet fuel, aviation gasoline, and propane by a customer class/geographic area combination. Geographic areas shall be defined by the customer's zip code. Customer class shall be defined by standard industrial classification (SIC) codes with extensions for more detailed breakdown of households and governmental units. In each customer class/geographic area combination the supplier shall report the number of customers and the total gallons of product consumed; this information shall be in the form determined by the director.

Subp. 2. **Alternate form.** Upon written application, the director may allow a prime petroleum supplier to report information required under subpart 1 in a different form.

Subp. 3. **Gas tax information.** In lieu of the data described in subpart 1, each prime petroleum supplier may submit to the agency the manifest data required to be filed with the commissioner of revenue by Gas Tax Reg 1(c) if the manifest data covers the product classes listed in subpart 1. The manifest data shall be in the form determined by the director.

Subp. 4. **1975.** The director may, after an evaluation of the data availability, level of automation, and homogeneity of accounts of any supplier, require said supplier to report the information required by this part for the third and fourth quarters of 1975. Third-quarter statistics for such suppliers shall be filed by October 31, 1975. No prime petroleum supplier shall be required to report in 1975 unless it has been notified in writing by the director of its obligation 30 or more days prior to the reporting dates.

Statutory Authority: *MS s 116J.10*

4100.9200 OTHER INFORMATION REPORTED ANNUALLY.

Each prime petroleum supplier shall provide to the director the name and address of the 25 largest wholesale purchaser-consumers during the last calendar year and the type and volume of product sold to each in that year.

Statutory Authority: *MS s 116J.10*