BEFORE THE PUBLIC UTILITIES COMMISSION OF THE STATE OF COLORADO

IN THE MATTER OF THE GENERIC)
HEARINGS CONCERNING THE RATE) CASE NO. 5693
STRUCTURE OF ALL ELECTRIC)
UTILITIES OPERATING UNDER THE) ORDER OF THE COMMISSION
JURISDICTION OF THE PUBLIC)
UTILITIES COMMISSION OF THE)
STATE OF COLORADO.)

March 6, 1980

STATEMENT

BY THE COMMISSION:

On July 27, 1979, the Commission entered Decision No. C79-1111 on the merits of the issues raised in the within proceeding.

On August 13, 1979, the Colorado Association of Municipal
Utilities filed a Motion for Extension of Time Within Which to File a
Petition for Reconsideration of Decision No. C79-1111; Empire Electric
Association, Inc. filed a Motion for Stay and Extension of Time in Which
to Respond; San Luis Valley Rural Electric Cooperative, Inc. filed a
Request for Extension of Time; CF&I Steel Corporation filed a Motion for
Extension of Time; Colorado Rural Electric Association filed a Motion
for Extension of Time Within Which to File for Reconsideration, Etc.

On August 15, 1979, by Decision No. C79-1258, the Commission, in response to the above filed motions, extended the time within which any party in Case No. 5693 would be permitted to file an Application for Rehearing, Reargument or Reconsideration of Decision No. C79-1111 to and including October 1, 1979.

On August 16, 1979, Colorado-Ute Electric Association, Inc., filed a Motion for Extension of Time Within Which to File for Reconsideration, Etc.

On September 27, 1979, the Colorado Association of Commerce and Industry filed with the Commission a letter which the Commission, for purposes of this decision, has treated as an application for rehearing, reargument or reconsideration of the matters specified in said letter.

On October 1, 1979, the following parties filed individual applications for rehearing and/or reargument and/or reconsideration:

Public Service Company of Colorado, The Home Builders Association of Metropolitan Denver, The Colorado Rural Electric Association, Colorado-Ute Electric Association, Inc., The Colorado Association of Municipal Utilities, Empire Electric Association, Intermountain Rural Electric Association, Poudre Valley Rural Electric Association, Inc. and CF&I Steel Corporation.

On October 1, 1979, San Luis Valley Rural Electric Cooperative, Inc., filed a Statement of Position adopting the position stated by the Colorado-Ute Electric Association and Colorado Rural Electric Association in their applications for reconsideration.

On October 1, 1979, Wheatland Electric Cooperative, Inc. filed a Response to the Order contained in Section III of Decision No. C79-1111.

On October 16, 1979, by Decision No. C79-1641, the Commission granted reconsideration of Decision No. C79-1111 and reserved ruling on all issues raised with respect to rehearing or reargument.

DISSCUSSION, FINDINGS OF FACT AND CONCLUSIONS THEREON

Numerous issues have been raised by the parties filing applications for rehearing, reargument or reconsideration. Only a limited number of specific issues so raised will be addressed specifically by the Commission in the discussion portion of this decision.

1. Resource Management - Power Pooling

Public Service Company of Colorado (PSCo) raises the issue in its Application for Reconsideration, Reargument or Rehearing that power pooling was not made a matter to be heard in Case No. 5693. PSCo argues the Commission, in Decision No. 89068, which instituted Case No. 5693, made no mention of power pooling. The Colorado Rural Electric Association

(CREA) also raises this issue in its application. PSCo requests that the portion of Decision No. C79-1111 on power pooling be vacated, or in the alternative, that rehearing be granted. In addition, PSCo requests that the Commission hold in abeyance any further action on power pooling pending completion of two studies mentioned in its application, with the possibility of instituting a separate proceeding designed to evaluate power pooling. The Commission has reviewed Decision No. 89068 and agrees that the subject matter of power pooling was not mentioned in said decision. Accordingly, the Commission will order hereinafter a rehearing relative to all matters relating to power pooling, rather than striking Part II-C from Decision No. C79-1111, inasmuch as the Commission considers power pooling to be akin to and as effective a tool for conservation of resources and capital as the matters raised in Decision No. 89068. Since rehearing will be ordered hereinafter, PSCo's remaining requests are moot.

On page 56 of Decision No. C79-1111 the Commission wrote with respect to power pooling:

Also, transmission facilities should be sized and built, not only to serve a particular utility, but also to promote interconnection and coordinated operations among all utilities of the region.

CREA has pointed out with respect to this statement that financing from the Rural Electrification Administration (under the Rural Electrification Act of 1936, as amended, 7 U.S.C 901, et seq.) generally prohibits the use of funds lent under the Act for the benefit of non-Act beneficiaries. CREA states that as long as decisions with respect to these facilities are made consistent with the Act "we have no problem; but to disregard the requirements of the Act will create all kinds of problems for rural electric associations". CREA does not specify what the "all kinds of problems" are. Rehearing will be granted hereinafter on this issue in order to determine what provisions of the loans under the Rural Electrification Act of 1936 would be affected by implementation of interconnection and coordination of operations by the various utilities

in Colorado, and what are the sanctions in the event of noncompliance with said provisions. CREA further states with respect to the above statement from Decision No. C79-1111 that rural electric cooperatives have preference rights with respect to power and energy generated by the Western Area Power Administration (WAPA). CREA states that if the Commission's decision is implemented in a way to achieve maximum coordination of operations amoung utilities, rural electric cooperatives may lose such preferential rights. The Commission is interested in evidence relative to the scope of the preferential rights referred to by CREA and under what circumstances such preferential rights may be lost in the event that rural electric cooperatives coordinate operations with other utilities. Rehearing will be granted with respect to this issue also. CREA will be expected to present testimony relative to both issues upon which rehearing will be granted hereinafter.

Load Management - Interruptible Rates

PSCo, in its application, requests that the Commission clarify
Decision No. C79-1111 in order to make clear (1) that inclusion of
capacity costs in interruptible rates is not per se impermissible and
(2) that the extent to which said costs may be included will be determined
on a utility-by-utility basis as compliance filings are made. PSCo
argues that even totally interruptible customers should be allocated
some capacity costs. The Commission, in Decision No. C79-1111, did not
intend to foreclose allocation of some capacity costs to customers on a
totally interruptible rate. Totally interruptible rates may be allocated
some capacity costs to reflect the use of the utility's facilities, even
though subject to interruption on-peak or at other times. The Commission
will order hereinafter that the second paragraph of Appendix C, appearing
on page 178 of Decision No. C79-1111, be deleted, and the following
paragraphs substituted:

The cost of interruptible power may be considered either as varying solely with its availability, or as varying with its availability and use of facilities.

In the former connotation, if no quarantee is given that power will be available, it can be sold at a "dump" or commodity rate which includes only the variable costs associated with its production. If the supplier of interruptible power must furnish specific amounts of energy within stated time periods, or can be interrupted only after giving advance notice or under otherwise limited conditions, that supplier should recover some of the fixed costs associated with the provision thereof. Under such "limited" interruptible rates, however, the supplier should not recover the fully allocated costs he would recover from a customer receiving firm service. The Commission takes no position on what demand charge discount should be attached to each attribute of interruptibility, but rather leaves this in the first instance to negotiation between the utility and customer, subject to the applicable provisions of the Public Utility Law.

In the latter connotation, since use of facilities is also considered, some fixed costs should be included in the interruptible rate regardless of availability of service. Whether this connotation or the former is appropriate in any situation will depend upon the circumstances.

In designing interruptible rates, the following criteria should be met before Commission approval of demand charges for interruptible rates is sought. However, for good cause shown, exception to these criteria may be granted on a case-by-case basis.

CF&I requests in its application that the Commission delete paragraphs numbered 1 and 2 of Appendix C, appearing on page 179, from the guidelines for establishing interruptible rates. CF&I objects to that part of paragraph 2 which provides that interruptible service must be terminable at the discretion of the utility and without a requirement for giving advance notice to the customer. CF&I argues that inasmuch as interruptible rates are to be voluntary, they must be attractive to potential customers. Furthermore, in most instances, advance notice would work no hardship to the utility, since the time of an approaching peak or limited reserve margin can be predicted at least thirty minutes to one hour in advance. The Commission agrees that in ordinary circumstances not involving an unexpected loss of capacity, the utility should be

able to predict an approaching peak or limited reserve margin thirty minutes to one hour in advance. Accordingly, the rate design criteria for interruptible rates will be modified in the order to provide for notification to the customer at least thirty minutes to one hour in advance of interruption, if possible.

CF&I also states that the requirements contained in paragraph numbered 1 of Appendix C are unduly restrictive. CF&I raises a question about the requirement for interrupting service whenever a utility's incremental cost of energy exceeds the revenue the utility would receive from the customer for service at 100% load factor. The Commission feels that there may be times and circumstances when a deviation from the criteria specified in paragraph 1 of Appendix C may be appropriate. Accordingly, the Commission will order hereinafter that the last sentence appearing on page 178 of Decision No. C79-1111, which presently reads: "However, the following criteria should be met before Commission approval of demand charges for interruptible rates is sought.", be modified as set forth in the above quotation.

CREA states in its application that certain distribution cooperatives, such as San Luis Valley Rural Electric Cooperative and Highline Electric Association will be required to file interruptible rates for irrigation customers whereas PSCo will not, according to Appendix B. CREA complains that this may be discriminatory insofar as similarly situated utilities are concerned and may result in inequities and confusion in the same geographical area. Although the unreasonable differences provisions of the Public Utilities Law are not applicable between utilities, the Commission did not intend in Decision No. C79-1111 to treat similarly situated utilities differently as far as filing requirements were concerned. Accordingly, rehearing will be granted as to this issue. PSCo should supplement the record herein by filing testimony and supporting exhibits as to the numbers, concentration or dispersion of its irrigation customers

and their usage as may be available presently from the company's records, and any reasons for or against inclusion of its irrigation customers in any interruptible rate filing. Any other party will be afforded an opportunity to file answering testimony and exhibits.

CREA states that throughout subpart II-D of Decision No. C79-1111, the Commission refers to on-peak and off-peak time periods, but that it is unclear whether the Commission was referring to the peaks of the individual distribution cooperative, or the peaks of one of the two generation and transmission (G&T) suppliers, Colorado-Ute Electric Association and Tri-State Generation and Transmission Association. The Commission has reviewed subpart II-D and finds that it is not unclear. In any event, use of the words "on-peak" or "off-peak," when they are applicable to rural electric cooperatives, mean the peak or off-peak periods of the G&T and its distribution members as a total system.

3. Co-generation and Small Power Producers.

Colorado-Ute requests that the Commission modify ordering paragraph No. 2 of Decision No. C79-1111 relating to co-generation and small power producers. Colorado-Ute suggests in lieu thereof that it, working in conjunction with its members prepare and file a single inventory covering both Colorado-Ute and its member systems, rather than fourteen separate inventories. Colorado-Ute also states that it can complete and file within six months after the effective date of the decision such a study, provided that only a brief description of identified barriers be included, rather than a detailed description of such barriers. Colorado-Ute's request is reasonable, and accordingly, the Commission will modify hereinafter ordering paragraph No. 2 of Decision No. C79-1111 to read as follows:

2. Each electric utility subject to the jurisdiction of this Commission be, and hereby is, directed to survey its service territory and file with this Commission within six month after the effective date of this decision, an inventory of all potential sites and joint ventures for co-generation (including a brief description of any identified economic, legal or engineering

barriers to development of such potential sites and/or joint ventures) in conformity with the provisions of Part II-E of this decision. A generation and transmission cooperative association, working in concert with its member distribution companies, may file a consolidated inventory on behalf of itself and its member distribution systems.

4. Costing Methodology - Average and Excess Demand Method

PSCo and CF&I request that the Commission delete from Decision No. C79-1111 the requirement that PSCo use the median as opposed to mean values in PSCo's calculation of average and excess demand. PSCo and CF&I request that this Commission reaffirm PSCo's continued use of mean values in conjunction with its average and excess demand costing methodology. The Commission has reconsidered the matter and has concluded that use of mean values is proper rather than use of the median values in connection with the average and excess demand methodology. The value that the methodology attempts to measure is the total residential group demand as a starting point for the average and excess demand methodology. Although the actual value is unknown, it can be estimated from load research data collected by PSCo. In order that load research data, collected in one twelve-month period, be applicable to a test year consisting of another twelve-month period, the group demand is not estimated directly from the load research data. Rather, the data is used to estimate group load factor by month. Under the assumption that the group load factors will be constant or only slowly varying, the group load factors so found are applied to actual test year KWH sales by month to estimate monthly group demand. The highest monthly group demand for the test year is then used as the group demand in the average and excess demand calculation. The calculation of group load factor, by month, from the load research data is the key step in this entire process. Group load factor is the ratio of group KWH usage in any given month to the product of group demand and the mumber of hours in the month. If numerator and denominator are both divided by the number of cusomters, the result yields the ratio of mean KWH usage in any given month to the product of mean demand and

the number of hours in the month. Use of the median will not yield the correct result. Accordingly, the Commission will order hereinafter that the concluding two sentences on page 106 of Decision No. C79-1111, under Part II-F-5-c, be deleted and that ordering paragraph No. 4, appearing on pages 153-154, be amended to be consistent therewith.

5. Pricing Methodology - Time of Use (Time-of-Day) Rates

CF&I raises three related issues with respect to that portion of Decision No. C79-1111 relating to time-of-day rates. CF&I first inquires whether or not Decision No. C79-1111 merely establishes a rebuttable presumption in favor of time-of-day rates or a conclusive determination in favor of time-of-day rates, with implementation thereof reserved for future rate proceedings. We intended to convey in the following language on page 130 of Decision No. C79-1111 that a rebuttable presumption had been established by the evidence in Case No. 5693 for the implementation of time-of-use rates:

However, it should be clear from the above that there is now a presumption which favors the implementation of the instant rate reforms. In future rate proceedings the Commission will invoke this presumption and the affected utility will then bear the burden of showing that the costs of implementation outweigh the benefits in its particular case. While the Commission does not intend, in future rate hearings, to relitigate the issues considered in this generic proceeding, it will provide the opportunity for each utility and its customers to show that implementation may not be beneficial to its system.

CF&I raises a second issue with respect to time-of-day rates, stating that whether a rebuttable presumption or a conclusive determination has been made, the record lacks substantial evidence to support the Commission's conclusions; furthermore, there are insufficient findings of fact and said findings of fact are inconsistent with other findings and conclusions contained in Decision No. C79-1111. The Commission does not agree with these contentions made by CF&I. The Commission considers the record made in Case No. 5693 as sufficient to support a finding that there is a rebuttable presumption in favor of implementation of time-of-use rates in Colorado.

CF&I argues in the third issue it raises that implementation of time-of-day rates for industrial and large commercial customers only is discriminatory against such customers and preferential to all other customers. The Commission does not agree that initially implementing time-of-day rates for industrial and large commercial customers is discriminatory against such customers, nor preferential as to other customers. As discussed in Decision No. C79-1111, implementation of time-of-day rates with respect to industrial and large commercial customers, will involve the least amount of cost, inasmuch as there are fewer of said customers, their usage is greater, and in many cases, the meters capable of recording use by time-of-day are already in place.

Suffice it to say that most of the arguments against initial implementation of time-of-day rates for a select group of customers (industrial and large commercial) were made by the New York State Council of Retail Merchants when the Long Island Lighting Company filed a rate structure to implement time-of-day rates for industrial and certain large commercial customers in its service area. The New York Court of Appeals rejected these arguments, and affirmed implementation as to these two rate groups in In the Matter of New York State Council of Retail Merchants, Inc. v. Public Service Commission of the State of New York, et al, 45 N.Y.2d 661, 412 N.Y.S.2d 358, 384 N.E.2d 1282 (1978).

The Colorado Association of Municipal Utilites (CAMU), in its Application for Rehearing, Reargument or Reconsideration, points out that the Commission has required all utilities to file time-of-day rates for large commercial and industrial customers; but that Decision No. C79-1111 does not define what the Commission means by "large commercial and industrial customers". CAMU requests the Commission clarify its decision by defining what size of load would be classified as either "large commercial or industrial". This was an oversight on the part of the Commission. The Commission, for purposes of Decision No. C79-1111, defines "large commercial or industrial" customers as any such customer whose demand during any two months in the last twelve months was 500 KW per month or larger.

Empire Electric Association (Empire) inquired whether the words "time-of-use" and "time-of-day" are synonomous. They are not.

Time-of-use is the more inclusive term, which includes both time-of-day and seasonal. Time-of-day refers specifically to diurnal rates.

6. <u>Pricing Methodology - Time of Use (Seasonal) Rates</u>

Colorado-Ute Electric Association requests a modification to ordering paragraph No. 6 of Decision No. C79-1111. Colorado-Ute writes in its application that the statement of the Commission in Appendix D to Decision No. C79-1111 (referring to Colorado-Ute and its members) is in error inasmuch as there is no significant seasonal variation in power costs in the Colorado-Ute system. Colorado-Ute argues that, in fact, summer power costs are slightly higher than winter power costs. A review of Decision No. C79-1111 and Appendix D thereof reveals a discrepancy between the two which has led to Colorado-Ute raising this issue. Appendix D at page 181 reads, as applicable to Colorado-Ute and its members: "Because of the significant seasonal variation in power costs, both Colorado-Ute and all of its members shall file seasonal rates for all customer classes." (Emphasis added.) Use of the words "seasonal variation in power costs" was inappropriate. The words "seasonal variation in load characteristics" should have been used properly to convey the perport of the Commission and for consistency with the discussion on pages 124 and 125 of said decision. On page 125, the Commission wrote:

In light of the fact that there are virtually no costs of implementing seasonal rates, the appropriateness of such rates for any given utility must be judged solely in terms of the seasonal load charateristics of that utility. Quite obviously, a utility with an insignificant seasonal differential would realize little benefit from such rates. Furthermore, the minimum seasonal differential required for effective application of seasonal rates may vary by utility, depending upon the size of that utility. Generally, the Commission concludes that any Colorado utility with a seasonal/non-seasonal ratio averaging 1.2:1 or more over a two-year period of time is an appropriate candidate for such an implementation.

The Commission is still of the opinion that the record demonstrates that Colorado-Ute and its member associations are appropriate candidates for seasonally differentiated rates. Accordingly, Colorado-Ute's request that the Commission modify ordering paragraph No. 6 will be denied.

CREA points out that the Commission in Decision No. C79-1111
requires the Colorado distribution members of Tri-State Generation and
Transmission Association file seasonally differentiated rates, whereas it does not require the same for Intermountain and Moon Lake. CREA
argues that part of the reason given for not requiring Intermountain and
Moon Lake to file seasonally differentiated rates, i.e., unless "their
wholesale suppliers subsequently institute seasonal rates.", is equally
applicable to the distribution members of Tri-State. Such may be true,
but this is not controlling. Tri-State's distribution members have a
significant seasonal variation in load characteristic, as does Intermountain,
but not Moon Lake. Accordingly, the Commission will order hereinafter
that Appendix D be amended to require Intermountain, but not Moon Lake,
to file seasonal rates.

7. <u>Declining Block Rates</u>

CREA raises several questions with respect to the Commission's discussion and findings of fact in Decision No. C79-1111 on declining block rates. CREA first asserts that the discussion in Decision No. C79-1111 on two-part and three-part rates is beyond understanding. The Commission has reviewed this portion of its decision, and although it is not a model of clarity, it is sufficiently understandable to render implementation possible. It should be pointed out that a number of the rural electric cooperatives already have filed two or three-part rate schedules which fully comply with the Commission's requirements in Decision No. C79-1111.

CREA writes in its application that on page 138 of Decision No. C79-1111 the Commission indicates it will order the new two-part or three-part rate schedules for each utility's residential, commercial

and industrial customers, but that in ordering paragraph No.7 on page 154, the Commission directs that two-part or theree-part rates be filed only with respect to residential customers, thus creating an inconsistency between the findings of fact of the Commission's decision and the ordering part of the Commission's decision. CREA is correct and the Commission will order hereinafter that ordering paragraph No. 7 on page 154 of Decision No. C79-1111 be amended to read as follows:

7. Each electric utility subject to the jurisdiction of this Commission be, and hereby is, directed to file at its next general rate proceeding, but in no event later than six months after the effective date of this decision, revised rate schedules for its residential, commercial and industrial rate customer classes based upon either a two-part or three-part rate, as more fully discussed in Part II-G of this decision.

The Commission appreciates CREA pointing out this discrepancy.

CREA writes in its application that on page 138 of Decision

No. C79-1111, the Commission wrote: "Specifically, the Commission will

expect utilities to include bill inserts as well as other public explanations

of the design characteristics of the established rate, in order to overcome

public misunderstanding." CREA points out that several rural electric

cooperatives presently use either post card of computerized pull-apart

forms to bill customers, and thus it would be impossible to use billing

inserts, unless the manner of billing is changed. The Commission certainly

did not intend to require that a utility change its whole billing procedures

on the strength of this one statement. If a utility uses post cares or

pull-apart computerized forms as a means of billing their customers,

then it obviously cannot use billing inserts to explain its rate design.

This should not, however, be used as a reason for not engaging in any

educational program to explain the operation of its new rate design.

8. Lifeline Rates

In its letter to the Commission, the Colorado Association of Commerce and Industry (CACI) intreprets the Commission's decision as stating: "Under the requirements of PURPA, the Commission must consider

the adoption of lifeline rates every two years." The Commission did not state or intend to state that the Commission must consider the adoption of lifeline rates every two years. However, the Commission does agree with the interpretation of PURPA as set forth in the letter of CACI to the effect that if an electric utility does not have a lifeline rate in effect within two years after the enactment of PURPA, an evidentiary hearing must be held to determine whether such rate would be appropriate. Accordingly, the Commission will order hereinafter a modification of the second sentence of the paragraph commencing approximately in the middle of page 142 of Decision No. C79-1111, which reads: "Pursuant to \$ 114 of PURPA, this Commission is required within two years of the date of the enactment of the Act, to determine, after an evidentiary hearing, whether a lifeline rate should be implemented by each Colorado utility." Said sentence will be modified to read as follows: "Pursuant to section 114 of PURPA, unless a lifeline rate is in effect within two years after the date of the enactment of PURPA, this Commission is required to determine, after the evidentiary hearing, whether a lifeline rate should be implemented by the utility in question." We are appreciative of CACI's bringing this misinterpretation of Section 114 of PURPA to our attention.

CF&I Steel Corporation (CF&I) requests reconsideration of that portion of Decision No. C79-1111 relating to conducting further hearings on the issue of whether to adopt or not to adopt lifeline rates for any electric utility in Colorado. CF&I argues that, under the circumstances in Colorado, PURPA allows an interpretation that no further lifeline hearings are required. We do not read PURPA as stating this. As stated above, PURPA requires that the Commission conduct an evidentiary hearing with respect to a utility that does not have in effect a lifeline rate within two years after the date of the enactment of PURPA. This is so because Section 124 of PURPA (the "grandfather" provision relative to prior or pending proceedings) is not applicable to Section 114 on lifeline rates.

9. <u>All-Electric Rates - Demand-Energy Metering</u>.

Intermountain Rural Electric Association (Intermountain) takes exception to the requirement of Decision No. C79-1111 relating to the installation of demand-energy meters and dual billings. Intermountain gives several reasons for its exceptions, among them that to require a utility to install a demand-energy meter which may never be utilized in determining the billing for energy usage, imposes a cost upon the utility which cannot be recovered. Intermountain further argues that the customer may, at any time, cause the removal of the demand-energy meter and under such circumstances, the meter costs, installation charges and cost of meter reading would be at the complete expense of the utility. The Commission feels that the fears of Intermountain are not well founded. Costs incurred by a utility in implementing Decision No. C79-1111 will be considered by this Commission as an operating expense for ratemaking purposes as any other reasonably incurred operating expense. Intermountain further argues that there will be no incentive for the customer to attempt to conserve energy and thus reduce costs during the trial period, inasmuch as the customer would be billed under the existing rate, and not under the demand-energy rate. Therefore, the customer would have nothing at stake. The Commission disagrees. It is unlikely that a customer will go to the trouble of requesting a demand-energy meter unless the customer intends to attempt to manage his or her usage so as to reduce the bill ultimately to be paid. In any event, no one will know unless the customer is given the opportunity. Intermountain further argues that the only means whereby a customer, who would ultimately benefit from the demand-energy rate, would be responsible for cost of service under such a rate would be if the customer were required to remain on said rate for a period of not less than one year. This argument is well taken and the Commission will require that any customer falling within the ambit of ordering paragraph No. 9 of Decision No. C79-1111, who elects to be billed under a demand-energy rate, must be billed under said rate for a period of not less than one year.

Empire raises a problem relative to meter reading of some of its rural customers who may qualify for a demand-energy rate. Empire points out that its personnel do not read rural meters. Empire relies upon its customers to perform this service. Empire reads Decision No. C79-1111 as requiring that its personnel read all of its rural meters. The Commission, in its deliberations, did not consider this specific problem. Rather than exempting certain rural electric associations from the provisions of Decision No. C79-1111 as it relates to demand-energy metering, the Commission will entertain, after the effective date of Decision No. C79-1111, applications for exemption as to specific customers who read, or in the case of a new customer, who will read their own meters. The record in Case No. 5693 is insufficient to make such a ruling at the present time.

Empire, as well as CREA, has interpreted Decision No. C79-1111, relative to the discussion and findings of fact on demand-energy rates, as requiring utilities to purchase sufficient demand-energy meters for all existing all-electric customers. Such is not the case. The Commission assumes that the utility will purchase demand-energy meters in such numbers as will be necessary to meet the demand therefor, including new all-electric installations. There is no need for a utility to purchase at this time sufficient meters to serve all existing all-electric customers. The utility should purchase demand-energy meters as needed.

10. Solar Energy and Heat Storage Rates.

CREA takes issue with the provisions of Decision No. C79-1111 relating to solar energy and heat storage rates. In its argument, CREA states that the requirements of the Commission's decision disregard the fact that solar customers usually will have one or more appliances (for example, a refrigerator, freezer, air-conditioner, TV, etc.) that will not be utilizing solar energy. CREA inquires whether the Commission will permit, or require, the use of separate meters for such customers, one meter to measure consumption of electricity for heating purposes and

one meter to measure consumption of electricity for non-heating purposes. Inasmuch as one of the criteria in the implementation of a solar energy and heat storage rate was not to either unduly benefit or unduly hamper the development of solar technology, the Commission will order hereinafter that Decision No. C79-1111 be modified. Decision No. C79-1111 will be modified to provide that dual metering, one meter measuring consumption of electrical energy for heating purposes and one meter for measuring consumption of electrical energy for non-heating purposes, should be made available to the customer, at the customer's option. In the event that a customer elects to have consumption of electrical energy measured by dual metering, the purchase and installation costs of the second meter should be borne by the customer requesting dual metering.

Intermountain also takes issue with the Commission's decision on heat-storage rates for residential and commercial customers. Intermountain argues that the special rate applicable to heat-storage customers is discriminatory, does not permit the utility to recover the cost of service of such customer and is detrimental to other customers. In addition, Intermountain objects to a requirement for time-of-day metering on a trial or experimental basis. First of all, Decision No. C79-1111 does not provide for a trial or experimental period with respect to time-of day metering. With respect to the other objections by Intermountain, a heat-storage rate is not, per se, discriminatory. The Commission anticipates that when utilities file heat-storage rates that said rates will be based upon costs, i.e., on-peak rates will be higher than off-peak rates, and will be cost based. Metering costs, however, should be off-set by customers' reduction in peak usage, thus benefiting all customers.

11. Extension of Time Requirements of Ordering Paragraphs Numbered 1, 5, 7, 8, 9, 10 and 11 of Decision No. C79-1111

A number of the parties filing applications for rehearing, reargument or reconsideration raised questions concerning their ability to comply with the time requirements set forth by the Commission in the ordering part of Decision No. C79-1111. Several of the parties proposed alternate time frames.

The Commission in Decision No. C79-1111 directed certain utilities to file at their next general rate increase proceeding, but in no event later than six months after the effective date of the decision. time-of-day rates for industrial and large commercial customers. The Commission, likewise, set the same time frame for the filing by certain utilities of demand-energy rate schedules for new all-electric service, and the same time frame for existing customers receiving all-electric service. The Commission has reconsidered each of the requests and has concluded that a revision in the time frame for the filing of time-of-use rate schedules and demand-energy rate schedules is warranted. The Commission will order hereinafter that such rate schedules be filed within twenty-four months after the effective date of Decision No. C79-1111 by all electric utilities subject to its jurisdiction, except PSCo. The Commission feels that a six-month period should be sufficient for the purchasing and testing of either demand-energy or time-of-use meters. The Commission is also of the opinion that a period of twelve months thereafter would be sufficient for the collection of data upon which to base new proposed rate schedules. The Commission is also of the opinion that a period of six months thereafter would be sufficient for analyzing the data that has been collected and for the structuring of demand-energy or time-of-use rates. This twenty-four month time frame, as stated above, will be applicable to all electric utilities subject to its jurisdiction, except PSCo. Public Service Company shall be directed to file its new demand-energy rate schedules and time-of-use rate schedules at its next general rate increase proceeding, but in no event later than nine months after the effective date of Decision No. C79-1111. The shorter time period prescribed for PSCo, vis-a-vis all other electric utilities, reflects

the Commission understanding that PSCo has already commenced collecting and analyzing the necessary data and the fact that PSCo requested this shorter period.

Some question has been raised concerning the time requirements for the filing of either two-part or three-part rate schedules as discussed in Part II-G of Decision No. C79-1111. The Commission does not agree that the time frame specified by the Commission, in ordering paragraph No. 7 of Decision No. C79-1111, is too burdensome to be complied with. Therefore, no adjustment to the time requirements will be ordered.

Question was raised also with respect to complying with the time frame for filing of interruptible rate schedules applicable to industrial, commercial and/or irrigation rate classes based upon the rate design criteria described in Appendix C to Decision No. C79-1111. The Commission in ordering paragraph No. 1 directed the applicable utilities to file said rate schedules at its next general rate proceeding, but in no event later than six months after the effective date of the decision. The Commission has reconsidered the time frame and shall direct the utilities affected by ordering paragraph No. 1 to file interruptible rate schedules, if possible, at their next general rate increase proceeding, but in no event later than six months after the effective date of the decision.

The Commission, with respect to heat-storage rates directed each electric utility subject to its jurisdiction to file rate schedules applicable to new or existing customers within six months after the effective date of Decision No. C79-1111, to become effective 18 months after the filing thereof. Several utilities argued against these time requirements, stating that it would be difficult or impossible to design properly priced rates to become effective one and one-half years in the future. The Commission has reconsidered these time requirements and has decided to change them to be consistent with the time requirements for the filing of

demand-energy rate schedules for new or existing all-electric customers.

Ordering paragraphs 10 and 11 of Decision No. C79-1111 will be modified hereinafter to so provide.

12. Miscellaneous

CREA has directed the Commission's attention to the fact that ordering paragraph No. 9 of Decision No. C79-1111 refers to Part II-H of said decision, whereas said reference should be to Part II-I of said decision. CREA also points out that in ordering paragraph Nos. 10 and 11 of Decision No. C79-1111, said paragraphs refer to Part II-H of said decision; whereas said ordering paragraphs should refer to Part II-J of said decision. CREA, indeed, is correct, and said corrections will be so ordered.

CREA states in its application for rehearing, reargument or reconsideration that the Commission excuse from participating in Case
No. 5693 such out-of-state utilities as Carbon Power & Light, Inc.,
Rural Electric Company, Inc., Tri-County Electric Cooperative, Inc., Kit
Carson Electric Cooperative, Inc., Springer Electric Cooperative, Inc.,
Wheatland Electric Cooperative, Inc. and Moon Lake Electric Association,
Inc. CREA suggests that the Commission also exempt said electric cooperatives
from compliance with Decision No. C79-1111 because of their minimal
contacts with the State of Colorado. The Commission will order hereinafter
that the above named out-of-state utilities be exempted from the requirements
of Case No. 5693, except Moon Lake Electric Association. The Commission
expects Moon Lake Electric Association to comply with the requirements
relative to filing interruptible and time-of-day rates for large commercial
and industrial customers, inasmuch as Moon Lake Electric Association has
a substantial industrial load in its Colorado operations.

An appropriate order will be entered.

ORDER

THE COMMISSION ORDER THAT:

 Rehearing of Decision No. C79-1111 be, and hereby is, granted with respect to the following:

- (a) All issues relating to power pooling among electric utilities subject to the jurisdiction of the Commission and by said electric utilities with electric utilities both within and without the State of Colorado not subject to the jurisdiction of the Commission;
- (b) All issues relating to specific preferential rights and specific provisions of loans under the Rural Electrification Act of 1936, as amended, 7 U.S.C. 901, et seq., that would be affected by the promotion of interconnection and coordination of operations by rural electric cooperatives and non-Act electric utilities within and without the State of Colorado, and to sanctions under said Act in the event that rural electric cooperatives are directed to interconnect and coordinate operations with non-Act electric utilities within and without the State of Colorado.
- (c) All issues relating to whether Appendix B to Decision No. C79-1111 should be amended to require Public Service Company to file interruptible rate schedules applicable to its irrigation customers.

Dates for the filing of written testimony and for rehearing will be set by subsequent order of the Commission.

- 2. Decision No. C79-1111 be, and hereby is, amended as follows:
 - (a) The concluding two sentences of Part II-F-5-c,appearing on page 106, are hereby deleted.
 - (b) The first sentence of the first full paragraph appearing on page 120, which reads: "However, for the vast majority of industrial and large commercial customers, metering costs are not an impediment to the implementation of time-of-use rates.", is hereby amended to read:

However, for the vast majority of industrial and large commercial customers (defined to mean any such customer whose demand during any two months in the last twelve months was 500 KW per month or larger), metering costs are not an impediment to the implementation of time-of-day rates.

(c) The fifth sentence appearing on page 147, which reads: "Accordingly each jurisdictional utility providing all-electric service shall file demand-energy rates for all new residential and commercial customers within six months subsequent to the effective date of this Decision, to be effective 18 months after filing thereof.", is hereby amended to read:

Accordingly, each electric utility, except Public Service Company of Colorado, and each rural electric cooperative providing all-electric service shall file demand-energy rate schedules for all new residential and commercial customers within twenty-four months after the effective date of this Decision. Public Service Company shall file such revised rate schedules, if possible, at its next general rate proceeding, but in no event later than nine (9) months after the effective date hereof.

(d) The second sentence of the paragraph commencing approximately in the middle of page 142, which read: "Pursuant to Section 114 of PURPA, this Commission is required within two years of the date of the enactment of the Act, to determine, after an evidentiary hearing, whether a lifeline rate should be implemented by each Colorado utility." is hereby amended to read:

Pursuant to Section 114 of PURPA, unless a lifeline rate is in effect within two years after the date of the enactment of PURPA, this Commission is required to determine, after an evidentiary hearing, whether a lifeline rate should be implemented by the utility in question.

(e) Part II-I is hereby amended by the addition of a new sentence after the concluding sentence of said Part II-I, appearing on page 148, to read:

Any customer who elects to be billed under the demand-energy rate schedule shall be billed under the demand-energy rate schedule for a period of not less than twelve consecutive months before said customer shall be eligible to be billed under a two-part or three-part rate schedule.

(f) Part II-K relating to solar energy and heat storage rates is hereby amended by the addition of two new sentences after the concluding sentence appearing on page 152. Said two new sentences shall read as follows:

Dual metering, i.e., one meter to measure consumption of electrical energy for heating purposes and one meter to measure consumption of electrical energy for non-heating purposes, should be made available to either a new or existing customer, at the customer's election. In the event that a customer elects to have consumption of electrical energy measured by dual metering, the purchase and installation costs of the second meter should be borne by the customer electing dual metering.

- (g) Ordering paragraph 1, appearing on page 153, is hereby amended to read:
 - 1. Each electric utility whose name is listed on Appendix B to this Decision be, and hereby is, directed to prepare interruptible rate schedules applicable to its industrial, commercial and/or irrigation rate customer classes based upon the rate design criteria as described in Appendix C of this Decision. Each such utility be, and hereby is, directed to file said rate schedules, if possible, at its next general rate proceeding, but in no event later than six (6) months after the effective date of this Decision.
- (h) Ordering paragraph 2, appearing on page 153, is hereby amended to read:
 - 2. Each electric utility subject to the jurisdiction of this Commission be, and hereby is, directed to survey its service territory and file with this Commission within six months after the effective date of this decision, an inventory of all potential sites and joint ventures for co-generation (including a brief description of any identified economic, legal or engineering barriers to development of such potential sites and/or joint ventures) in conformity with the provisions of Part II-E of this decision. A generation and transmission cooperative assocation, working in concert with its member distribution companies, may file a consolidated inventory on behalf of itself and its member distribution systems.
- (i) Ordering paragraph 4, appearing on page 153-154, is hereby amended to read:
 - 4. Public Service Company of Colorado be, and hereby is, directed to modify its average and excess demand allocation methodology to reflect metering of all rate classes for the same length interval, as more fully discussed in Part II-F of this Decision.

- (j) Ordering paragraph 5, appearing on page 154, is hereby amended to read:
 - 5. Each electric utility subject to the jurisdiction of this Commission except Public Service Company of Colorado be, and hereby is, ordered to file within twenty-four (24) months after the effective date of this Decision, revised rate schedules implementing time-of-day rates for industrial and large commercial rate classes, as more fully discussed in Part II-F of this Decision. Public Service Company of Colorado be, and hereby is, ordered to file said rate schedule at its next general rate proceeding, if possible, but in no event later than nine (9) months after the effective date of this Decision.
- (k) Ordering paragraph 7, appearing on page 154, is hereby amended to read:
 - 7. Each electric utility subject to the jurisdiction of this Commission be, and hereby is, directed to file at its next general rate proceeding, but in no event later than six months after the effective date of this Decision, revised rate schedules for its residential, commercial and industrial customer classes based upon either a two-part rate or three-part rate, as more fully discussed in Part II-G of this Decision.
- (1) Ordering paragraph 8, appearing on pages 154-155, is hereby amended to read:
 - 8. Each electric utility subject to the jurisdiction of this Commission except Public Service Company of Colorado be, and hereby is, ordered to file within twenty-four (24) months after the effective date of this Decision demandenergy rate schedules for all new residential and commercial customers, as more fully discussed in Part II-I of this Decision. Public Service Company of Colorado be, and hereby is, ordered to file said rate schedules at its next general rate proceeding, if possible, but in no event later than nine (9) months after the effective date of this Decision.
- (m) Ordering paragraph 9, appearing on page 155, is hereby amended to read:
 - 9. Each electric utility subject to the jurisdiction of this Commission except Public Service Company of Colorado be, and hereby is, directed to file within twenty-four (24) months after the effective date of this Decision, demandenergy rate schedules (to be elected on a voluntary basis by the customer) applicable to (1) existing all-electric customers, (2) residential customers with a minimum annual usage of 15,000 KWh and (3) existing commercial customers, as more fully discussed in Part II-I. Public Service Company of Colorado be, and hereby is, ordered to file said

optional revised demand-energy rate schedules at its next general rate proceeding, if possible, but in no event later than nine (9) months after the effective date of this Decision.

- (n) Ordering paragraph 10, appearing on page 155, is hereby amended to read:
 - 10. Each electric utility subject to the jurisdiction of this Commission, except Public Service Company of Colorado, be, and hereby is, directed to file within twenty-four (24) months after the effective date of this Decision rate schedules applicable to all new residential and commercial solar and other heat-storage customers, as more fully discussed in Part II-J of this Decision. Public Service Company of Colorado be, and hereby is, directed to file said rate schedules at its next general rate proceeding, if possible, but in no event later than nine (9) months after the effective date of this Decision.
- (o) Ordering paragraph 11, appearing on page 155, is hereby amended to read:
 - 11. Each electric utility subject to the jurisdiction of this Commission, except Public Service Company of Colorado, be, and hereby is, directed to file within twenty-four (24) months after the effective date of this Decision rate schedules applicable to existing residential and commercial solar and other heat-storage customers (to be elected on a voluntary basis by the customer), as more fully discussed in Part II-J of this Decision. Public Service Company of Colorado be, and hereby is, directed to file said rate schedules at its next general rate proceeding, if possible, but in no event later than nine (9) months after the effective date of this Decision
- (p) The second paragraph of Appendix C appearing on page 178 is hereby deleted and the following paragraphs substituted therefor:

The cost of interruptible power may be considered either as varying solely with its availability, or as varying with its availability and use of facilities.

In the former connotation, if no guarantee is given that power will be available, it can be sold at a "dump" or comodity rate which includes only the variable costs associated with its production. If the supplier of interruptible power must furnish specific amounts of energy within stated time periods, or can be interrupted only after giving advance notice or under otherwise limited conditions, that supplier should recover some of the fixed costs associated with the provision thereof. Under such "limited" interruptible rates, however, the supplier should not recover the fully allocated costs he would recover from a customer receiving firm service.

The Commission takes no position on what demand charge discount should be attached to each attribute of interruptibility, but rather leaves this in the first instance to negotiation between the utility and customer, subject to the applicable provisions of the Public Utility Law.

In the latter connotation since use of facilities is also considered, some fixed costs should be included in the interruptible rate regardless of availability of service. Whether this connotation or the former is appropriate in any situation will depend upon the circumstances.

In designing interruptible rates, the following criteria should be met before Commission approval of demand charges for interruptible rates is sought. However, for good cause shown, exception to these criteria may be granted on a case-by-case basis.

- (q) Paragraph numbered 2 of Appendix C appearing on page 179 is hereby amended to read:
 - 2. All interruptible service must be terminable at the discretion of the utility rendering service without a requirement for giving advance notice to the customer. However, when possible, the utility rendering service should give notice of interruption at least thirty to sixty minutes prior to interruption. Should an interruptible customer be curtailed automatically by frequency-sensing devices, the device must be designed to curtail the interruptible customer before any firm customers are curtailed.
- (r) The narrative paragraph applicable to "Colorado-Ute and Colorado-Ute Members" of Appendix D, appearing on page 181, is hereby amended to read:

Because of the significant seasonal variation in load characteristics, both Colorado-Ute and all its members should file seasonal rates for all customer classes.

(s) The narrative paragraph applicable to "Intermountain Rural Electric Association and Moon Lake Electric Association" of Appendix D, appearing on page 181, is hereby amended to read:

Because its load does not vary significantly with season, Moon Lake should not file seasonal rates. However, because its load does vary significantly with season, Intermountain Rural Electric Association should file seasonal rates.

3. Carbon Power & Light, Inc., Rural Electric Company, Inc.,
Tri-County Electric Cooperative, Inc., Kit Carson Electric Cooperative,
Inc., Springer Electric Cooperative, Inc. and Wheatland Electric Cooperative,

Inc., be, and hereby are, exempted from all of the filing requirements of Case No. 5693. Moon Lake Electric Association be, and hereby is, exempted from all of the filing requirements, except the filing requirements of ordering paragraphs 1 and 5 of Decision No. C79-1111, as amended.

- 4. Any specific ground wherein Decision No. C79-1111 is alleged to be unlawful, or otherwise inappropriate, as stated in any application for rehearing and/or reargument and/or reconsideration heretofore filed, and not otherwise specifically addressed in paragraphs 1 through 8 of this Order be, and hereby is, denied.
- 5. Paragraph numbered 1 of this Order shall be effective forthwith. Paragraphs numbered 2, 3 and 4 of this Order shall be effective twenty-one (21) days subsequent to the date of mailing hereof.

 DONE IN OPEN MEETING the 6th day of March, 1980.

THE PUBLIC UTILITIES COMMISSION OF THE STATE OF COLORADO

ss:Gen/1/a