

Decision 90 09 064 SEP 12 1990**ORIGINAL**

BEFORE THE PUBLIC UTILITIES COMMISSION OF THE STATE OF CALIFORNIA

Order Instituting Investigation  
on the Commission's own motion to  
implement the Biennial Resource  
Plan Update following the  
California Energy Commission's  
Seventh Electricity Report.

I.89-07-004  
(Filed July 6, 1989)

Second application of Pacific Gas  
and Electric Company for approval of  
certain standard offers pursuant to  
Decision 82-01-103 in Order Insti-  
tuting Rulemaking No. 2.

Application 82-04-44  
(Filed April 21, 1982;  
amended April 28, 1982,  
July 19, 1982, July 11, 1983,  
August 2, 1983,  
and August 21, 1986)

Application 82-04-46

Application 82-04-47

Application 82-03-26

Application 82-03-37

Application 82-03-62

Application 82-03-67

Application 82-03-78

Application 82-04-21

And Related Matters.

### OPINION

#### I. Summary

By this order we deny recent protests to the quarterly avoided cost energy price postings made by Southern California Edison Company (SCE). We conclude that the gas volume of 114,703,000 MMBtu represents the most recently adopted forecast for the purpose of SCE's May 1, 1990 quarterly prices.

## II. Background

Each quarter, Pacific Gas & Electric Company (PG&E), San Diego Gas & Electric Company (SDG&E), and SCE post updated prices for avoided cost energy payments to qualifying facilities (QFs).<sup>1</sup> Under procedures established in Decision (D.) 91109 and subsequent orders, these prices are derived by multiplying the utility's Incremental Energy Rate (IER) times the cost of the utility's incremental fuel for the quarter, typically oil or gas. By "incremental" (or marginal) fuel, we refer to the fuel that would be used to serve one additional kilowatt-hour of demand for electricity.

When gas is projected to be on the margin, our prior decisions direct utilities to use the weighted average price of gas, calculated by dividing the total charges associated with various gas rate components, by the total gas volume.<sup>2</sup> Hence, the volume of gas consumption, or throughput, by the electric utility is a factor in the calculation of avoided cost energy payments, whenever gas is on the margin. It is this specific component of SCE's avoided cost calculations that gave rise to the protests described in Section III below.

Under the procedures established in D.82-12-120, the utilities file preliminary avoided cost energy prices one month prior to the quarter in which the energy prices apply. If a party objects to the proposed prices, a motion to adjust the price may be filed at the Commission. The utilities' filed prices go into

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1 QFs are cogeneration and small power production projects that qualify for certain benefits under the federal Public Utility Regulatory Policies Act of 1978.

2 For a more detailed description of how avoided cost energy payments are calculated, see D.89-09-099, Attachment 3.

effect on the first day of the quarter. If a protest is pending, these prices may be adjusted upward and applied retrospectively in the event that the Commission later reaches a determination that the prices posted were too low. No downward adjustments can be made retrospectively. (See D.82-12-120, mimeo., pp. 110-111.)

### III. Position of the Parties

On April 2, 1990, SCE filed its preliminary avoided cost energy prices for the quarter beginning May 1, 1990. On April 30, 1990, the California Cogeneration Council (CCC) and the Cogenerators of Southern California (CSC) filed separate, but substantively identical protests. In their protests, CCC, and CSC assert that SCE's calculations rely on gas throughput assumptions that were never adopted by the Commission.

More specifically, CCC and CSC assert that the total gas volume used in SCE's filing is based on an assumption underlying a Joint Recommendation in SCE's recent ECAC, to which CCC and CSC were parties.<sup>3</sup> According to CCC and CSC, parties to the stipulation agreed only to the IER and total revenue requirement changes. In their protest, CCC and CSC cite specific language from the Joint Recommendation and the Commission decision acknowledging that the underlying assumptions were not agreed upon.

On May 23, 1990, SCE filed a response to CCC and CSC's protests. In its response, SCE states that the gas volume used in the April 2 preliminary posting is the output of a production cost model run developed by the Division of Ratepayer Advocates (DRA). According to SCE, this model run was developed to reflect the

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<sup>3</sup> Joint Recommendation of the Division of Ratepayer Advocates, Southern California Edison, Cogenerators of Southern California and California Cogeneration Council. (Exhibit 19) See D.90-01-048, Appendix B.

results of the Joint Recommendation. Moreover, SCE asserts that the joint recommendations contained in the agreements on IERs and total revenue requirements were based upon this model run. Finally, SCE points out that the gas volumes derived from this run were used to develop marginal energy costs for revenue allocation in the Energy Cost Adjustment Clause (ECAC) proceeding. In sum, SCE argues that the gas volume used in its April 2 posting represents the Commission's most recently adopted value. SCE also points out that granting the protests would increase avoided cost energy prices by approximately two percent.

On June 27, 1990, CSC filed a reply to SCE's response, arguing that SCE's position does not withstand scrutiny when the language of the Joint Recommendation and the Commission's order are carefully considered.

#### IV. Discussion

In D.88-09-031, we directed SCE to base its quarterly avoided cost price calculation on the most recently adopted forecast of gas volume from either SCE's ECAC or Southern California Gas Company's (SoCal's) Annual Cost Allocation Proceeding (ACAP).<sup>4</sup> On January 9, 1990, we issued D.90-01-015 in SoCal's ACAP proceeding. Fifteen days later, we issued D.90-01-048 in SCE's ECAC proceeding.

In D.90-01-048, we adopted an average IER of 9,586 Btu/kWh and a total revenue requirement reduction of \$65.6 million, as agreed to by the parties. In jointly presenting these recommendations, parties agreed to the following:

"The parties will not contest in this proceeding, either in hearings or in any other manner before this Commission, or in any other

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<sup>4</sup> D.88-09-031, mimeo., pp. 69-70. In an earlier decision, D.86-10-045, we directed PG&E to do the same.

forum, the revenue requirement change and the IER recommendations contained in this exhibit. However, this shall not be construed to be acceptance of the methodology or assumptions underlying the parties' estimate of Edison's revenue requirement change or the Incremental Energy Rate or any of the resource assumptions utilized by DRA in its ELFIN simulation." (D.90-01-048, Appendix B; emphasis added.)

In adopting the joint recommendations, we stated:

"This adopted result, however, should not be construed to be acceptance of the methodology or assumptions underlying the parties' estimates of Edison's revenue requirement or the IER." (D.90-01-048, mimeo., pp. 7-8; emphasis added.)

Based on a plain reading of the Joint Recommendation and our decision language, it is clear that our adoption of the IER and revenue requirement changes did not mean that we accepted, or adopted, the underlying gas volume assumptions. Had that decision considered only IERs and revenue requirement changes, we would agree with CCC and CSC that the "most recently adopted" forecast of gas would be found in the January 9, 1990 ACAP decision.

However, in D.90-01-048 we also adopted a revenue allocation. That is, we determined how the agreed upon revenue requirement changes should be allocated across customer classes. We note that the Joint Recommendation did not address the issue of revenue allocation. Hence, the caveat regarding the use of underlying assumptions does not apply to this aspect of the decision. Moreover, revenue requirements cannot be allocated without at least implicitly adopting a gas volume. This is because marginal energy costs, which are used to allocate revenue requirements, are a function of gas volumes and gas-related expenses. Parties offered evidence both on marginal energy costs and revenue allocation, and these issues were litigated during evidentiary hearings, and briefed. We therefore conclude that the

most recently adopted gas volume is that value underlying our adopted revenue allocation in D.90-01-048.

In its response, SCE asserts that the underlying gas volume assumption for revenue allocation purposes is 114,703,000 MMBtus. While that figure does not appear in the decision, or appended tables, it can be derived as shown in Attachment 1.<sup>5</sup> Hence we agree with SCE that 114,703,000 MMBtu represents the most recently adopted gas volume for the purpose of SCE's May 1, 1990 quarterly avoided cost price calculations. To improve the transparency of our orders for future quarterly avoided cost filings, we will explicitly note the swing gas volume assumptions underlying our marginal cost calculations for revenue allocation purposes. At a minimum, this value will be presented as a footnote to the tables appended to future ECAC decisions.

Findings of Fact

1. D.88-09-031 directs SCE to base its quarterly avoided cost price calculation on the most recently adopted forecast of gas volume from either SCE's ECAC or SoCal's ACAP proceeding.

2. On January 9, 1990 we issued D.90-01-015 in SoCal's ACAP proceeding.

3. On January 24, 1990 we issued D.90-01-048 in SCE's ECAC proceeding.

4. In D.90-01-048 we adopted IERs, revenue requirement changes, revenue allocation across customer classes and rate design.

5. For IERs and revenue requirement changes, D.90-01-048 adopts the Joint Recommendations, stipulated to by DRA, SCE, CCC, and CSC.

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5 Attachment 1 shows the development of the marginal cost revenues used in D.90-01-048 and shown in Appendix C therein. These marginal cost revenues were developed using SoCal gas as the "swing fuel" on the margin.

6. Consistent with the conditions of the Joint Recommendations, D.90-01-048 adopts IERs and revenue requirement changes without accepting the methodology or assumptions underlying the parties' estimates.

7. The Joint Recommendation did not address the issue of revenue allocation.

8. D.90-01-048 adopts a final revenue allocation, as presented in Appendix D of that order.

9. Underlying the revenue allocation adopted in D.90-01-048 is a gas volume of 114,703,000 MMBtus, as derived in Attachment 1.

10. Our ECAC decisions routinely include tables showing the derivation of revenue allocation, similar to Attachment 1. In this case, the tables were inadvertently omitted from Appendix D of D.90-01-048.

#### Conclusions of Law

1. The gas volume of 114,703,000 MMBtus was implicitly adopted in D.90-01-048 to arrive at the adopted revenue allocation.

2. The gas volume of 114,703,000 MMBtus represents the most recently adopted forecast for the purpose of SCE's May 1, 1990 quarterly avoided cost price calculations.

3. SCE properly used the gas volume of 114,703,000 MMBtus in its April 2, 1990 quarterly posting.

4. In order to improve the transparency of our Energy Cost Adjustment Clause orders for future quarterly postings, we should include, as a minimum, a footnote to the adopted revenue allocation tables that presents the underlying gas volume.

5. In order to provide all interested parties with the resolution of this issue as soon as possible, this order should be effective today.

O R D E R

IT IS ORDERED that:

1. The April 30, 1990 protests filed by the California Cogeneration Council and the Cogenerators of Southern California are denied.
2. In the future, in compiling the revenue allocation tables appended to our Energy Cost Adjustment Clause orders, our Commission Advisory and Compliance Division shall note the gas volume forecast implicit in those tables.

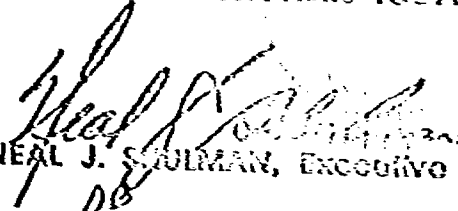
This order is effective today.

Dated SEP 12 1990, at San Francisco, California.

G. MITCHELL WILK  
President  
FREDERICK R. DUDA  
STANLEY W. HULETT  
PATRICIA M. ECKERT  
Commissioners

Commissioner John B. Ohanian,  
being necessarily absent, did  
not participate.

I CERTIFY THAT THIS DECISION  
WAS APPROVED BY THE ABOVE  
COMMISSIONERS TODAY

  
NEAL J. SULLIVAN, Executive Director



1.89-07-004 et al. ALJ/NEG/tcg  
ATTACHMENT 1

SOUTHERN CALIFORNIA EDISON COMPANY

DERIVATION OF THE ADOPTED GAS VOLUMES  
FOR REVENUE ALLOCATION IN D.90-01-048

- 1) Marginal cost revenues of \$4,925.629 million, as adopted in D.90-01-048, Appendix D, page 1, column (c), were developed by adding the marginal energy, demand, and customer cost revenues.

Marginal energy cost revenues	\$2,255.202 million
Marginal demand cost revenues	2466.770 million
Marginal customer cost revenues	203.655 million
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Total marginal cost revenues	\$4,925.629 million

- 2) Marginal energy cost revenue of \$2,255.202 million, as stated above in item (1), was developed by adding together the marginal energy cost revenues attributed to the various rate groups.

Domestic	\$701.432 million
GS-1	151.923 million
GS-2	631.341 million
PA-1	36.704 million
PA-2	31.872 million
Str Light	15.426 million
TOU-8/2ND	260.957 million
TOU-8/PRI	262.117 million
TOU-8/SUB	163.431 million
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Total marginal energy cost revenue \$2,255.202 million

When deflated by the franchise fee factor, they yield:

Domestic	\$696.141 million
GS-1	150.777 million
GS-2	626.579 million
PA-1	36.427 million
PA-2	31.631 million
Str Light	15.310 million
TOU-8/2ND	258.989 million
TOU-8/PRI	260.140 million
TOU-8/SUB	162.198 million
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Total marginal energy cost revenue \$2,238.192 million

## ATTACHMENT 1

## SOUTHERN CALIFORNIA EDISON COMPANY

DERIVATION OF THE ADOPTED GAS VOLUMES  
FOR REVENUE ALLOCATION IN D.90-01-048.

- 3) Marginal energy cost revenues for an annual period for each rate group, as stated in item (2) above, were developed by adding together the marginal on-peak, mid-peak, and off-peak energy cost revenues for both summer and winter:

	SUMMER			WINTER	
	ON-PEAK	MID-PEAK	OFF-PEAK	MID-PEAK	OFF-PEAK
Domestic	69.562	75.799	108.922	210.804	231.054
GS-1	19.443	20.278	19.378	54.618	37.060
GS-2	66.495	73.602	90.459	211.513	184.510
PA-1	3.598	4.009	5.869	10.194	12.758
PA-2	3.076	3.453	5.038	9.249	10.816
Str Light	0.000	0.966	3.406	1.985	8.952
TOU-8/2ND	25.183	28.667	38.651	86.492	79.997
TOU-8/PRI	21.854	25.625	41.851	79.473	91.337
TOU-8/SUB	11.960	14.475	27.538	46.108	62.116

- 4) Marginal energy cost revenues, as stated in item (3) above, were developed by multiplying each group's unit marginal energy costs by its respective consumption:

	SUMMER			WINTER	
	ON-PEAK	MID-PEAK	OFF-PEAK	MID-PEAK	OFF-PEAK
Unit marginal energy costs (\$/Kwh):					
Domestic	0.04103	0.03295	0.03030	0.03692	0.03051
GS-1	0.04099	0.03291	0.03026	0.03688	0.03048
GS-2	0.04101	0.03294	0.03029	0.03690	0.03050
PA-1	0.04103	0.03295	0.03030	0.03692	0.03051
PA-2	0.04101	0.03293	0.03028	0.03690	0.03050
Str Light	0.04058	0.03259	0.02996	0.03651	0.03018
TOU-8/2ND	0.04103	0.03295	0.03030	0.03692	0.03051
TOU-8/PRI	0.04024	0.03231	0.02971	0.03621	0.02994
TOU-8/SUB	0.03852	0.03105	0.02870	0.03485	0.02898

## Energy consumption for forecast period (Gwh):

Domestic	1,695.5	2,300.6	3,595.3	5,710.2	7,573.7
GS-1	474.4	616.1	640.3	1,481.0	1,216.0
GS-2	1,621.3	2,234.6	2,986.8	5,731.3	6,050.0
PA-1	87.7	121.7	193.7	276.1	418.2
PA-2	75.0	104.8	166.4	250.6	354.7
Str Light	0.0	29.7	113.7	54.4	296.6
TOU-8/2ND	613.8	870.1	1,275.8	2,342.9	2,622.2
TOU-8/PRI	543.1	793.0	1,408.7	2,195.1	3,050.5
TOU-8/SUB	310.5	466.3	959.5	1,323.1	2,143.5

## ATTACHMENT 1

## SOUTHERN CALIFORNIA EDISON COMPANY

DERIVATION OF THE ADOPTED GAS VOLUMES  
FOR REVENUE ALLOCATION IN D.90-01-048.

The annual energy consumption, as stated above, adds up to 67,388 Gwh, as adopted in D.90-01-048, Appendix D, page 1, column (a).

- 5) Unit marginal energy costs, as stated above in item (4), were developed by multiplying the systemwide unit marginal energy costs by the line loss factors for each of the rate groups:

	SUMMER			WINTER	
	ON-PEAK	MID-PEAK	OFF-PEAK	MID-PEAK	OFF-PEAK
-----					
Systemwide unit marginal energy costs (\$/Kwh):					
	0.0374	0.0302	0.0280	0.0339	0.0283

## Line loss factors:

Domestic	1.0970	1.0910	1.0820	1.0890	1.0780
GS-1	1.0959	1.0899	1.0809	1.0879	1.0769
GS-2	1.0966	1.0906	1.0816	1.0886	1.0777
PA-1	1.0970	1.0910	1.0820	1.0890	1.0780
PA-2	1.0966	1.0906	1.0816	1.0886	1.0776
Str Light	1.0850	1.0790	1.0700	1.0770	1.0666
TOU-8/2ND	1.0970	1.0910	1.0820	1.0890	1.0780
TOU-8/PRI	1.0760	1.0700	1.0610	1.0680	1.0580
TOU-8/SUB	1.0300	1.0280	1.0250	1.0280	1.0240

- 6) The unit marginal energy costs, as stated above in item (5), were developed by multiplying the gas price of \$2.84/MMBtu by the incremental energy rates, and adding \$0.003/Kwh to that amount for O&M expenses, as adopted in Edison's general rate case proceeding, D.87-12-066:

	SUMMER			WINTER	
	ON-PEAK	MID-PEAK	OFF-PEAK	MID-PEAK	OFF-PEAK
-----					
Gas price (\$/MMBtu):					
	2.84	2.84	2.84	2.84	2.84
Incremental energy rates (Btu/Kwh):					
	12,121	9,579	8,798	10,869	8,900
O&M expenses (\$/Kwh):					
	0.003	0.003	0.003	0.003	0.003

ATTACHMENT 1

SOUTHERN CALIFORNIA EDISON COMPANY

DERIVATION OF THE ADOPTED GAS VOLUMES  
FOR REVENUE ALLOCATION IN D.90-01-048

7. The gas price of \$2.84/MMBtu appeared in DRA's Exhibit 21 as "SoCal Average Price with Demand Charges" (See Chapter 11 Summary Table and following page). This price was developed from underlying workpapers by dividing DRA's forecast of gas production expenses by the DRA's forecast of gas purchases:

SoCal P5	\$289,048
SoCal demand charge	30,207
Core P2A	4,752
SoCal (CC)	1,674
SoCal (Pkrs)	<u>26</u>
Total expenses	\$325,707
Gas purchases	114,703 MMBtu

(END OF ATTACHMENT 1)