

123 FERC ¶ 61,011
UNITED STATES OF AMERICA
FEDERAL ENERGY REGULATORY COMMISSION

Before Commissioners: Joseph T. Kelliher, Chairman;
Sudeen G. Kelly, Marc Spitzer,
Philip D. Moeller, and Jon Wellinghoff.

Southern Company Services, Inc.

Docket Nos. ER91-150-014
ER91-326-006
ER91-570-011

ORDER ON REMAND

(Issued April 4, 2008)

1. In response to a petition for review of the Commission's orders issued earlier in this proceeding,¹ the United States Court of Appeals for the District of Columbia Circuit issued an order remanding the case back to the Commission for further consideration.² At issue was the Commission's treatment of turbine assembly and heating loss costs in calculating rates for reactive power. In this order, we direct Southern to revise the reactive power rate to reflect an allocated portion of turbine assembly costs; revise the calculation of heating losses to reflect the actual output of the units; and provide additional data to support the amount of unrecovered heating losses.

I. Background

2. This proceeding involves rates to be charged for reactive power by Southern Company Services, Inc., as agent for the operating companies of the Southern Company, namely Alabama Power Company (Alabama Power), Georgia Power Company (Georgia Power), Gulf Power Company (Gulf Power), Mississippi Power Company (Mississippi Power), and Savannah Electric and Power Company (Savannah Electric) (collectively referred to as Southern).

¹ *Southern Company Services, Inc.*, 61 FERC ¶ 63,009 (1992), *aff'd in part and rev'd in part*, 80 FERC ¶ 61,318 (1997), *reh'g denied*, 82 FERC ¶ 61,168 (1998) (*Southern*).

² *Alabama Power Co. v. FERC*, 220 F.3d 595 (D.C. Cir. 2000) (Remand Order).

3. Specifically, this case involves a Unit Power Sales Agreement, filed in Docket No. ER91-150-000, between Southern and the City of Tallahassee, Florida.³ The agreement provided for a 100 MW sale from the Miller units on Alabama Power's system and the Scherer units on Georgia Power's system to Tallahassee over a 10-year term, from 1990 to 2000, with options under which Tallahassee could increase or decrease the amount of power purchased by 25 MW.⁴ Southern proposed to provide this service under formula rates with separate formulae for generation and transmission services, plus various surcharges, one of which was a reactive power charge of \$0.25/kW per month.⁵ The Commission accepted the contract for filing, suspended it, and set it for hearing. The parties subsequently resolved all rate issues other than reactive power by a settlement, which was approved by letter order issued October 26, 1992.⁶

4. The Commission affirmed a presiding judge's determination that a reactive power charge is appropriate, but reversed the finding that Southern's proposed reactive power charge is just and reasonable. The Commission adopted, with modifications, trial staff's alternative methodology for determining a reactive power charge, which excluded turbine assembly costs.⁷

5. Subsequently, the Commission denied Southern's request for rehearing. Southern argued that the Commission had improperly rejected (1) Southern's proposed allocation of turbine assembly costs to the reactive power charge; and (2) Southern's recovery of the heating losses in the reactive power charge. The Commission affirmed its earlier decision and denied rehearing.⁸

6. Southern appealed the Commission's decision to the United States Court of Appeals for the District of Columbia Circuit, arguing that the Commission erred in its exclusion of turbine assembly costs and heating loss costs from the calculation of Southern's reactive power rate. The court held that the Commission's decision regarding turbine assembly costs appeared inconsistent with other, later Commission precedent and directed the Commission to re-examine Southern's turbine assembly costs in light of

³ Remand Order, 220 F.3d at 596.

⁴ *Southern*, 80 FERC ¶ 61,318 at 62,081.

⁵ *Id.*

⁶ *Id.* at 62,081 n.8

⁷ *Id.* at 62,091.

⁸ *Southern*, 82 FERC ¶ 61,168.

another Commission decision issued subsequent to the Commission's *Southern* orders.⁹ The court also remanded the Commission's decision on heating loss costs, directing the Commission to, among other things, reconsider its decision that heating loss costs are already recovered through the fuel adjustment clause and whether, as Southern claimed, Southern's revenue-crediting mechanism prevents double recovery of costs recovered through the fuel adjustment clause.¹⁰

II. Discussion

A. Turbine Assembly Costs

7. In *AEP*, which we note was issued subsequent to the decisions on remand here, the Commission approved a method for American Electric Power Service Corp. (AEP) to recover the costs of reactive power (*AEP* methodology).¹¹ The Remand Order noted that the Commission recognized in *AEP* that investment in turbines is a legitimate and recoverable cost.¹² The Remand Order directed the Commission to reconcile its treatment of Southern's turbine assembly costs with the treatment allowed under the later *AEP* methodology.

8. Under the *AEP* methodology, the allocator used to determine the amount of generator-exciter investment related to reactive power is based on the ratio of MVAR² to MVA² (reactive allocator) where MVAR is megavolt amperes reactive capability and MVA is megavolt amperes capability at a power factor of one. Accessory equipment, including auxiliary generators, is allocated to reactive power production using the product of two allocators. The first allocator is the ratio of generator-exciter auxiliary load (MW) divided by total production plant auxiliary load (MW). The second allocator used to determine the portion of accessory equipment that is reactive-related is the same reactive allocator used for generator-exciters. The remaining production plant investment is calculated by subtracting the generator-exciter and accessory equipment from total production plant to avoid double counting. The remaining production plant investment, *which includes the turbines*,¹³ is allocated to reactive power service using an allocator called the remaining power plant investment allocator (RPPIA) or balance of plant (BOP)

⁹ Remand Order, 220 F.3d at 599-600, citing *American Electric Power Service Corp.*, 80 FERC ¶ 63,006 (1997), *aff'd in relevant part*, 88 FERC ¶ 61,141 (1999) (*AEP*).

¹⁰ Remand Order, 220 F.3d at 600-01.

¹¹ *AEP*, 88 FERC ¶ 61,141 at 61,439-40, 61,456-58.

¹² Remand Order, 220 F.3d at 600, citing *AEP*, 80 FERC ¶ 63,006 at 65,076-80.

¹³ *See AEP*, 80 FERC ¶ 63,006 at 65,077, 65,079-80, *aff'd*, 88 FERC ¶ 61,141 at 61,439.

allocator, which is the product of two ratios. The first ratio is Exciter MW/Generator MW. The second ratio is the maximum MVARs/nameplate MVARs.¹⁴

9. As the *AEP* methodology allocates a share of turbine costs to reactive power production and rates, we find that Southern may include a share of its turbine assembly costs in its calculation of its reactive power rate. Southern is directed to file revisions to its reactive power rate, with supporting workpapers, to reflect the inclusion of an allocated portion of its turbine assembly costs.

B. Heating Losses

1. Peak v. Actual Conditions

10. The Remand Order upheld the Commission's rejection of Southern's heating loss cost calculations. Southern considered the full VAR capability of the generators and assumed that all of its generators produce maximum VARs at all times, instead of the VARs actually produced at specific hours and normal conditions. The Commission determined that Southern's heating loss costs calculations overestimated its heating loss costs.¹⁵ The Remand Order upheld the Commission's finding, adding that the Commission should "allow [Southern] to recalculate the costs associated with heating loss."¹⁶ Therefore, Southern is directed to recalculate heating losses based on the actual VAR output of its generators for the term of the Unit Power Sales Agreement, and submit a compliance filing with a revised reactive power rate, with supporting workpapers accordingly. In addition, Southern is directed to provide supporting workpapers that include all peak and non-peak VAR output for the relevant period based on actual meter readings.

2. Fuel Adjustment Clause and Double Recovery

11. In addition, the Remand Order directed the Commission to reconsider whether all heating loss costs are already recovered through the fuel adjustment clause and whether Southern's revenue-crediting mechanism prevents double recovery of costs recovered through the fuel adjustment clause. In the earlier orders in this proceeding, the Commission concluded that heating loss costs should not be reflected in reactive power rates, because they were already recovered in the fuel adjustment clause.¹⁷ Southern

¹⁴ See *AEP*, 80 FERC ¶ 63,006 at 65,076-80, *aff'd*, 88 FERC ¶ 61,141 at 61,439.

¹⁵ *Southern*, 80 FERC ¶ 61,318 at 62,089.

¹⁶ Remand Order, 220 F.3d at 600.

¹⁷ *Southern*, 80 FERC ¶ 61,318 at 62,089.

countered that its revenue-crediting mechanism prevents double-recovery and also avoids a subsidy of certain customers' rates by other customers.

12. The court determined that the Commission did not adequately explain why Southern's revenue-crediting mechanism did not prevent double recovery. The court stated that, if the Commission concluded on reconsideration that the revenue-crediting mechanism discloses unrecovered heating loss costs, the Commission should allow Southern to adjust its reactive power rate to recover those costs. Moreover, even if the costs are already recovered, the Commission should consider whether Southern's proposed reactive power rate properly allocates costs among consumers.¹⁸

13. Under the *AEP* methodology, generators are allowed to recover a portion of their fixed operating and maintenance costs in their revenue requirement.¹⁹ However, if Southern can demonstrate that it incurs variable costs associated with heating losses, we would consider recovery of those costs.

14. Moreover, Southern's fuel adjustment clause, as filed, appears to recover total system losses including additional heating losses. Southern, however, claims that its fuel adjustment clause includes a revenue crediting mechanism that prevents a double recovery of heating losses from affected customers. Southern computes its reactive power costs as the product of: (1) reactive requirement from generators (\$/MVAR); and (2) the sum of the cost of reactive capacity (\$/MVAR/year) and the cost of losses attributable to additional reactive output. In response to the court's findings in the Remand Order, Southern has the option to file a compliance filing identifying and supporting any specific unrecovered heating loss costs incurred during the term of the Unit Power Sales Agreement. The filing should include sufficient detail demonstrating that the fuel adjustment clause billings included an appropriate revenue credit to prevent double recovery.

The Commission orders:

(A) Within 30 days of the date of this order, Southern is directed to file revisions to its reactive power rate, with supporting workpapers, to include an allocated portion of Southern's turbine assembly costs as part of its remaining production plant investment and to recalculate the costs associated with heating losses based on VARs actually produced during the term of the Unit Power Sales Agreement.

¹⁸ Remand Order, 220 F.3d at 601 & n.10.

¹⁹ *AEP*, 80 FERC ¶ 63,006 at 65,071, 65,081-82, *aff'd*, 88 FERC ¶ 61,141 at 61,457-58.

(B) Within 30 days of the date of this order, Southern may submit a compliance filing, with supporting workpapers, identifying and supporting any unrecovered heating loss costs associated with the Unit Power Sales Agreement as discussed in the body of this order.

By the Commission.

(S E A L)

Nathaniel J. Davis, Sr.,
Deputy Secretary.