

COMMONWEALTH OF KENTUCKY  
BEFORE THE PUBLIC SERVICE COMMISSION

In the Matter of:

JACKSON COUNTY WATER ASSOCIATION, INC., )  
APPLICATION FOR A CERTIFICATE OF CON- )  
VENIENCE AND NECESSITY AND APPROVAL OF )  
FINANCING PLAN TO CONSTRUCT A WATER ) CASE NO. 9321  
STORAGE TANK AND TO MAKE ALTERATIONS TO )  
EXISTING WATER TREATMENT PLANT AND FOR )  
INCREASE OF WATER RATES )

ORDER

The Jackson County Water Association, Inc., ("Jackson Water") filed its application on March 29, 1985, for approval of adjustments to its water service rates, authorization to construct a \$385,000 waterworks improvement project and approval of its plan of financing for this project. The planned financing includes a \$140,000 grant from the Appalachian Regional Commission ("ARC"), a loan of \$319,000 from the Farmers Home Administration ("FmHA"), and a local contribution of \$5,000. The FmHA loan will be scheduled for repayment over a 40-year period at an interest rate of 5 percent per annum and will be secured by a real estate mortgage.

The proposed construction will improve hydraulic capability and service reliability for existing customers. Drawings and specifications for the proposed improvements as prepared by Crawford and Crawford Engineers, Inc., of Burnside, Kentucky, ("Engineer") have been approved by the Division of Water of the Natural Resources and Environmental Protection Cabinet.

A hearing on Jackson Water's proposed construction, financing and rates was held in Frankfort, Kentucky, on September 17, 1985. There were no intervenors and no protests were entered.

The rates proposed by Jackson Water would produce additional annual revenues of \$25,512, an increase of 10.5 percent over test-period revenues. Based on the determination herein, the revenues of Jackson Water will increase by \$16,893 annually, an increase of 7 percent over test-period revenues.

#### COMMENTARY

Jackson Water is a non-profit water utility engaged in the distribution and sale of water to approximately 1685 customers in Jackson and Rockcastle counties, Kentucky.

#### TEST PERIOD

Jackson Water as part of its filing submitted an audit report by Christian, Sturgeon and Associates for the years ending December 31, 1984, and 1983, as its financial exhibit. Therefore, the Commission in this proceeding has used the 12-month period ending December 31, 1984, as the test period in this proceeding.

#### REVENUES AND EXPENSES

Jackson Water had an actual test period net operating loss of \$1,349 including \$5,635 of interest and dividend income. The Commission based on the following adjustments has increased the test period operating income by \$58,249 for an adjusted net operating income of \$56,900.

#### Uncollectible Revenue

Jackson Water had test period uncollectible revenue of \$3,174 which it included in its operating expenses. The

Commission is of the opinion that this item should more properly be included in the calculation of net operating revenues. The ratio of uncollectible revenue to gross revenue for the test period was 1.309 percent.<sup>1</sup> The Commission has made an allowance for uncollectible revenue at this level in its calculation of Jackson Water's revenue requirements.

#### Produced Water Expense

Jackson Water produced 129,172,000 gallons of water during the test period. Unaccounted-for water for this period totaled 33,843,349 gallons or 26.2 percent.<sup>2</sup> An unaccounted-for maximum allowance of 15 percent for rate-making purposes is a long established Commission precedent that is applicable to the instant case. In order to determine the allowable cost of water, the Commission has taken Jackson Water's actual test period pumping and water treatment expense of \$52,885<sup>3</sup> and divided by the actual water produced for a cost per 1000 gallons of produced water of 40.9 cents.<sup>4</sup> At the hearing Jackson Water's accounting witness agreed with the method of determining the cost of produced water.<sup>5</sup> The Commission using this cost of water and Jackson Water's actual test period sales of 83,452,651 gallons, free customers

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<sup>1</sup> 1984 Annual Report, page 11, line 34 divided by page 10, line 29.  $\$3,174 \div \$242,420 = 1.309\%$ .

<sup>2</sup> 1984 Annual Report, page 12.

<sup>3</sup> 1984 Annual Report, page 11, lines 6 and 19.

<sup>4</sup>  $(\$52,885 \div 129,172,000 \text{ gallons}) \times 1000 \text{ gallons} = \$0.409$ .

<sup>5</sup> Transcript of Evidence, September 17, 1985, pp. 46 and 47.

usage of 63,000 gallons, company used water of 11,813,000 gallons<sup>6</sup> and including an unaccounted-for water allowance of 15 percent has determined the allowable cost of produced water to be \$45,870, a reduction of \$7,015 to actual test period expenses.<sup>7</sup>

Depreciation Expense

Jackson Water had test period depreciation expense of \$80,308, which included depreciation on contributed property. The Commission has established a precedent disallowing depreciation on contributed property for rate-making purposes. The Commission utilizing Jackson Water's depreciation schedule<sup>8</sup> and assigning the depreciation rates to contributed property in the same proportion as they were applied to total plant in service has reduced Jackson Water's depreciation expense by \$56,457.<sup>9</sup> The Commission has increased Jackson Water's depreciation expense by \$3,828 to reflect one year's depreciation on the depreciable portion of the construction allowed in this Order for an adjusted depreciation expense of \$27,679.<sup>10</sup>

<sup>6</sup> 1984 Annual Report, page 12.

<sup>7</sup>  $(83,452,651 \text{ gallons} + 63,000 \text{ gallons} + 11,813,000 \text{ gallons}) \times .85 \times \$0.000409 = \$45,870 - \$52,885 = (\$7,015)$ .

<sup>8</sup> Depreciation schedule filed in response to the staff information request of May 20, 1985.

<sup>9</sup> Contributed Property

Non-Depreciable Plant:	\$ 60,463	X	0%	=	\$ 0
40-Year Plant:	2,022,625	X	2.5%	=	50,566
20-Year Plant:	10,469	X	5%	=	523
8-Year Plant:	42,944	X	12.5%	=	5,368
	<u>\$2,136,501</u>				<u>\$56,457</u>

<sup>10</sup> Total Plant Addition of \$295,000 less ARC Grant of \$150,000 = \$145,000 X composite depreciation rate of 2.64% = \$3,828.

Therefore, the Commission is of the opinion that Jackson Water's adjusted operations are stated as follows:

	<u>Actual</u>	<u>Adjustments</u>	<u>Adjusted</u>
Operating Revenues	\$242,420	(\$ 3,174)	\$239,246
Operating Expense	<u>249,404</u>	<u>( 61,423)</u>	<u>187,981</u>
Operating Income	\$ (6,984)	\$ 58,249	\$ 51,265
Other Income	5,635	-0-	5,635
Net Operating Income	<u>\$ (1,349)</u>	<u>\$ 58,249</u>	<u>\$ 56,900</u>

#### REVENUE REQUIREMENT

Including the proposed financing approved herein Jackson Water has a debt service obligation of \$61,310 annually.<sup>11</sup> Jackson Water's adjusted operations provides a .84X coverage on this level of debt service. The Commission is of the opinion that this coverage is neither fair, just, nor reasonable and does not permit Jackson Water to fully provide for its debt service obligations and, further, that a debt service coverage of 1.2X will satisfy this requirement and allow for a reasonable operating reserve. Thus, the Commission will allow Jackson Water to increase its rates to provide an additional \$16,893 on an annual basis calculated as follows:

1.2X DSC	\$73,572
Adjusted Net Operating Income	<u>56,900</u>
Deficiency	\$16,672
Adjusted for Uncollectibles (+ .9869)	\$16,893

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<sup>11</sup> Debt Service (5 year Avg.)  
2012 Note 23,297  
2019 Note 32,076  
Projected Note 5,937  
61,310

### CONTINUITY OF ADEQUATE AND RELIABLE SERVICE

Jackson Water's Engineer has provided information and testimony which appear to indicate that reliable and adequate service can be maintained throughout the system after completion of the proposed construction. The Commission is concerned, however, that Jackson Water's service to its customers may not be totally adequate in the long term, due to the constraints of its existing water distribution system and the "marginal" size of various components.

The Commission reminds Jackson Water of its obligation to provide adequate and reliable service to all of its customers. Jackson Water should monitor the adequacy of the expanded water distribution system after construction. If this monitoring indicates that the level of service is inadequate or declining, Jackson Water must take necessary action to maintain the level of service in conformance with the regulations of the Commission.

### FINDINGS AND ORDERS

The Commission, after consideration of the application and evidence of record and being advised, is of the opinion and finds that:

1. Public convenience and necessity require that the construction proposed in the application and record be performed and that a certificate of public convenience and necessity be granted.

2. The approved construction includes about 2.3 miles of water mains, a 150,000-gallon water storage tank, improvements to the water treatment plant, and miscellaneous appurtenances

thereto. The low bids received for the proposed work totaled \$284,900, which will require about \$385,000 after allowances are made for fees, contingencies and other indirect costs.

3. Jackson Water should obtain approval from the Commission prior to performing any additional construction not expressly certificated by this Order.

4. Any deviations from the approved construction which could adversely affect service to any customer should be subject to prior approval of this Commission.

5. The financing proposed by Jackson Water for this project will be needed to pay for the work herein approved. Jackson Water's financing plan should, therefore, be approved.

6. Jackson Water should file with the Commission duly verified documentation which shows the total costs of construction including all capitalized costs (engineering, legal, administrative, etc.) within 60 days of the date that construction is substantially completed. Said construction costs should be classified into appropriate plant accounts in accordance with the Uniform System of Accounts for Water Utilities prescribed by this Commission.

7. Jackson Water's contract with its Engineer should require the provision of construction inspection under the general supervision of a professional engineer with a Kentucky registration in civil or mechanical engineering. The supervision and inspection should insure that the construction work is done in accordance with the contract drawings and specifications and in

conformance with the best practices of the construction trades involved in the project.

8. Jackson Water should require the Engineer to furnish a copy of the record drawings and a signed statement that the construction has been satisfactorily completed in accordance with the contract drawings and specifications within 60 days of the date of substantial completion of this construction.

9. Jackson Water should file with the Commission a copy of all contractual agreements for the provision of services or the purchase of services which are subject to the approval of this Commission.

10. The rates proposed by Jackson Water provide revenues greater than those allowed herein and are hereby denied upon application of KRS 278.030.

11. The rates in Appendix A are fair, just and reasonable rates to be charged by Jackson Water for water service rendered on and after the date of this Order.

12. Jackson Water shall file its revised tariffs setting forth the rates and charges allowed herein within 30 days of the date of this Order.

IT IS THEREFORE ORDERED that:

1. Jackson Water be and it hereby is granted a certificate of public convenience and necessity to proceed with the waterworks improvements projects set forth in the drawings and specifications of record hereby approved.

2. Jackson Water shall comply with all matters set out in Findings 3 through 9 as if the same were individually so ordered.



3. The rates proposed by Jackson Water are hereby denied.

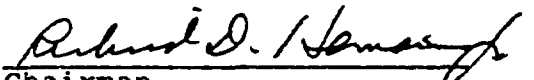
4. The rates in Appendix A be and they hereby are approved for service rendered by Jackson Water on and after the date of this Order.

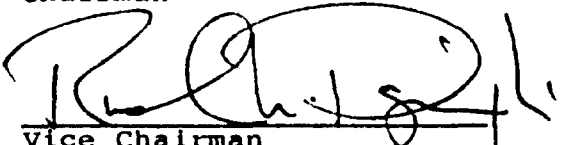
5. Within 30 days from the date of this Order Jackson Water shall file with this Commission its revised tariff sheets setting out the rates approved herein.

Nothing contained herein shall be deemed a warranty of the Commonwealth of Kentucky, or any agency thereof, of the financing herein authorized.

Done at Frankfort, Kentucky, this 15th day of November, 1985.

PUBLIC SERVICE COMMISSION

  
Chairman

  
Vice Chairman

  
Commissioner

ATTEST:

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Secretary

APPENDIX A

APPENDIX TO AN ORDER OF THE KENTUCKY PUBLIC SERVICE  
COMMISSION IN CASE NO. 9321 DATED 11/15/85

The following rates and charges are prescribed for the customers in the area served by Jackson County Water Association. All other rates and charges not specifically mentioned herein shall remain the same as those in effect under authority of this Commission prior to the effective date of this Order.

RATES: Monthly

5/8 x 3/4-Inch Connection

First 1,000 gallons	\$6.95 Minimum Bill
Next 4,000 gallons	2.15 per 1,000 gallons
Next 5,000 gallons	1.70 per 1,000 gallons
Next 10,000 gallons	1.50 per 1,000 gallons
Over 20,000 gallons	1.10 per 1,000 gallons

3/4-Inch Connection

First 3,000 gallons	\$11.25 Minimum Bill
Next 2,000 gallons	2.15 per 1,000 gallons
Next 5,000 gallons	1.70 per 1,000 gallons
Next 10,000 gallons	1.50 per 1,000 gallons
Over 20,000 gallons	1.10 per 1,000 gallons

1-Inch Connection

First 5,000 gallons	\$15.55 Minimum Bill
Next 5,000 gallons	1.70 per 1,000 gallons
Next 10,000 gallons	1.50 per 1,000 gallons
Over 20,000 gallons	1.10 per 1,000 gallons

1 1/2-Inch Connection

First 10,000 gallons	\$24.05 Minimum Bill
Next 10,000 gallons	1.50 per 1,000 gallons
Over 20,000 gallons	1.10 per 1,000 gallons

2-Inch Connection

First 20,000 gallons	\$39.05 Minimum Bill
Over 20,000 gallons	1.10 per 1,000 gallons