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December 12, 2005

HAND DELIVERED

Steve Olea
Assistant Director, Utilities Division
Arizona Corporation Commission
1200 W. Washington
Phoenix, AZ 85007

Re: *Southwest Transmission Cooperative, Inc. ("SWTC");*
Docket Nos. E-04100A-00-0227 and E-01773A-00-0227

Dear Mr. Olea:

In Decision No. 64991 (Docket No. E-04100A-00-0227), the Commission authorized SWTC to borrow up to $14,360,920 from the RUS/FFB for transmission-related projects (referred to as the "A8 Loan Authorization"). Later in 2002, the Commission issued Decision No. 65473 (Docket No. E-04100A-02-0261) authorizing SWTC to borrow $30,853,000 from the RUS/FFB to finance its Construction Work Plan (referred to as the "B8 Loan Authorization").

The last day which encumbered funds on the A8 Loan Authorization can be drawn is March 31, 2006. If the funds are not drawn by that date, the encumbrance will lapse and RUS will have to go through another Congressional budget process to re-encumber the monies with the federal treasury. RUS recently informed SWTC that approximately $1.5 million in A8 Loan Authorization monies have not been drawn. It recommended that funds for projects it has approved as part of the Construction Work Plan B8 Loan Authorization be drawn instead under its A8 Loan Authorization so as to avoid this lapse in the encumbrance. SWTC has identified three projects totaling approximately $1.4 million in today's costs which would qualify for this financing.

One of the projects – the Mobile Radio System Upgrade – was part of the original work plan. The Remedial Action Scheme and San Xavier Upgrades have been approved by RUS as amendments to the Construction Work Plan. For convenience, relevant pages from the Construction Work Plan as amended describing the three projects are attached.

SWTC would ask that the Commission confirm SWTC's ability to finance these projects under the A8 Loan Authorization in Decision No. 64991. In order to assure the funds can be drawn by the March 31 deadline, SWTC asks that the confirmation be issued as soon as possible and no later than February 15.

Staff's assistance in relation to this matter is appreciated. If I can answer any questions in relation to this request, please call.

Very truly yours,

GALLAGHER & KENNEDY, P.A.

By:
Michael M. Grant

MMG/plp
15169-1/1316617

Attachments

Original and 15 copies filed with Docket Control this 12th day of December, 2005.

cc (w/attachments): Steve Olea, Utilities Division (delivered)
Chris Kempley, Legal Division (delivered)
Gary Pierson (mailed)

SOUTHWEST TRANSMISSION COOPERATIVE, INC.

Proposed B8 Loan Projects to be moved to A8 Loan:

Apache Remedial Action Scheme	$ 173,676.00
Mobile Radio System Upgrade	$ 219,682.60
San Xavier Area Comm. Upgrade	$1,094,970.74
Subtotal	$1,488,329.34

Capital Project Analysis

Project Name:	SWTransco Mobile Radio System Upgrade		
Project Location:	Various		
Project Number:	5000393010	(1101.1)	
Estimated Cost:	$350,000	*Including* $0	IDC
In Service Month/Year:	Dec / 2003		
Anticipated Funding Source:	$350,000	RUS Loan Funds	
	$0	General Funds	
	$0	Other	
RUS Environmental Approval:	1/10/2001	Actual	
RUS General Funds Approval:		Not Applicable	

Recommendation:

Upgrade the current aging and non-supported mobile radio system. This includes replacing the mobile radio repeaters at seven (7) repeater sites and implementing a replacement program of the mobiles, portables and base stations.

This project will have several sites in which work will be required to meet the objective.

Economics / Justification

Project Type:	System Improvement
Budget Priority Code:	3-Improved Sys. Reliability & Econ.
IRR:	%
Payback:	Years
Payback Basis:	Not Calculated, obsolete equipment. Continued ability to maintain questionable.

Background, Justification, and Need:

The current equipment is more than 20 years old and has been manufacture discontinued for several years. Manufacturer's support is disappearing due to lack of parts being manufactured for the radio modules.

Capital Project Analysis

The mobile radio system is critical to the day to day operation of the Transmission System and the Apache Generating Station. It provides critical communications for crews working on the transmission lines, at the substations, microwave communications sites and along the routes to and from the work sites. The mobile radio system is the primary method of contact for the crews to the System Control Center and Benson Headquarters.

System Control uses the radio system to keep in contact with the crews, keep track of their locations, conduct switching orders and plan and modify future work. In-house crews use the radio system for switching order coordination, locating failed or downed lines and equipment, cable pulling and wire stringing.

Alternatives Reviewed:

Option #1 - Do Nothing

This option will result in further decline in vendor maintenance support and increased prices for the remaining parts if they are available at all. The cost to repair will increase and the overall maintenance will increase. Eventually the equipment will begin failing regularly making the radio system vulnerable to complete failure and become unusable by the crews.

Option #2 - Begin using cellular phone service

This option will result in a loss of coverage. The Cellular telephone industry has installed thousands of cell sites and sold millions of phones, but is targeting areas of the country which are larger population centers. The rural areas and in particular the areas where transmission lines typically go are not populated and often have limited or no coverage due to no population being there. The reliability and availability of a cellular system is questionable for such a critical operation since it is not built to the same reliability standards of an owned radio system.

The on going cost to use cellular service also makes it cost prohibitive to use instead of a mobile radio system. The costs would likely run $10,000 to $12,000 or more per month.

Option #3 - Replace the existing aging and non-supported mobile radio system with a digital capable mobile radio system

This option involves replacing the existing mobile radio equipment with new digital capable repeaters and mobile equipment. This will allow continued use of the portion of the mobile and handheld radios which are still serviceable and replace the units which must replaced. It also will allow the cutover in a planned time frame using in-house staff to complete the work.

Safety Considerations:

Capital Project Analysis

All safety issues in design and construction will be adhered to through the project.

Environmental Considerations:

The project will involve equipment being installed on the existing towers in the existing communications sites. No adverse environmental impact is expected.

Conclusion:

The preferred option is option #3. The installation of a new mobile radio system reduces maintenance by bringing digital technology and modern equipment into service. This new equipment also increases the capabilities to monitor the mobile radio system from Benson which reduces outage time and overall maintenance costs for the network. This option also allows for growth of existing services and for new services when they are required.

Capital Project Analysis

Project Name:	Apache Remedial Action Scheme		
Project Location:	Various Substations		
Project Number:	5000532011	(1000.23)	
Estimated Cost:	$171,330	*Including* $0	IDC
In Service Month/Year:	Jan / 2001		
Anticipated Funding Source:	$171,330	RUS Loan Funds	
	$0	General Funds	
	$0	Other	
RUS Environmental Approval:	9/30/2002	Anticipated	
RUS General Funds Approval:		Not Applicable	

Recommendation:

Implement a Remedial Action Scheme (RAS) for the SWTransco system that will be armed whenever one of the 230kV lines exiting Apache Station is out for maintenance or any other reason. The RAS will automatically reduce Apache generation upon loss of the remaining 230kV line.

Economics / Justification

Project Type:	New Construction
Budget Priority Code:	2-Corp. Oblig., Legal & Other
IRR:	%
Payback:	Years
Payback Basis:	Not calculated. Project needed to bring SWTransco's system into compliance with WSCC Minimum Operating Requirements Criteria

Background, Justification, and Need:

On June 22, 1999 Arizona Electric Power Cooperative, Inc. (AEPCO) experienced loss of all generation at Apache Station when units tripped off-line which ultimately left 45, 309 customers without power. At the time SWTransco's Pantano-Bicknell 230kV line was out of service for maintenance, SWTransco's Dos-Condados-Morenci 230kV line relayed due to an unreported fire beneath the line. These two line outages isolated 435 MW of Apache

generation with only 112.5 MW of load and two 115kV tie lines. The two 115kV lines relayed on overload, further isolating Apache generation. The generating units could not respond to this sudden unbalanced condition resulting in the loss of all generation at Apache.

On July 19, 1999, the Compliance Monitoring and Operating Practices Subcommittee of the Western Systems Coordinating Council (WSCC) requested SWTransco (then AEPCO) to prepare an Abbreviated Disturbance Report. Conclusions and recommendations from this report are as follows:

1. Conclusion: SWTransco's (AEPCO) system was not operating within WSCC Minimum Operating Requirements Criteria once the first 230kV line was out of service. Recommendation: SWTransco's (AEPCO) management personnel shall instruct Power System Controllers to reduce generation to proper levels whenever SWTransco has a transmission line out of service and the loss of the second line will cause cascading outages.

2. Conclusion: Future maintenance or outage conditions will require that sections of the 230kV system be out of service. Recommendation: SWTransco (AEPCO) shall investigate whether to reduce generation, purchase import power to cover load requirements and/or install a Remedial Action Scheme (RAS) to trip generation for this same type of contingency in the future.

Alternatives Reviewed:

Option #1 - Do Nothing

Doing nothing can lead to cascading outages of the Apache Plant generation and loss of service to the member cooperatives and other customers. It also leaves SWTransco out of compliance with WSCC Minimum Operating Requirements Criteria.

Option#2 - Reduce Apache Generation

This option would require AEPCO to reduce generation any time a section of SWTransco's 230kV system is out of service. The estimated cost to AEPCO for replacement power and/or lost revenue due to a reduction in generation is $111,000 per day (based on 2000-2001 market prices that were in effect at time project was evaluated).

Option#3 - Implement a Remedial Action Scheme (RAS)

In conjunction with General Electric, SWTransco's staff has analyzed the events on June 22, 1999 and has developed a RAS that will prevent a reoccurrence of this event and will not require a reduction in generation. The RAS consists of installing relays at various SWTransco substations, a logic processor installed at Apache Station and logic that will trip Apache Steam Unit 2 or 3 or Gas Turbine 3 if the RAS is "armed" when one of the 230kV lines is out of service and the other 230kV line opens.

Capital Project Analysis

Safety Considerations:

All safety issues in design and construction will be adhered to throughout the project.

Environmental Considerations:

The relays, logic processor, etc. installed as part of this project are expected to have no adverse environmental impact.

Conclusion:

Option #3 is the preferred option. Implementation of a Remedial Action Scheme will prevent the reoccurrence of the events of June 22, 2001 at the least cost to SWTransco.

Capital Project Analysis

Project Name:	San Xavier Area Communication Upgrades		
Project Location:	Various Subs./T. Lines		
Project Number:	500038626/000 (1101.34)		
Estimated Cost:	$1,050,000	*Including* $37,092	IDC
In Service Month/Year:	Dec / 2004		
Anticipated Funding Source:	$1,012,908	RUS Loan Funds	
	$37,092	General Funds	
	$0	Other	
RUS Environmental Approval:	10/15/2003	Actual	
RUS General Funds Approval:		Not Applicable	

Recommendation:

Install new digital microwave radio equipment, new towers and fiber optic cable to replace existing non-supported analog microwave radio equipment at substations located southwest of Tucson, Arizona in Trico Electric Cooperative, Inc.'s (Trico) service territory.

The the new equipment will increase reliability and improve system integrity.

Economics / Justification

Project Type:	System Improvement
Budget Priority Code:	3-Improved Sys. Reliability & Econ.
IRR:	%
Payback:	Years
Payback Basis:	Not Calculated, obsolete equipment. Continued ability to maintain questionable.

Background, Justification, and Need:

The current equipment is less than ten years old but has been manufacturer discontinued and has become non-supported due to the rapid shift in technology. Analog microwave radios, which were used extensively a few years ago have now been dropped by most manufacturers

and spare parts and tech support has all but disappeared.

This equipment provides critical communications from several substations in the area southwest of Tucson in Trico's service territory, to other substations and the Benson headquarters. The communications is used for energy management system (EMS) control, billing and system metering, system control communications and relay coordination to maintain the integrity and reliability of the Transmission System.

Alternatives Reviewed:

Option #1 – Do Nothing

This option will result in further decline in maintenance support and increased prices for any parts which may be found. The cost to repair will increase and the overall maintenance will increase. Eventually the equipment will begin failing regularly making the paths to this group of substations unreliable leaving them vulnerable to losing EMS control and metering information.

Option #2 – Replace the analog microwave radio equipment with new digital radio equipment and fiberoptic cable

This option involves replacing the existing analog microwave equipment with digital microwave equipment, new towers and fiber optic cable. This option will simplify the current configuration and reduce the risk of failure and simplify maintenance and network management. It will also facilitate communication with future substations located in this area to support load growth in Trico's system.

Safety Considerations:

All safety issues in design and construction will be adhered to throughout the project.

Environmental Considerations:

The project will involve installing new radios and towers within existing substation sites. It will also involve the installation of fiber optic cable on existing transmission line structures. No adverse environmental impact is expected.

Conclusion:

The preferred option is option #2. The installation of the new digital microwave and fiber optic technology will reduce maintenance costs. This new equipment also increases the capabilities to monitor and control the radio system in this area which reduces outage time and overall maintenance costs for the network. This in turn increases the overall reliability of the

Transmission System. This option also allows for growth of existing services and for new services when they are required.