May 19, 2016

AGENDA ITEM NO. 6

SUBJECT: Resolution No. 2016-5-4, authorizing the transfer of certain transmission projects to Member Cities; and resolving matters incidental and related thereto.

DISCUSSION: The Transmission Engineering Working Group, the P&O Committee, and Staff are of the opinion that it would be more advantageous to the Agency and the Member Cities for several transmission construction projects to be transferred to certain Member Cities. Following the construction, the Member Cities, named below, would be the owners of the new equipment.

Dansby Autotransformer Replacement

TMPA's existing autotransformer at the Dansby Substation has reached the end of its useful life and needs to be replaced for reliability purposes. Rather than have TMPA replace the autotransformer, the Resolution contemplates that Bryan will replace it and thereafter own the new autotransformer.

Swindell Substation Construction

Sharyland currently owns a distribution substation which houses certain TMPA transmission equipment. Sharyland plans to upgrade and reconstruct the substation, making it necessary for TMPA to replace and upgrade its equipment. Rather than have TMPA install and own the new equipment, the Resolution contemplates that Garland would do so.

Transmission Asset Ownership Policy

The Transmission Asset Ownership policy classifies, as a Replacement Project, a project such as the two described above, in which a Member City replaces obsolete equipment owned by TMPA, with equipment to be owned by the Member City. In such cases, bond counsel has advised that the Board should make certain findings, to ensure that the rights of the bondholders are not adversely affected by the loss of equipment constituting part of the System. Accordingly, the "Whereas clauses" of the Resolution make the findings recommended by bond counsel.

To provide support for those findings from the Board, the Transmission Engineering Working Group, with representatives from each of the Member Cities, meet on April 12, 2016 and voted unanimously that the ownership of the equipment by the Member Cities would not negatively affect the proper operation of the TMPA System.

The Financial Working Group, with representatives from each of the Member Cities, met on April 15, 2016, reviewed the financial impact of TMPA not constructing and owning these capital projects and concluded that the projects were not needed for the maintenance of revenue from the Transmission System. Representative from the cities of Denton, Garland and Greenville voted to recommend Member City ownership of these projects. The Bryan representative abstained from the vote, but did not provide an explanation for the abstention.

BACKUP MATERIAL: Capital Proposal relating to Swindell Substation Construction
Capital Proposal relating to Dansby Replace Autotransformer
Transmission Asset Ownership Policy.

ACTION REQUESTED: Consideration and action on Resolution No. 2016-5-4.

Russell Huff
05/06/16

Russell Huff

RESOLUTION NO. 2016-5-4

A RESOLUTION BY THE BOARD OF DIRECTORS OF THE TEXAS MUNICIPAL POWER AGENCY ("AGENCY") AUTHORIZING THE TRANSFER OF CERTAIN TRANSMISSION PROJECTS TO MEMBER CITIES; AND RESOLVING MATTERS INCIDENTAL AND RELATED THERETO.

WHEREAS, the proposed transmission capital expenditure projects that are proposed to be undertaken by certain of the Member Cities (the "Transferred Transmission Projects", as defined below in the body of this Resolution) pertain to the Agency's transmission system, a component of the Agency's generation and transmission system. For purposes hereof, "System" has the meaning set forth in the bond resolutions (the "Bond Resolutions") pursuant to which the Agency has issued its outstanding revenue bonds (the "Outstanding Bonds");

WHEREAS, to the extent, if any, that the transfer of the Transferred Transmission Projects constitutes a sale or other disposition of part of the System, it does not represent the disposition of any property needed for the proper operation of the System or for the maintenance of the revenues therefrom;

WHEREAS, the undertaking of the Transferred Transmission Projects by the Member Cities does not impair or impede the operation of the System and does not impair or impede the rights of the holders of the Outstanding Bonds (the "Bondholders") with respect to the Net Revenues (as defined in the Bond Resolutions); and

WHEREAS, notwithstanding the undertaking of the Transferred Transmission Projects by the Member Cities, the Agency will at all times subsequent thereto (a) operate the System, to the extent practicable, in an efficient and economical manner and (b) maintain, preserve and keep, or cause to be maintained, preserved or kept, the System, including all parts thereof and appurtenances thereto, in good repair, working order and condition, and in such manner that the operating efficiency thereof will be of high character, and the Agency will from time to time, make or cause to be made, all necessary and proper repairs and replacements so that the business carried on in connection with the System by the Agency may be properly and advantageously conducted in a manner consistent with prudent management, and so that the rights and security of the Bondholders are fully protected and preserved;

NOW, THEREFORE, BE IT RESOLVED BY THE BOARD OF DIRECTORS OF THE TEXAS MUNICIPAL POWER AGENCY:

1. That the above recitals are true and correct;

2. That the Dansby Autotransformer Replacement, described by the Capital Proposal attached as Exhibit "A", shall be transferred to the City of Bryan for purposes of funding, construction, and ownership;

3. That the Swindell Substation Construction, described by the Capital Proposal attached as Exhibit "B", shall be transferred to the City of Garland for purposes of funding, construction, and ownership;

4. That the General Manager, or a person acting at his direction, may execute such documents as are necessary to transfer the projects described in paragraphs "2" and "3" (the

"Transferred Transmission Projects") and to enable the above named Member Cities to construct, own, operate, and maintain the Transferred Transmission Projects, including, as necessary, license agreements relating to the use of Agency transmission rights of way and other properties; and

5. That it is officially found and determined that notice of this meeting of the Board of Directors of the Agency was given as required by law.

PASSED AND APPROVED THIS 19TH DAY OF MAY 2016.

James Ratliff, President
Board of Directors
Texas Municipal Power Agency

ATTEST:

P. D. Bairrington, Secretary
Board of Directors
Texas Municipal Power Agency

TEXAS MUNICIPAL POWER AGENCY
CAPITAL PROPOSAL

PROJECT TITLE: Swindell Substation Construction		PROJECT MANAGER: Ahmad Saboor		DATE: March 24, 2016	
PROJECT NO.	RISK LEVEL:	RISK TYPE:	FERC ACCOUNT: Multiple	FUNDING: ☐ Rate ☑ Debt	
SCHEDULE DATES					
START DATE: April 2016			ESTIMATED IN-SERVICE DATE: December 2016		
☑ Capital			☐ Annual Need ☑ One Time Need ☐ Cyclical Need	Capital Plan Year: 2016	
Total Cost: $7,219,300	FY14:	FY15:	FY16: $ 5,000,000	FY17: $ 2,219,300	FY18

DESCRIPTION OF PROJECT:

The goal of Swindell Substation construction is to optimize Transmission Capability for the City of Greenville & serve Sharyland's growing distribution load. TMPA will own and operate the high voltage side of the proposed Swindell substation; while lower voltage side will be owned and operated by Sharyland. Two separate control houses are proposed, 138 kV side will be owned and operated by TMPA the distribution control house will be owned and governed by Sharyland. The two power companies will be involved in substation construction activities side by side in same time period to achieve 12/31/2016 energizing date. Swindell substation that is located on 138kV Greenville-Olinger transmission line consists of approximately 23 miles of existing single circuit steel structure line rebuilt in year 2012 owned by TMPA, with intermediate terminations at the Pruitt and Swindell Substations that are owned by Sharyland Utilities

PROJECT BENEFITS & JUSTIFICATION (OUTCOME):

The power system of the city of Greenville depends upon two 138 kV feeds, one is 138 kV feeder from Royse city and other is 138 kV Greenville-Olinger line. Also this line serves as one of the main conduits to export power out of Olinger generation plant. This project will serve Sharyland's increasing distribution load and will increase reliability by adding 138 kV breakers for fault detection and isolation. The 138 kV breakers will also allow remote control by SCADA and improve sectionalizing for service restoration. The new ring bus arrangement will allow for isolation of faults on Sharyland's distribution facilities without removing the transmission line from service.

TEXAS MUNICIPAL POWER AGENCY
CAPITAL PROPOSAL

BACKGROUND:

The Swindell 138 kV substation is constructed as a four position ring bus. Two (2) TMPA transmission lines connect at nonadjacent positions on the ring. The other two non-adjacent positions are designated for serving Sharyland distribution load through Sharyland transformer(s). One transformer was installed and was in service as of the effective date of this Facility Schedule, but said unit failed in June 2015. The second position is reserved for a future Sharyland transformer.
The Point of Interconnection in the Swindell Substation is the connection between the 138 kV bus tap and the 138 kV switch associated with the 138 kV side of the Sharyland transformer.

ALTERNATIVES:

1. Let Sharyland do the construction & subsequently sharyland will have control of power flow between Olinger & GNIN

2.

3.

COST/BENEFIT WORKSHEET

ECONOMIC ASSESSMENT:

Costs: Current Year Only

			Benefits:$/Year
TMPA Labor Hours =			
TMPA Labor	$	225,000	Reliability -
Materials	$	2,217,000	Capability -
Contract Services	$	3,000,000	Labor Savings -
Engineering Consultant	$	500,000	Heat Rate Improvement -
Misc. Expenses	$	800,300	Non Labor O&M Savings -
Labor Loadings (60%)	$	477,000	Total Benefit $
TOTAL	$	7,219,300	Cost / Benefit =

Estimation Levels:
P1 = Budget/Preliminary
P2 = Conceptual
P3 = Detail Design

Estimated life of asset: 40

Staff will measure improvement of completed project: ☑ Yes ☐ No

Level of Estimate: P1 ☑ P2 ☐ P3 ☐

Over $100K in professional services: ☑ Yes ☐ No

Is land acquisition or right of ways procurement required: ☑ Yes ☐ No

TEXAS MUNICIPAL POWER AGENCY
CAPITAL PROPOSAL

ASSUMPTIONS:

Sharyland Utilities owns the property will allow TMPA to rebuilt the substation as agreed during the meetings held between Sharyland Engineers & GP&L Transmission & Compliance departments. The existing understanding is Sharyland will not charge TMPA now, nor in the future for any real estate costs.

Budgetary estimate for construction of Swindell substation:- Please refer to enclosed estimate in excel file.

Engineering: $500,000.00
Control House: $750,000.00
Breakers: $448,000.00
Steel structures: $500,000.00
Dead-end steel structures: $120,000.00
Construction Labor : $3,000,000.00
TMPA Supervision & Labor: $225,000.00
Miscellaneous Substation Material: $400,000.00
CT/PT Combo: $60,000.00
Protection Engineering (Line): $100,000.00
Concrete: $250,000.00
Fence $150,000.00
Line switches $60,000.00
Total $6,563,000.00
Contingency 10% $656,300.00
Grand Total $7,219,300.00

SIGNATURES			
Project Manager:	O Sekw?	Date:	4/11/2016
Supervisor:	R. J S Benson	Date:	4/11/16
Division Manager:	[signature]	Date:	4/11/16
General Manager:	[signature]	Date:	5/11/16
Business Assistant: ______	Budgeting: ________	Accounting: ________	

TEXAS MUNICIPAL POWER AGENCY
CAPITAL PROPOSAL

PROJECT TITLE:			PROJECT MANAGER:		DATE:
Dansby Replace Autotransformer			Paul Ricciardi		April 11, 2016
PROJECT NO.	RISK LEVEL:	RISK TYPE:	FERC ACCOUNT:		FUNDING: ☐ Rate ☑ Debt

SCHEDULE DATES		
START DATE: May 2016	ESTIMATED IN-SERVICE DATE: May 2017	
☑ Capital	☐ Annual Need ☒ One Time Need ☐ Cyclical Need	Capital Plan Year: 2017

Total Cost: $2,000,000	FY17: $ 2,000,000	FY18	FY19:	FY20:	FY21:

DESCRIPTION OF PROJECT:

The purpose of this project is to replace the existing 138/69/125 kV 168 MVA transformer at Dansby substation.

PROJECT BENEFITS & JUSTIFICATION (OUTCOME):

Replacement of the autotransformer will add to the reliability of the transmission system and Dansby substation.

TEXAS MUNICIPAL POWER AGENCY
CAPITAL PROPOSAL

BACKGROUND:

The autotransformer at Dansby substation has come to the end of its expected life according to the life assessment study that was performed in 2008. The sister transformer at Bryan East of same age and type failed in 2014.

ALTERNATIVES:

1. Do nothing and accept risk
2. Wait for DME to retire its 69 kV system and purchase the new autoransformer from RD Wells.
3.

COST/BENEFIT WORKSHEET

ECONOMIC ASSESSMENT:

Costs: Current Year Only

			Benefits:$/Year
TMPA Labor Hours =			
TMPA Labor	$		**Reliability -**
Materials	$	1,550,000	**Capability -**
Contract Services	$	250,000	**Labor Savings -**
Engineering Consultant	$	100,000	**Heat Rate Improvement -**
Misc. Expenses	$	100,000	**Non Labor O&M Savings -**
Labor Loadings (50%)	$		**Total Benefit $**
TOTAL	$	2,000,000	**Cost / Benefit =**

Estimation Levels:
P1 = Budget/Preliminary
P2 = Conceptual
P3 = Detail Design

Estimated life of asset: 40

Staff will measure improvement of completed project: ☐ Yes ☑ No

Level of Estimate: P1 ☐ P2 ☑ P3 ☐

Over $100K in professional services: ☐ Yes ☑ No

Is land acquisition or right of ways procurement required: ☐ Yes ☑ No

TEXAS MUNICIPAL POWER AGENCY
CAPITAL PROPOSAL

ASSUMPTIONS:

There will be no income from sale or disposal of the old transformer or oil contained within.
Existing oil containment will be sufficient.
Existing relay protection will be sufficient.
BTU will not require any changes to the SCADA system

Budget

Removal of old transformer -	$250,000
Supporting material -	$25,000
GP&L Labor -	$50,000
Engineering -	$50,000
Autotransformer -	$1,525,000
Contingency -	$100,000
TOTAL-	$2,000,000

SIGNATURES	
Project Manager: Paul Ricciardi	Date: 4/11/16
Supervisor:	Date: 4/11/16
Division Manager:	Date: 4/11/16
General Manager:	Date: 5/11/16
P. Prod. Business Analyst: ____ Budgeting: ________	

POLICY: Transmission Asset Ownership

Policy Responsibility:	General Manager	**Policy Number:**	F 1800
Administered By:	CFO		

F 1800 – Transmission Asset Ownership

1.0 PURPOSE

The purpose of this policy is to establish guidelines for determining when a transmission project related to the TMPA transmission system (System) may be owned by a Member City rather than by TMPA.

2.0 SCOPE

This policy applies to Transmission Projects which rebuild or refurbish existing TMPA transmission assets, which will build in an existing TMPA right-of-way, or connect to an existing TMPA transmission asset. The scope is not intended to extend to new facilities being built by Member Cities outside a TMPA right-of-way.

3.0 POLICY

3.1 All ownership allocations of Transmission Projects must comply with TMPA Bond Covenants. Bond Covenants, relevant to this policy, may be summarized as follows:

3.1.1 TMPA may not sell or otherwise dispose of assets financed in whole or in part by TMPA bonds and other obligations. However, as facilities or equipment become obsolete or in need of an upgrade, the old assets may be removed from service and retired, and TMPA does not have to be the entity replacing the assets (Replacement Projects).

3.1.2 Non-TMPA ownership of a Transmission Project must not impair or impede the proper operation of the System. TMPA relies on the Transmission Engineering Working Group (TEWG), which has technical representation from each Member City, to identify if there are operational, maintenance, or compliance issues with Non-TMPA ownership of a Transmission Project.

3.1.3 The Non-TMPA ownership of a Transmission Project must not impair or impede the rights of the bond holders with respect to the Net Revenues as defined by the Bond Resolutions.

New transmission assets (Additions), such as new transmission lines, new substations, new line bays in a substation, new control houses, new autotransformers, which are not financed by TMPA debt in whole or in part are not subject to TMPA Bond Covenants. Additions within the scope of this policy are subject to TMPA Board approval.

The Power Sales Contract, in Section 4(a)(5), and in Section 3 of Schedule "B", allows TMPA to perform special services, upon request, for an individual Member City, and authorizes TMPA to receive from the Member City reimbursement of TMPA's costs in providing the special services. Such services may include Transmission Projects which may be interim financed with TMPA debt, so long as the Member City fully reimburses TMPA for the project prior to TMPA capitalizing the project, and those proceeds are sufficient to and used to pay off the interim financing. In such case, the Transmission Project will not be considered a TMPA debt financed Addition and may be a Member City transmission asset.

3.2 To the extent practical, TMPA should attempt to avoid mixing equipment ownership in the same right-of-way to avoid confusion as to which entity is responsible for operations, maintenance, and compliance. To that end, the following guidelines apply.

POLICY: Transmission Asset Ownership

Policy Responsibility:	General Manager	**Policy Number:**	F 1800
Administered By:	CFO		

3.2.1 A TMPA line that is to be reconductored only will remain a TMPA asset.

3.2.2 A TMPA line that is essentially rebuilt (i.e. wires and poles replaced) may be considered a Replacement Project and be eligible for Member City ownership.

3.2.3 Land and easements will not be considered in evaluating mixed assets. It is acceptable for Member City equipment to be on TMPA land or easements, subject to review of the TMPA easement wording. TMPA's consent to the use of its land and easements should, in each case, be reflected in an interconnection agreement, license agreement, lease, or other form of agreement.

3.2.4 Mixed asset ownership in substations is common. Ownership of substations will depend on the extent of new equipment being installed. If there is a substantial replacement or addition of equipment, the station may be considered rebuilt, and the associated Member City may own the Replacement Project.

3.3 Asset ownership, operation, maintenance, and compliance responsibilities will be documented in interconnection agreements between TMPA and the entities owning the Transmission Projects. Assets rebuilt under criteria 3.2.2 and 3.2.4 will be presumed eligible for Member Cities to acquire operations, maintenance and compliance responsibilities of the transmission assets.

4.0 PROCEDURE

4.1 All Transmission Projects within the scope of this policy should be brought forward through the TEWG. The TEWG will consider a project's eligibility for Non-TMPA ownership focusing on policy sections 3.1.1, 3.1.2 and 3.2. Projects deemed ineligible will be considered for addition to the TMPA Transmission Capital Plan and taken through the TMPA capital project proposal process with a presumption of TMPA ownership.

4.2 Projects recommended as eligible for non-TMPA ownership by the vote of the TEWG will be passed to the Financial Working Group (FWG), which will model the impacts of non-TMPA ownership on the Transmission Capital Plan, to determine if non-TMPA ownership of a project or group of projects complies with policy section 3.1.3. If compliant, the FWG will assess Member City interest in owning the project. If no Member Cities are interested, the project will default to TMPA ownership. If multiple Member Cities are interested, the FWG will attempt to come to an agreement. If no agreement is reached, the positions will be documented and passed to the Planning and Operating Committee ("P&O") for consideration. The FWG will make a recommendation to the P&O regarding project ownership. The P&O will either endorse, modify or reject the recommendation. If agreement regarding project ownership cannot be reached at the FWG and P&O level, the question of project ownership will be decided by the Board of Directors.

4.3 Bond Counsel has recommended that certain TMPA Board findings be made in connection with non-TMPA ownership of a Replacement Project. Therefore, all non-TMPA owned Replacement Projects within the scope of this policy should be approved by the TMPA Board.

5.0 AUTHORIZATION

The CFO is responsible for maintaining this policy.

POLICY: Transmission Asset Ownership

Policy Responsibility: General Manager **Policy Number:** F 1800

Administered By: CFO

The General Manager must approve changes to this Policy.

Bob Kahn
General Manager

9/28/2015
Effective Date