

Possum Point 2nd 500-230kV Transformers

General Information

Proposing entity name	The redacted information is proprietary to the Company; therefore, it is privileged and confidential.
Does the entity who is submitting this proposal intend to be the Designated Entity for this proposed project?	The redacted information is proprietary to the Company; therefore, it is privileged and confidential.
Company proposal ID	The redacted information is proprietary to the Company; therefore, it is privileged and confidential.
PJM Proposal ID	57
Project title	Possum Point 2nd 500-230kV Transformers
Project description	Install a 2nd 500kV-230kV 840MVA transformer bank at Possum Point 500kV Yard, a 0.8 mile long 230kV line extension between Possum Point 500kV and Possum Point 230kV substation, and a new 230kV breaker at Possum 230kV Yard to terminate the extension. Note: Possum Point 500kV Substation and Possum Point 230kV Substation are separated by approximately 0.85 miles.
Email	The redacted information is proprietary to the Company; therefore, it is privileged and confidential.
Project in-service date	06/2026
Tie-line impact	No
Interregional project	No
Is the proposer offering a binding cap on capital costs?	No
Additional benefits	The redacted information is proprietary to the Company; therefore, it is privileged and confidential.

Project Components

1. Possum Point 500kV Substation - Add 2nd 500/230kV Transformer and associ...
2. Possum Point 230kV Substation breaker addition and rearrangement
3. Possum Point 500kV to Possum Point 230kV - 2nd 230kV Line

Substation Upgrade Component

Component title	Possum Point 500kV Substation - Add 2nd 500/230kV Transformer and associated equipment
Project description	The redacted information is proprietary to the Company; therefore, it is privileged and confidential.
Substation name	Possum Point 500kV
Substation zone	366
Substation upgrade scope	Proposal 99-2945-3 provides for the installation of a second 500-230 kV Transformer Bank at Possum Point 500 Substation. The banks will consist of four (4) 280 MVA units (including spare) and a sparing bus will be built. A 500 kV Circuit Breaker will be added to the ring bus along with some double-end-break switches. A 230kV Circuit Breaker will be installed on the low side of the new transformer along with center- break switches to create a 230 kV line terminal. This terminal will support a new line from the 500 kV yard to the Possum point 230 kV yard.

Transformer Information

	Name	Capacity (MVA)		
Transformer	Possum Point TX#2	840		
	High Side	Low Side	Tertiary	
Voltage (kV)	500	230		
New equipment description	The major components being installed at Possum Point 230kV Substation include: 1. Four (4), 500-230kV, 168/224/280 MVA 1-PhaseTransformers (includes spare) 2. One (1), 500 kV, 5000A, SF6 Circuit Breaker 3. Two (2), 500 kV, 5000A Double Break Disconnect Switches 4. One (1), 500 kV, 5000A Double Break Disconnect Switch 6. One (1), 230 kV, 3000A, SF6 Circuit Breaker 7. Two (2), 230 kV, 3000A Center Break Switches The entire Scope of Work (SOW) is attached in the Substation Supporting Documents section with the Possum Point 500kV operating and 992945-3 proposal substation drawings.			
Substation assumptions	Possum Point 500kV Substation was planned for the addition of a second 500-230kV transformer and associated equipment. Tubular bus and structures will be removed, as required, to accommodate the new transformer.			
Real-estate description	Possum Point 500kV Substation will not be expanded for Proposal 99-2945-3.			
Construction responsibility	The redacted information is proprietary to the Company; therefore, it is privileged and confidential.			

Benefits/Comments	The redacted information is proprietary to the Company; therefore, it is privileged and confidential.
Component Cost Details - In Current Year \$	
Engineering & design	The redacted information is proprietary to the Company; therefore, it is privileged and confidential.
Permitting / routing / siting	The redacted information is proprietary to the Company; therefore, it is privileged and confidential.
ROW / land acquisition	The redacted information is proprietary to the Company; therefore, it is privileged and confidential.
Materials & equipment	The redacted information is proprietary to the Company; therefore, it is privileged and confidential.
Construction & commissioning	The redacted information is proprietary to the Company; therefore, it is privileged and confidential.
Construction management	The redacted information is proprietary to the Company; therefore, it is privileged and confidential.
Overheads & miscellaneous costs	The redacted information is proprietary to the Company; therefore, it is privileged and confidential.
Contingency	The redacted information is proprietary to the Company; therefore, it is privileged and confidential.
Total component cost	\$15,706,578.00
Component cost (in-service year)	\$16,821,745.00

Substation Upgrade Component

Component title	Possum Point 230kV Substation breaker addition and rearrangement
Project description	The redacted information is proprietary to the Company; therefore, it is privileged and confidential.
Substation name	Possum Point 230kV
Substation zone	353
Substation upgrade scope	Proposal 992945-3 provides for the addition of a 230 kV Circuit Breaker to create a line position for a second 230 kV line from Possum Point 500 kV Substation yard. Possum Point 230 kV substation expansion will be required to accommodate the breaker and line terminal equipment. The existing 230 kV Line 2078 will be moved to the new backbone and new Line 2216 coming from the 500 kV yard will be terminated on the current Line 2078 position to avoid transmission line crossings outside the substation.

Transformer Information

None	
New equipment description	The major components being installed at Possum Point 230kV Substation include: 1. One (1), 230 kV, 63 kA, 3000 Amps, Circuit Breaker 2. Two (2), 230 kV, 3000A, Center Break Disconnect Switches The entire Scope of Work (SOW) is attached in the Substation Supporting Documents section with the Possum Point 230kV operating and 992945-3 proposal substation drawings.
Substation assumptions	Substation expansion will be contained within Dominion-owned property.
Real-estate description	The substation footprint will be expanded to accommodate the new equipment. See attached 992945-3 Real Estate and Permitting Summary.
Construction responsibility	The redacted information is proprietary to the Company; therefore, it is privileged and confidential.
Benefits/Comments	The redacted information is proprietary to the Company; therefore, it is privileged and confidential.
Component Cost Details - In Current Year \$	
Engineering & design	The redacted information is proprietary to the Company; therefore, it is privileged and confidential.
Permitting / routing / siting	The redacted information is proprietary to the Company; therefore, it is privileged and confidential.
ROW / land acquisition	The redacted information is proprietary to the Company; therefore, it is privileged and confidential.
Materials & equipment	The redacted information is proprietary to the Company; therefore, it is privileged and confidential.
Construction & commissioning	The redacted information is proprietary to the Company; therefore, it is privileged and confidential.
Construction management	The redacted information is proprietary to the Company; therefore, it is privileged and confidential.
Overheads & miscellaneous costs	The redacted information is proprietary to the Company; therefore, it is privileged and confidential.
Contingency	The redacted information is proprietary to the Company; therefore, it is privileged and confidential.
Total component cost	\$1,842,476.00
Component cost (in-service year)	\$1,973,292.00
Transmission Line Upgrade Component	
Component title	Possum Point 500kV to Possum Point 230kV - 2nd 230kV Line
Project description	The redacted information is proprietary to the Company; therefore, it is privileged and confidential.

Impacted transmission line	2078 and new 2216
Point A	Possum Point 500kV
Point B	Possum Point 230kV
Point C	
Terrain description	The area between the two substations is lines with parking lots and runs between Possum Point Power station and railroad tracks.

Existing Line Physical Characteristics

Operating voltage	230
Conductor size and type	2-636 ACSR (24/7) 150 Deg C MOT
Hardware plan description	Hardware will not be re-used on this project.
Tower line characteristics	The existing Line 2078 is constructed on single circuit structures.

Proposed Line Characteristics

	Designed	Operating
Voltage (kV)	230.000000	230.000000
	Normal ratings	Emergency ratings
Summer (MVA)	1047.000000	1047.000000
Winter (MVA)	1160.000000	1160.000000
Conductor size and type	2-636 ACSR (24/7) 150 Deg C MOT (Line 2078 and Line 2216)	
Shield wire size and type	7#7 alumoweld shield wire	
Rebuild line length	0.81 miles (rebuild) and 0.15 miles (new)	
Rebuild portion description	Due to character limitations this section is described in the attached 992945-3 Transmission Scope document.	

Right of way The existing ROW will need to be widened at the 230kV crossing to allow the double circuit line to dip under existing 230kV along with a new 120' corridor around the eastern edge of Possum Point 500kV substation will be required. All new transmission line structures will be built on existing Dominion owned property. No new ROW will be required from a third party.

Construction responsibility The redacted information is proprietary to the Company; therefore, it is privileged and confidential.

Benefits/Comments The redacted information is proprietary to the Company; therefore, it is privileged and confidential.

Component Cost Details - In Current Year \$

Engineering & design The redacted information is proprietary to the Company; therefore, it is privileged and confidential.

Permitting / routing / siting The redacted information is proprietary to the Company; therefore, it is privileged and confidential.

ROW / land acquisition The redacted information is proprietary to the Company; therefore, it is privileged and confidential.

Materials & equipment The redacted information is proprietary to the Company; therefore, it is privileged and confidential.

Construction & commissioning The redacted information is proprietary to the Company; therefore, it is privileged and confidential.

Construction management The redacted information is proprietary to the Company; therefore, it is privileged and confidential.

Overheads & miscellaneous costs The redacted information is proprietary to the Company; therefore, it is privileged and confidential.

Contingency The redacted information is proprietary to the Company; therefore, it is privileged and confidential.

Total component cost \$6,989,527.00

Component cost (in-service year) \$7,485,782.00

Congestion Drivers

None

Existing Flowgates

FG #	From Bus No.	From Bus Name	To Bus No.	To Bus Name	CKT	Voltage	TO Zone	Analysis type	Status
DOM-T3	314919	8OX	314068	6OX	1	500/230	345	FERC 715 Thermal	Included
DOM-T4	314919	8OX	314068	6OX	2	500/230	345	FERC 715 Thermal	Included

New Flowgates

The redacted information is proprietary to the Company; therefore, it is privileged and confidential.

Financial Information

Capital spend start date	01/2023
Construction start date	09/2025
Project Duration (In Months)	41

Additional Comments

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