

BGE 2020
Submission of Supplemental Projects for
Inclusion in the Local Plan

Need Number: BE-2020-0001

Process Stage: Submission of Supplemental Project for inclusion in the Local Plan 05/19/2020

Previously Presented:

Need 02/04/2020

Solution 03/10/2020

Supplemental Project Driver: Equipment Material Condition, Performance and Risk

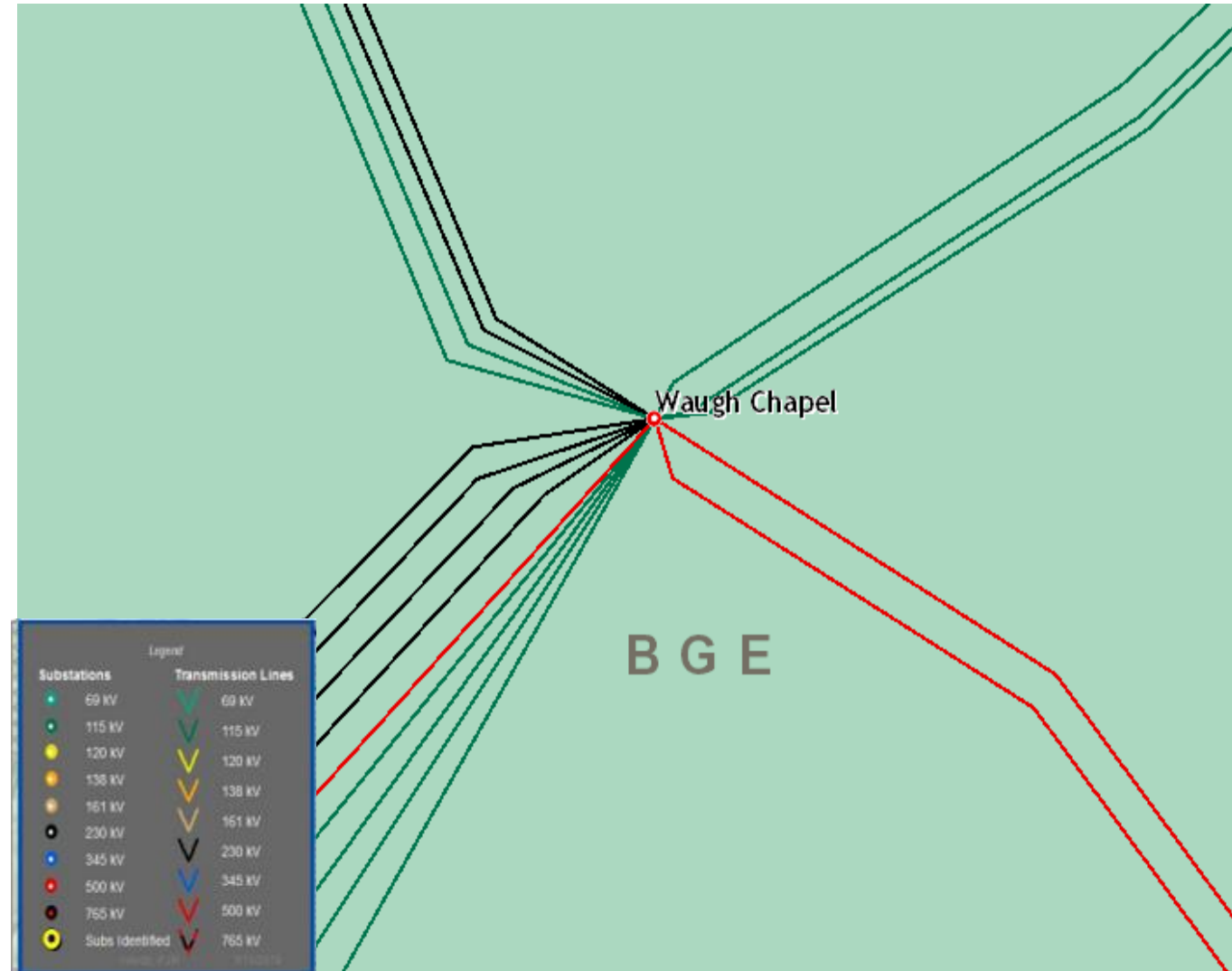
Problem Statement:

Four 230 kV oil filled circuit breakers at Waugh Chapel are at risk of poor performance, have environmental risks/concerns along with parts availability issues

Specific Assumption References:

2020 Local Planning Assumptions (BGE) – 12/16/2019 Mid Atlantic SRRTPEP

- Programmatic replacement of breakers, relays, wood poles, cables, etc.



Need Number: BE-2020-0001

Process Stage: Submission of Supplemental Project for inclusion in the Local Plan 05/19/2020

Selected Solution:

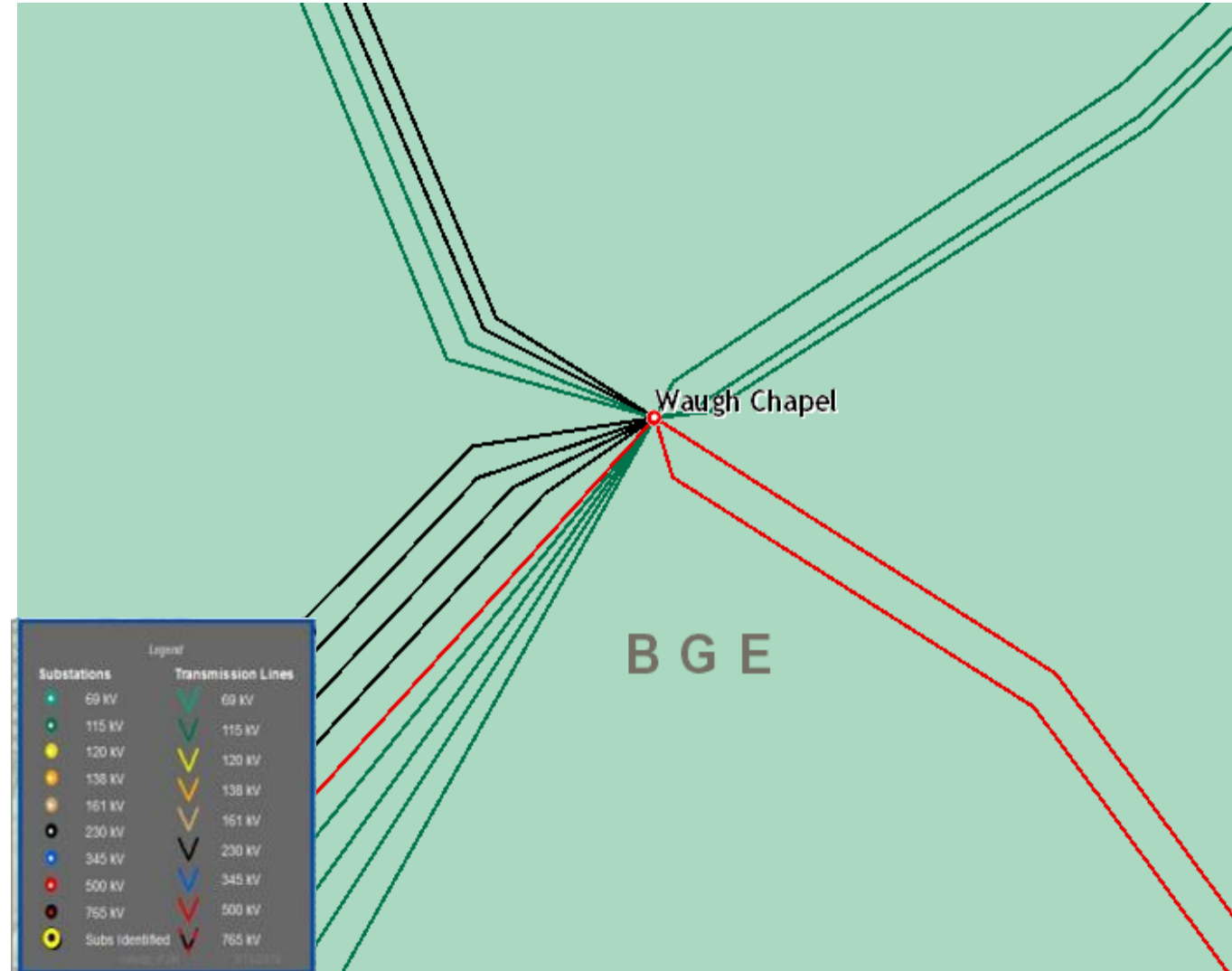
- Replace four 230 kV oil filled circuit breakers at Waugh Chapel substation with four new gas circuit breakers

Estimated Cost: \$2.3M

Projected In-Service: 12/31/2020

Supplemental Project ID: S2206

Project Status: Engineering & Procurement



Need Number: BE-2020-0002

Process Stage: Submission of Supplemental Project for inclusion in the Local Plan 05/19/2020

Previously Presented:

Need 02/04/2020

Solution 03/10/2020

Supplemental Project Driver: Equipment Material Condition, Performance and Risk

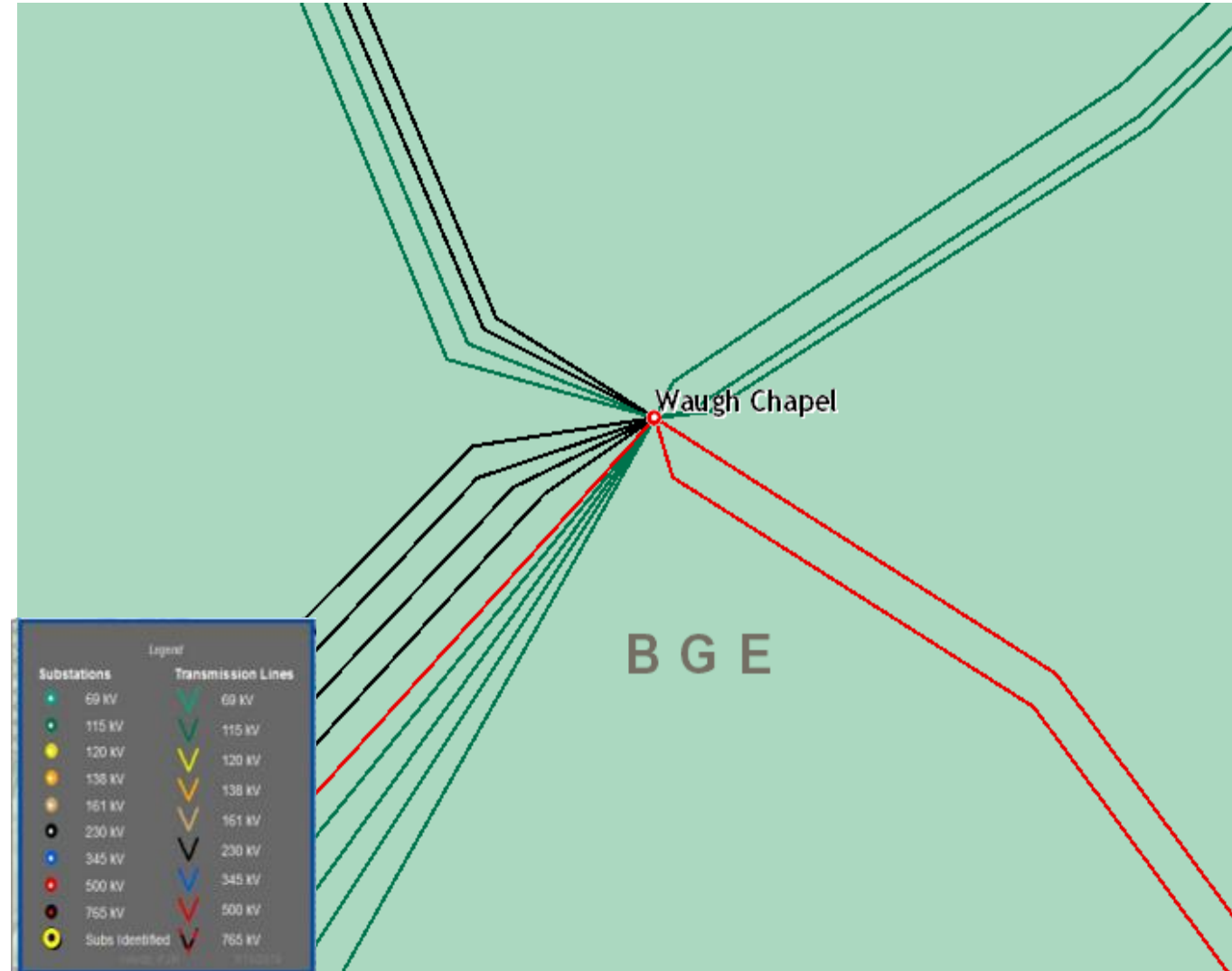
Problem Statement:

Two 230 kV circuit breakers at Raphael Road are at risk of poor performance, have had defective parts along with parts availability issues

Specific Assumption References:

2020 Local Planning Assumptions (BGE) – 12/16/2019 Mid Atlantic SR RTEP

- Programmatic replacement of breakers, relays, wood poles, cables, etc.



Need Number: BE-2020-0002

Process Stage: Submission of Supplemental Project for inclusion in the Local Plan 05/19/2020

Selected Solution:

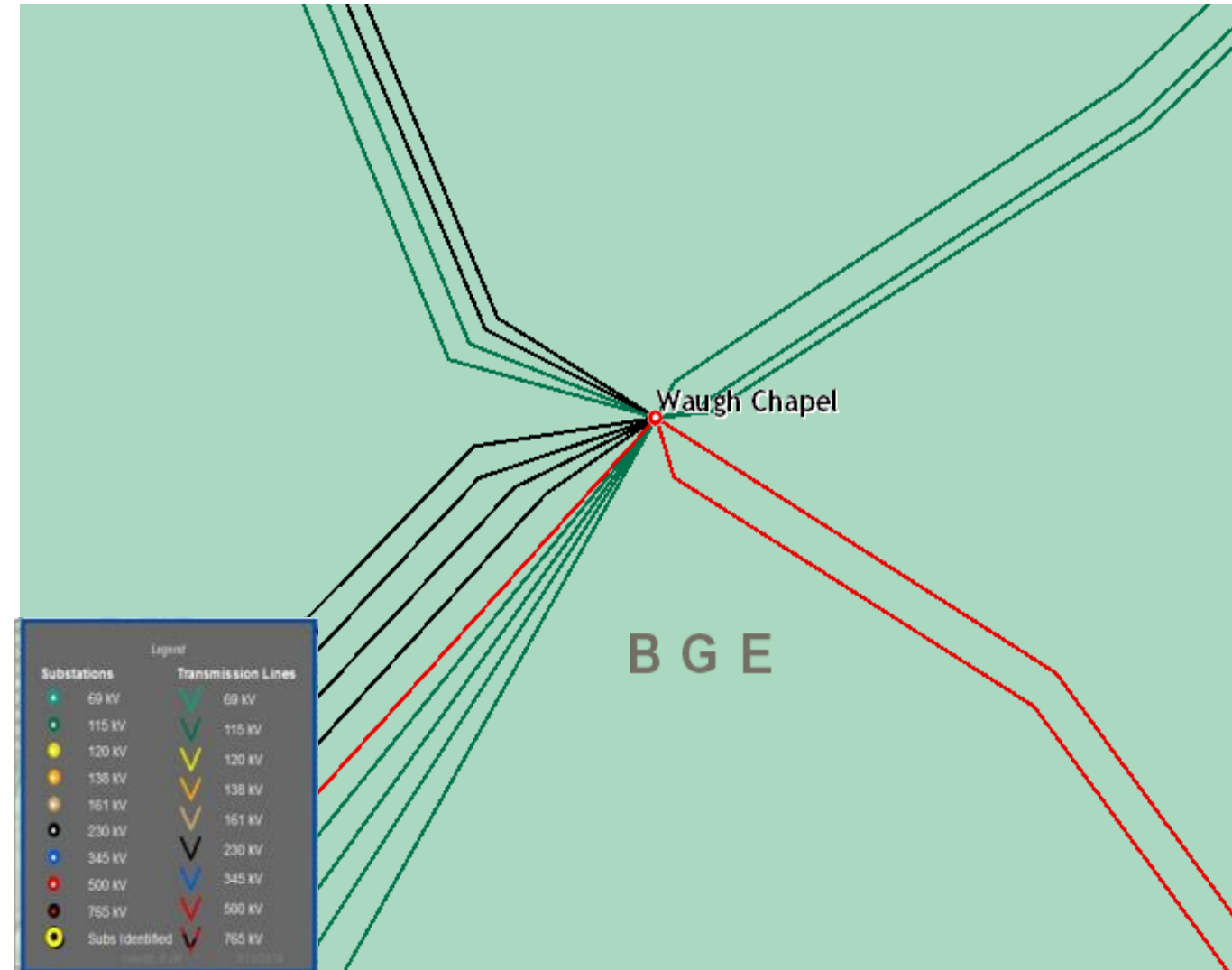
- Replace two 230 kV circuit breakers at Raphael Road substation with two new gas circuit breakers

Estimated Cost: \$0.91M

Projected In-Service: 12/31/2020

Supplemental Project ID: S2207

Project Status: Engineering & Procurement



Need Number: BE-2020-0003

Process Stage: Submission of Supplemental Project for inclusion in the Local Plan 05/19/2020

Previously Presented:

Need 02/11/2020

Solution 03/19/2020

Supplemental Project Driver: Equipment Material Condition, Performance and Risk

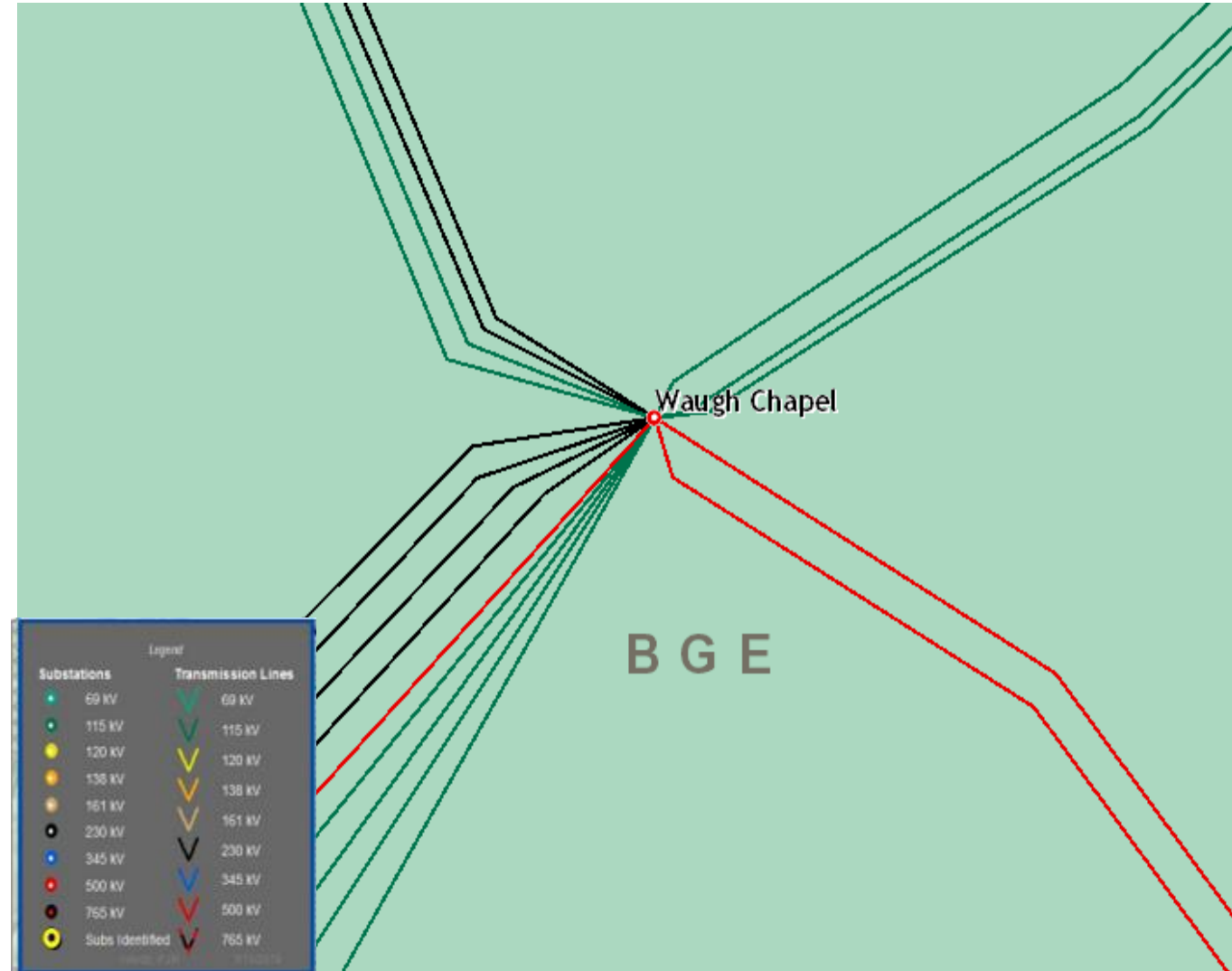
Problem Statement:

Two 115 kV oil filled circuit breakers at Granite are at risk of poor performance, have environmental risks/concerns along with parts availability issues

Specific Assumption References:

2020 Local Planning Assumptions (BGE) – 12/16/2019 Mid Atlantic SRRTPEP

- Programmatic replacement of breakers, relays, wood poles, cables, etc.





BGE Transmission Zone M-3 Process Granite Breaker Replacement

Need Number: BE-2020-0003

Process Stage: Submission of Supplemental Project for inclusion in the Local Plan 05/19/2020

Selected Solution:

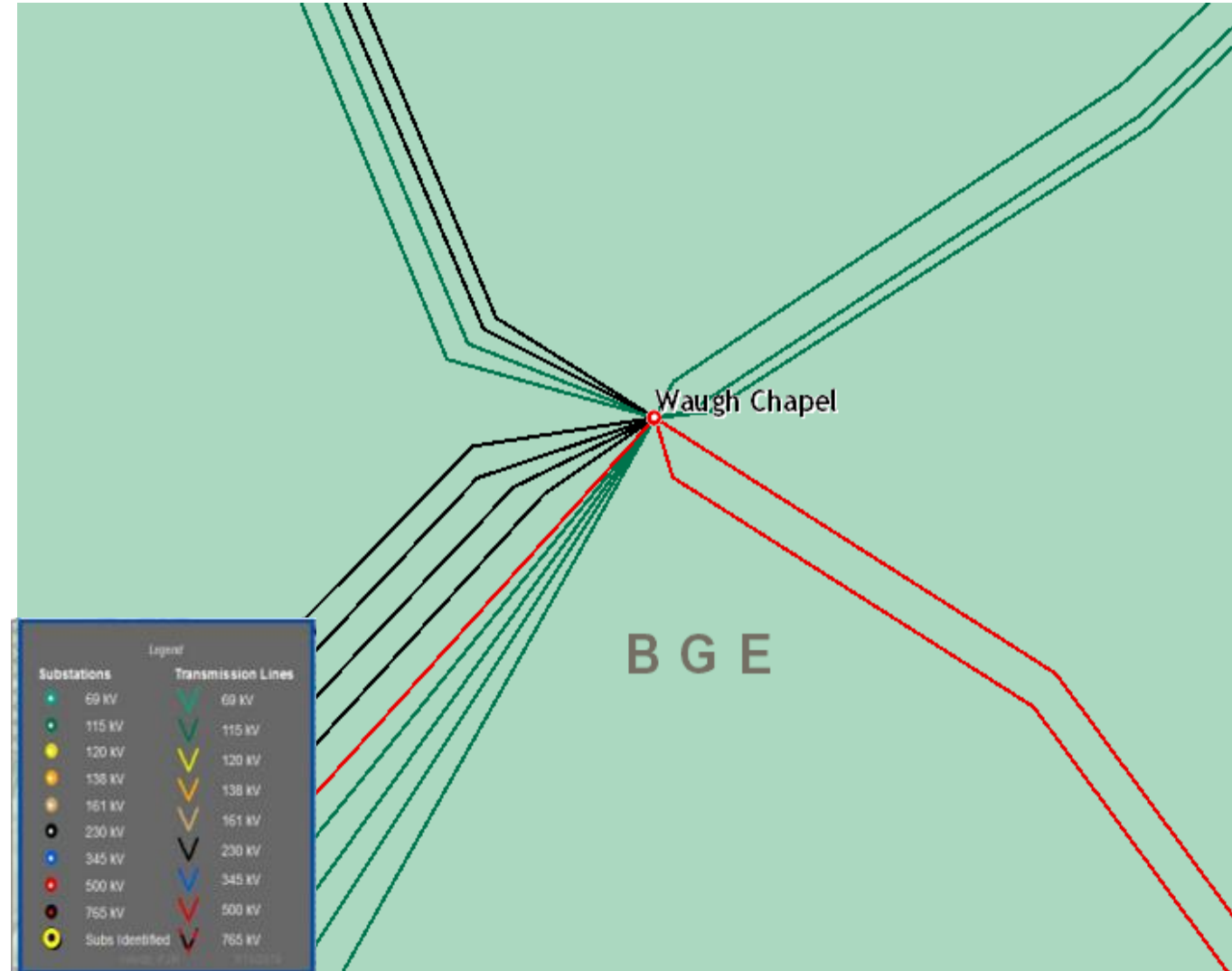
- Replace two 115 kV oil filled circuit breakers at Granite substation with two new gas circuit breakers

Estimated Cost: \$0.92M

Projected In-Service: 12/31/2020

Supplemental Project ID: S2208

Project Status: Engineering & Procurement



Need Number: BE-2020-0004

Process Stage: Submission of Supplemental Project for inclusion in the Local Plan 05/19/2020

Previously Presented:

Need 02/11/2020

Solution 03/19/2020

Supplemental Project Driver: Equipment Material Condition, Performance and Risk

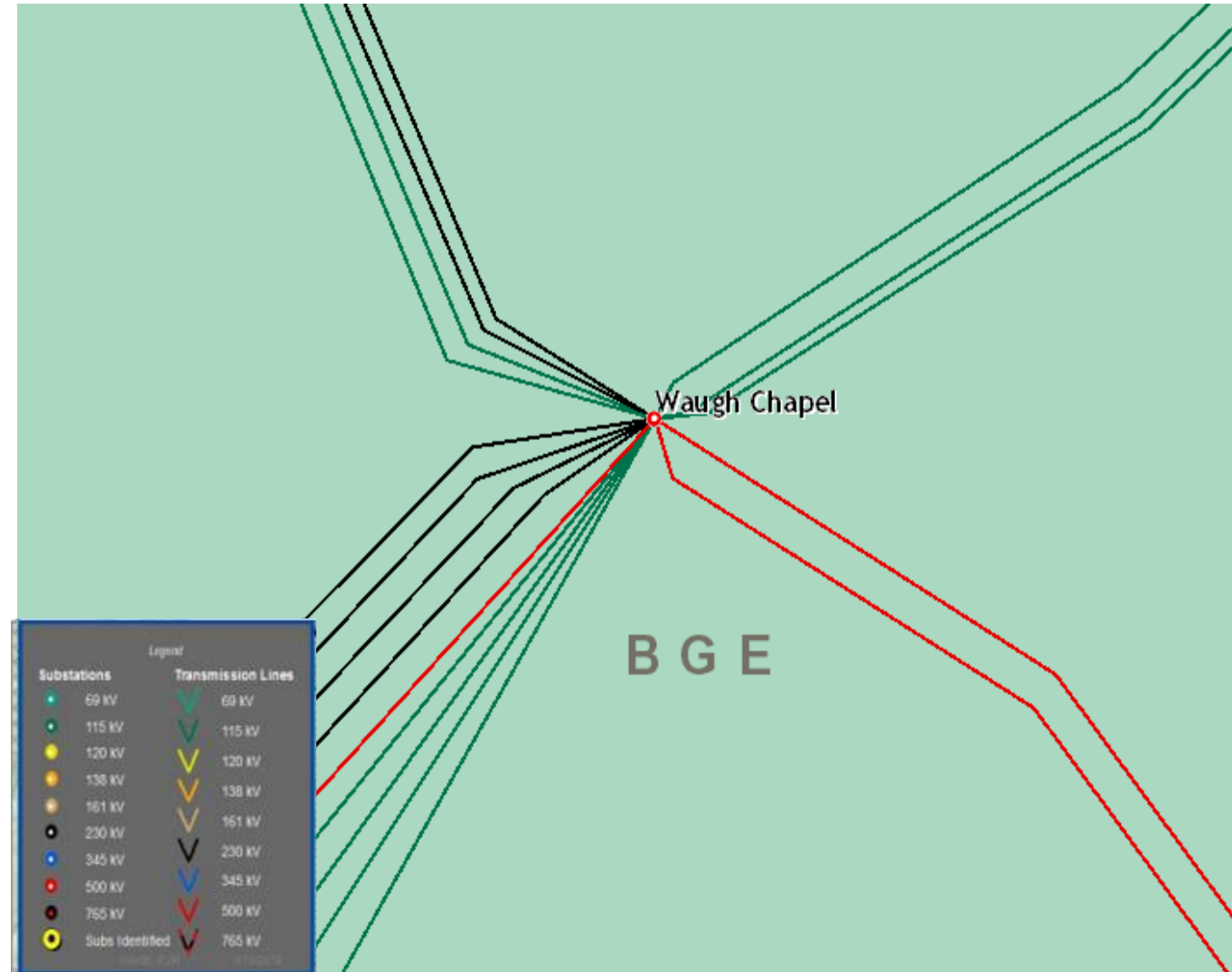
Problem Statement:

The Harford-Perryman 115kV circuits 110617, 110618 are wood H-Frame circuits with poles dating back to the 1950's with nearly every pole having significant material condition issues including degraded pole shafts, arms, tops, bird holes including those from Pileated Wood Peckers), degraded insulators and hardware etc.

Specific Assumption References:

2020 Local Planning Assumptions (BGE) – 12/16/2019 Mid Atlantic SRRTEP

- Transmission infrastructure replacements (EOL/condition/obsolescence) that are consistent with efficient asset management decisions



Need Number: BE-2020-0004

Process Stage: Submission of Supplemental Project for inclusion in the Local Plan 05/19/2020

Selected Solution:

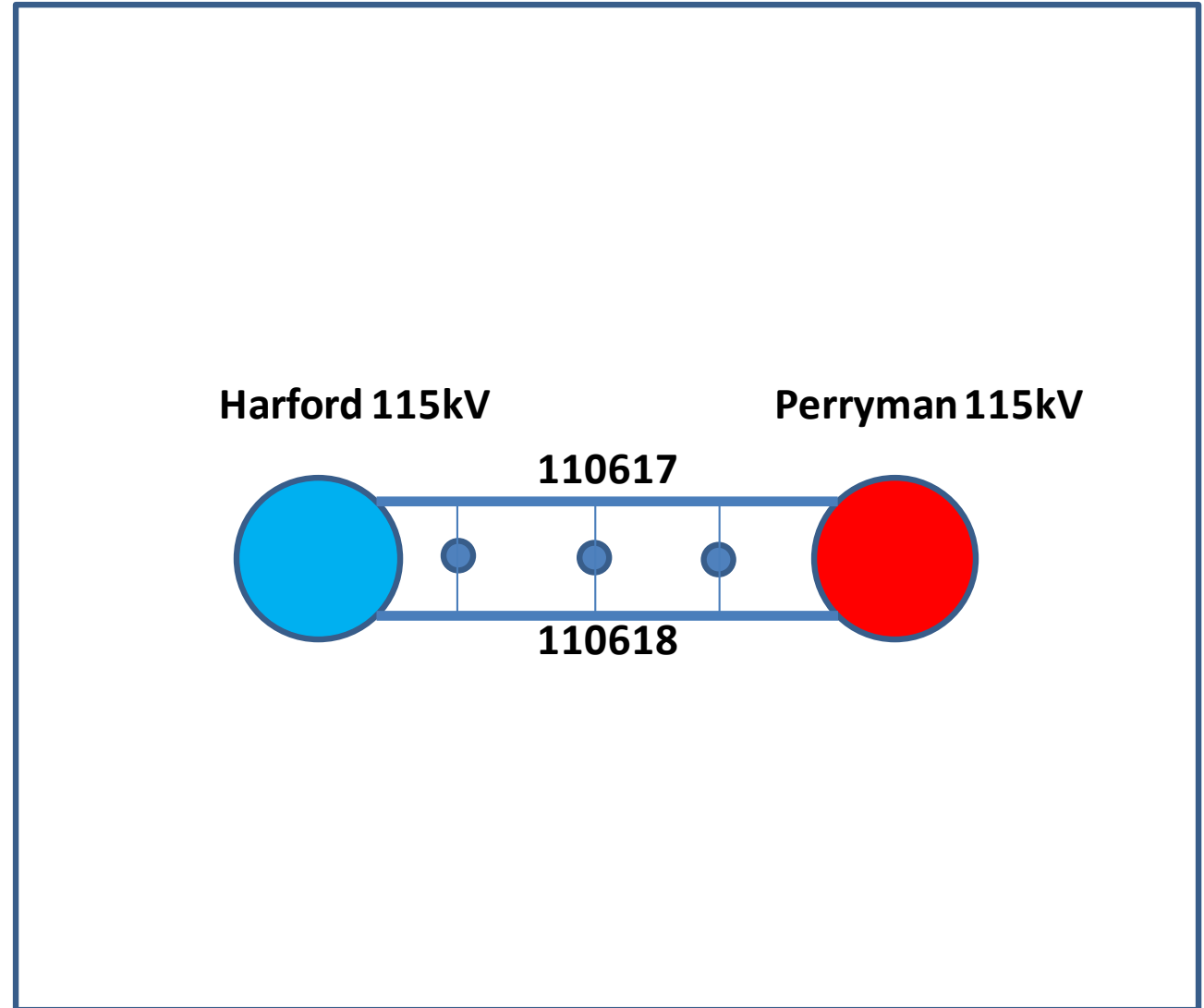
- Rebuild two single circuit 115kV wood h-frame circuits (110617/110618) as one double circuit steel pole line

Estimated Cost: \$21.4M

Projected In-Service: 12/31/2021

Supplemental Project ID: S2209

Project Status: Engineering & Procurement



Need Number: BE-2020-0005

Process Stage: Submission of Supplemental Project for inclusion in the Local Plan 09/22/2020

Previously Presented:

Need 04/14/2020

Solution 06/02/2020

Project Driver: Operational Flexibility and Efficiency

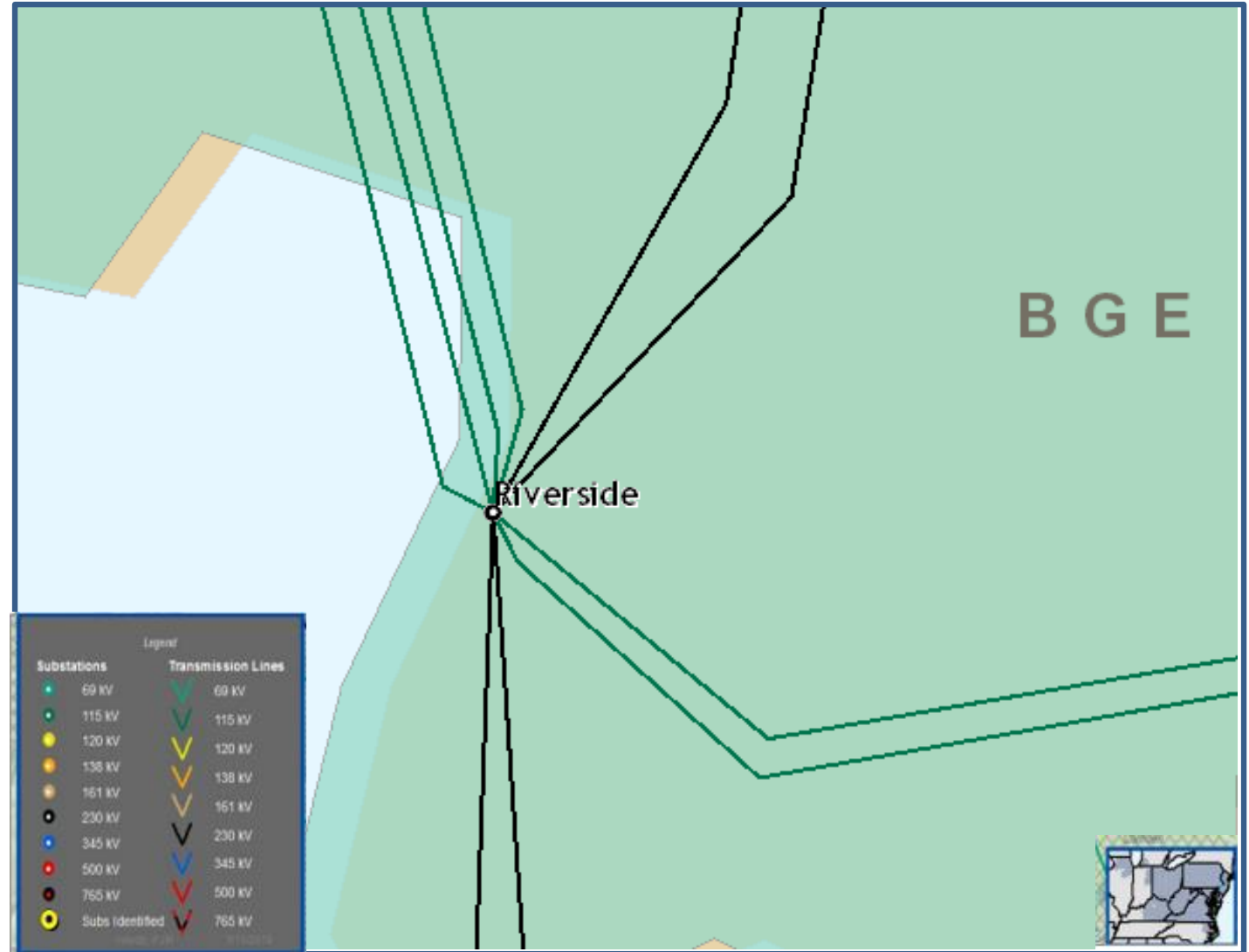
Specific Assumption Reference:

2020 Local Planning Assumptions (BGE) – 12/16/2019 Mid Atlantic SRRTEP

Enhancing system functionality, flexibility, or operability

Problem Statement:

At BGE's Riverside substation, significant switching steps and equipment outages are required to support planned outages of the 230kV 2344 circuit, 230-1 transformer or associated underlying 115kV equipment. In addition, for unplanned outages of the same equipment, there are multiple elements at both 230 and 115kV voltage levels that are automatically taken out of service in order to isolate the fault conditions.



Need Number: BG-2020-0005

Process Stage: Submission of Supplemental Project for inclusion in the Local Plan 09/22/2020

Proposed Solution:

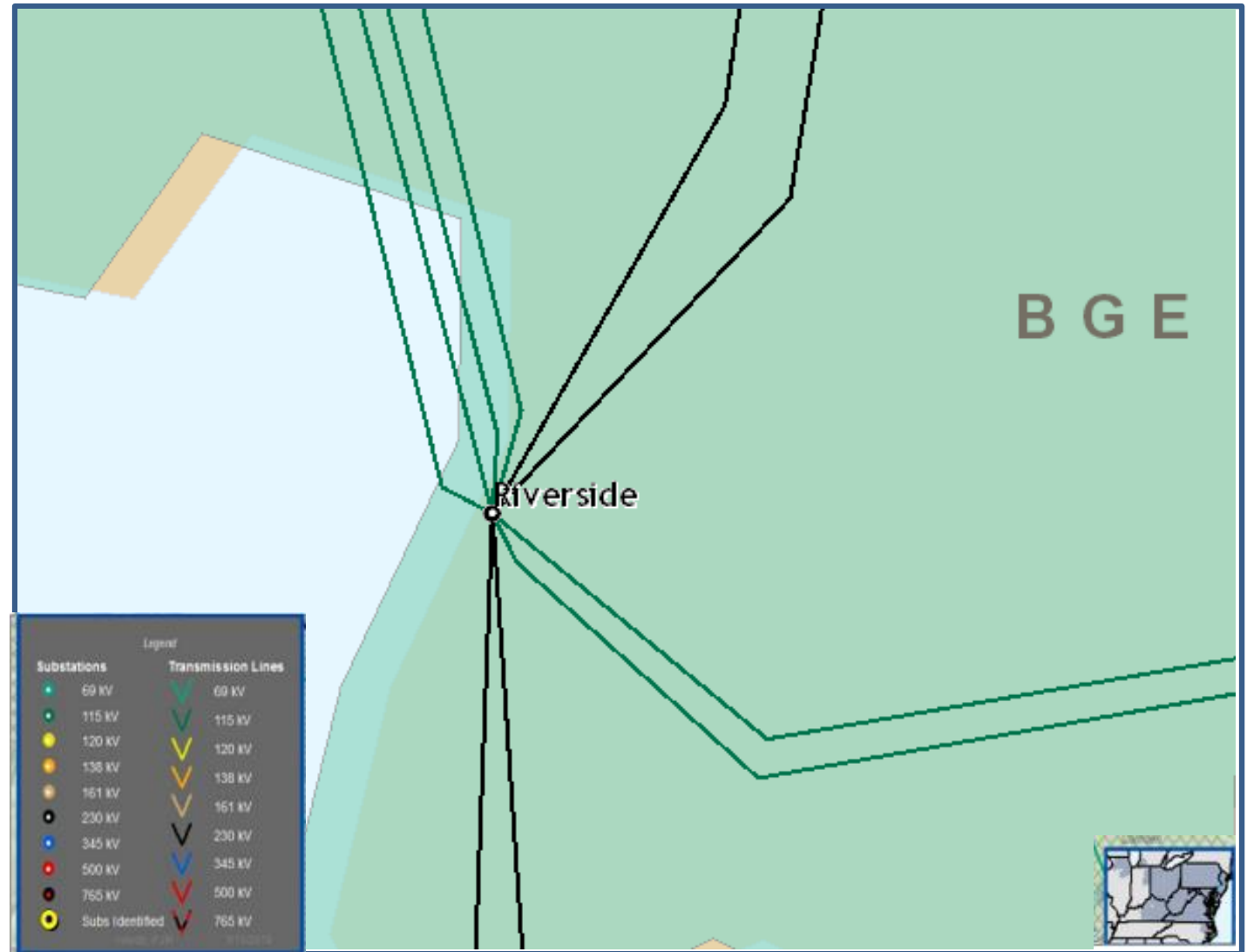
Install new 230kV 63kA breaker and associated equipment on the 2344 circuit at Riverside substation

Estimated Cost: \$0.93M

Supplemental Project ID: S2277

Projected In-Service: 11/31/2020

Project Status: Engineering & Procurement



Revision History

5/19/2020 – V1 – Posted Local plan for S2206 to S2209

9/22/2020 – V2 – Added Local plan for S2277