EVERSOURCE
Project Authorization Form

Operations Project Authorization Form

Date Prepared: 9/16/2021	**Project Title: [redacted] Lateral Reliability**
Company/ies: Eversource CT	**Project ID Number: CD01796**
Organization: Distribution Electric	**Class(es) of Plant: Distribution**
Project Initiator: [redacted]	**Project Category: Line**
Project Manager: [redacted]	**Project Type: Reliability Improvement Specific Project**
Project Sponsor: [redacted]	**Project Purpose: Reliability Improvement Project**
Estimated in service date: 2022	**If Transmission Project: PTF? N/A**
Eng. /Constr. Resources Budgeted?	**Capital Investment Part of Original Operating Plan?**
Authorization Type: Full Funding	**O&M Expenses Part of the Original Operating Plan?**
Total Request: $620,316	

Financial Requirements:

Project Authorization

ERM: _____

FP&A: _____

Executive Summary

Project CD01796 addresses reliability issues along [redacted]. The identified [redacted]

The proposed work suggests enhanced tree trimming and reconductoring of existing bare wire overhead segments with 1/0 ACSR tree wire for each location. The installation and replacement of cutouts, fuses, poles, and transformers along each segment is included where required. The suggested work for each zone will help reduce the frequency of tree related interruptions for customers in the future. The total cost of all proposed work is $620,315.84

Project Costs Summary

	Prior Authorized	2022	2023	2024+	Totals
Capital Additions - Direct	$0	$353,677	$0	$0	$353,677
Removals net of Salvage ____%	$0	$32,633	$0	$0	$32,633
Total - Direct Spending	$0	$386,310	$0	$0	$386,310
Capital Additions - Indirect	$0	$210,319	$0	$0	$210,319
Subtotal Request	$0	$596,629	$0	$0	$596,629
AFUDC	$0	$4,757	$0	$0	$4,757
Total Capital Request	$0	$601,386	$0	$0	$601,386
O&M	$0	$18,930	$0	$0	$18,930
Total Request	$0	$620,316	$0	$0	$620,316

Financial Evaluation

Direct Capital Costs	2022	2023	2024+	Total
Straight Time Labor	$26,266	$0	$0	$26,266
Overtime Labor	$4,794	$0	$0	$4,794
Outside Services	$263,748	$0	$0	$263,748
Materials	$90,355	$0	$0	$90,355
Other, including contingency amounts (describe)	$1,147	$0	$0	$1,147
Total Direct Costs	**$386,310**	**$0**	**$0**	**$386,310**

Indirect Capital Costs	2022	2023	2024+	Total
Indirects/Overheads (including benefits)	$210,319	$0	$0	$210,319
Capitalized interest or AFUDC, if any	$4,611	$0	$0	$4,611
Total Indirect Costs	**$214,930**	**$0**	**$0**	**$214,930**
Total Capital Costs	**$601,239**	**$0**	**$0**	**$601,239**
Less Total Customer Contribution	**$0**	**$0**	**$0**	**$0**
Total Capital Project Costs	**$601,239**	**$0**	**$0**	**$601,239**
Total O&M Project Costs	**$19,076**	**$0**	**$0**	**$19,076**
Total Project Cost	**$ 620,316**	**$ -**	**$ -**	**$ 620,316**

Note: Explain unique payment provisions, if applicable

Technical Justification:

Project Need Statement

Project CD01796 addresses [redacted].

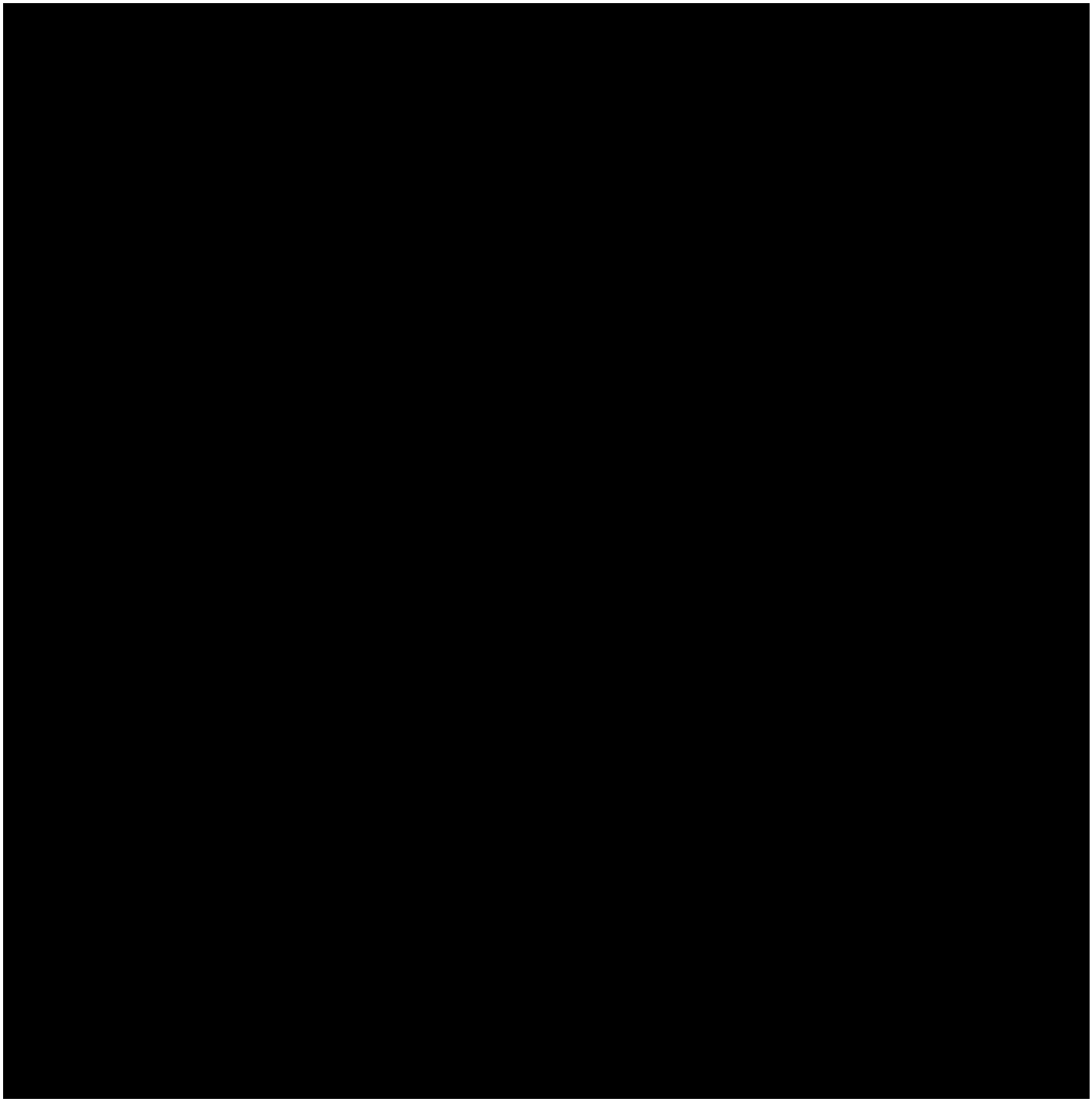
The proposed work suggests enhanced tree trimming and reconductoring of existing bare wire overhead segments with 1/0 ACSR tree wire for each location. The installation and replacement of cutouts, fuses, poles, and transformers along each segment is included where required. The suggested work for each zone will help reduce the frequency of tree related interruptions for customers and provides zone security in the future.

Project Objectives

The objective of this project is to improve the reliability of the outlined circuit sections to ultimately reduce the high frequency of interruptions.

Project Scope

This project proposes the work on the following 6 lateral segments:



Segment:	Outages [4 Years]	Outages [1 Year]	Conductor Type	Segment Length	Oldest Pole	Cost:	$/CMS	$/CIS
[redacted]	7	4	#4	3,960’	1948	$112,272	$ 5.32	$8,165.24
	9	6	#631	2,900’	1942	$ 117,360	$ 3.51	$4,580.80
	8	5	#631	2,626’	1961	$ 86,678	$ 6.62	$8,262.96
	15	9	#4	3,250’	1948	$ 138,325	$ 3.51	$474.99
	7	4	#6	1,475’	1936	$ 70,051	$ 2.41	$4,245.53
	7	5	#4	3,130’	1944	$ 95,629	$ 2.72	$1,522.51

Major Material:

[redacted]

Background / Justification

The [redacted]:

1.) [redacted] and has poles dating back to 1948. [redacted].

2.) [redacted] and has poles dating back to 1942. [redacted].

3.) [redacted] and has poles dating back to 1961. [redacted]

4.) [redacted]s and has poles dating back to 1948. [redacted]

5.) [redacted] and has poles dating back to 1936. [redacted]

6.) [redacted] and has poles dating back to 1944. [redacted]

[redacted]**nical Improvements**:

Without performing the suggested work, the identified areas will continue to suffer from frequent service outages due to degrading equipment and encroaching tree cover. Performing this work will reduce customer outages, increase loading capacity, and provide future security for each zone.

Project Schedule

[redacted]

Risks and Risk Mitigation Plans

Risk Event	Risk Horizon	Likelihood of Occurrence	Risk Mitigation
Actual cost higher than estimated due to scope changes.	2022	Medium	Included contingency costs in the funding request. Perform detailed Field Analysis and walk down in project development to avoid potential issues.
Customer Permission / Siting Council / Municipal approvals	2022	Low	Design to minimize customer impact. Project Preplanning and customer/community outreach.
Internal construction resources not available to perform the work.	2022	Medium	Plan internal resources to perform the work. Use competitive bidding to ensure lowest outside labor cost.
Internal engineering resources not available to perform the work.	2022	Low	Plan internal resources to perform the work. Use competitive bidding to ensure lowest outside labor cost.
Materials Shortage or long lead times	2022	Low	Pre-order long lead time material; minimize the use of non-standard and non-stocked material.
Storm delays	2022	Medium	If storm activity delays work, we may be forced to use external resources.

System abnormal configuration	2022	Low	Schedule work to minimize system abnormal time. Install temporary bypasses/equipment if system will be abnormal for extended periods.
Technological risks involving integration of new technology	2022	Low	Before use of new technology ensure support of standards and manufacturer. Schedule project to accommodate for extra time or ensure new technology is not on the critical path.
Wetlands / Environmentally sensitive area	2022	Low	Use of mats and specialty equipment, only work during certain times of the year.

References

None.

Attachments (One-Line Diagrams, Images, etc.)

