EVERSOURCE

Supplement Authorization Form

Project Title: Install SWGR For [redacted]	Project Number: CD01053
Date Prepared: 05/08/2025	**Company:** Eversource CT
Organization: Distribution Engineering	**Project Category:** SPECIFIC PROJECTS-NEW SRVCE
Initiating Organization: Distribution	**Project Type:** Specific
Project DDE: [redacted]	**Capital Investment part of 5-year plan?** Yes
Project Manager: [redacted]	**Emergency Related Request?** No
Project Sponsor: [redacted]	**Facility Type** (check all that apply)**:** ☐ PTF ☐ non-PTF ☒ Distribution ☐ N/A (General Plant)
Current Authorized Amount: $1,082.9K	**Approved In-Service Date:** 12/31/2025
Supplement Request: $459.0K	**Estimated In-Service Date:** 12/31/2025
Total Capital Request: $1,541.9K	**Authorization Type:** Supplement Request
	Reason: Cost Overage

1. Project Background

This is a SAF request for $459.0K.

The currently authorized amount is $1,082.9K.

The project is in progress and the spend to date is $1,193.4K.

The total request now is $1,541.9K.

This presentation is for Supplemental Funding for project CD01053, [redacted] Phase 2, a mixed-use development in Meriden that began in 2018 and is complete in the field except for the installation of switch gear, an ISG 4-way auto pair.

.

2. Supplement Justification Overview

- Direct cost for remaining work is $113,640
- $67,540 internal labor
- $4000 outside services
- $42,100 material.
- 2% contingency on actuals and 10% on remaining work.

3. Supplement Justification Detail

The directs cost increases associated with the above are:

- $113.64k, sum of internal labor, outside services and material. The cost to install the poured in place manhole and re-routing of the duct bank was higher than the estimate in full funding. Material costs were higher due to inflation. One cost increase is $10k to retro-fit the ISG Switchgear with the 52A relay update.
- $11.36K, 10% contingency for work to be done in 2025
- $23.87K, 2% contingency for work actuals through March 2025
- $148.87K, total directs

Total direct cost increase is $148.87K. Including indirects the total is $327.51K. This covers the cost to complete the project beyond the current spend.

$110.5K, additional cost of cable installation in 2024 and early 2025
+$327.51K estimate to complete the project in 2025
$438.01K, versus the supplemental request of $459K

4. Supplement Cost Summary (Project Total)

Capital Costs	To Date Spend	Prior Authorized	Supplement Request	**Total** (Add Prior and Supplement Request)
Internal Labor & Equipment	90.9	70.6	83.1	153.7
Outside Services	256.1	202.2	57.5	259.7
Materials	360.3	225.7	173.1	398.8
Removals	25.6	155.7	-124.0	31.7
Risk and Contingency		0.0	53.4	53.4
Other	-9.9	0.0	-9.9	-9.9
SUBTOTAL Direct Cost	**723.0**	**654.2**	**233.3**	**887.5**
Indirects / Overheads	374.8	402.0	156.7	558.7
AFUDC	95.5	26.7	69.1	95.8
SUBTOTAL Indirect Cost	**470.3**	**428.7**	**225.7**	**654.4**
TOTAL Capital Request	**1,193.4**	**1,082.9**	**459.0**	**1,541.9**
Less Total Customer Contribution		0.0	0.0	0.0
TOTAL Project Cost	**1,193.4**	**1,082.9**	**459.0**	**1,541.9**

New Total Request by Year (if applicable)

Note: If multi-year project, include actuals for current and years past, and then show forecasted spend for upcoming years.

Capital Costs	2018	2019	2020	2021	2022	2023	2024	2025	Projected Spend
Internal Labor & Equipment	0.6	42.9	13.6	3.3	-0.1	-3.7	23.4	73.6	153.7
Outside Services	2.2	117.7	2.2	0.0	118.8	0.5	14.6	3.6	259.7
Materials	0.7	285.9	0.0	2.1	-1.4	-0.5	50.0	62.1	398.8
Removals	0.0	6.6	17.8	0.4	0.0	2.9	-2.2	6.1	31.7
Risk and Contingency								53.4	53.4
Other	0.0	-9.9	0.0	0.0	0.0	0.0	0.0	0.0	-9.9
SUBTOTAL Direct Cost	**3.5**	**443.2**	**33.7**	**5.9**	**117.2**	**-0.9**	**85.9**	**199.0**	**887.5**
Indirects / Overheads	2.8	199.6	50.6	8.8	23.8	-25.1	82.5	215.7	558.7
AFUDC	0.0	20.1	13.6	6.3	10.6	13.7	21.7	9.8	95.8
SUBTOTAL Indirect Cost	**2.8**	**219.6**	**64.2**	**15.1**	**34.4**	**-11.4**	**104.2**	**225.5**	**654.4**
TOTAL Capital Request	**6.3**	**662.8**	**97.9**	**20.9**	**151.7**	**-12.3**	**190.1**	**424.4**	**1,541.9**
Less Total Customer Contribution									
TOTAL Project Cost	**6.3**	**662.8**	**97.9**	**20.9**	**151.7**	**-12.3**	**190.1**	**424.4**	**1,541.9**

5. Lessons Learned

EVERSOURCE

Supplement Authorization Form

Full Funding PAF:

EVERSOURCE

Project Approval Form

Project Title: Install SWGR For [redacted]	**Project Number:** CD01053
Date Prepared: 01/16/2024	**Company:** Eversource CT
Organization: Distribution Engineering	**Project Category:** SPECIFIC PROJECTS-NEW SRVCE
Project Initiator [redacted]	**Project Type:** Specific
Initiating Organization: Distribution	**Capital Investment part of original Op Plan:** Yes
Project Manager: [redacted]	**Emergency Related Request?** No
Project Sponsor: [redacted]	**Facility Type** (check all that apply)**:** ☐ PTF ☐ non-PTF ☒ Distribution ☐ N/A (General Plant)
Required in service date: 12/31/2024	
Total Capital Request: $1,083K	**Authorization Type:** *Full Funding*

1. Executive Summary

Project change in scope:

A new manhole will be installed on Pratt St in Meriden near MH #69, Enlarging MH #69 is not possible due to existing utilities. The underground group took detailed measurements and determined it is not possible to install the two 500kcmil copper primary's (plus a 4/0 Al loop) up cedar street to the [redacted] switchgear location through MH #69 due to space limitations. A sketch and estimate, $175K, are attached in the Reference section below.

Project CD01053 received Initial Funding Authorization of $908K at the 5/31/2018 CT PAC meeting. Full Funding Authorization of $1083K was requested and approved at the 1/6/22 CT PAC meeting.

The construction of phases 1 and 2, discussed below, are complete.

Executive Summary (original)

The developers of the [redacted] project have approached Cheshire FED regarding power for Phase 2 of the new complex (MC2). Five existing residential buildings will be demolished and will be replaced with 6 mixed use buildings as follows: Phase 1, Building A. Phase 2, Buildings B, C and D (Project CD01053). Phases 3 and 4, one building each. [redacted]

EVERSOURCE

Project Approval Form

[redacted]

Phase 1 construction is single Building A. Phase 2 construction consists of Buildings B, C and D (Project CD01053). [redacted] Following Phase 2 will be Phases 3 and 4, with one building each. The new ISG switchgear will be able to accommodate Phase 3 and Phase 4.

2. Project Cost Summary

Note: Dollar values are in thousands.

Capital Costs	2024	2025	2026	Total
Internal Labor and Construction Equipment	70.6	0.0	0.0	70.6
Outside Services	202.2	0.0	0.0	202.2
Materials	225.7	0.0	0.0	225.7
Removals	155.7	0.0	0.0	155.7
Other	0.0	0.0	0.0	0.0
Risk and Contingency	0.0	0.0	0.0	0.0
Subtotal	**654.2**	**0.0**	**0.0**	**654.2**

Indirect Capital Costs				
Indirects/Overheads (including benefits)	402.0	0.0	0.0	402.0
Capitalized interest or AFUDC, if any	26.7	0.0	0.0	26.7
Subtotal	**428.6**	**0.0**	**0.0**	**428.6**
Total Capital Costs (Gross)	**1,082.8**	**0.0**	**0.0**	**1,082.8**
Less Total Customer Contribution	**0.0**	**0.0**	**0.0**	**0.0**
Project Costs (Net)	**1,082.8**	**0.0**	**0.0**	**1,082.8**

Explain unique payment provisions, if applicable:

3. Technical Justification

a. Background

[redacted]

b. Project Need

This is a new service request by the developers of the Meriden Commons regarding power for Phase 2 to supply three, new multi-story apartment buildings; Buildings B, C, and D.

The main objectives of this project are as follows:

[redacted]

c. Project Scope

[redacted]

4. Alternatives Considered

[redacted]

Design Criteria	Option	[redacted]
[redacted]		
Authorization Type	Full	N/A
Capital Cost	$1.083M	N/A
Expense Cost	$.056M	N/A
Total Cost	$1.139M	N/A
Total Cost / MVA added	n/a	N/A
Preferred option	X	

EVERSOURCE

Project Approval Form

5. Project Schedule

Add any additional milestones that are pertinent to the project

Milestone/Phase Name	Estimated Date
Partial Approval	May 2018
100% Detailed Engineering Completion	December 2019
Fully Funded	January 2022
Construction Start	May 2019
In Service Date	December 2024

6. Regulatory Decisions

7. Codes and Standards

EVERSOURCE

Project Approval Form

8. Risk and Contingencies

Contingencies:

Risk Mitigation:

Risk Event	Risk Horizon	Likelihood of Occurrence	Risk Mitigation
Actual cost higher than estimated due to scope changes.	2024	High	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	2024	Low	Design to minimize customer impact. Project Preplanning and customer/community outreach.
Internal construction resources not available to perform the work.	2024	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.	2024	Medium	Plan internal resources to perform the work. Use competitive bidding to ensure lowest outside labor cost.
Materials Shortage or long lead times	2024	High	Pre-order long lead time material; minimize the use of non-standard and non-stocked material.
Storm delays	2024	Low	If storm activity delays work, we may be forced to use external resources.
System abnormal configuration	2024	Low	Schedule work to minimize system abnormal time. Install temporary bypasses/equipment if system will be abnormal for extended periods.

6

Refer to Distribution Capital Project Approval Process
JA-AM-2001-B, Rev.1

Technological risks involving integration of new technology	2024	High	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	2024	Medium	Use of mats and specialty equipment, only work during certain times of the year.

9. References

References
1.
2.
3.
4.
5.

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

Attachment	Included in Submittal?
A. Cost Estimates	*YES*
B. P6 Schedule	*NO*
C. Geographic Map	*YES*
D. System and Station One-Lines	*YES*
E. Other	*YES*
F.	

EVERSOURCE

Project Approval Form

Cost Estimates:

New manhole

	Code	Unit Type	Unit Description	Included	Unit of Measure	Unit Cost	Quantity	Total Cost	KEYWORD	
2	2016 Estimating Sheet (Updated 1/21/16)									
4	ALL11	ALL	ACT Estimate for System Projects Crews		$	[redacted]			ACT	
5	ALL12	ALL	ACT Estimate for Contractor Crews		$				ACT	
6	ALL13	ALL	ACT Estimate for Division Crews		$				ACT	
7	ALL14	ALL	OTHER	Item not in list	$				OTHER	potential extra cost depending on Vendor's permit requirements
8	ALL29	ALL	Credit Adjustment Value	Credit Adjustment Value	$				OTHER	
9	ALL15	ALL	OH/DB/UG - SWITCHING Network	Labor per switching order	EA				SWITCHING	
10	ALL16	ALL	OH/DB/UG - SWITCHING NonNetwork - Complex	Labor per switching order	EA				SWITCHING	
11	ALL17	ALL	OH/DB/UG - SWITCHING NonNetwork - Average	Labor per switching order	EA				SWITCHING	
12	ALL18	ALL	OH/DB/UG - Traffic Control - Police Officer	$1000 / day / officer. Urban area, Main/State roads, 2 needed for reconductoring, multiple crews	$			$17,000	TRAFFIC	police 15% of precontingency subtotal
102	UG139	UG	UG - MANHOLE - Precast	Labor and Material	EA				ENCLOSURE	
103	UG140	UG	UG - MANHOLE - Pour in place	Labor and Material	EA			$107,377	ENCLOSURE	
104	UG141	UG	UG - MANHOLE - Rebuild, enlarge or re-roof	Labor and Material	EA				ENCLOSURE	
119	Total					Sub- Total		$174,377		
120				Contingency/Contractor Contingency/Urban Adder			40%	$69,751		
121						Total		$174,960		

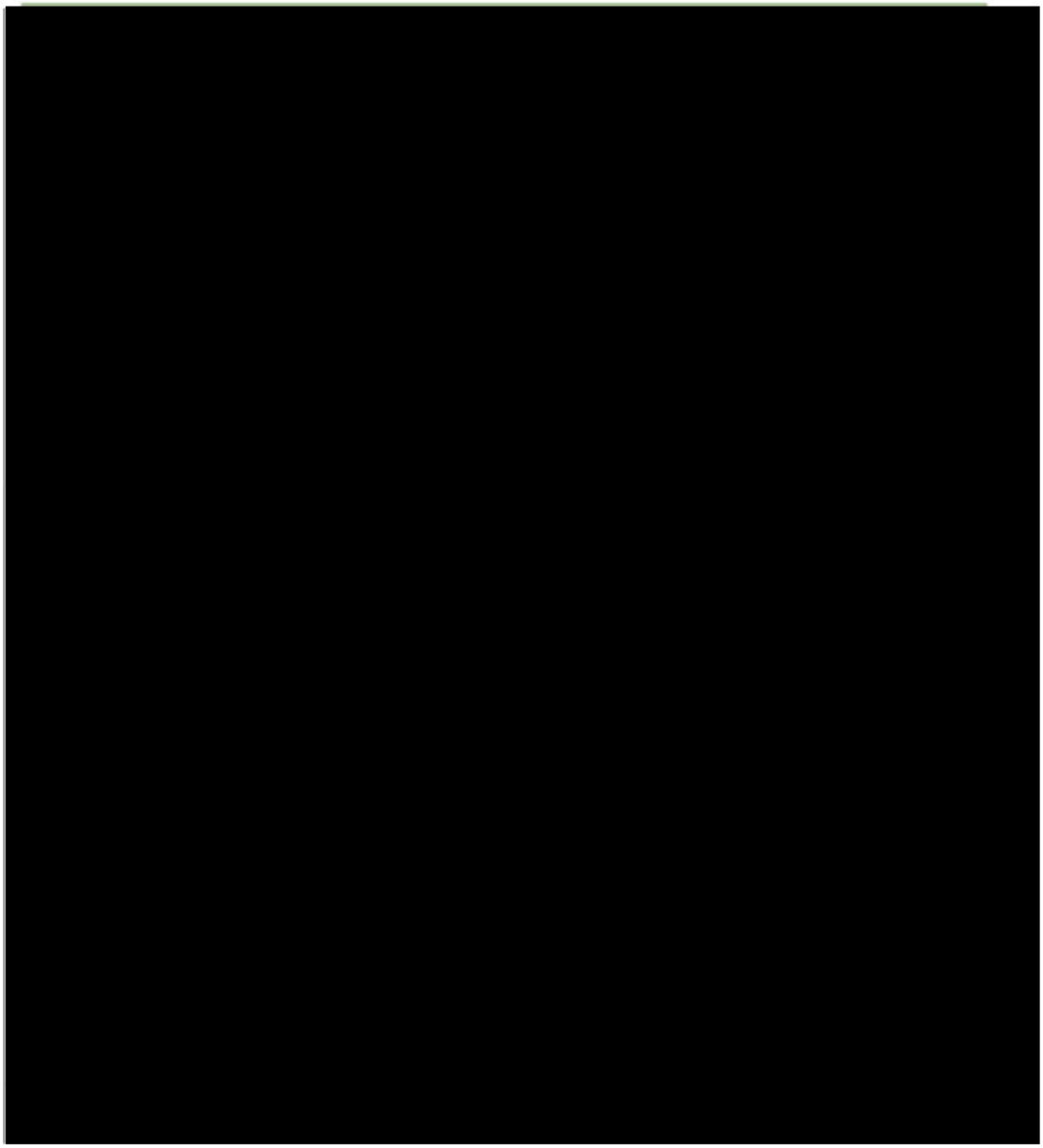
8

Refer to Distribution Capital Project Approval Process
JA-AM-2001-B, Rev.1

Supplement Authorization Form

EVERSOURCE

Project Approval Form



9

Refer to Distribution Capital Project Approval Process
JA-AM-2001-B, Rev.1

Refer to Distribution Capital Project Approval Process
JA-AM-2001-B, Rev.3
Refer to Distribution Capital Project Supplement Process
JA-AM-2001-C, Rev.0

EVERSOURCE

Project Approval Form

[redacted]

Budget Summary - Preferred Option — Install ISG 4-Way Switch Gear

2018

ID	Title	Status	Rev #	Contingency	Expenditure Amount	Net Estimate
1	Civil Work - MH's, Ducts, Excavation, Et	Prelim	0	40 %	$648,079	$0
2	Install SWGR, XF's and Cable	Prelim	0	28 %	$932,752	$908,501
				2018 Total:	**$1,580,831**	**$908,501**
				Total Project:	**$1,580,831**	**$908,501**

Design Alternative CD01053-01

General Information

Segment: 1 - Civil Work - MH's, Ducts, Excavation, Et — Status: Prelim Design Submitted

Segment Type: NEW SERVICE — Town: MERIDEN — Budget Year: 2018

Work Type: Other — Trimming Required: ☐ — In Service Date: 12/31/2018

Description: All civil work associated with the installation of automatic switch gear, ducts and pulling structure for the [redacted] Phase 2 project will be competed by the developer.

10

Refer to Distribution Capital Project Approval Process
JA-AM-2001-B, Rev.1

EVERSOURCE

Project Approval Form

Design Alternative CD01053-01

Estimate

Preliminary Estimate Summary

Revision Number:	0
Contingency:	40.00 %
SubTotal:	$462,914
Contingency Amount:	$185,165
Estimate:	$648,079
Reimbursement:	$648,079
Net Amount:	$0
Description:	

Item Description	CU	$ / Per	Qty	Amount
TRAFFIC OH/DB/UG - Traffic Control - Police Officer	16-ALL18	[redacted]		$10,000.00
ENCLOSURE DB/UG - Transformer Pad/Handhole	16-UG143			$18,626.40
CONDUIT UG-Ductline-up to 12 duct-Non- Traveled/Non-Paved ducts b/w pads and MH's in non-traveled way	16-UG138			$226,560.00
ENCLOSURE UG - MANHOLE - Precast one for pulling two for switch gear	16-UG139			$188,959.20
CONDUIT UG-Ductline-up to 12 duct - Traveled Way / Paved street crossing - ducts to MH #292 on cedar st	16-UG137			$18,768.00

EVERSOURCE

Project Approval Form

Design Alternative CD01053-02

Estimate

Preliminary Estimate Summary

Revision Number:	0
Contingency:	28.00 %
SubTotal:	$728,713
Contingency Amount:	$204,040
Estimate:	$932,752
Reimbursement:	$24,252
Net Amount:	**$908,501**

Description:

Item Description	CU	$ / Per	Qty	Amount
SWITCHGEAR DB/UG-Swgr up to 25kV-Vista Auto Type 413/422-pair	16-UG128	[redacted]		$359,923.20
XF DB/UG - Padmount XF - 3ph	16-UG131			$18,897.60
ENCLOSURE UG - MANHOLE - Pour in place	16-UG140			$107,976.80
TRAFFIC OH/DB/UG - Traffic Control - Police Officer for installation of poured in place MH and installation of 500 Cu	16-ALL18			$35,000.00
UG CABLE DB/UG - 350/500 - 3-1/C (3ph) Cu from pratt st and from park st to swgr manholes	16-UG114			$83,520.00
DB CABLE DB/UG - 4/0 - 3-1/C (3ph) Al loop from swgr to pads and back to swgr	16-UG113			$67,200.00
SWITCHING OH/DB/UG - SWITCHING Network take [redacted]ut (one at a time) to splice in a 3-way splice	16-ALL15			$56,195.20

12

Refer to Distribution Capital Project Approval Process
JA-AM-2001-B, Rev.1

EVERSOURCE

Project Approval Form

Geographic Maps:



EVERSOURCE

Project Approval Form

City of Meriden GIS Map



14

Refer to Distribution Capital Project Approval Process
JA-AM-2001-B, Rev.1

EVERSOURCE

Project Approval Form

GOOGLE EARTH VIEW



15

Refer to Distribution Capital Project Approval Process
JA-AM-2001-B, Rev.1

EVERSOURCE

Supplement Authorization Form

EVERSOURCE

Project Approval Form

Plan D loop extension temp until swgr is installed

[redacted]

16

Refer to Distribution Capital Project Approval Process
JA-AM-2001-B, Rev.1

20

EVERSOURCE

Project Approval Form

After swgr is installed



17

Refer to Distribution Capital Project Approval Process
JA-AM-2001-B, Rev.1