Lead Agency Information

Lead Agency Name:	Sonoma County Transit
Address:	355 West Robles Avenue
City, State, Zip Code:	Santa Rosa, CA 95407
County:	Sonoma County
Regional Entity:	Metropolitan Transportation Commission
Title VI Attached:	Yes

Title VI Approval Date:	08/15/19

Allocation Request Prepared by

Name:	Bryan Albee
Title:	Transit Systems Manager
Phone #:	707-585-7516
E-mail:	bkalbee@sctransit.com

Contact *(if different than "Prepared by")*

Name:	Steven Schmitz
Title:	Transit Specialist II
Phone #:	707-585-7516
E-mail:	steven@sctransit.com

Authorized Agent

Name:	Johannes J. Hoevertsz
Title:	Director of Transportation & Public Works
Phone #:	707-565-2231
E-mail	johannes.hoevertsz@sonoma-county.org

Legislative District Numbers

Assembly*:	10	4	2			
Senate*:	3	2				
Congressional*:	5	2				

*if you have additional Districts, please provide a separate attachment

Project Summary

Name: *No more than 180 characters.*	Purchase One 35-Foot Battery-Electric Transit Bus
Description (Short): *No more than 375 characters.*	Purchase of one 35-foot electric-powered bus that will be available for deployment on local and intercity routes serving the cities of Santa Rosa, Rohnert Park, Cotati and Petaluma.
Type:	Capital
Sub-Type	Purchase of replacement zero-emission vehicle(s) (may include equipment/infrastructure)

Total Years of Rollover:	0	**Remaining Years of Rollover:**	0
Start date *(anticipated)* :		**End date** *(anticipated)* :	

Please provide specific area information for the project in the Lat-Long tab.

Project Life: For capital projects, state the project useful life in years. For operation projects state the number of months a service will be funded.

Capital:	12 Years		**Operations:**		
Funding:	**99313:** $665,243	**99314:** $58,374	**Total:**	$723,617
Approved LONP:	No	**LONP Approval date:**		

Funding Information

LCTOP Allocation Year	Prior	FY 21-22	FY 22-23	FY 23-24	FY 24-25	FY 25-26	Total
PUC 99313 Amount:		$665,243					$665,243
PUC 99314 Amount:		$58,374					$58,374
Total LCTOP Funds:	$0	$723,617	$0	$0	$0	$0	$723,617
Other GGRF:							$0
Other Funds:		$243,040					$243,040
Total Project Cost:	$0	$966,657	$0	$0	$0	$0	$966,657

Lead Agency:	Sonoma County Transit	Amount:	PUC Funds Type:
Contact Person:	Steven Schmitz		99313
Contact Phone #:	707-585-7516	$58,374	99314
Contact E-mail:	steven@sctransit.com		

Contributing Sponsor:	Metropolitan Transportation Commission	Amount:	PUC Funds Type:
Contact Person:	Anne Spevack	$665,243	99313
Contact Phone #:	415-778-6611		99314
Contact E-mails:	aspevack@bayareametro.org		

Contributing Sponsor:	b	Amount:	PUC Funds Type:
Contact Person:			99313
Contact Phone #:			99314
Contact E-mails:			

Contributing Sponsor:	c	Amount:	PUC Funds Type:
Contact Person:			99313
Contact Phone #:			99314
Contact E-mails:			

Contributing Sponsor:		Amount:	PUC Funds Type:
Contact Person:			99313
Contact Phone #:			99314
Contact E-mails:			

Total FY 21-22 LCTOP Funding	$723,617

Fully Funded Project: Provide a description of all the funds that will be used to complete this project and how LCTOP funds will not supplant other funding sources. Include the project ID and awarded funding amount from prior rollover years.

The budget anticipates that this project will be fully funded with a combination of LCTOP funds and Transportation Development Act funds. LCTOP funds will not be used to supplant other funds to complete this project.

Project Changes: If this is a rollover project with an approved CAP that added funds into the project in a previous year, provide the CAP approval date, project ID, and amount transferred. The amount should be reflected in the 'Prior' column

N/A

Funding Plan

Proposed Total Project Cost

Component	Prior	FY 21-22	FY 22-23	FY 23-24	FY 24-25	FY 25-26	FY 26-27	Total
PA&ED	$0	$0	$0	$0	$0	$0	$0	$0
PS&E	$0	$0	$0	$0	$0	$0	$0	$0
R/W	$0	$0	$0	$0	$0	$0	$0	$0
CON	$0	$0	$0	$0	$0	$0	$0	$0
Veh/Equip Purchase	$0	$966,657	$0	$0	$0	$0	$0	$966,657
Operations/Other	$0	$0	$0	$0	$0	$0	$0	$0
TOTAL	$0	$966,657	$0	$0	$0	$0	$0	$966,657

Low Carbon Transit Operations Program (LCTOP)

Component	Prior	FY 21-22	FY 22-23	FY 23-24	FY 24-25	FY 25-26	FY 26-27	Total
PA&ED								$0
PS&E								$0
R/W								$0
CON								$0
Veh/Equip Purchase		$723,617						$723,617
Operations/Other								$0
TOTAL	$0	$723,617	$0	$0	$0	$0	$0	$723,617

Funding Source: Transportation Development Act

Component	Prior	FY 21-22	FY 22-23	FY 23-24	FY 24-25	FY 25-26	FY 26-27	Total
PA&ED								$0
PS&E								$0
R/W								$0
CON								$0
Veh/Equip Purchase		$243,040						$243,040
Operations/Other								$0
TOTAL	$0	$243,040	$0	$0	$0	$0	$0	$243,040

Funding Source:

Component	Prior	FY 21-22	FY 22-23	FY 23-24	FY 24-25	FY 25-26	FY 26-27	Total
PA&ED								$0
PS&E								$0
R/W								$0
CON								$0
Veh/Equip Purchase								$0
Operations/Other								$0
TOTAL	$0	$0	$0	$0	$0	$0	$0	$0

Funding Source:

Component	Prior	FY 21-22	FY 22-23	FY 23-24	FY 24-25	FY 25-26	FY 26-27	Total
PA&ED								$0
PS&E								$0
R/W								$0
CON								$0
Veh/Equip Purchase								$0
Operations/Other								$0
TOTAL	$0	$0	$0	$0	$0	$0	$0	$0

Funding Plan

Funding Source:								
Component	**Prior**	**FY 21-22**	**FY 22-23**	**FY 23-24**	**FY 24-25**	**FY 25-26**	**FY 26-27**	**Total**
PA&ED								$0
PS&E								$0
R/W								$0
CON								$0
Veh/Equip Purchase								$0
Operations/Other								$0
TOTAL	$0	$0	$0	$0	$0	$0	$0	$0

Funding Source:								
Component	**Prior**	**FY 21-22**	**FY 22-23**	**FY 23-24**	**FY 24-25**	**FY 25-26**	**FY 26-27**	**Total**
PA&ED								$0
PS&E								$0
R/W								$0
CON								$0
Veh/Equip Purchase								$0
Operations/Other								$0
TOTAL	$0	$0	$0	$0	$0	$0	$0	$0

Funding Source:								
Component	**Prior**	**FY 21-22**	**FY 22-23**	**FY 23-24**	**FY 24-25**	**FY 25-26**	**FY 26-27**	**Total**
PA&ED								$0
PS&E								$0
R/W								$0
CON								$0
Veh/Equip Purchase								$0
Operations/Other								$0
TOTAL	$0	$0	$0	$0	$0	$0	$0	$0

Funding Source:								
Component	**Prior**	**FY 21-22**	**FY 22-23**	**FY 23-24**	**FY 24-25**	**FY 25-26**	**FY 26-27**	**Total**
PA&ED								$0
PS&E								$0
R/W								$0
CON								$0
Veh/Equip Purchase								$0
Operations/Other								$0
TOTAL	$0	$0	$0	$0	$0	$0	$0	$0

Funding Source:								
Component	**Prior**	**FY 21-22**	**FY 22-23**	**FY 23-24**	**FY 24-25**	**FY 25-26**	**FY 26-27**	**Total**
PA&ED								$0
PS&E								$0
R/W								$0
CON								$0
Veh/Equip Purchase								$0
Operations/Other								$0
TOTAL	$0	$0	$0	$0	$0	$0	$0	$0

Project Information

1) Project Description - Provide a comprehensive project description. For operations projects, include: number of trips, span, frequency improvements, and number of days of operation. For capital projects, include: product specifications and identify all LCTOP funded components. *No more than 12 lines.*

LCTOP funding is being requested by Sonoma County Transit (SCT) to assist with the purchase of one 35-foot electric-powered bus that will be available for deployment on local and intercity routes providing service in the cities of Santa Rosa, Rohnert Park, Cotati and Petaluma. This project is developed with the assumption that SCT will be purchasing the 35-foot electric-powered buses from BYD which will replace one CNG bus. The low-floor bus will be 35-feet in length and equipped with 32 seats, 2 ADA-compliant wheelchair securement areas, security cameras, AVL systems and have a operating range of approximately 200 miles on a single charge. The electric-powered bus will be charged utilizing existing charging stations located at SCT's bus yard. Also, a remote charging station is planned for installation at the Petaluma Transit Mall located at the southern terminus of intercity routes 44 and 48, which will effectively expand the operating range of the 35-foot electric bus beyond 200 miles.

2) Project Planning - Provide a detailed explanation of the project planning process and how it was designed to avoid substantial burden on any low- income, disadvantaged, and vulnerable populations. Include any public outreach efforts, engagement events, community input, and workshops. *No more than 10 lines.*

The purchase of electric-powered buses for Sonoma County Transit's fixed-route fleet is included in the current version of its Short Range Transit Plan. This project was designed to avoid substantial burden on any low income disadvantaged communities by replacing older CNG vehicles with new clean air electric buses, reducing air contaminants along the corridors. The 35-foot electric-powered bus to be purchased will be deployed on Sonoma County Transit's local and intercity routes in the cities of Santa Rosa, Rohnert Park, Cotati and Petaluma based only on current operating range limitations for electric-powered buses. As the operating range for electric-powered buses expands, SCT will deploy its electric-powered buses on additional intercity routes, as determined feasible.

3) Project Costs - Provide an itemized breakdown of project components and describe how the cost estimations were developed. Total costs must correspond to the Funding Information section above. *No more than 12 lines.*

As mentioned previously under project description, LCTOP funding is being requested by Sonoma County Transit (SCT) to assist with the purchase of one 35-foot electric-powered buses that will be available for deployment on local and intercity routes providing service to the cities of Santa Rosa, Rohnert Park, Cotati and Petaluma. The low-floor bus will be 35-feet in length and equipped with 32 seats, 2 ADA-compliant wheelchair securement areas, security cameras, AVL systems and have an operating range of approximately 200 miles on a single charge. This requested LCTOP funding will assist with the purchase of a third 35-foot electric-powered bus for SCT's fixed-route fleet. With the assumption for this project that SCT will be purchasing the 35-foot electric-powered buses from BYD, the cost is estimated to be $966,657 (including options and delivery) based on SCT's recent electric-powered bus procurements from BYD.

Agency Information

4) Agency Fare - Describe the fare structure for your system and how the project will affect that structure if at all.

All of Sonoma County Transit's local routes are currently fare-free. Cash fares on SCT's intercity routes depend on distance traveled and currently range from $1.50 to $4.80 for adults, $1.25 and $4.55 for youth, and $0.75 and $2.40 for senior/disabled. This project will not affect SCT's current fare structure.

5) Agency Service - Describe the transit service provided and how the project plays into the overall operations. Include how the COVID-19 pandemic has impacted transit service related to the project. *No more than 10 lines.*

Sonoma County Transit (SCT) currently operates a total of eighteen (18) local and intercity routes. Local service is provided within the cities of Cloverdale, Healdsburg, Windsor, Sebastopol, Rohnert Park, Cotati, Sonoma, the Sonoma Valley area and the Lower Russian River area. SCT's 35-foot electric-powered bus will be available for deployment on SCT's local and intercity routes in the cities of Santa Rosa, Rohnert Park, Cotati and Petaluma. During FY 2020-21 SCT provided a total of 358,411 fixed-route passenger trips and 22,539 ADA paratransit trips. With the outbreak of COVID-19 and major decreases in ridership, some of SCT's underperforming intercity routes were suspended and the schedules for most core intercity routes were reduced. These service reductions have continued into FY 2021-22. However, ridership is anticipated to gradually increase toward pre-pandemic levels over the next fiscal year and service restoral on SCT's local and intercity routes will be necessary.

Project GHG Benefits

Greenhouse Gas Reductions - <u>Describe qualitatively</u> how this project will reduce greenhouse gas emissions.
Sonoma County Transit deploys buses that are fueled by compressed naturual gas (CNG) on its local and intercity routes operated in Santa Rosa, Rohnert Park, Cotati and Petaluma. This project will replace one CNG-fueled bus with one zero-emission electric-powered bus. The deployment of an additional zero-emission electric-powered bus on these routes will help reduce greenhouse gas emissions.

Greenhouse Gas Reductions - Please provide quantitative information requested below and explanations supporting the data provided.

	Value	**Explanation**
Year 1 (Yr1) - *First year of service, or year that capital improvements will be completed.*	2023	
Year F (YrF) - *Final year that the service is funded or the final year of useful life for capital improvements.*	2035	
Project Yr. 1 Ridership Increase - *Estimated annual ridership <u>contributed by the new service or capital improvement</u> in Yr1. Refer to page 4 of the Supplemental Guidance.*		N/A
Project Yr. F Ridership Increase - *Estimated annual ridership <u>contributed by the new service or capital improvement</u> in YrF. Refer to page 5 of the Supplemental Guidance.*		N/A
Adjustment (A) - *Adjustment factor to account for Choice Riders. You may use defaults values listed on page 18 of the Supplemental Guidance.*	0.705	Adjustment factor for intercity service per CARB's recommended default value. (CB- PT)
Trip Length (L) - *Length (miles) of average auto trip reduced or average passenger trip length. You may use defaults values list ed on pages 19-24 of the Supplemental Guidance.*	21.83	Average trip length for intercity service per CARB's recommended default value. (CB- PT)
Project Useful Life	**12**	This is calculated based on the values above.
Total Project Ridership Increased	**0**	This is calculated based on the values above.
Total Project VMTs Reduced	**0**	This number is calculated based on the values above.
Total Project GHG Emission Reductions (MTCO2e)	**852.36**	This number is calculated based on the values from above and the **QM-Tool tab**.
LCTOP Project GHG Emission Reductions (MTCO2e)	**852.36**	This number is calculated based on the values from above and the **QM-Tool tab**.

Project Benefits

Job Support Benefits *(Refer to LCTOP Guidelines and CARB Co-Benefits website for more information)*

Primary Project Activity *(select from drop-down)*	Procurement of buses
% of Project Budget Associated with Primary Activity	100%
Other Project Activity *(select from drop-down)*	
% of Project Budget Associated with Other Activity	
Other Project Activity *(select from drop-down)*	
% of Project Budget Associated with Other Activity	

Travel Cost Savings Benefits   Refer to pages 5-6 on the Supplemental Guidance.

	Value	Explanation
Baseline Average One-Way Fare Cost ($/One-Way Trip/Rider) *(Average fare per way prior to project implementation)*	**$2.10**	SCT's average standard fare per trip associated with this project (pre-COVID). The average intercity fare on SCT is based on a two-zone fare, which costs $2.10 and assumes payment of an adult fare for the trip.
New Average One-Way Fare Cost ($/One-Way Trip/Rider) *(Average fare per way resulting from project implementation)*	**$2.10**	The project will not impact SCT's current fare structure.
Transit Facility Parking Cost ($/Roundtrip/Rider) *(Average cost to park to use transit associated with project)*		(ex. The average transit facility parking cost is $5 per day)
Avoided Parking Cost ($/Roundtrip/Rider) *(Average avoided parking cost associated with project)*		(ex. The average parking cost in the project area is $15 per day)
Avoided Toll Cost ($/Roundtrip/Rider) *(Average avoided toll cost associated with project)*		(ex. The average tolling cost in the project area is $10 per day)

Co-Benefits - Check all additional Benefits/Outcomes.

x	**Improved Safety**	___	**Coordination with Educational Institution**
x	**Improved Public Health**	___ **College** ___ **Grades K-12**	
x	**Reduced Operating/Maintenance Costs**	___	**Promotes Active Transportation**
x	**Increase System Reliability**	x	**Promotes Integration w/ other modes**

Co-Benefits - Describe benefits selected above and other benefits not listed.

This project will improve public health through the deployment of a new zero-emission electric-powered bus on Sonoma County Transit's local and intercity routes serving the cities of Santa Rosa, Rohnert Park, Cotati and Petaluma. The deployment of an additional zero-emission electric-powered bus will reduce greenhouse gas emissions, and help reduce air pollution and related public health issues. Also, overall maintenance costs for the new electric-powered bus is expected to be less than the costs for a CNG-fueled bus. In addition, because the new electric-powered bus will be deployed on routes operated in the cities of Santa Rosa, Rohnert Park, Cotati and Petaluma serving SMART commuter rail stations, it will help promote the intergration of bus and rail service in Sonoma County. Furthermore, overall system reliability and safety will be improved with the addition of the electric-powered bus because upgraded AVL and security camera systems will be included on the new bus.

<u>Priority Populations Benefits</u>

Does your Agency's Service Area have a Disadvantaged Community? (as defined by SB 535)	Yes
Is the project located within the boundaries of a disadvantaged community census tract?	Yes
Is the project located within the boundaries of a low-income community census tract?	Yes
Is the project located outside of a disadvantaged community, but within 1/2 mile of a disadvantage community and within a low-income census tract?	Yes
Amount of FY 21-22 funds benefitting Disadvantaged Communities : $	
Priority Population Community Engagement: Identify the specific assessment for the Community Engagement Co-benefit (High, Medium, Low): *<u>See pages 26-28 Supplemental Guidance for more information</u>	Low

<u>Method:</u> Select the method your agency used for identifying an important community or household need.	C. Where direct engagement is infeasible, look at the individual factors in CalEnviroScreen that are most impacting an identified disadvantaged or low-income community (i.e., factors that score above the 75th percentile), and confirm that the project will reduce the impacts of at least one of those factors.
<u>Specific Common Need</u>: Make a selection only if <u>letter D</u> is selected above**.**	

Priority Populations Community Needs Description: Expound on the selections above in **Method** and **Specific Common Need** to describe the process that your agency used to identify important community needs. Provide details of any public outreach efforts, engagement events, community input, and workshops.

After reviewing the individual factors in CalEnviroScreen 3.0 for DAC census tract 6097153200, it was determined that Asthma had a percentile score of 80 and, therefore, a higher relative burden among residents. This project will purchase a new zero-emission busfor deployment on routes providing service within this DAC census tract, which will reduce the impacts of Asthma on residents.

Priority Populations Benefits

Identify the Priority Population(s) that will benefit from this project.	Project provides benefits to a DAC, a LIC/HH, and a LIC/HH 0.5mi from a DAC
Priority Population Benefit: Select the benefit your project provides to the community or household.	A. Project reduces criteria air pollutant or toxic air contaminant emissions.

Priority Population Benefit: Based on the selections above, explain in greater detail how the project will provide benefits to the priority populations in your service area.

The project will benefit the residents in DAC census tract 6097153200 by improving public health through the deployment of new a zero-emission electric-powered bus on Sonoma County Transit's local and intercity routes serving the cities of Santa Rosa, Rohnert Park, Cotati and Petaluma. The deployment of an additional zero-emission electric-powered bus in this disadvantaged community will also help to reduce greenhouse gas emissions, air pollution and related public health issues.

SB 1119 Project Criteria: See page 7 of the LCTOP Supplemental Guidance for more information. ☐

Is the project a transit fare subsidies or network and fare integration technology improvements, including, but not limited to, discounted or free student transit passes	
Is the project a purchase of zero-emission transit buses and/or purchase and installation of supporting infrastructure?	
Is the project a new or expanded transit service that connects with transit service serving a disadvantaged communities?	

SB 1119 Project Criteria: If this is a new or expanded service project, explain how it connects to a transit service that serves a Disadvantaged Community.

Note to applicants:

Step 2a: Identify the Project Type.
Step 2b: Input Project-specific Information.

Project Name:	

This section is used to determine the quantification method and emission factors to use to estimate emissions.			
Project Info Inputs	Input	Required	Description
Project Type	Purchase of replacement zero-emission vehicle(s) (may include equipment/infrastructure)	Required Input	For the purposes of this quantification, eligible LCTOP projects fall into four project types. Select the project type that best describes this component.
Quantification Method	Technology Conversion	Automated	Emission Estimates = Emissions from Baseline Vehicle – Emissions from New Vehicle
Service Type	Intercity/Express Bus (Long Distance)	Required Input	The transit service (e.g., Intercity/Express Bus (Long Distance), Light Rail, Vanpool, etc.) directly associated with the proposed project. For projects that serve multiple services, select Multi-modal.
Type of Region	County	Required Input	The type of region that best encompasses the geographic location for the proposed project type.
Region	Sonoma	Required Input	The County or Air Basin where the majority of the service occurs.
Year 1 (Yr1)	2023	Required Input	The first year of service that the rolling stock acquisition will support.
Year F (YrF)	2035	Required Input	The final year of service that the rolling stock acquisition will support.
Useful Life (yrs)	12	Calculated	The useful life of the rolling stock. Limited to up to 50 years.

This section is used to estimate the emission and cost reductions from displaced auto vehicle miles traveled (VMT).			
Displaced Auto VMT Inputs	Input	Required	Description
Yr1 Ridership		Not Required	Not applicable for this project type.
YrF Ridership		Not Required	Not applicable for this project type.
Adjustment Factor		Not Required	Not applicable for this project type.
Length of Average Trip (mi)		Not Required	Not applicable for this project type.
Passenger VMT Reductions (mi)	0	Not Applicable	Not applicable for this project type.
GHG Emission Reductions (MTCO$_2$e)	0	Not Applicable	Not applicable for this project type.

This section is used to estimate the net emission reductions from new service or from the purchase of new zero-emission/hybrid vehicle(s).			
New Service Vehicle Inputs	Input	Required	Description
Vehicle Type	Transit Bus	Required Input	The vehicle type (e.g., Transit Bus, Streetcar, Ferry, etc.) that will operate the new service or will be procured.
Engine Tier		Not Required	Not applicable for this project type.
Engine Horsepower		Not Required	Not applicable for this project type.
Fuel Type	Electric	Required Input	The fuel type (e.g. Electric, Diesel, etc.) of the vehicle to be acquired.
Hybrid Vehicle	N/A	Not Required	Not applicable for this project type.

Model Year	2023	Required Input	The engine model year of the vehicle to be acquired.
Project-Specific GHG Emission Factor (gCO2e/MJ)		Optional Input	If used, applicant must be able to demonstrate an approved carbon intensity value under the Low Carbon Fuel Standard and submit additional documentation.
Annual VMT (mi/yr)	40,000	Required Input	The estimated annual VMT of the vehicle to be acquired (e.g., 72,000 mi/yr).
Annual Fuel Use		Not Required	Not applicable for this project type.
Annual Renewable Energy Generated (kWh/yr)		Not Required	Not applicable for the selected fuel type.
GHG Emissions (MTCO$_2$e)	141	Calculated	The estimated GHG emissions (MTCO2e) of the vehicle to be acquired.

This section is used to estimate the net emission reductions from vehicle replacement as a result of the proposed project.			
Baseline Vehicle Inputs	Input	Required	Description
Vehicle Type	Transit Bus	Required Input	Not applicable for this project type.
Engine Tier		Not Required	Not applicable for this project type.
Engine Horsepower		Not Required	Not applicable for this project type.
Fuel Type	CNG	Required Input	The fuel type (e.g., electric, diesel, etc.) of the baseline vehicle(s).
Hybrid Vehicle	No	Not Required	Not applicable for this project type.
Model Year	2010	Required Input	The average engine model year(s) of the baseline vehicle(s).
Project-Specific GHG Emission Factor (gCO2e/MJ)		Optional Input	If used, applicant must be able to demonstrate an approved carbon intensity value under the Low Carbon Fuel Standard and submit additional documentation.
Annual VMT (mi/yr)	40,000	Required Input	The estimated annual VMT of the baseline vehicle(s). For rail and ferry vehicles, applicants may alternatively use Annual Fuel. For vehicles with multiple engines (e.g., DMUs), provide the cumulative VMT across all the engines.
Annual Fuel Use		Not Required	Not applicable for this project type.
GHG Emission Reductions (MTCO$_2$e)	994	Calculated	The estimated GHG emissions (MTCO2e) of the vehicle to be acquired.

This section is used to estimate the net emission reductions from fuel/energy reductions as a result of the proposed project.			
Fuel/Energy Reductions Inputs	Input	Required	Description
Vehicle Type		Optional Input	The vehicle type (e.g., Transit Bus, Streetcar, Ferry, etc.) of the vehicle(s) that will realize fuel/energy reductions as a result of The project.
Engine Tier		Not Required	Not applicable for this project type.
Engine Horsepower		Not Required	Not applicable for this project type.
Fuel Type		Not Required	Not applicable for this project type.
Model Year		Not Required	Not applicable for this project type.

Annual Fuel/Energy Reduced		Not Required	Not applicable for this project type.
GHG Emission Reductions (MTCO$_2$e)		Calculated	Not applicable for this project type.
This section is used to estimate the GHG emisson reductions as a result of the proposed project.			
Total Project GHG Emission Reductions (MTCO$_2$e)	852	Calculated	Total GHG emission reductions (MTCO2e) from the project during the useful life.
Total LCTOP Project GHG Emission Reductions (MTCO$_2$e)	852	Calculated	The portion of GHG emission reductions attributable to funding from LCTOP; GHG emission reductions are prorated according to the level of program funding contributed from LCTOP and other CCI programs, as applicable.
FY 21-22 LCTOP Project GHG Emission Reductions (MTCO2e)	852	Calculated	The portion of GHG emission reductions attributable to funding from FY 21-22 LCTOP; GHG emission reductions are prorated according to the level of program funding contributed from FY 21-22 LCTOP and other CCI programs, as applicable.

Please provide specific area information for the project. *Lat-Long for the project should be in decimal degrees.*

If you are claiming a Priority Population benefit, please provide **at least one location point to each claimed community** within the **first three rows**. Then **select** from the drop down which community the location points are representing. Use https://oehha.ca.gov/calenviroscreen/report/calenviroscreen-40 to identify your DAC and https://webmaps.arb.ca.gov/PriorityPopulations/ to Identify your AB 1550 Community

Name	Latitude	Longitude	Priority Population
J and 8th	*38.580997*	*-121.496433*	*Disadvantaged Community*
Name A	38.580997	-121.496433	**Disadvantaged Community**
Name B	38.680997	-121.596433	**Low-Income Community/Househol**
Name C	38.780997	-121.696433	**Low-Income w/n 1/2 mile of a DAC**
Redwood Dr / Golf Course Dr (Graton Resort)	38.363702	-122.714934	**Disadvantaged Community**
Petaluma Hill Rd & Dutch Ln	38.304132	-122.666391	**Low-Income Community/Househol**
Santa Rosa Ave & Scenic Ave	38.376087	-122.713652	**Low-Income w/n 1/2 mile of a DAC**
Petaluma Transit Mall	38.236645	-122.636513	
E Washington St & Lakeville St	38.238262	-122.635649	**None**
E Washington St & Vallejo St	38.240699	-122.633569	**None**
E Washington St & Kenilworth Dr	38.243942	-122.630551	**None**
N McDowell Blvd (Lucchesi Park)	38.252315	-122.631188	**None**
N McDowell Blvd & Lynch Creek Way	38.253387	-122.633037	**None**
N McDowell Blvd & Rainer Ave	38.255669	-122.637162	**None**
Rainier Ave & Maria Dr	38.258269	-122.632706	**None**
Rainier Ave & Acadia Dr	38.262005	-122.629869	**None**
Sonoma Mtn Pkwy & Rainier Ave	38.262943	-122.630046	**None**
Sonoma Mtn Pkwy (Petaluma SRJC)	38.267377	-122.637879	**None**
Sonoma Mtn Pkwy & Reisling	38.269031	-122.640987	**None**
Sonoma Mtn Pkwy & Ely Rd	38.268943	-122.643914	**None**
Sonoma Mtn Pkwy & Maria Dr	38.268242	-122.649077	**None**
N McDowell Blvd & Rainer Ave	38.256535	-122.638688	**None**
N McDowell Blvd & Dynamic St	38.258040	-122.641359	**None**
N McDowell Blvd & Sunrise Parkway	38.259642	-122.644167	**None**
N McDowell Blvd & Southpoint	38.261705	-122.647780	**None**
N McDowell Blvd & Southpoint	38.263234	-122.650539	**None**
N McDowell Blvd & Corona Rd	38.265425	-122.654429	**None**
N McDowell Blvd & Rand St	38.267776	-122.658547	**None**
N McDowell Blvd & Clegg St	38.269374	-122.660257	**None**
N McDowell Blvd & Scott St	38.272516	-122.663714	**None**
N McDowell Blvd & Old Redwood Hwy	38.273992	-122.666204	**None**
Old Redwood Hwy & McDowell Blvd	38.276301	-122.668933	**Low-Income Community/Househol**
Old Redwood Hwy & Ely Rd	38.284354	-122.667261	**Low-Income Community/Househol**
Old Redwood Hwy & Hatchery Rd	38.290003	-122.666313	**Low-Income Community/Househol**
Old Redwood Hwy & Petaluma Hill Rd	38.294591	-122.666843	**Low-Income Community/Househol**
Petaluma Hill Rd & Woodward Ave	38.297297	-122.666315	**Low-Income Community/Househol**
Petaluma Hill Rd & Adobe Rd	38.299560	-122.666344	**Low-Income Community/Househol**
Santa Rosa Ave & Horn Ave	38.376285	-122.713305	None
Petaluma Hill Rd & East Railroad Ave	38.309041	-122.666429	**Low-Income Community/Househol**
Petluma Hill Rd & East Railroad Ave	38.314599	-122.666574	**Low-Income Community/Househol**
Petaluma Hill Rd & Valley House Dr	38.320851	-122.666663	**None**
Petaluma Hill Rd & Robert's Rd	38.329409	-122.666629	**None**
Petaluma Hill Rd & Curtis Dr	38.333521	-122.666654	**None**
East Cotati Ave & Petaluma Hill Rd	38.336254	-122.668754	**None**
Sonoma State University	38.338075	-122.675004	**None**
Sonoma State University - NB	38.338075	-122.675004	**None**
East Cotati Ave & Sequoia Way	38.336244	-122.675472	**None**

East Cotati Ave & Snyder/Roman	38.336248	-122.682228	**None**
East Cotati Ave & Cristobal Way	38.335187	-122.686873	**None**
East Cotati Ave & Camino Colegio Ave	38.333921	-122.688709	**None**
East Cotati Ave & Sunflower Dr	38.332673	-122.690441	**None**
East Cotati Ave & Ryan Lane	38.331436	-122.692934	**Low-Income Community/Househol**
East Cotati Ave & Lancaster Dr	38.330401	-122.695484	**Low-Income Community/Househol**
Adrian Dr & Bonnie Ave	38.332254	-122.700541	**Low-Income Community/Househol**
Adrian & Southwest	38.335824	-122.705034	**Low-Income Community/Househol**
Commerce Blvd & Arlen Dr	38.340774	-122.712232	**Low-Income Community/Househol**
Commerce Blvd & Enterprise Dr	38.345110	-122.711550	**Low-Income Community/Househol**
Commerce Blvd & RP Expressway	38.347616	-122.709438	**Low-Income Community/Househol**
RP Expressway & Hwy 101	38.348587	-122.711855	**Low-Income Community/Househol**
Martin Ave & Dowdell Ave	38.351581	-122.718106	**Low-Income Community/Househol**
Labath & Martin	38.355430	-122.722267	**Low-Income Community/Househol**
Business Park Dr & Redwood Dr	38.357607	-122.714360	**Low-Income w/n 1/2 mile of a DAC**
Redwood Dr & RP Expressway (Budget Inn)	38.348991	-122.716730	**Low-Income w/n 1/2 mile of a DAC**
Redwood Dr / Golf Course Dr (Graton Resort)	38.362135	-122.714454	**Low-Income w/n 1/2 mile of a DAC**
Graton Resort (North Entrance)	38.361640	-122.722626	**Low-Income w/n 1/2 mile of a DAC**
Redwood Dr / Commerce Blvd (Taco Bell across fro	38.364988	-122.713648	**Disadvantaged Community**
Santa Rosa Ave & Mountain View Ave	38.381566	-122.713409	**Low-Income w/n 1/2 mile of a DAC**
Santa Rosa Ave/ Todd Rd	38.387510	-122.713414	**Low-Income w/n 1/2 mile of a DAC**
Santa Rosa Ave & Todd Rd	38.389586	-122.713391	**Low-Income w/n 1/2 mile of a DAC**
Santa Rosa Ave & East Robles Ave	38.393647	-122.713406	**Low-Income w/n 1/2 mile of a DAC**
Santa Rosa Ave & Butterfly Ln	38.396649	-122.713364	**Low-Income w/n 1/2 mile of a DAC**
Santa Rosa Ave & Castro Ct	38.399192	-122.713346	**Low-Income w/n 1/2 mile of a DAC**
Santa Rosa Ave & Bellevue Ave	38.403739	-122.713305	**Low-Income w/n 1/2 mile of a DAC**
Santa Rosa Ave & Court Rd	38.407537	-122.713294	**Low-Income w/n 1/2 mile of a DAC**
Santa Rosa Ave & Yolanda Ave	38.411806	-122.713347	**Low-Income w/n 1/2 mile of a DAC**
Santa Rosa Ave & Colgan Ave (Market Place)	38.419177	-122.713308	**Low-Income w/n 1/2 mile of a DAC**
Santa Rosa Ave & Colgan Ave	38.421723	-122.713345	**Low-Income w/n 1/2 mile of a DAC**
Santa Rosa Ave & Barham Ave	38.427548	-122.712824	**Low-Income Community/Househol**
Santa Rosa Ave & Maple Ave	38.431762	-122.711203	**Low-Income Community/Househol**
Santa Rosa Ave & Mill St	38.434039	-122.711683	**Low-Income Community/Househol**
Santa Rosa Transit Mall	38.438686	-122.713727	**Low-Income Community/Househol**
B St & Ross St	38.441337	-122.716799	**Low-Income Community/Househol**
Mendocino Ave & Cherry St	38.444530	-122.716873	**Low-Income Community/Househol**
Mendocino Ave & College Ave	38.446148	-122.717560	**Low-Income Community/Househol**
Mendocino Ave & Ridgeway	38.449979	-122.717410	**Low-Income Community/Househol**
Ac Santa Rosa Junior College	38.455033	-122.717217	**Low-Income Community/Househol**
Mendocino Ave & Dexter St	38.457209	-122.717126	**Low-Income Community/Househol**
Mendocino Ave & Silva Ave	38.458518	-122.717083	**Low-Income Community/Househol**
Mendocino Ave & Steele Ln	38.462123	-122.717528	**Low-Income Community/Househol**
Administration Dr & Paulin	38.464252	-122.722061	**Low-Income Community/Househol**
Administration Dr & Ventura	38.464161	-122.723999	**Low-Income Community/Househol**
County Admin Center (Ventura Ave)	38.466541	-122.724219	**Low-Income Community/Househol**
Kaiser Stop / Bicentennial Ave	38.470341	-122.725700	**Low-Income Community/Househol**
Range Ave & Russel Ave	38.468321	-122.732776	**Low-Income Community/Househol**
Range Ave & State Farm Dr	38.465583	-122.732748	**Low-Income Community/Househol**
Range Ave & @ Paulin Creek	38.462693	-122.732721	**Low-Income Community/Househol**
Range Ave & Steele Ln	38.460372	-122.732625	**Low-Income Community/Househol**
Coddingtown	38.457133	-122.732438	**Low-Income Community/Househol**
Old Redwood Hwy & Adobe Rd	38.29986755	-122.673994	**Low-Income Community/Househol**
Old Redwood Hwy & Adobe Rd	38.30331586	-122.681021	**Low-Income Community/Househol**

Old Redwood Hwy & Minnesota Ave	38.30719898	-122.687749	**Low-Income Community/Househol**
Old Redwood Hwy & Fern Ave	38.30971175	-122.690381	**Low-Income Community/Househol**
Old Redwood Hwy & East Railroad Ave	38.31470927	-122.694693	**Low-Income Community/Househol**
Old Redwood Hwy & Valparaiso	38.32238485	-122.70278	**Low-Income Community/Househol**
Old Redwood Hwy & Page Ave	38.32395801	-122.703961	**Low-Income Community/Househol**
Cotati Hub	38.3266211	-122.705471	**Low-Income Community/Househol**
East Cotati Ave & La Salle Ave	38.32862395	-122.699182	**None**

Step 3: Review the Estimated GHG Emission Reductions for the Proposed Project

Project Name:	Purchase One 35-Foot Battery-Electric Transit Bus

Co-benefits and Key Variables Summary	
LCTOP GGRF Funds	
Local Diesel PM Emission Reductions (lbs)	0
Local NO_x Emission Reductions (lbs)	770
Local $PM_{2.5}$ Emission Reductions (lbs)	24
Local ROG Emission Reductions (lbs)	1
Remote Diesel PM Emission Reductions (lbs)	0
Remote NO_x Emission Reductions (lbs)	0
Remote $PM_{2.5}$ Emission Reductions (lbs)	0
Remote ROG Emission Reductions (lbs)	0
Passenger VMT Reductions (miles)	0
Fossil Fuel Use Reductions (gallons)	83,910
Fossil Fuel Energy Use Reductions (kWh)	-473,199
Renewable Energy Generated (kWh)	0
Travel Cost Savings ($)	$0
Energy and Fuel Cost Savings ($)	$141,098
Additional California Climate Investments Program(s)	
Local Diesel PM Emission Reductions (lbs)	0
Local NO_x Emission Reductions (lbs)	0
Local $PM_{2.5}$ Emission Reductions (lbs)	0
Local ROG Emission Reductions (lbs)	0
Remote Diesel PM Emission Reductions (lbs)	0
Remote NO_x Emission Reductions (lbs)	0
Remote $PM_{2.5}$ Emission Reductions (lbs)	0
Remote ROG Emission Reductions (lbs)	0
Passenger VMT Reductions (miles)	0
Fossil Fuel Use Reductions (gallons)	0
Fossil Fuel Energy Use Reductions (kWh)	0
Renewable Energy Generated (kWh)	0
Travel Cost Savings ($)	$0
Energy and Fuel Cost Savings ($)	$0
Total California Climate Investments	
Local Diesel PM Emission Reductions (lbs)	0
Local NO_x Emission Reductions (lbs)	770
Local $PM_{2.5}$ Emission Reductions (lbs)	24
Local ROG Emission Reductions (lbs)	1
Remote Diesel PM Emission Reductions (lbs)	0
Remote NO_x Emission Reductions (lbs)	0
Remote $PM_{2.5}$ Emission Reductions (lbs)	0
Remote ROG Emission Reductions (lbs)	0
Passenger VMT Reductions (miles)	0
Fossil Fuel Use Reductions (gallons)	83,910
Fossil Fuel Energy Use Reductions (kWh)	-473,199
Renewable Energy Generated (kWh)	0
Travel Cost Savings ($)	$0
Energy and Fuel Cost Savings ($)	$141,098

California Air Resources Board

Job Co-benefit Modeling Tool

California Climate Investments

Project Name	Purchase One 35-Foot Battery-Electric Transit Bus

Total Full-time Equivalent Jobs Supported by Project Budget	5.0
Total Full-time Equivalent Jobs Supported by Project GGRF Funds	3.8
Full-time Equivalent Jobs Directly Supported by Project GGRF Funds	1.6
Full-time Equivalent Jobs Indirectly Supported by Project GGRF Funds	0.9
Full-time Equivalent Induced Jobs Supported by Project GGRF Funds	1.2

Note:

It is not appropriate to directly compare the job estimates from this Job Co-benefit Modeling Tool to the GGRF project dollars. California Climate Investments facilitate greenhouse gas emission reductions and deliver a suite of economic, environmental, and public health co-benefits, including job co-benefits. A different mix of spending on materials, equipment, and labor is expected across various California Climate Investments project types and match funding arrangements. As such, some project types will support more jobs than others.

Step 3: Review the Estimated GHG Emission Reductions for the Proposed Project

Project Name:	**Purchase One 35-Foot Battery-Electric Transit Bus**

Project Information		
FY 2021-2022 LCTOP GGRF Funds Requested ($)	$	723,617
Total LCTOP GGRF Funds ($)	$	723,617
Total GGRF Funds ($)	$	723,617
Non-GGRF Leveraged Funds ($)	$	243,040
Total Funds ($)	$	966,657

GHG Summary	
Total FY 2021-2022 LCTOP GHG Emission Reductions (MTCO$_2$e)	852
Total LCTOP GHG Emission Reductions (MTCO$_2$e)	852
Total GHG Emission Reductions (MTCO$_2$e)	852
Total GHG Emission Reductions per FY 2021-2022 LCTOP GGRF Funds (MTCO$_2$e/$million)	1,178
Total GHG Emission Reductions per Total GGRF Funds (MTCO$_2$e/$million)	1,178