## APPLICATION FOR CMAQ FUNDS

(Congestion Mitigation & Air Quality) FFY 2017 & 2018

MPO Project Information

Project Title:	Traffic Signal at Green Lane and River Road to support Santa Clara Community Transit Center (SCCTC)					
Project fille.						
Agency Applying:	LTD					
Fiscal Year(s):	FY2017-2018					
Staff Contact:	Kelly Hoell		Staff Phone	e: 541-682-6146		
Staff Email:	Kelly.hoell@ltd.org					
Eligibility Category: (see Interim Program Guidance)	Capital Investment	Operating Assistance	Emission Reduction	Planning & Project Development		

Project Description (include size, scope, location, and timetable):

Lane Transit District intends to move its current River Road station located at River Road and Beltline to a new longterm transit center and Park & Ride facility at the former Santa Clara Elementary School site in North Eugene. LTD purchased the 7.8 acre parcel in 2015 and its boundaries include River Road to the west, Hunsaker Lane to the north and Green Lane to the south. Working with LTD's operations staff it has been determined that the best place to locate the 2-3 acres needed for the transit center within the 7.8 acre parcel is on the southeast side of the property. This will ensure the lowest risk for interruption of transit scheduling by using Green Lane to access River Road. This option is only considered feasible with installation of a traffic control signal to provide safe entry to River Road for the left turning transit vehicles. This CMAQ application asks for funding to construct this traffic signal at River Road and Green Lane in order to support the development of the Santa Clara Community Transit Center.

River Road has been designated as a "Key Corridor" for focused long-term growth in the City of Eugene's draft "Envision Eugene" comprehensive plan. (Key Corridors are streets with transit service every 15 minutes or less). Consistent with the city's vision, the Santa Clara Community Transit Center will serve as a hub connecting 20,000 residents in the Santa Clara community to over 58,000 jobs within walking distance of LTD's EmX system including downtown Eugene and UO.

River Road is currently served by 15 – 30 minute transit service throughout the weekday. As heavy congestion at the River Road and Beltline interchange has grown, ingress and egress to LTD's current station and Park & Ride (built in 1982) has become progressively more difficult causing delays, and safety concerns – see attachment 1. There has also been significant growth in residential and commercial activity north of Beltline over the 35 years the current station has been operating, generating increased transit ridership in that area. In 2016, LTD was awarded a *Connect*Oregon VI grant for \$3 Million of a \$10 Million dollar total project to build the Santa Clara Community Transit Center.

The concept of installing a new traffic signal at Green Lane was reviewed and granted preliminary approval by City of Eugene Engineering and Operations staff in November 2016. A Traffic Impact Analysis for the new signal has been conducted and submitted to the City of Eugene as part of the Planned Unit Development land use planning process.

Per the agreement with *Connect*Oregon, the SCCTC is scheduled to be completed by October 2019. In order to facilitate that timeline, construction of the new traffic signal would need to be completed before the end of calendar year 2018.

#### Description of Need or Problem

The site of the current River Road Station and Park & Ride has many safety concerns (outlined in the safety section below) and delays which can lead to less reliable transit service. At the new site, significant congestion on Hunsaker Lane at River Road can lead to long queues which led LTD's Operations staff to select the southeast side of the purchased property as the site of the new transit center. This is dependent on having a traffic signal placed at Green Lane and River Road to allow for protected left turns to move southbound onto River Road from Green Lane.

	VES	NO				
reduction and is located in or benefits a nonattainment or maintenance area?	$\square$					
Federal Funds & NEPA. Does applicant understand that all CMAQ projects need to complete NEPA requirements and satisfy basic eligibility requirements under titles 23 and 49 U.S. Code?						
Clean Air Act. Does the project meet the conformity provisions of 42 U.S.C. 75061?	$\boxtimes$					
PM10. Does this project demonstrate benefits to PM10?	$\boxtimes$					
<b>RTP.</b> Is the project listed in, consistent with, or able to be added to financially constrained RTP, during project time frame? RTP project number or policy reference: <i>TSI Transit Policy #1: Transit Improvements; TSI Transit Policy #4: Park and Ride Facilities; TSI Roadway Policy #1: Mobility and Safety for all modes.</i>						
<b>Local Match.</b> Does project meet requirements for increased federal share ( <i>see page 6</i> )? If not, can agency provide required matching funds (10.27% of project total)?						
Sufficient Funding. Has sufficient funding been identified to complete project/phase						
<sup>1</sup> see <u>https://www.gpo.gov/fdsys/pkg/USCODE-2006-title42/html/USCODE-2006-title42-chap85</u> -subchap1-pa	rtD-subpart1-sec7506.	htm				
<sup>2</sup> see <u>http://www.fhwa.dot.gov/environment/air quality/cmaq/policy and guidance/2013 guidance/index.c</u>	cfm	-				
Air Quality Analysis						
Assessment of the project's expected emissions benefits (reductions) and	nd disbenefits	(increases)				
Quantitative Assessment:Quantify emissions benefits and disbenefits in units of kg/day for PM10 as a minimum, but may include other pollutants as well. This section is expected for almost all project types, an exception will be made when it is not possible to accurately quantify emissions benefits, in these cases qualitative assessments are acceptable.These calculations use the FHWA CMAQ Toolkit Traffic Flow Improvements Spreadsheet – Intersection tab.EXISTING CONDITIONSEvaluation year: 2020 (This is the year the entire Santa Clara Community Transit Center is expected to open). Area type: Urban; Business District: No; Total Peak Hours per day: 2 (based on the TIA, an AM peak and a PM peak hour were studied); Existing Intersection is: Un-signalizedNote: Roadway 1 = East/west; Roadway 2 = North/south Average annual daily traffic volume: Roadway 1: 506 Roadway 2: 29,494 (Source: Page 15 of TIA Table 2 shows ADT for River Road and Green Lane as 30,000 vehicles. The split between roadway 1 and roadway 2 was based on the percent of peak-hour volume (see below) that goes e/w vs. n/s. Peak-hour volume (both directions): Roadway 1: 36 Roadway 2: 2097 (Source: TIA Page 129 for RiverRoad/Green Lane 2020 No Build Volume in vehicles/hour were added up for all e/w and n/s lane configurations).Number of Lanes: Roadway 1: 2; Roadway 2: 2% (Source: TIA Page 138) Existing Delay per Vehicle: Roadway 1: 25 (LOS C); Roadway 2: 15 (LOS B) (Source: TIA Page 129 = LOS; then used the Level of Service Reference Table in the Traffic Flow Improvement Tool to get seconds of delay per vehicle for						
Existing left-turn phase: Roadway 1: No; Roadway 2: Yes (Source: TIA page 129) Existing Right-turn phase: Roadway 1: No; Roadway 2: No (Source: TIA page 129)						
<b>PROPOSED CONDITIONS</b> Cycle length: 95 seconds (Source: TIA page 138)						

Number of Left-turn lanes to add: Roadway 1: 0; Roadway 2: 0 (Source: TIA page 138)

Left-turn phase: Roadway 1: No; Roadway 2: Yes (Source: TIA page 138)

Right-turn phase: Roadway 1: Yes; Roadway 2: No (Source: TIA page 138)

Ratio of Green Time per Cycle Time: Roadway 1: 10.3 sec /95 sec = .108; Roadway 2: 71.9 sec /95 sec = 0.7568

(Source: TIA page 138 effective green)

EMISSIONS REDUCTION: 0.003 kg/day PM10

#### **Qualitative Assessment:**

Based on reasoned and logical determinations that the project will decrease emissions and contribute to maintenance of National Ambient Air Quality Standards (NAAQS). If Quantitative Assessment has been completed, this is optional. Without a signal at Green Lane / River Road, LTD buses would idle for a significant amount of time in order to turn left (southbound) onto River Road from Green Lane. By adding a signal, it will reduce this idle time without impacting north/south traffic significantly due to signal timing with nearby signal at River Road and Hunsaker to the north.

CMAQ funds are awarded through a competitive selection process. Proposed projects are first screened for program eligibility by MPO staff. Initial project rating is then completed by the Technical Advisory Sub-committee (TASC) through a consensus process based on how well the projects address the region's CMAQ priorities. TASC is a sub-committee of the Transportation Planning Committee (TPC), which ultimately provides funding recommendations to the Metropolitan Policy Committee (MPC) for approval upon public review. Approved projects are reviewed by ODOT and FHWA/FTA for ultimate eligibility determination.

#### **Cost-Effectiveness (program priority)**

Mark the box by the project type (or types) that best fits the project being proposed. If your project doesn't fit the types listed, mark "Other" and include an estimate of the project's cost-effectiveness for at least PM10.

	Cost-Effectiveness					
Project Type	PM10	PM2.5	voc	со	NOx	_
Diesel Retrofits						
Heavy Vehicle Engine Replacements (Diesel)						
Idle Reduction Strategies						High
Park and Ride						nigri
Transit Service Expansion						
Bicycle and Pedestrian						Madium
Incident Management						Medium
Extreme-Temperature Cold Start Technologies						
Transit Amenity Improvements						Low
Employee Transit Benefits						LOW
Carsharing						
Intermodal Freight						Not Applicable
Ridesharing						
Intersection Improvements						
Dust Mitigation						
Roundabouts						
Bikesharing						Source: FHWA
Subsidized Transit Fares						adapted by CLMPO
Electric Charging Stations						
Natural Gas Fueling Infrastructure						
Other (describe cost-effectiveness below)						
If "Other" describe the cost-effectiveness of this project for improving PM10 (at a minimum) in space below:						
N/A.						

Improves	Safety (regional priority & program priority) if applicabl
Goals:	Reduce the number and severity of accidents involving pedestrians, bicyclists, and/or vehicles. Address areas perceived to have safety issues to increase the use of multi-use paths.
Describe ho	w the project meets these goals:
The site of t averaged 25 operates 70 concerns at	the current River Road Station and Park & Ride at the Silver Ln/River Ave intersection with River Road 5.3 crashes/year between 2002 and 2011, giving it the highest crash rate for any Eugene intersection. LTD round trips through the intersection every weekday. Please see Attachment 1 below for a diagram of safet the existing site.
The new tra will help to ADA mobilit crosswalk. Clara Rural near the Gru	iffic signal at Green Lane and River Road will be coordinated with adjacent traffic signals on River Road and accommodate large bus vehicle maneuvers onto River Road. It will also allow all users (pedestrians, cyclists cy device users, etc.) at that intersection to have protected travel through a clearly identified, ADA complian Additionally, the new signal will provide improvements to emergency vehicle access at the existing Santa Fire District Station #1 emergency vehicle driveway approach which is located on the west side of River Road een Lane intersection.
ertain safet eet the elip omplete the	y elements of CMAQ-eligible projects may be eligible for a federal share of 100 percent if they als gibility requirements of the Highway Safety Improvement Program (HSIP). If applicable, pleas Increased Federal Share section below.
Increased applicable	Federal Share (see 23 U.S.C. 120(c) & FHWA Memo 141125 & HSIP Eligibility) if
Describe ho	w your project element(s) meets the requirements for increased federal share (if applicable)
N/A. This a various stat	pplication is not seeking the increased federal share of funding. LTD is able to provide 94% match from e, federal and local sources, much more than the required minimum 10.27% match for this project.
Preserve	s Existing Transportation Assets (regional priority) if applicabl
Goal:	Meet a minimum Pavement Condition Index on high volume Arterials, Collectors and Multi-Use Paths
Describe ho	w the project meets this goal:
The existing	Diver Deed Chatter and Dedu 9. Dide was built in 4000 . Dube wise all the functionality of the existing site

and moving it just half a mile north to an area that will be safer and yet still serve the residents of this community this project aims to preserve and enhance existing transportation assets. The new facility will provide even more enhancements than the existing facility by adding a driver relief building, secure bike parking and more capacity for articulated buses as ridership on the corridor grows. In addition, this project is coordinating with several other projects targeting the same location (River Road between Hunsaker and Green Lanes) led by Lane County, City of Eugene, and LTD. See the section about "Connectivity" below for a description of how these projects preserve existing transportation assets and go beyond existing conditions to improve connectivity.

#### Preserves or Enhances Transit Services (regional priority)

if applicable

Goal: Maintain or increase transit ridership.

Describe how the project meets this goal:

LTD currently serves the project area via routes 51 and 52 on its daily route schedule with buses available every 15 to 30 minutes throughout the typical weekday. The existing stops on River Road in the vicinity feature paved bus pull-out areas that accommodate the stopped buses outside of the traveled way to allow continuous flow of traffic while the bus is loading/unloading passengers. The proposed park and ride transit facility will enhance the transit offerings and is designed to provide daily commuters with an alternate mode of transportation through the congested River Road corridor around the Beltline Road interchange area. Ridership is strong along this corridor and at the existing transit center with more than 2500 average weekday boardings between routes 51 and 52 combined.

This ridership may be further increased with other complementary projects that LTD is currently pursuing. The MovingAhead project, a joint project between LTD and the City of Eugene, is currently studying alternatives to provide

enhanced transit service along the River Road corridor that could potentially increase ridership. Additionally, LTD was recently awarded an FTA grant with the City of Eugene to study transit oriented development along River Road to support enhanced transit ridership in the area.

#### **Reduces Greenhouse Gas Emissions (regional priority)**

Goal:Reduce greenhouse gas emissions by reducing congestion, increasing operational efficiency, supporting<br/>alternative modes, and managing transportation demand.

Describe how the project meets this goal:

While the addition of a traffic signal itself may not actually reduce greenhouse gas emissions, the project as a whole to build the Santa Clara Community Transit Center and the efforts to increase transit ridership along this corridor will reduce greenhouse gas emissions associated with personal vehicle traffic and congestion.

# Additional Project Benefits where applicable Congestion Reduction Describe the congestion reduction benefits anticipated as a result of this project.

This project seeks to reduce congestion at both the existing site at the Beltline and River Road intersection as well as at the Hunsaker / River Road intersections.

As the results of the Traffic Impact Analysis conducted in January 2017 by Branch Engineering explained, "The proposed development will provide safe and efficient vehicle access to the public transportation system and will not cause significant impacts to the performance or operation of traffic during the year 2018 year-of-opening or horizon year 2023 projected transportation system conditions." (Source: Traffic Impact Analysis page 1.)

Emissions Bonofita	Describe the emissions benefits anticipated as a result of this			
Emissions benefits	project. Be as specific as possible			

This project seeks to provide safer, more reliable transit service to the River Road corridor. By providing a viable alternative to a personal vehicle, local air quality will improve and greenhouse gas emissions will be reduced. Additionally, FTA, EPA and FHWA determined that this project was not required to perform a PM10 hot spot analysis for the following reasons:

1. This project is not a "new" station. It simply is moving the operations of the existing River Ave/River Road station near Beltline north by ½ mile to the planned site at River Road and Green Lane.

2. The total number of buses that will go through the new station in a day is 70: 33 (Route 51), 25 (Route 52), 12 (Route 55). This will be the same as under current operating conditions – the only change will be the location of the station from the River Road/River Ave station to the planned site at River Road / Green Lane.

3. The total number of buses that will arrive at the new station in a peak hour is only 5 – under the FTA threshold for hotspot analysis of 10. This also will remain the same from existing conditions. Therefore there is no increase in diesel bus arrivals to the station.

4. LTD has continually been investing in cleaner vehicles. Our plans have focused on phasing out traditional diesel buses in favor or diesel hybrid buses and all-electric vehicles. LTD has 5 all-electric BYD K9 buses currently on order and have won a Federal Low-No Emissions FTA grant to purchase an additional 5 all-electric buses in the next two years. If these buses are proven to be successful, LTD plans to continue investment in low/no tailpipe emissions vehicles. At our most conservative estimates, by the time the SCCTC is operational at the end of 2019, our long-range fleet plan says the composition of our entire fleet would look like this:

Fleet size: 124 vehicles

(40) 60' articulated vehicles

- 40 diesel hybrid
- 0 conventional diesel

(84) 40' vehicles

- 10 all-electric
- 68 diesel hybrid
- 6 conventional diesel

if applicable

For these reasons, it seems reasonable to assume that this project will improve both local air quality emissions and greenhouse gas emissions over time.

SOV Reliance	How will the completed project impact reliance on single occupancy vehicles?
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The park and ride transit facility is intended to reduce the reliance on single or low occupant motor vehicles by providing an alternate mode of transportation.

	How will completed project benefit more than one mode or
Multiple Modes	purpose (i.e., roadway & transit, bicycle & roadway users, or
-	roadway & identified freight route)?

Lane County, ODOT and City of Eugene are currently in planning processes that involve changes to the transportation system in the immediate area. ODOT is working on the Beltline facilities, while Lane County and City of Eugene have recently been in the process of updating the Lane County and City of Eugene Transportation System Plans. The Lane County and ODOT planning efforts have included planning level improvements to the Hunsaker-Beaver Corridor and potentially a new Beltline Road off-ramp that could by-pass parts of River Road. The improvements could include intersection improvements at the Irving Road/Hunsaker Lane and River Road intersection to include designated separate left-turn lanes with protected and permissive signal phasing on the eastbound and westbound approaches.

The Beaver-Hunsaker Corridor study also includes a discussion on new sidewalks and roadway widening for a bike lane and a center two-way left-turn lane at the site's Hunsaker Lane frontage. Right-of-way on the Hunsaker Lane frontage will be dedicated from this Santa Clara Community Transit Center project to implement the City of Eugene and Lane County's planned future intersection improvements. The planned sidewalks and bike lanes to be constructed on Hunsaker Lane would likely be extended to Beaver Street and provide connectivity to the Ruth Bascom Riverbank Path and other planned paths on the City's path/trail system.

Green Lane is currently a local street with no sidewalks or bike lanes and an open conveyance stormwater system. As part of the Private Investment for Public Improvement (PEPI) process for the SCCTC project, Green Lane is planned to be widened to the City of Eugene local commercial street standards and updated with urban improvements, including new sidewalks which will improve pedestrian access, curb and gutter and storm facilities at the site frontage.

	Will completed project fill in key gaps in the transportation
Connectivity	system, complete system components, or provide better
-	pedestrian, bicycle, or roadway connectivity at a regional scale?

As described under "Multiple Modes" above, the site of this project is important in multiple initiatives between the City of Eugene, Lane County, ODOT and LTD, and will result in improved connectivity for all modes.

ODOT is working on the Beltline facilities, while Lane County and City of Eugene have recently been in the process of updating the Lane County and City of Eugene Transportation System Plans. The Lane County and ODOT planning efforts have included planning level improvements to the Hunsaker-Beaver Corridor and potentially a new Beltline Road off-ramp that could by-pass parts of River Road. The improvements could include intersection improvements at the Irving Road/Hunsaker Lane and River Road intersection to include designated separate left-turn lanes with protected and permissive signal phasing on the eastbound and westbound approaches.

The Beaver-Hunsaker Corridor study also includes a discussion on new sidewalks and roadway widening for a bike lane and a center two-way left-turn lane at the site's Hunsaker Lane frontage. The new sidewalks and widening would require additional right of way to be acquired from the subject site. The planned sidewalks and bike lanes to be constructed on Hunsaker Lane would likely be extend to Beaver Street and provide connectivity to the Ruth Bascom Riverbank Path and other planned paths on the City's path/trail system.

The current development plans for the SCCTC site include a new public commercial local through street connection parallel to River Road north and south between Green Lane and Hunsaker Lane that will provide local access and a new right-in right-out driveway access on the site's River Road frontage, as well as frontage improvements that include a dedicated left-turn lane from Hunsaker Lane westbound onto River Road southbound that will improve intersection operations for year of opening and future year traffic conditions. Current plans also provide for bike and pedestrian connections with the neighborhoods to the east and River Road to the west.

System Preservation	Describe any system preservation benefits as a result of this project.				
This project allows LTD to preserve access to a transit center and park & ride facility for residents along River Road in a safer, less congested location.					
Access to Opportunity	Describe any access to opportunity benefits as a result of this project.				
River Road has been designated as a "Key Corridor" for focused long-term growth in the City of Eugene's "Envision Eugene". Consistent with the city's vision, the Santa Clara Community Transit Center will serve as a hub connecting 20,000 residents in the Santa Clara community to over 58,000 jobs within walking distance of LTD's EmX system including downtown Eugene and the UO.					
Freight	Will completed project improve the freight system and freight movement?				
This project is not expected to have any negative impact on freight.					
Public Health	Will the completed project provide public health benefits?				
There are several public health benefits associated with public transit. First the local air quality public health benefits of reducing community-wide vehicle miles travelled helps community members who suffer from respiratory problems such as asthma, etc. that are aggravated by pollution such as particulate matter and smog. Not only does transit help take vehicles off the road by providing a more fuel-efficient means of travel, but LTD's investment in cleaner alternative fuels and new equipment (hybrid and all-electric buses) helps local air quality as well. Second, there are public health benefits associated with the selection of an active transportation mode like transit.					
Other	What other benefits will the completed project provide that would be of interest to the selection committee				
N/A					

Cost Estimate and Funding Requested						
Phase	FFY	CMAQ	Local Funds	STP-U / TAP	Other	Total
		Funds		Funds		
(PL) Planning	FY16/17		\$330,000			\$330,000
(PE) Preliminary Engineering	FY17/18		\$250,000		\$1,000,000	\$1,250,000
(RW) Right-of-Way						
Acquisition						
(UR) Utility Relocation						
(CN) Construction	FY18/19	\$600,000			\$7,820,000	\$8,420,000
(OT) Other						

Cost Estimate/Funding Needs							
Total CMAQ Request	\$600,000						
Total Local Funds	\$4,600,000	Source:	\$3.2 million in-kind from sale of property and				
			General Fund				
Total STP-U/TAP Funds	\$n/a	Source:	STP-U TAP				
Total Other	\$4,800,000	Source:	\$2.4 million in Federal 5307 grant funds and \$3				
			million in ConnectOregon VI grant funds				
Estimated Project Total	\$10,000,000	Source:					
Note: Total non-federal funding must meet minimum match requirement of 10.27% of total project cost, unless the							
project includes elements that are eligible for increased federal share (see below).							

#### **Increased Federal Share:**

Certain safety elements of CMAQ-eligible projects described in 23 U.S.C. 120(c)(1) may be eligible for a federal share of 100 percent. Project elements not eligible for increased federal share will require match of 10.27% of the non-eligible total. For further details see the references below.

- 23 U.S.C. 120(c)(1): https://www.fhwa.dot.gov/map21/docs/title23usc.pdf
- FHWA Memorandum of November 25, 2014: https://www.fhwa.dot.gov/federalaid/141125.cfm

APPLICATION DUE DATE: June 15, 2017

PLEASE SUBMIT APPLICATION ELECTRONICALLY TO PAUL THOMPSON, LCOG pthompson@lcog.org

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### ATTACHMENT 1: Safety concerns at existing River Road Station

