

Metropolitan Transportation Commission Programming and Allocations Committee

November 4, 2020

Agenda Item 4f - 20-1451

Transportation Development Act (TDA) Triennial Audit report for FY2019-20

Subject: A presentation of the findings from TDA Triennial Performance Audits of AC Transit, BART, Central Contra Costa County Transit Authority, Marin Transit, Petaluma, Santa Rosa, and Sonoma County Transit. This performance audit covers pre-COVID-19 Fiscal Years 2017 through 2019.

Background: The Transportation Development Act (TDA) requires that MTC administer triennial performance audits of the region's transit operators. Operators are divided into three groups, with one group audited each year on a three-year cycle. The audits are conducted under contract by an independent auditing firm, currently Pierlott and Associates, LLC.

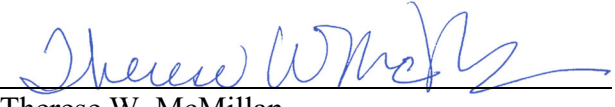
The attached presentation summarizes findings and recommendations for the recently completed audits, focusing on each operator's three-year trends between FY2016-17 and FY2018-19. Audited performance indicators include cost per hour, cost per passenger, and passengers per hour. Five of seven operators were successful in reducing or keeping their cost per hour growth to within inflationary adjustments. Service effectiveness (ridership) and cost efficiency trends (productivity) were mixed but generally declining, during the audit period as shown below:

Agency	Productivity	Ridership	Notes
AC Transit	↓	↔	Steady service levels and mostly unchanged ridership
BART	↔	↓	Steady service and decrease in ridership
County Connection	↓	↓	Steady service levels and decrease in ridership
Marin Transit	↔	↔	Steady service and ridership levels
Sonoma County Transit	↓	↓	Steady service levels and decrease in ridership
Santa Rosa	↓	↓	Steady service levels and decrease in ridership
Petaluma	↓	↓	Decrease in both service levels and ridership

Issues: The audit recommendations may no longer be relevant due to the COVID-19 pandemic and its impacts on transit operating performance. Audit recommendations are addressed as Productivity Improvement Program (PIP) projects. MTC staff will work with operators to ensure that PIP projects are relevant to current circumstances.

Recommendation: Information. No action required.

Attachments: Transportation Development Act (TDA) Triennial Audit Presentation



Therese W. McMillan



**METROPOLITAN
TRANSPORTATION
COMMISSION**

**FY2020 TDA
Operator Performance Audits
Programming & Allocations Committee
November 4, 2020**

Presentation Overview

COVID-19 Impact on Transit Operating Performance

- Pandemic has changed the transportation landscape
- Audit measures performance for years not impacted by pandemic
- Audit recommendations may or may not be relevant in current environment

TDA Performance Audits

- Triennial compliance audits are focused on multi-year trends and performance measures
- Current audit round: BART, AC Transit, County Connection, Marin Transit, Sonoma County Transit (SCT), Santa Rosa CityBus, and Petaluma Transit

TDA Performance Metrics

- Cost Per Vehicle Service Hour
- Cost Per Passenger
- Passengers Per Vehicle Service Hour
- Passengers Per Vehicle Service Mile
- Vehicle Service Hours Per Employee



FY2020 TDA Performance Audits – Audit Plan

Audit Period

- FYs 2016-17, 2017-18 and 2018-19

Audit Activities

- Review data collection, management and reporting methods.
- TDA performance indicator trend analysis.
- Compliance with statutory and regulatory requirements.
- Review actions to implement prior audit recommendations.
- Functional area performance review.
- Conclusions, commentary and recommendations.

Operator Profiles – All Modes



Statistics

- Annual Operating Expense: \$686 M
- Annual Passenger Trips: 128.4 M
- Vehicle Service Hours : 2.4 M
- Cost/Hour : \$286

Highlights

- Completion of Warm Springs/South Fremont Station (2017);
- Opened eBART service extension (2018);
- Establishment of BART Inspector General position

Planned Activities

- Station Modernization Program;
- Warm Springs/Silicon Valley line extension;
- Continuation of Hayward Maintenance Complex expansion project
- Ongoing new rail car procurements



Statistics

- Annual Operating Expense: \$437 M
- Annual Passenger Trips: 53.5 M
- Vehicle Service Hours : 2.3 M
- Cost/Hour : \$188

Highlights

- Completion of new Transbay Terminal;
- Implemented new CAD/AVL system on all buses;
- Adopted Safety Management System and Transit Asset Management Policy

Planned Activities

- Final phase of BRT line on International Boulevard;
- Transbay Fare increase implemented in January 2020;
- Development of Zero Emission Bus fleet

TD1
CH2

Slide 4

TR1

Was this implemented? If so, state that. Did you mean 2021? If 2021, is this still true or should we remove it?

Theresa Romell, 10/18/2020

CH2

A \$.50 fare increase was implemented in January of 2020.

Christina Hohorst, 10/19/2020



Annual Operating Expense: \$37.9 M
Annual Passenger Trips: 3,404,865
Vehicle Service Hours: 308,206
Cost Per Hour: \$123

Highlights:

- Initiated “Early Bird Express” service to BART stations within service area, to assist with Transbay Tube seismic retrofit construction project;
- Completed major service restructuring in 2019;
- Increased fares on March 10, 2019; first increase since 2009;
- Working on new Short Range Transit Plan.



Annual Operating Expense: \$26.8 M
Annual Passenger Trips: 3,087,067
Vehicle Service Hours: 235,123
Cost Per Hour: \$114

Highlights:

- Implemented service improvements in 2016 on select corridors, to 15-minute daily service levels from 15/30-minute peak and 30/60-minute off-peak service frequencies, focusing on reducing travel times;
- Initiated Marin Transit Connect in 2018, a demand response service designed to increase first/last mile commuter connections to major employers in northern San Rafael.



Annual Operating Expense: \$13.6 M
Annual Passenger Trips: 1,851,967
Vehicle Service Hours: 101,527
Cost Per Hour: \$135

Highlights:

- Began feeder service to Sonoma Marin Area Rail Transit (SMART) stations;
- Initiated fare free local service in Cloverdale, Healdsburg, Sebastopol, Windsor, Sonoma/Sonoma Valley and Lower Russian River communities;
- Procured first electric bus.



Annual Operating Expense: \$16.5 M
Annual Passenger Trips: 965,635
Vehicle Service Hours: 133,298
Cost Per Hour: \$124

Highlights:

- Implemented redesigned transit system in 2017, including some 15-minute service frequencies;
- Consolidated all Transit Division offices within Transit Operations Building;
- Made bus service, stop and amenity improvements around new SMART commuter rail stations in Santa Rosa.



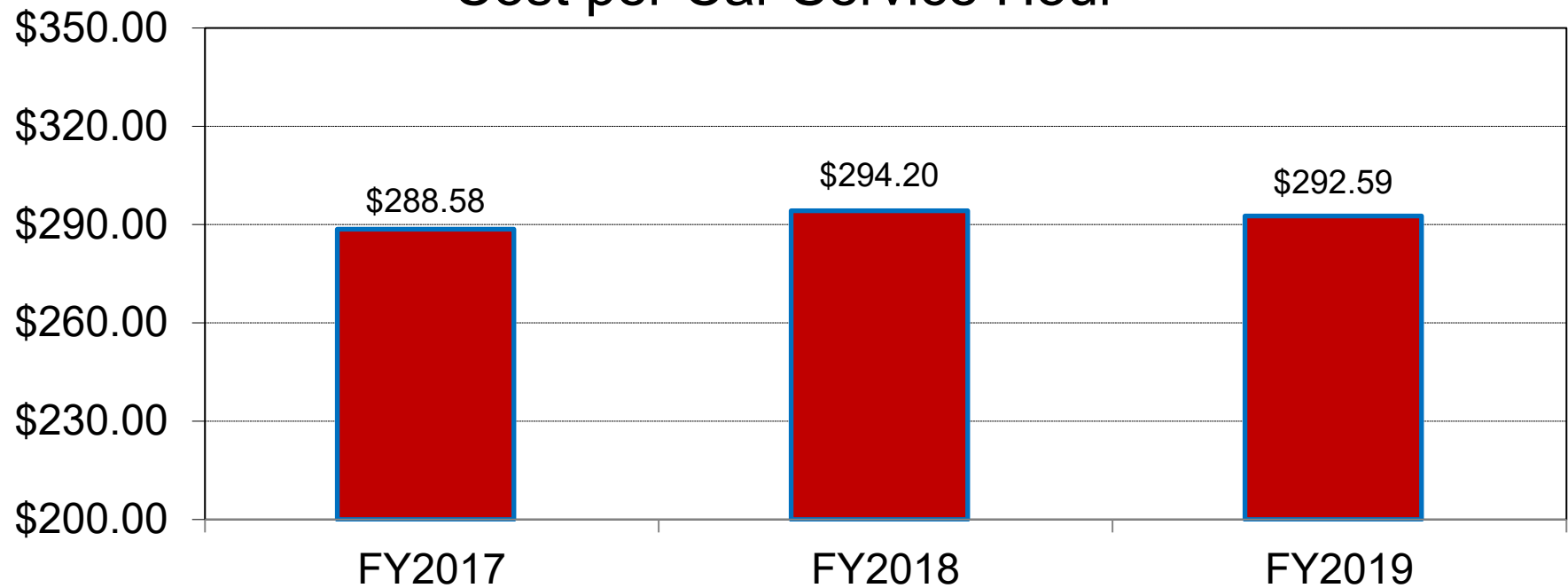
Annual Operating Expense: \$2.9 M
Annual Passenger Trips: 349,280
Vehicle Service Hours: 27,862
Cost Per Hour: \$102

Highlights:

- Took delivery of two new fixed-route and two new paratransit vehicles;
- Adjusted schedules to service new SMART commuter rail service in downtown Petaluma;
- Continuing vehicle replacement program and updating SRTP in FY2020-21.

BART - Heavy Rail Transit

Cost per Car Service Hour



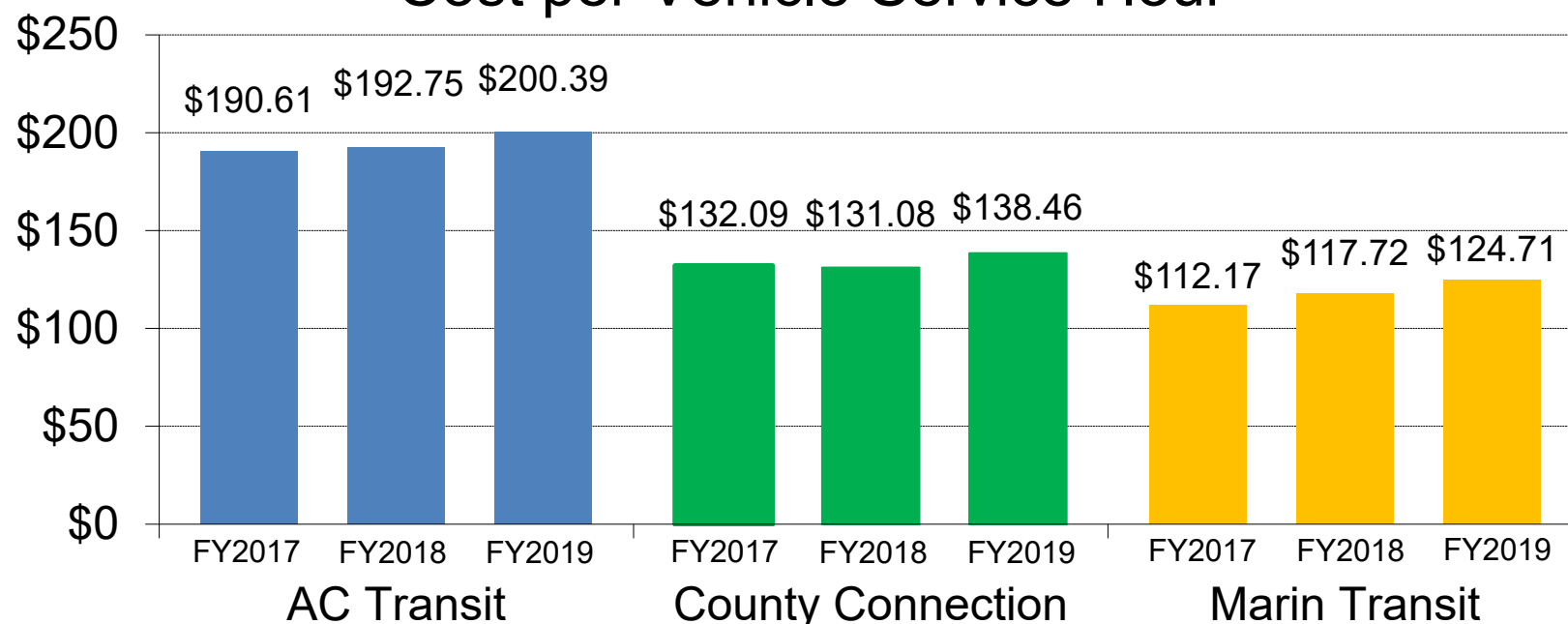
FY2017-FY2019 Average Annual Change (CPI = 3.5%)

BART 0.7%

- BART operating costs rose 2.6 percent per year on average while car service hours rose 1.9 percent per year, resulting in cost per hour only increasing by 0.7 percent

Fixed-Route Bus – Larger Operators

Cost per Vehicle Service Hour



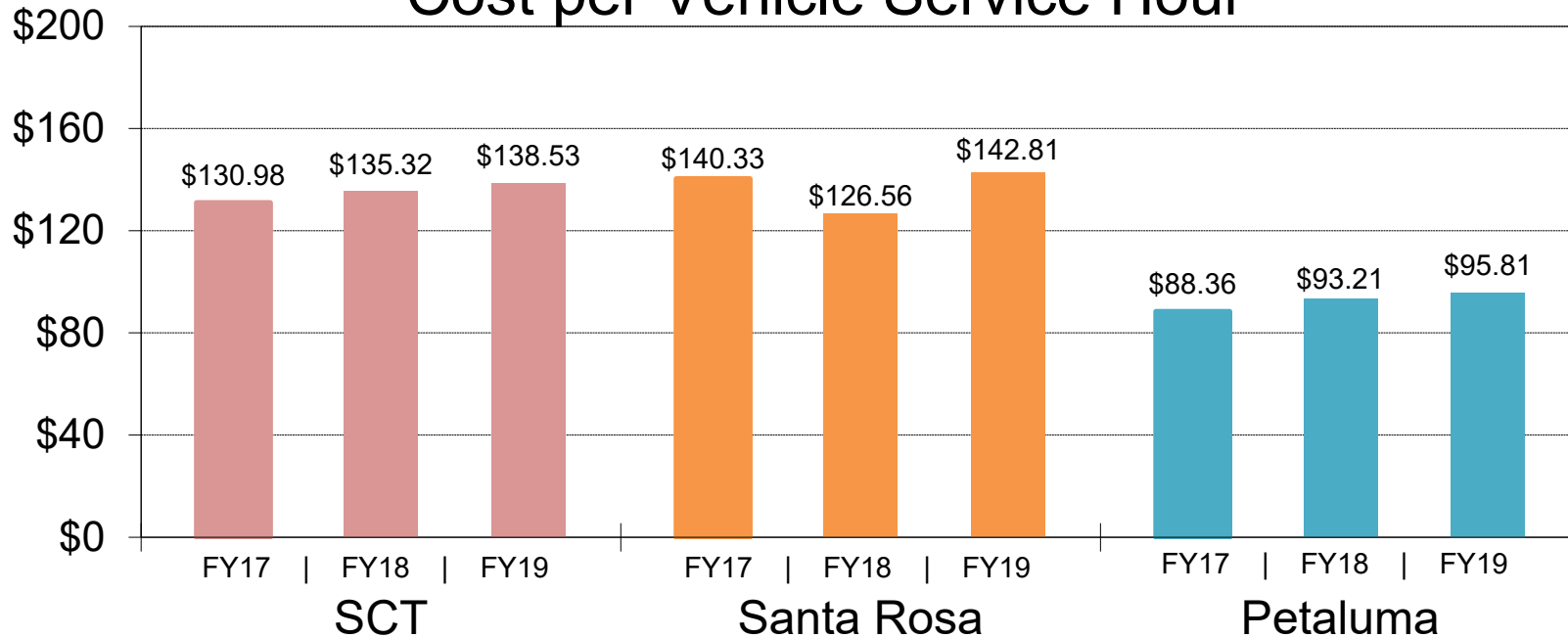
FY2016-FY2018 Average Annual Change (CPI = 3.5%)

AC Transit 2.5%	County Connection 2.4%	Marin Transit 5.4%
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- AC Transit's operating costs increased an average of 5.5 percent per year, while service hours increased by 2.9 percent per year.
- County Connection's operating costs increased an average of 4.3 percent per year, while service hours increased 1.9 percent per year.
- Marin Transit's six percent average annual increase in operating costs, and almost unchanged service hours resulted in a 5.4 percent annual increase cost per service hour.

Fixed-Route Bus – Smaller Operators

Cost per Vehicle Service Hour



FY2016-FY2018 Average Annual Change (CPI = 3.5%)

■ SCT 2.8%	■ Santa Rosa 0.9%	■ Petaluma 4.1 %
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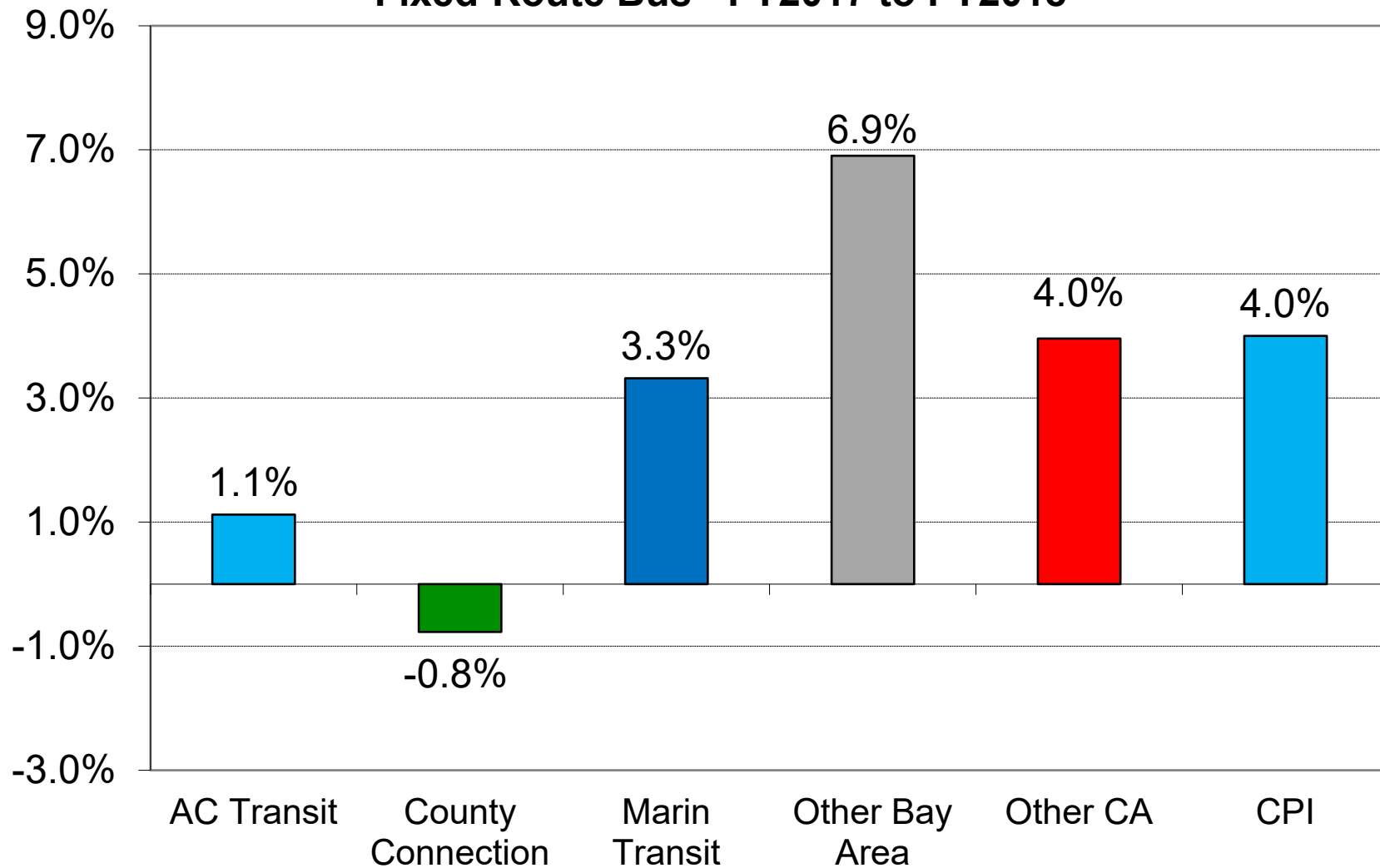
- Sonoma's costs increased modestly, while service hours decreased overall during the audit period..
- Santa Rosa's operating costs and service hours both fluctuated over the period, resulting in a modest average annual increase in cost per hour.
- Petaluma's operating cost increase outpaced the increase in service hours by an average of about three percent per year, resulting in a 4.1 percent annual increase in cost per service hour.

Passengers per Vehicle/Service Hour Trends

FY2017 through FY2019

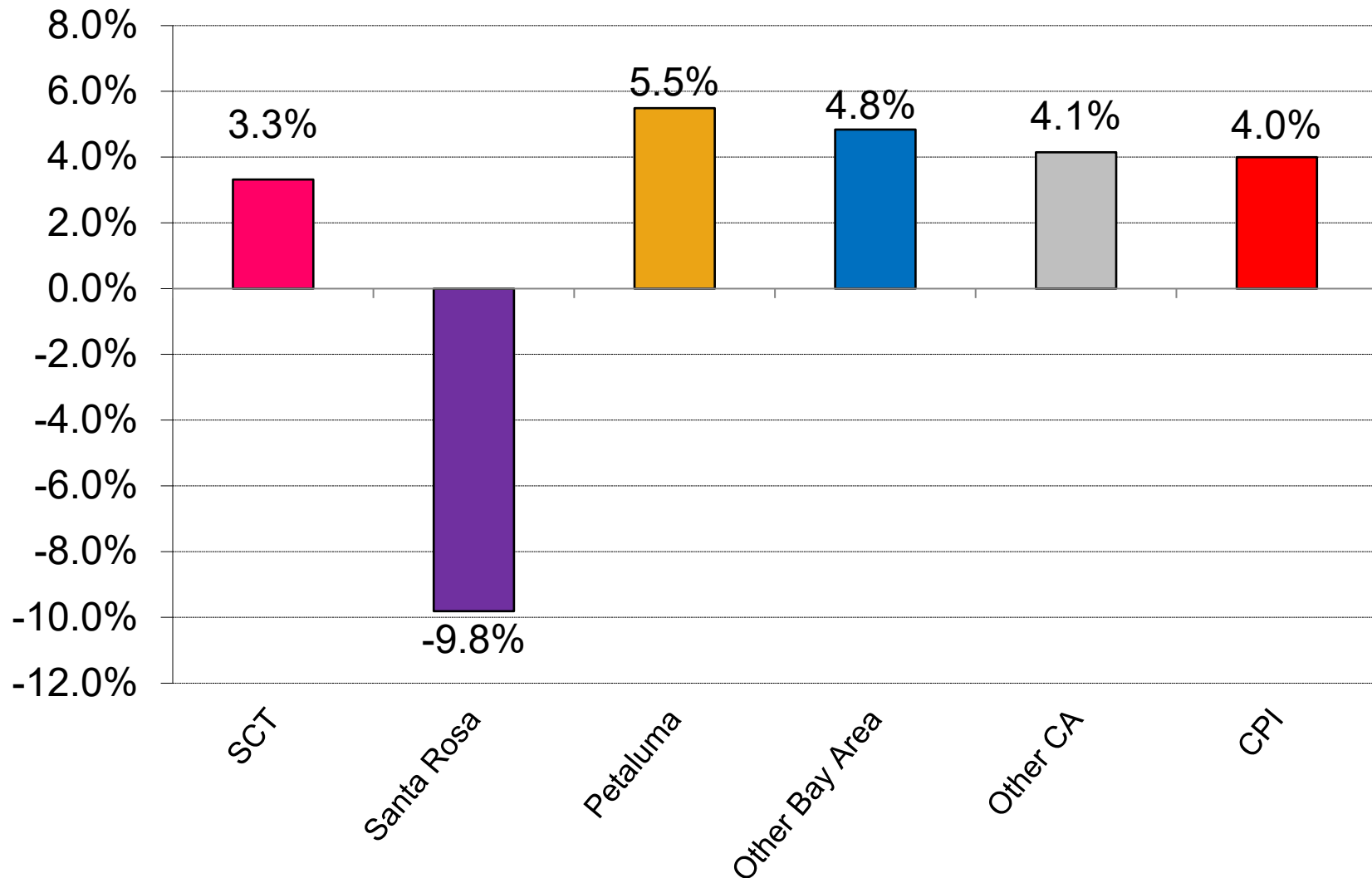
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**Comparison of Average Annual Change in
Cost per Vehicle Service Hour for Larger Operators
Fixed-Route Bus - FY2017 to FY2018**



“Other Bay Area”: SFMTA, SamTrans, GGBHTD, and VTA

Comparison of Average Annual Change in Cost per Vehicle Service Hour for Smaller Operators Fixed-Route Bus - FY2017 to FY2018



“Other Bay Area”: WestCAT, Tri Delta, FAST, LAVTA, NVTa, Vacaville, Dixon, Union City, SolTrans, and Rio Vista.

Audit Recommendations

Basis for recommendations may include one or more of the following:

- Results of the TDA performance indicator trend analysis.
- Results of the review of compliance with statutory and regulatory requirements.
- Progress towards implementing prior audit recommendations.
- Results of the functional performance review.

The following summarizes the recommendations by operator.

Audit Recommendations, *continued*

- BART
 - continue efforts to improve customer satisfaction and reduce complaints related to the heavy rail service.
- AC Transit
 - examine the increase in operator unscheduled absences for the fixed-route bus service;
 - address the increasing number of complaints for the fixed-route bus service; and
 - examine the causes of, and develop strategies to reduce the number of missed trips for the fixed-route bus service.
- BART/AC Transit (East Bay Paratransit Consortium)
 - examine causes of and develop strategies to address the increasing missed trips rates on EBPC's service.

Audit Recommendations, *continued*

- County Connection

- continue to implement steps to maintain improved schedule adherence performance for the paratransit service;
- address the increasing preventable accident rate on CCCTA's bus and paratransit services; and
- develop and implement strategies to reduce trip cancellations on the paratransit service.

- Marin Transit

- take steps to address preventable accidents on MCTD's bus service; and
- monitor and report schedule adherence consistently and on a regular basis across the bus system.

Audit Recommendations, *continued*

- Sonoma County Transit
 - examine maintenance activities to address the increasing mechanical failure rates on the bus and paratransit services.
- Santa Rosa CityBus
 - continue efforts to reduce trip cancellations and no shows/late trip cancellations on the paratransit service;
 - continue to address the recently increasing mechanical failure rates on the paratransit service; and
 - continue taking steps to reduce preventable accidents on the paratransit service.
- Petaluma Transit
 - take steps to address recently increasing mechanical failure rates on the bus and paratransit services; and
 - take further steps to reduce preventable accidents across the system.

Audit Recommendations, *continued*

- The recommendations for this audit period may or may not be relevant because of the effects of COVID-19 on Bay Area transportation beginning in March of 2020.
- TDA performance audit recommendations are generally addressed through the Productivity Improvement Program; MTC staff will work with operators to ensure that projects are relevant to current circumstances.