SAN JOAQUIN JOINT POWERS AUTHORITY

DRAFT 2020 BUSINESS PLAN UPDATE

PUBLIC REVIEW DRAFT

PREPARED FOR CALIFORNIA STATE TRANSPORTATION AGENCY
UPDATED FOR FISCAL YEARS 2020/21 & 21/22

EXECUTIVE SUMMARY

The purpose of this 2020 San Joaquin Joint Powers Authority (SJJPA) Business Plan Update ("Business Plan") is to identify SJJPA's intentions for State Fiscal Year (FY) 2020/21 and FY 2021/22 in its proposed management of the San Joaquins Intercity Passenger Rail Service (San Joaquins) and to request the annual funds required by SJJPA to operate, administer, and market the San Joaquins. This Business Plan also describes planned service and capital improvements to ensure the continued success and future growth of the San Joaquins. This Business Plan will be submitted to the Secretary of the California State Transportation Agency (CalSTA) in draft form on April 1st, 2020 and will be submitted in final form by June 30th, 2020.

Administrative Role

The primary role of SJJPA is the day-to-day management of the San Joaquins. In 2019, SJJPA selected the San Joaquin Regional Rail Commission (SJRRC) as its Managing Agency for an additional five-year term. SJRRC's consolidated agency approach results in the most efficient and cost-effective management of the San Joaquin Valley's two passenger rail services. SJJPA will provide the level of service consistent with funding appropriated by the State and any cost savings identified by SJJPA or revenues in excess of the Business Plan projections, which may be used by SJJPA for service improvements in the San Joaquins Corridor.

Operating Plan, New Schedules, 8th and 9th Daily Round-Trips, and Short-Term Service Improvements

The San Joaquins have great potential for increased ridership, revenue, service coordination, and performance. SJJPA is currently implementing a number of strategies to improve the San Joaquins. Some of the strategies require little or no additional resources, including improved schedules and reduced trip lengths, reduced travel times, improved train monitoring, train and connecting bus schedule adjustments, and improved service coordination. SJJPA is also in the process of pursuing a significant expansion of service for the San Joaquins within the next five years, including implementation of the 8th and 9th Daily Round-Trips. Planned expansion of the San Joaquins Service is fully coordinated and consistent with the 2018 California State Rail Plan and the CHSRA's Draft 2020 Business Plan.

New Schedules: SJJPA introduced a new schedule in Spring 2019 which returned the San Joaquins to full-corridor service for 7 daily round trips and initiated a "slotted" schedule and distributed pad-time for improved on-time performance. Building upon the Spring 2019 schedule, SJJPA is planning for further changes in 2020. The Spring 2020 schedule will include reduced operating times and more detailed coordination with Capitol Corridor and Pacific Surfliner services.

8th and 9th Daily Round-Trips: A significant increase in ridership is anticipated if the frequency of service to Sacramento can be increased and offered at the right times of the day. SJJPA is currently working to implement the improvements needed to enable the 8th and 9th Daily Round-Trips, which will allow a doubling of trains serving Sacramento from two to four. As part of this effort, SJJPA explored using the Sacramento Subdivision between Sacramento and Stockton for expanded passenger rail service in coordination with CalSTA, CHSRA, Caltrans, Central Valley Rail Working Group, and Sacramento Regional Rail Working Group. This resulted in SJJPA's Board formally adopting the Sacramento Subdivision as the preferred corridor for future passenger rail expansion in 2017. To implement the 8th and 9th Daily Round-Trips and necessary improvements along the Sacramento Subdivision, SJPPA submitted a Transit and Intercity Rail Capital Program (TIRCP) grant application in January 2018. On April 26, 2018 CalSTA awarded $500.5 million to SJJPA/SJRRC for the "Valley Rail" project which is funding these improvements.

The schedule to be developed for 8th and 9th Daily Round-Trips will based on a pulsed-service approach, which provides more efficient operations, better use of infrastructure, and improved on-time performance.

Additional key short-term programs for the San Joaquins include:
Thruway Bus Partnerships: SJJPA is exploring ways to maximize the utilization of the San Joaquins' Thruway Bus network and other connecting bus services. SJJPA successfully worked with Senator Allen, RailPAC, Central Valley Rail

Working Group, and San Joaquin Valley Regional Planning Agencies' Directors' Committee on getting legislation (SB 742) passed and signed by the Governor that enables bus-only tickets to be sold on state-supported Thruway Bus services. SJJPA is working in coordination with private intercity bus providers and public local and regional bus providers to implement the provisions of SB 742. Through coordination with the State and regional transportation agencies, SJJPA is currently pursuing partnerships with several regions to optimize bus connections for San Joaquins passengers that would allow non-Amtrak passengers to utilize excess seating capacity in key corridors, or utilize the services of an existing outside bus provider. SJJPA and the Shasta Regional Transportation Agency are in the process of creating a partnership that would allow SJJPA to shorten Thruway Bus Route 3 by terminating in Chico rather than in Redding, while San Joaquins passengers traveling to Red Bluff or Redding would be able to take SRTA's new North State Express Bus service. SJJPA would support the operations of the new service with cost savings realized from the reduction in the length of Thruway Bus Route 3. SJJPA is also coordinating with Butte County Association of Governments (BCAG) about the possibility of BCAG incorporating a portion of Thruway Bus Route 3 (between Chico and Stockton) into their proposed intercity bus service between Chico and Sacramento in exchange for SJJPA operating support.

Renewable Diesel Implementation: SJJPA is committed to helping meet California's Greenhouse Gas (GHG) emission reduction goals. Utilizing renewable diesel in locomotives and in the Thruway Bus fleet will help to advance this objective. Testing of renewable diesel in Northern California Fleet locomotives is underway for the older F59 locomotives and for the new Charger Locomotives and scheduled for completion in early summer of 2020. If results are positive, all locomotives are expected to utilize renewable diesel as early as the fall of 2020. SJJPA is also planning to require the use of renewable diesel for all future Amtrak Thruway Bus contracts to further reduce the San Joaquins system's carbon footprint.

Relocate Madera Station: SJJPA is working with Madera County, Madera County Transportation Commission, and CalSTA to relocate the Madera Amtrak Station to a more accessible location. Additionally the station would be co-located with a California High-Speed Rail station to allow for direct transfers between the two systems.

Reduce Running Times between Northern California and Bakersfield: As part of the Spring 2020 San Joaquins schedule, SJJPA is exploring ways to reduce travel times for trains running between Northern California and Bakersfield to under six hours. This will result in significant operational cost savings, as a crew change can be eliminated for each train. As part of this program, SJJPA is considering a variety of strategies, including implementing measures to reduce dwell times and schedule recovery time, utilizing increased acceleration/deceleration of new Charger Locomotives, terminating some trains in Emeryville, implementing limited stop service, and increasing operating speeds (up to 90 mph).

Merced to San Jose Thruway Bus Route Pilot Program: SJJPA received funding from the state for a pilot program to operate a new Thruway bus service between Merced and San Jose (with stops at Los Banos and Gilroy). The Merced to San Jose Thruway Bus Pilot Program will begin service in Spring 2020 with two daily round-trips.

Integration with High-Speed Rail: Like other high-speed rail (HSR) services throughout the world, California will need to have extensive networks of conventional intercity and commuter rail networks that complement and provide "feeder" service to the proposed HSR system for it to be successful. SJJPA believes the San Joaquins provide important connectivity that is critical to the phased implementation of HSR in California. A Joint Policy Statement, which was adopted by CHSRA, SJJPA, and Caltrans on July 26, 2013, is intended to ensure cooperation and input of local communities on all decisions related to any changes in the San Joaquins service and consistent planning between these agencies. SJJPA has been coordinating and partnering with CHSRA on the development of their Draft 2020 Business Plan which proposes a Merced-Bakersfield HSR Interim Operating Segment in advance of completing their Valley –Valley Initial Operating Segment between San Francisco and Bakersfield. Integration with the San Joaquins rail and Thruway Bus services maximizes the ridership and benefits of the Merced-Bakersfield HSR Interim Operating Segment. SJJPA's plan is to connect to the HSR interim operating segment at a multi-modal station at downtown Merced (R Street). Once the HSR interim operating segment is operating, the San Joaquins rail service would terminate at Merced and would provide rail connectivity for the HSR interim operating segment to Sacramento and the Bay Area until HSR is extended. Future San Joaquins service improvements would focus on increasing service from Merced to the North.

Merced Intermodal Track Connector (MITC) Project: SJJPA is requesting funding in FY 2020/21 and FY 2021/22 for the detailed design and environmental clearance of the MITC Project. The MITC project will enable the San Joaquins to connect with interim HSR operations at Merced by creating a direct link between the BNSF alignment and the Merced

HSR Station. This project is critical for integrating the San Joaquins with the Merced-Bakersfield HSR Interim Operating Segment.

Stockton Diamond Grade Separation Project: This project is the grade separation of the intersection of the BNSF Stockton Subdivision and the Union Pacific (UP) Fresno Subdivision in south Stockton. This is the most heavily congested freight bottleneck in California. In addition to substantial freight and environmental benefits, this project will enable future expansion of ACE and San Joaquins services. In partnership with the SJRRC, SJJPA is pursuing state and federal funding in 2020 to implement this critical project, Valley Rail funding will be used as matching funding. The environmental and detailed design are being funded through ITIP funds to be appropriated in 2020.

South of Merced Planning Studies: As part of the "Network Integration" planning studies funded by the 2018 TIRCP award, SJJPA will investigate and identify connectivity needed from Corcoran, Wasco, and Downtown Hanford to the Merced-Bakersfield HSR Interim Operating Segment. SJJPA will also study the potential use of the BNSF slots between Merced and Bakersfield for regional service that is complementary to HSR, and study how San Joaquins Thruway bus service improvements can support the future implementation of the Cross-Valley Corridor.

Performance Standards and Action Plan

CalSTA created a set of uniform performance standards in 2014 for all state-supported intercity passenger rail corridors in an effort to control costs and improve efficiency. The three primary uniform performance standard measures used are: usage, cost efficiency, and service quality. SJJPA has adopted the CalSTA performance standards, and will continue to develop strategies to maintain the successful performance of the San Joaquins. In addition to meeting CalSTA's performance standards, SJJPA is also focused on the environmental benefit of the San Joaquins and its role in helping to create a more sustainable

California by working to reducing air pollution and greenhouse gas emissions and help to encourage sustainable, transit-oriented development.

SJJPA's FY 2020/21 and FY 2021/22 "Action Plan" includes:

Negotiate additional revisions to the Amtrak operating agreement to improve performance reporting and decrease operating costs. Reinvest savings to improve service.

Continue to work jointly with the CHSRA, Caltrans, and CalSTA to develop viable strategies and solutions to support phased implementation of high-speed rail and to meet the needs of the San Joaquins and the stakeholder communities of the San Joaquins Corridor. This includes continuing Network Integration planning and coordination to support the success of the Merced-Bakersfield HSR Interim Operating Segment.

Apply for state (TCEP and Congested Corridors) and federal (INFRA, and BUILD) funding to implement the Stockton Diamond Grade Separation Project, and complete the environmental and design work for this key project.

Work with the state to identify funding and then lead the environmental and detailed design work for the MITC Project.

Complete "South of Merced" Network Integration studies.

Coordinate with SJRRC's Ceres to Merced environmental review process regarding the planning and environmental clearance of a future layover and maintenance facility in Merced for ACE and San Joaquins services.

Implement improvements needed to accommodate the planned 8th and 9th Daily Round-Trips trains in conjunction with UPRR, BNSF, Amtrak, and the State.

Deploy San Jose to Merced Thruway Bus Pilot Program.

Work with UPRR, BNSF, Amtrak, and the State to improve ridership and revenue by improving reliability, adjusting the service plan, and/or implementing projects that add capacity and reduce travel times.

Contribute to the ongoing fleet analysis being conducted by Caltrans.

Explore new partnerships with public or private bus operators and implement SB 742 provisions with the goals of allowing non-Amtrak passengers to utilize excess seating capacity on buses that connect with San Joaquins trains to save on operations costs.

Capital Improvement Programs

Based upon the planned service expansions and enhancements, SJJPA has developed a "10-Year Capital Improvement Program", estimated at $1.5 billion. The program includes SJJPA's overall vision for the implementation of the 8th and 9th Daily Round-Trips, and ultimately hourly service between Sacramento and Fresno within the next 10-15 years, while optimizing service to the Bay Area and Southern San Joaquin Valley.

SJJPA is currently implementing its Short-Term Capital Improvement Program, which has a five-year horizon. This program focuses on the 8th and 9th Daily Round-Trips, several other station projects, and corridor and other projects to improve the San Joaquins Service. In January 2018, SJJPA submitted a Transit and Intercity Capital Program (TIRCP) grant application (jointly with the San Joaquin Regional Rail Commission) to fund a program of capital improvements associated with the implementation of the 8th and 9th Daily Round-Trips. On April 26, 2018 CalSTA announced that the SJJPA/SJRRC "Valley Rail" Application was awarded $500.5 million to expand San Joaquins and ACE services. As part of this service, the Sacramento Subdivision will be upgraded between Sacramento and Stockton to allow for passenger rail service with up to six new stations along the corridor. Additionally, a new layover facility will be constructed in Natomas (in Sacramento) and the Stockton Regional Maintenance Facility will be expanded to accommodate San Joaquins trainsets. Two additional trainsets may be procured for the expanded service. Other projects include additional parking, a new station in Oakley, and a relocated Madera Station (see Table ES-1). In 2020, in partnership with SJRRC, SJJPA will focus on actively pursuing additional state and federal funding to complete the Stockton Diamond Grade Separation Project.

SJJPA also has a Longer-Term Capital Improvement Program, which envisions improvements to achieve hourly service between Sacramento and Merced, the Merced Intermodal Track Connector (MITC) Project, as well as to consider extensions of service north of Sacramento and to the Oakland Coliseum/Airport. Hourly service will require additional capacity enhancement projects such as improvements at the Robert J. Cabral Station in downtown Stockton, the grade separation of the Stockton Diamond, a new maintenance facility, additional track work and/or capital access fees, and additional rolling stock. Potential future extensions of the San Joaquins being investigated include, rail service north of Sacramento along the UPRR rail line from Sacramento to Redding with potential stations initially in Yuba City/Marysville and Oroville, and trains five miles past the Amtrak Oakland Station to serve the Amtrak Coliseum/Airport Station. Longer-term utilization of the Altamont Corridor to bring the San Joaquins to additional Bay Area markets is also being explored.

Table 1

San Joaquins Corridor - Short-Term Capital Projects ($ Millions)					
Improvement Program/Project (0-5 years)	**Project Cost**	**Funding Secured**	**Funding Sources**	**Lead Agency**	**Status**
Short-Term Service Improvements					
Temporary Layover Facility - Fresno	$1.7	$1.7	Cal OES	SJJPA	Completed
Modesto Station Parking Lot	$0.4	$0.4	LTF	City of Modesto	Construction
Turlock-Denair Station Parking Lot	$0.29	$0.29	Minor Cap/Cal OES	Stanislaus Co.	Completed
Stockton (Cabral) Station Parking Lot	$1.3	$1.3	CMAQ	SJJPA/SJRRC	Construction
Station Enhancements - Antioch	$0.3	$0.3	Cal OES	SJJPA/City	Completed
Station Enhacements - Security Cameras	$1.5	$1.5	Minor Cap/Cal OES	SJJPA	Construction
Station Enhacements - Other*	$2.3	$2.3	Minor Cap/Cal OES	SJJPA	Construction
8th and 9th Daily Round-Trips					
Track Improvements - UPRR Sac. Sub	$149.1	$149.1	TIRCP	SJJPA/UPRR	Planning/Env.
Track Improvements - BNSF Stock. Sub	$20.0	$20.0	TIRCP	SJJPA/BNSF	Design
New Stations (Lodi, Elk Grove, 4 in Sac.)	$111.5	$111.5	TIRCP	SJJPA	Planning/Env.
Track Extension (RMF to Cabral Station)	$23.7	$23.7	Prop 1A/CMAQ/Other	SJRRC/UPRR	Planning/Env.
New Rolling Stock	$87.6	$68.0	TIRCP	SJJPA	Planning/Env.
Merced-LeGrand Double Tracking (Seg. 2)	$23.2	$23.2	ITIP	Caltrans/BNSF	Construction
Stockton-Escalon Double Tracking (Seg. 3)	$20.5	$20.5	ITIP	Caltrans/BNSF	Construction
Stockton-Escalon Double Tracking (Seg. 4)	$23.0	$23.0	ITIP	Caltrans/BNSF	Construction
Layover Facility - Natomas	$17.7	$17.7	TIRCP	SJJPA	Planning/Env.
Merced Station Double Platform/Trackwork	$10.3	$10.3	ITIP	Caltrans/BNSF	Design/Const.
Modesto and Turlock-Denair Double Platforms	$20.0	$20.0	ITIP	Caltrans/BNSF	Planning
Capital Access Fees	TBD		TIRCP/SRA	SJJPA	Planning
Other Station Projects					
Wasco Station Reconstruction	TBD		CHSRA Funds	CHSRA	Design
Madera Station Relocation/Expansion	$26.7	$26.7	TIRCP	SJJPA	Planning/Env.
New Oakley Station	$8.6	$8.6	TIRCP	SJJPA	Design/Const.
Allensworth Accesssibility Improvements	$0.3	$0.3	Cost Savings	SJJPA	Planning
Turlock-Denair Station Bus Loop	TBD		TBD	SJJPA/Stan Co.	Planning
New Parking Lots	TBD		Cost Savings/SRA	SJJPA	Planning
Station Enhancements - Other**	$0.1	$0.1	Minor Cap/Cal OES	SJJPA	Planning
Corridor and Other Projects					
Stockton Wye	$8.7	$8.7	SRA	UPRR	Design/Const.
Platform Accessibility for High-Floor Cars	$5.0	$5.0	ITIP	Caltrans/SJJPA	Design
Increasing Operating Speeds (e.g. 90 mph)	TBD		TBD	SJJPA/BNSF	Planning
Cal PIDS Replacement/Upgrade	$0.9	$0.9	Cost Savings/SRA	SJJPA/CCJPA	Planning
Stockton Diamond Grade Separation	$237.0	$24.7	ITIP/SB 132	SJRRC/SJJPA/UP/BNSF	Planning
Stockton Rail Maintenance Facility Expansion	$15.0	$15.0	ITIP	SJRRC/SJJPA	Design
Safety Improvements***	TBD		TBD	SJJPA/CCJPA	Planning

Source: Caltrans Division of Rail and Mass Transporation and SJJPA, 2020.

Notes

*Consists of a variety of station improvements that include lighting, signage, landscaping, repairs, and other projects

** Consists of non-Short-Term Service station improvements that include lighting, signage, landscaping, repairs, and other projects

*** Safety improvements could include upgrades to lighting, security cameras, fencing, and at-grade crossings, as well as grade separation projects

Fare Policy

SJJPA will work to develop fares that ensure the service is attractive and competitive with other modes of transportation along the corridor. The San Joaquins have a single, "one-bucket" fare grid with a peak fare plan for high traffic periods. The fare grid utilizes a distance based methodology with a descending per mile rate as the length of the trip increases.

Due to reduced available seating capacity from multiple equipment overhaul and retrofit programs, SJJPA is reinstating reserved ticketing to reduce the likelihood of standees onboard the trains and Thruway busses. Reinstating reserved ticketing alerts ticket purchasers of "at-capacity" trains and Thruway Busses to help encourage them to purchase tickets for a less impacted train or another date.

SJJPA, CCJPA, and LOSSAN JPA partnered together to create the "California Everyday Discount" program. As a part of this program, the California JPAs retained the senior, disabled, veteran, and student discounts. By partnering together, the JPAs are ensuring that riders within California interact with a united marketing message from all three corridors.

Service Amenities and Food Service

The San Joaquins service boasts many great amenities that are integral to the attraction of riders and are a key component of the marketable features of the service. These features add value to the customer experience and SJJPA is working with Caltrans, Amtrak and the other JPAs to improve current amenities and add additional services. Current service amenities include: free Wi-Fi, bicycle storage, comfortable seating, and a generous baggage policy.

SJJPA is evaluating the existing food and beverage service to provide high quality options in the most efficient and cost-effective manner. SJJPA is considering food service changes to underperforming trainsets, including the removal of the café car or utilization of lower cost cart service. SJJPA is actively increasing the sale of and promotional opportunities for products grown or produced in the San Joaquins Corridor. While evaluating changes to the current partnership with Amtrak to increase the cost recovery of the café, SJJPA is evaluating the use of a third-party vendor to provide this service. Third-party vendors are utilized on other Amtrak operated corridors with significant success in cost recovery efforts with the added benefits of simplified operations and reporting of performance.

Marketing Strategies

For FY 2020/21 and FY 2021/22, SJJPA assumes $1,500,000 each fiscal year for marketing to increase awareness and use of the service along the corridor. This represents a $500,000 increase from previous years. Recent data provided by Amtrak shows that approximately 13.6% of San Joaquins passengers are from the Bay Area and 9.4% of are from the Los Angeles Region. This amounts to over 20% of San Joaquins passengers are from high cost regions for marketing and advertising. Additionally, the San Joaquins spans the largest geographic area of the three Intercity Passenger Rail Services. With vital thruway bus services originating in communities as far north as McKinleyville and Redding to as far south as San Diego, the San Joaquins serves a large geographic area with diverse set of Designated Marketing Areas (DMA). The increase in budget will allow SJJPA to more equitably and realistically market to the San Joaquins Corridor, including in the larger markets like the Bay Area and Los Angeles and the smaller more disadvantaged markets in the Thruway Corridors. The SJJPA Marketing and Outreach Plan employs advertising, social media, and grassroots strategies to market and conduct outreach for the San Joaquins. SJJPA is expanding its use of advertising and social media in response to the success of these strategies in driving more traffic to amtraksanjoaquins.com and online channels, which comprise the majority of ticket purchases.

SJJPA is also carrying out specific strategies for reaching out to minority, non-English-speaking constituencies, and disadvantaged communities along the San Joaquins Corridor. With Hispanics comprising over 38% of California's population and representing a similar segment of San Joaquins' ridership, a concerted effort has been made to tailor promotional materials in Spanish and utilize informational outlets that are more effective. The grassroots strategy has helped SJJPA identify and address other markets throughout the San Joaquins Corridor that are underserved, or lacking information.

Annual Funding Requirement

A primary purpose of this Business Plan is to request the annual funds required by SJJPA to operate, administer, and market the San Joaquins for agreed-upon service levels. Table ES-2 summarizes the funding request by the SJJPA.

SJJPA State Funding Request for the San Joaquins			
Expense Category	**FY 2019/20 (Approved/Current)**	**FY 2020/21 (Requested)**	**FY 2021/22 (Projected)**
Operating			
-Amtrak Contract	$56,676,590	$58,805,207	$60,569,363
-Other Operations1	$3,616,000	$1,400,000	$1,450,000
Administrative	$3,140,802	$3,247,589	$3,328,779
Marketing	$1,000,000	$1,500,000	$1,500,000
Minor Capital	$500,000	$500,000	$500,000
Connected Corridor Schedule Advertising	$500,000		
Total Request	**$65,433,392**	**$65,452,796**	**$67,348,142**
1 Expenses under the "Other Operations" category (i.e. outside of the Amtrak contract)			

Safety and Security

The primary objectives of SJJPA's Safety and Security Program include the continuation of a broad-based program of educational activities and to aggressively pursue capital improvements that help eliminate unsafe conditions. Educational efforts are two-fold: to increase public awareness of rail safety and security along the San Joaquins Corridor; and to ensure all personnel involved in operating the San Joaquins has the proper training to be effective in implementing SJJPA's Safety and Security Program. SJJPA will leverage a network of rail safety education resources through California Operation Lifesaver, free DHS security training resources, and safety and security grant programs to coordinate, develop new programs, and build upon and enhance programs currently undertaken by Amtrak. SJJPA will also continue collaborative efforts with various stakeholders, including the State, SJJPA member agencies, Amtrak, UPRR, BNSF, California Operation Lifesaver, Transportation Security Administration (TSA), California Governor's Office of Emergency Services (Cal OES), and local law enforcement and first responders along the San Joaquins Corridor to address safety and security issues impacting the service.

In an effort to identify needed physical improvements, SJJPA will continue to conduct a systematic evaluation of the conditions along the railroad right-of-way and in and around San Joaquins stations (including parking lots and platforms), as well as onboard trains. California's Office of Emergency Services has provide much of the funding for SJJPA's program of Safety and Security capital improvements. Important capital projects that SJJPA is currently implementing or pursuing include:

Fencing projects at locations identified based on incident hot spots and high numbers of near misses;

Increased lighting at stations and parking lots, as well as installing blue light phone towers (originally developed for use on college campuses); and

Improved safety and security-related signage, including messaging around suicide prevention and railroad safety.

Station Area Development

Increased development near San Joaquins stations promotes increased use of the San Joaquins, generating additional ridership and revenue to benefit the State. The responsibility and powers needed to focus growth and produce station area development reside primarily with local government. To help ensure that the San Joaquins become an instrument for encouraging implementation of station area development principles, SJJPA will:

1. Encourage local governments to prepare/update and adopt station area plans, amend city and county general plans, and promote transit-oriented development (TOD) in the vicinity of San Joaquins stations.
2. Assist local governments in securing grants/funding for planning and implementing TOD around San Joaquins stations.
3. Require new San Joaquins stations be developed as multi-modal transportation hubs.

4. Encourage the location of new San Joaquins stations in traditional city centers and/or areas with high-potential for TOD around the station area.
5. Work with communities and organizations to support TOD and with developers to implement TOD.
6. Encourage planning consistent with SB 375 (Sustainable Communities Strategy), transit priority areas, infill development and TOD.
7. Prepare station areas for potential changes in first- and last-mile access including the growth of micro-mobility, and shared, connected, electric, and automated vehicles.

1. INTRODUCTION

The purpose of this 2020 San Joaquin Joint Powers Authority Business Plan Update ("Business Plan") is to identify the San Joaquin Joint Powers Authority's (SJJPA) intentions for State Fiscal Year (FY) 2020/21 and FY 2021/21 in its proposed management of the San Joaquins Intercity Passenger Rail Service (San Joaquins), and to request the annual funds required by SJJPA to operate, administer, and market the San Joaquins. The State of California requires that an Annual Business Plan Update be submitted to the Secretary of the California State Transportation Agency (CalSTA) in draft form by April 1 of each year, and final form by June 30 of each year to allow Amtrak time to finalize operating cost estimates. This Business Plan will be reviewed and approved by the State and used to develop an annual appropriation request to the State Legislature.

Business Plan Requirements

This Business Plan Update includes State-required information, including the following:

- Service performance;
- Operating and action plan strategies;
- Short-term and long-term capital improvements;
- Funding requirements for the upcoming fiscal year;
- External factors affecting the service;
- Plans for service expansion and enhancement efforts;
- Marketing and outreach efforts;
- Establishment of fares; and
- Delineation of how proposals to expand or modify service, including funding and accounting, are separate from locally-sponsored services in the corridor.

This Business Plan must also be consistent with the 2018 California State Rail Plan and the California High-Speed Rail Authority (CHSRA) 2020 Draft Business Plan.

Regional Governance of the San Joaquins

In 2012, transportation planning agencies throughout the San Joaquin Valley worked together in order to set up a regional Joint Powers Authority and to support legislation that would enable regional governance of the San Joaquins. To protect the existing service and to promote its improvement, local and regional agencies throughout most of the San Joaquins Corridor sponsored and supported Assembly Bill 1779 (AB 1779). This bill enabled regional government agencies to form the San Joaquin Joint Powers Authority to take over the administration and management of the San Joaquins from the State. AB 1779 was passed by the Legislature on August 30, 2012 with bi-partisan support, and was signed by Governor Brown on September 29, 2012. The first SJJPA Board Meeting was held on March 22, 2013 in Merced.

The SJJPA Governing Board includes elected representatives of ten Member Agencies, which include Alameda County, Contra Costa Transportation Authority, Fresno Council of Governments, Kings County Association of Governments, Madera County Transportation Commission, Merced County Association of Governments, Sacramento Regional Transit, San Joaquin Regional Rail Commission, Stanislaus Council of Governments, and Tulare County Association of Governments.

AB 1779 defines the composition of SJJPA, as well as requiring that the interagency transfer must result in administrative or operating cost reductions. AB 1779 also requires SJJPA to protect the existing service and facilities and seek to expand service as warranted by ridership and available revenue.

Roles and Responsibilities

On July 1, 2015, SJJPA became the primary managing entity of the San Joaquins. The SJJPA is responsible for the following:

- Oversight and management of the day-to-day San Joaquins operations, which includes entering into an operating agreement with the current contract operator, the National Railroad Passenger Corporation (Amtrak);
- Negotiating changes to the current contract or selecting another qualified operator;
- Advising the Capitol Corridor Joint Powers Authority (CCJPA) on the management and administration of the State-owned and other rolling stock (passenger cars and locomotives) assigned to the San Joaquins;
- Overseeing the dedicated feeder bus system for the San Joaquins, which is subcontracted to private bus operators through the Amtrak contract;
- Planning for future service improvements;
- Coordinating with CCJPA and Los Angeles-San Diego-San Luis Obispo (LOSSAN) JPA and the State on issues such as scheduling, connecting buses, and ticketing; and
- Marketing for the San Joaquins.

The State and Amtrak share operating responsibility for the San Joaquins with SJJPA. Under the provisions of AB 1779, the State continues to provide the funding necessary for service operations, administration, and marketing. Furthermore, Caltrans Division of Rail and Mass Transportation remains responsible for the development of the California State Rail Plan; coordination and integration between the three state-supported intercity passenger rail services; the preparation of grant applications to the federal government; and the development of state budget requests. The State also remains the owner of the trainsets used for the San Joaquins and Capitol Corridor Services and continues to be responsible for the procurement of new equipment for the state-supported intercity passenger rail services. Amtrak continues to serve as the operator of the San Joaquins.

The San Joaquin Regional Rail Commission (SJRRC), the managing body for the Altamont Corridor Express (ACE) Service between Stockton and San Jose, was selected by the SJJPA Board to be the Managing Agency at the July 26, 2013 SJJPA Board Meeting in Fresno for an initial 3-year term (September 27, 2013 – September 27, 2016) and was later extended for an additional 3-year term (September 27, 2016 – September 27, 2019). At the November 22, 2019 SJJPA Board Meeting, the SJJPA Board approved SJRRC as the Managing Agency for an additional 5-year term (September 27, 2019 – September 27, 2024).

Advocacy

In addition to more cost-effective administration and operations, there are many benefits to regional governance of the San Joaquins. Train riders and San Joaquin Valley residents now have a stronger voice in deciding what happens with the service, as local decision-making is more responsive and adaptive to passenger issues. SJJPA, which is made up of elected officials throughout the San Joaquins Corridor, is a strong voice in advocating for service improvements and expansions – particularly in Washington D.C. and in Sacramento. SJJPA is taking advantage of joint marketing and partnerships with local agencies throughout the San Joaquin Valley. Since SJJPA's Board Members are part of the communities in the San Joaquins Corridor, they are able to facilitate the engagement of local communities throughout the corridor to use and support the San Joaquins.

Public Outreach for this Business Plan

Public outreach of the Draft 2020 SJJPA Business Plan included briefings for key stakeholder groups, electronic outreach to the SJJPA stakeholder list, and posting a public review draft on sjjpa.com. This process is meant to engage with the public and stakeholders to provide information about this document and the opportunity for public comment.

Briefings were held during the development and comment period of the Business Plan. These briefings provided an opportunity to engage key stakeholder groups within the corridor. Briefings were also held with the SJJPA Board, Central Valley Rail Working Group, CalSTA, Caltrans, Freight Railroads, San Joaquin Valley Rail Committee, and Amtrak. SJJPA sought input from these and other agencies and organizations that have an interest in intercity passenger rail.

As a part of its Stakeholder Engagement Strategy, SJJPA has developed an extensive stakeholder email list which it employs to notice about board meetings, service updates, and to engage stakeholders to participate in the Business Plan process. SJJPA sent electronic communications to its stakeholder list requesting public comment and provided links to the document. This process ensures those invested in intercity passenger rail are engaging with SJJPA in the San Joaquin Valley, Sacramento, and the Bay Area, and have an opportunity to provide comment to the Business Plan. Finally, SJJPA posted the Public Review Draft Business Plan to its website (sjjpa.com) on March 6, 2020 for public review of the document, and was circulated to SJJPA's stakeholder list.

2020 SJJPA Business Plan Update Approval Process

This Business Plan is similar to the 2019 SJJPA Business Plan. The changes include providing current numbers for the San Joaquins operating expenses and bringing the plan up-to-date. The SJJPA Board discussed the general outline and highlighted changes planned for the 2020 Business Plan at its November 22, 2019 and January 24, 2020 Board Meetings. Following the incorporation of comments from the public review period, an updated Draft Business Plan will be presented to the SJJPA Board at the March 27, 2020 Board Meeting for approval. Following approval, the Draft Business Plan will be submitted to CalSTA by April 1, 2020. A final version of the Business Plan, which includes revised operating cost estimates from Amtrak, will be presented at the May 29, 2020 SJJPA Board Meeting. The Business Plan will be submitted to CalSTA by June 30, 2020.

2. HISTORICAL PERFORMANCE OF THE SERVICE AND ROUTE CHARACTERISTICS

Beginning with the introduction of the Amtrak national network in the early 1970s, passenger train service has been expanding in California. The State initiated, co-funded, and operated intercity rail service under the authority of Section 403(b) of the Federal Rail Passenger Services Act. Amtrak operates all three state-supported intercity rail services.

San Joaquins Intercity Rail Service ("San Joaquins")

The San Joaquins extends 364 miles and provides direct rail service to 11 counties: Sacramento, Contra Costa, Alameda, San Joaquin, Stanislaus, Merced, Madera, Fresno, Kings, Tulare, and Kern (see Figure 2.1). Between Oakland and Bakersfield, the San Joaquins route is 315 miles long and has 13 intermediate stops. The San Joaquins route is 49 miles between Sacramento and Stockton with one additional intermediate stop. The San Joaquins has seven daily round-trip trains (five between Oakland and Bakersfield and two between Sacramento and Bakersfield). The current minimum scheduled San Joaquins running time between

Table 2.1

Oakland and Bakersfield is 6 hours and 1 minute. Between Sacramento and Bakersfield the San Joaquins has a minimum 5 hours and 10 minute running time. Maximum speed for the San Joaquins is 79 mph.

In 1979-80, the San Joaquins only had two daily round-trips between Oakland and Bakersfield and annual ridership was a little over 123,000. Ridership steadily increased over the years, reaching a peak in FY 2013/14 when it recorded over 1.2 million passengers. In recent years, ridership has slightly decreased or held flat. Potential reasons for this include consistently low gas prices over the last few years, competition from new private intercity bus carriers, and periods of declining on-time performance (OTP). SJJPA is addressing these concerns though service changes and other planning efforts described in this Business Plan. Currently, the San Joaquins Service is the sixth most used intercity service within the Amtrak system. Table 2.1 presents historical annual operating performance of the San Joaquins between FY 1973/74 and FY 2018/19.

San Joaquins Routes Annual Operating Performance - State Fiscal Years									
State Fiscal Year	Ridership Data		Financial Data for Operations						
	Ridership	PM/TM	Revenue	Expense	Loss	State	Amtrak	Train Loss per PM	Farebox Ratio
						Calculated Service Costs			
Notes		*(F1)*		*(F2)*		*(F3)*	*(F4)*	*(F5)*	*(F6)*
1973-74 (S1)	38,770	83.6							
1974-75	66,990	44.2							
1975-76	66,530	43.8							
1976-77	87,642	56.0							
1977-78	80,611	52.7							
1978-79	87,645	60.2							
1979-80 (S2)	123,275	63.6	$1,174,065	$3,975,185	$2,801,120	$518,206		18.4¢	29.5%
1980-81	159,498	55.3	$2,224,137	$6,940,934	$4,716,797	$1,360,391		18.4¢	32.0%
1981-82	189,479	65.3	$3,115,710	$7,774,029	$4,658,319	$2,228,585		14.0¢	40.1%
1982-83	186,121	62.9	$3,342,137	$7,991,697	$4,649,560	$2,490,275		14.6¢	41.8%
1983-84	248,275	85.3	$4,730,431	$8,094,789	$3,364,358	$2,518,066		7.3¢	58.4%
1984-85	269,837	94.6	$5,210,951	$8,641,293	$3,430,342	$2,802,955		7.7¢	60.3%
1985-86	280,798	101.1	$5,425,329	$8,610,554	$3,185,225	$2,658,895		6.8¢	63.0%
1986-87	304,668	106.1	$6,084,677	$9,179,133	$3,094,456	$2,929,148		5.1¢	66.3%
1987-88	340,573	121.1	$7,457,686	$9,633,659	$2,175,973	$2,605,572		2.2¢	77.4%
1988-89	370,190	133.7	$9,527,268	$10,968,216	$1,440,948	$1,887,450		1.3¢	86.9%
1989-90 (S3)	418,768	116.9	$11,845,743	$15,286,520	$3,440,777	$3,544,332		3.2¢	77.5%
1990-91	463,906	104.1	$12,691,986	$18,456,785	$5,764,799	$5,803,565		4.9¢	68.8%
1991-92	483,593	104.3	$12,369,805	$18,633,777	$6,263,972	$6,472,598		4.3¢	66.4%
1992-93 (S4)	516,113	109.6	$12,628,496	$22,227,149	$9,598,653	$10,789,651		6.5¢	56.8%
1993-94	558,569	94.6	$13,894,624	$26,678,861	$12,784,237	$12,335,021	$3,937,150	8.3¢	52.1%
1994-95	524,680	88.8	$12,244,668	$25,077,153	$12,832,485	$12,668,018	$3,705,069	9.7¢	48.8%
1995-96	526,088	86.6	$12,477,497	$25,386,099	$12,908,602	$14,483,048	$1,360,327	11.8¢	49.2%
1996-97	652,544	106.1	$13,817,681	$34,528,165	$20,710,484	$16,265,387	$5,672,236	18.6¢	40.0%
1997-98	702,178	118.0	$15,230,966	$36,517,290	$21,286,324	$17,190,515	$4,493,597	17.7¢	41.7%
1998-99 (S5)	680,687	102.8	$16,496,457	$37,269,835	$20,773,378	$19,938,254	$1,712,168	17.6¢	44.3%
1999-00	671,295	92.7	$18,061,512	$41,791,782	$23,730,270	$24,232,326	$652,236	19.0¢	43.2%
2000-01	710,833	97.9	$19,667,681	$43,404,325	$23,736,644	$24,350,127	$540,809	18.2¢	45.3%
2001-02 (S6)	733,152	96.9	$20,114,693	$46,503,548	$26,388,855	$26,281,035	$396,392	20.0¢	43.3%
2002-03	769,708	89.9	$20,318,564	$50,552,529	$30,233,965	$29,729,650	$504,315	21.7¢	40.2%
2003-04	752,227	87.2	$22,100,796	$50,061,460	$27,960,664	$27,960,664	$89,345	20.5¢	44.1%
2004-05	743,245	85.1	$22,590,880	$49,883,689	$27,292,809	$27,292,809	-	19.6¢	45.3%
2005-06	801,242	91.1	$25,869,979	$55,226,742	$29,356,763	$29,356,763	-	19.0¢	46.8%
2006-07	789,641	88.8	$26,862,994	$61,188,078	$34,325,084	$34,325,084	-	28.8¢	43.9%
2007-08	894,346	88.2	$28,945,651	$65,474,253	$36,528,602	$36,528,602	-	21.4¢	44.2%
2008-09	958,946	90.0	$30,671,510	$68,232,766	$37,561,256	$37,561,256	-	21.2¢	45.0%
2009-10	967,437	103.7	$32,117,615	$62,689,957	$30,572,342	$30,572,342	-	22.2¢	51.2%
2010-11	1,032,579	112.9	$36,571,173	$69,578,077	$33,006,904	$33,006,904	-	21.9¢	52.6%
2011-12	1,133,654	124.0	$40,161,170	$74,360,735	$34,199,565	$34,199,565	-	20.2¢	55.0%
2012-13	1,195,898	127.5	$41,415,960	$73,685,365	$32,269,405	$32,269,405	-	19.2¢	56.2%
2013-14	1,202,624	125.8	$41,421,102	$79,263,729	$37,842,627	$37,842,627	-	22.5¢	52.3%
2014-15	1,181,639	123.8	$41,020,415	$80,023,410	$39,002,995	$39,002,995	-	23.7¢	51.3%
2015-16 (S7)	1,135,424	118.6	$39,040,339	$77,388,218	$38,347,879	$38,347,879	-	24.2¢	50.4%
2016-17	1,125,626	100.1	$38,880,344	$78,939,791	$40,059,447	$40,059,447	-	25.7¢	49.3%
2017-18	1,090,200	97.4	$36,073,870	$83,878,638	$47,804,768	$47,804,768	-	32.0¢	43.0%
2018-19	1,076,454	93.9	$35,217,711	$85,840,487	$50,622,776	$50,622,776		34.4¢	41.0%

Source: Amtrak and the California Department of Transporation, 2019
Table 2.1 Notes
(S1) Service started 3/6/74 with one round-trip between Oakland and Bakersfield Data is for four months only.
(S2) State support started 10/1/79. Data is for nine months, during which time ridership totaled 93,206.
(S3) Third round-trip added 12/17/89 between Oakland and Bakersfield.
(S4) Fourth round-trip added 10/25/92 between Oakland and Bakersfield.
(S5) Fifth round-trip added 2/21/99 between Sacramento and Bakersfield.
(S6) Sixth round-trip added 3/18/02 between Sacramento and Bakersfield.
(S7) Seventh round-trip added 6/20/16 between Oakland and Bakersfield.
(F1) Passenger-miles per train mile (PM/TM), a measure of the average load on a train over its entire route.
(F2) Prior to October 1983, all trains billed on solely related cost basis. From October 1983 through September 1995, all trains billed on short term avoidable cost basis. Effective October 1996, all trains billed on Full Cost (Train, Route and System) Basis. Incudes cost of connecting buses. Depreciation and interest (equipment capital cost) included in operating cost under solely-related cost basis but excluded and charged separately under short-term, long-term avoidable and full cost bases.
(F3) Calculated service costs shown here may not reflect actual State contract cost. From October 1979 through September 1983, State cost increased in stages from 18.5 to 48.5 percent of operating loss (including equipment costs). Between October 1983 and September 1995, State cost was 65 percent of train operating loss for first three round trips, plus 50 percent of depreciation and interest (equipment capital cost). For the fourth round trip, State cost was 70 percent of train operating loss plus equipment capital cost. Between October 1995 and September 1996, State cost was 100 percent of train operating loss and 60 percent of equipment capital cost. Between October 1996 and September 1997, State cost was 65 percent of train operating loss. Effective October 1997, State is billed contractually specified percentages of most individual cost elements, plus a fixed amount for certain other cost elements. Also includes State payment of costs of special agreements with Amtrak for use of equipment, and State payment of entire net cost of all connecting bus routes.
(F4) Between State Fiscal Years 1993-94 and 2003-04, Amtrak cost is based on billings submitted and reflects cost basis and Amtrak shares as stated in notes (F2) and (F3) above. However, Amtrak does not include the unbilled Amtrak share of fixed cost elements. Prior to FY 1993-94, data to calculate Amtrak cost is not available/ beginning in FY 2004-05, no Amtrak share is billed.
(F5) Train loss (deficit) per train passenger-mile. Connecting buses not included in loss per passenger mile data.
(F6) Farebox Ratio, the ratio of Revenue to Expense.

Amtrak operates the state-supported San Joaquins on track owned by the UPRR and the BNSF through operating agreements with the UPRR and BNSF. UPRR owns the 49 miles of track used by the San Joaquins between Stockton and Sacramento, and 39 miles between Oakland and Port Chicago, whereas the remaining 276 miles (between Port Chicago and Bakersfield) are owned by BNSF (see Table 2.2). The UPRR track is primarily single track, while the BNSF line has approximately 65.7 miles of double-track divided among five segments.

Assessing the ridership patterns of the San Joaquins is critical to monitoring performance and conducting effective service planning. Table 2.3 shows passenger ons/offs (i.e. boardings/alightings) at San Joaquins train stations for Federal FY 2019. These numbers include trips with a Thruway bus connection (which comprise a considerable number of the trips at Bakersfield, Stockton [San Joaquin Street], Sacramento, Hanford, Martinez, and Emeryville Stations). Table 2.4 illustrates how ons/offs can differ significantly from the true origins/destinations points of passengers by excluding ons/offs of passengers making transfers between a bus and train. While ons/offs are useful for planning station capacity and design issues, origins/destinations statistics are far more useful (and accurate) for service planning. For example, in Table 2.3, Bakersfield is shown as having the most (426,056) passenger ons/offs in FY 2019. However, nearly 75% of these passengers took a connecting bus between Southern California, reducing the number of passengers who actually traveled to/from Bakersfield as

Table 2.2

San Joaquins Route Ownership and Track Characteristics								
Between	**Mile Post**	**And**	**Mile Post**	**Route Miles**	**Owner of Track**	***No. of Tracks**	**Max Speed**	**Signal System**
Oakland Jack London Square	7.0	Oakland 10th St.	4.2	2.8	UP	2	50	CTC
Oakland 10th St.	2.2	Martinez	31.7	29.5	UP	2	79	CTC
Martinez	34.7	Port Chicago	41.3	6.6	UP	1	79	CTC
Port Chicago	1163.5	Stockton	1120.7	42.8	BNSF	1-2	79	CTC
Sacramento	89.0	Elvas	91.8	2.8	UP	2	35	CTC
Elvas	38.8	Stockton	84.7	45.9	UP	1	60	CTC
Stockton	1120.7	Bakersfield	886.9	233.8	BNSF	1-2	79	CTC
			TOTAL	**364.2**				

Source: California Department of Transportation

Notes:

*General Number of Mainline Tracks

an origin/destination point to 125,823 (see Table 2.4, this table will be updated in official draft version of the business plan on April 1, 2020). Stockton (San Joaquin Street) Station is shown as having the third highest ridership with 276,880 passengers in Table 2.3, but about 50% of these passengers took a connecting Thruway bus, reducing the number of passengers who actually traveled to/from Stockton (San Joaquin Street) Station as an origin/destination point to 141,405 (see Table 2.4, see prior note on this table). Many of those taking a Thruway bus at Stockton (San Joaquin Street) Station were actually traveling to/from Sacramento (about 48,000 passengers). For Sacramento Station, the total number of passengers (rail + Thruway bus) actually traveling to/from Sacramento was nearly 136,000 passengers. The Thruway bus station with the greatest number of riders is by far Los Angeles Union Station with over 110,000 San Joaquins passengers in FY 2016.

Table 2.5 provides Federal FY 2018 ridership for the top San Joaquins "city pairs" (including trips that start or end on an Amtrak San Joaquins Thruway Bus stop). This data includes the true origins/destinations of riders, providing an accurate picture of ridership markets. Tables 2.3, 2.4, and 2.5 highlight the importance of incorporating Thruway Bus travelers when discussing San Joaquins ridership.

San Joaquins Amtrak Thruway Bus Service

The extensive network of dedicated Amtrak Thruway Buses connecting with the San Joaquins to and from destinations around California and Nevada is critical to the performance of the overall service. In addition to the Thruway Bus service connections in Bakersfield, other Amtrak Thruway Bus service connections are provided at Sacramento, Stockton, Lodi, Oakland, Emeryville, Martinez, Merced, Hanford, and Fresno. In Federal FY 2016, over 55 percent (625,835) of San Joaquins passengers used an Amtrak Thruway Bus on at least one end of their trip.[1] San Joaquins ridership to/from key Amtrak Thruway Bus stops can be found in Table 2.6.

All trains either initiating or terminating at Bakersfield are met by Amtrak Thruway Buses connecting south to Southern California. In FY 2016, over 366,000 San Joaquins passengers used an Amtrak Thruway Bus between Bakersfield and Southern California, with over 30% of these passengers traveling to or from Los Angeles Union Station (over 110,000 passengers). [2]

[1] *Amtrak, 2016*

[2] *Ibid.*

Table 2.3

San Joaquins Train Station Ridership Report - FY 2019* (Includes Passengers Making Thruway Bus Transfers)		
	Station	Passenger Ons/Offs (FY 19)**
1	Bakersfied	426,056
2	Fresno	369,129
3	Stockton (San Joaquin St.)	276,880
4	Hanford	182,143
5	Merced	133,720
6	Modesto	116,610
7	Martinez	102,358
8	Sacramento	100,062
9	Emeryville	99,855
10	Oakland	70,451
11	Richmond	51,404
12	Wasco	39,411
13	Antioch	34,618
14	Turlock-Denair	32,717
15	Madera	27,636
16	Corcoran	26,993
17	Stockton (Downtown)	16,600
18	Lodi	11,342
	TOTAL PAX ON/OFFS	2,117,985
	TOTAL RIDERSHIP	1,058,993

*The Fiscal Year (FY) is based on Amtrak's fiscal year, which is October-September.
**The above figures are total ons (boardings) and offs (alightings at each station for both directions of travel. Since each trip contains two endpoints, total ridership is equal to half of total boardings and alightings.
Source: Amtrak, 2019

Table 2.4 (This table will be updated in official draft version of the Business Plan on April 1, 2020)

Table 2.5

San Joaquins City Pair Ridership - FY 2018 (Includes Key Train Stations and Thruway Bus Stops)	
City Pair	Ridership
Fresno - Hanford	62,695
Sacramento - Fresno	39,181
Oakland - Stockton (San Joaquin St.)	26,985
Fresno - Bakersfield	22,886
Fresno - Los Angeles (Union Station)	22,375
Sacramento - Bakersfield	16,677
Richmond - Stockton (San Joaquins St.)	16,152
Oakland - Fresno	14,985
Martinez - Fresno	13,506
Richmond - Fresno	13,060
San Francisco* - Fresno	12,987
Sacramento - Hanford	12,054
San Francisco* - Stockton (San Joaquin St.)	11,984
Sacramento - Modesto	10,257
Hanford - Corcoran	9,862
Sacramento - Merced	9,810
Hanford - Los Angeles (Union Station)	9,311
Sacramento - Los Angeles (Union Station)	7,991
San Francisco* - Los Angeles (Union Station)	2,847
San Francisco* - Yosemite**	2,255
*Includes all bus stops in San Francisco	
**Data for Yosemite includes all bus stops within the boundaries of Yosemite National Park and El Portal.	
Source: Amtrak, 2018	

Table 2.6

San Joaquins Ridership at Key Thruway Bus Stops - FY 2019		
	Bus Stop	Passenger Ons/Offs
1	Los Angeles (Union Station)	195,797
2	Sacramento	97,034
3	San Francisco*	48,942
4	San Jose	32,123
5	Van Nuys	12,377
6	Las Vegas**	11,991
7	Oxnard	11,700
8	Davis	10,479
9	Santa Rosa	9,898
10	Riverside	9,512
11	Chico	9,262
12	UCLA/Westwood	8,915
13	San Bernardino	8,787
14	Arcata	7,417
15	Long Beach	7,225
16	Yosemite Valley***	4,236
*Aggregate of all 4 San Francisco bus stops.		
**Aggregate of both Las Vegas bus stops.		
***Aggregate of all Yosemite Valley bus stops		
Note: The above figures are total ons (boardings) and offs (alightings) at each bus stop.		
Source: Amtrak, 2019		

The Thruway Bus system extends north to Redding; east to Reno and Las Vegas, Nevada; south to Indio; and all along the California coast from Arcata to San Diego. See Figure 2.2 at the end of this chapter for a map of all Thruway Bus routes.

SJJPA contracts with Amtrak for dedicated feeder bus services, and Amtrak then contracts with bus operators. The bus routes function as part of the San Joaquins, with coordinated connections, guaranteed seating, integrated fares and ticketing procedures, and inclusion in Amtrak's central information and reservation system in the same manner as the trains. Ridership for these routes is shown on Table 2.7. The current Thruway bus routes and their origins/destinations are as follows:[3]

Route 1 – Los Angeles Basin/San Diego
(from Bakersfield Station):[4]

1a–Bakersfield-Los Angeles-San Diego*;

1b–Bakersfield-Los Angeles-Long Beach*/San Pedro*;

1c–Bakersfield-Van Nuys-Torrance;

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[3] *Cities designated with asterisks (*) are not serviced by all schedules on the route.*

[4] *Route 1 serves the Pacific Surfliner and San Joaquins routes.*

Route 3 – Redding (from Stockton/Sacramento Stations): Stockton-Sacramento-Redding;

Route 6 – South Bay (from Stockton Station):
Stockton-San Jose;

Route 7 – North Bay/Redwood Empire (from Martinez Station): Martinez-Vallejo-Napa-Santa Rosa-Eureka*-McKinleyville*;

Route 9 – High Desert/Las Vegas (from Bakersfield Station): Bakersfield-Las Vegas;

Route 10 – Santa Barbara (from Bakersfield Station): Bakersfield-Oxnard-Santa Barbara;

Route 12 – Antelope Valley (from Bakersfield Station): Bakersfield-Victorville;

Route 15 – Yosemite National Park (from Merced/Fresno Stations):

15a–Merced-Yosemite National Park;

15b–Fresno-Yosemite National Park (Summer Only)

Note: Route 15 buses operated by YARTS - Yosemite Area Regional Transportation System;

Route 18 – Central Coast/Visalia (from Hanford Station):

18a–Hanford-San Luis Obispo-Santa Maria;

18b–Hanford-Visalia

Note: Route 18 buses are operated by Orange Belt Stages;

Route 19 – Inland Empire-Coachella Valley (from Bakersfield Station):

19a–Bakersfield-Riverside-San Bernardino-Hemet*;

19b–Bakersfield-Riverside-San Bernardino-Palm Springs-Indio;

Route 20 – Reno/South Lake Tahoe (from Sacramento Station):[5]

Route 20a–Sierra Foothills/High Sierra, Sacramento-Auburn/Reno/Sparks;

Route 20c–Lake Tahoe, Sacramento-South Lake Tahoe/Stateline;*

Route 34 – Bay Area (from Stockton Station): Stockton-Oakland-San Francisco;

Route 35 – Santa Cruz (from San Jose Station): San Jose-Santa Cruz (buses operated by Santa Cruz Metropolitan Transit District). Note: Route 6 connects passengers to Route 35 via Stockton to San Jose Station;

Route 40 – San Jose (from Merced): Merced-Los Banos-Gilroy-San Jose (starting Spring 2020);

Route 56 –Stockton (from San Jose Station): San Jose - Stockton (Note: three one-way trips, Monday-Friday via the Altamont Corridor Express train);

Route 99 – San Francisco (from Emeryville Station): Emeryville-San Francisco.

Table 2.7

San Joaquins Thruway Bus Route Ridership - FY 2019		
Thruway Bus Route		**Ridership**
Route 1*	(Fresno - Bakersfield - Van Nuys - Los Angeles - Long Beach - San Diego)	263,051
Route 3	(Stockton - Sacramento - Redding)	129,573
Route 6	(Stockton - San Jose)	39,034
Route 7	(Martinez - Napa - Santa Rosa - Eureka - McKinleyville)	46,607
Route 9	(Bakersfield - Las Vegas)	13,347
Route 10	(Bakersfield - Oxnard - Santa Barbara)	24,749
Route 12	(Bakersfield - Victorville)	11,994
Route 15a/15b	(Merced - Mariposa - Yosemite Valley / Fresno - Yosemite Valley)	4,976
Route 18a /18b	(Visalia - Hanford - San Luis Obispo - Santa Maria)	23,298
Route 19a/19b	(Bakersfield - Riverside - Hemet / Bakersfield - Riverside - Palm Springs - Indio)	43,461
Route 34	(Stockton - Oakland - San Francisco)**	1,089
Route 56	(San Jose - Stockton)	2,416
Route 99	(Emeryville - San Francisco)	49,072
	Total Ridership	**652,667**

Source: Amtrak, 2019

Notes: The above figures are total ons/offs (boardings/alightings) for each bus route, and includes ridership for

* Route 1 is made up of three sub-routes (1a, 1b, and 1c) which serve locations within the Los Angeles Basin and the Greater Southern California region.

** Route 34 did not operate from April 2019 to September 2019 of Fiscal Year 2019 due to Morning Express.

3. EXISTING TRAINSETS, NEW EQUIPMENT, AND MAINTENANCE

The San Joaquins Service currently utilizes eight trainsets for the existing seven daily round-trips. The fleet consists of a mix of locomotive types and train cars. The State of California owns or leases all locomotives and train cars utilized by the San Joaquins.

Existing Equipment

The San Joaquins and Capitol Corridor currently share a combined fleet of 15 F59 PHI Locomotives, 3 P42 Locomotives (leased), 2 P-32 DASH-8 Locomotives, 8 Charger Locomotives, and 84 bi-level passenger coaches, food service and cab cars. The San Joaquins also utilizes 14 State-owned Comet Car coaches, as well as 3 Horizon Café cars and 3 F40 Cabbage cars (which the State leases from Amtrak). Taken together, this equipment is referred to as the Northern California Fleet.

California Cars

The San Joaquins primarily utilizes bi-level California Cars. The bi-level equipment was purchased by the State in the 1990's for use on the three California Intercity Passenger Rail Corridors. The Northern California Fleet is shared between the San Joaquins and Capitol Corridor services to allow for maximum flexibility in seating capacity. Bi-level equipment assignments for the Northern California Fleet is currently being studied to see if there can be further optimization of equipment based upon peak loads of paired trains.

An essential feature of the bi-level coaches is the ability for doors to be operated remotely on either side of the train from a single point of control. This feature allows the operator to maximize passenger flow in boarding and alighting operations, and thereby minimizing station dwell time.

Comet Cars

The San Joaquins currently operate two trainsets that utilize refurbished Comet Cars consisting of seven cars each. Comet Cars have proved to be a valuable resource in providing needed seating capacity while Caltrans Division of Rail and Mass Transportation pursues the procurement of a large order of new rail cars for the Northern California Fleet. While the use of Comet Car trainsets has accomplished the goal of increasing seating capacity, this equipment has presented some challenging operational aspects. High-level boarding (which requires all passengers to climb a steep set of stairs), narrow doors, and use of a manually cranked wheelchair lift at all stations often cause boarding delays, increasing dwell times and reducing on-time performance. Additionally, Comet Car coach doors are all manually operated, requiring additional staff to be onboard while also preventing some doors in the trainset from being used when the trains are at stations. SJJPA is working with the state on planning for the retirement of the Comet Cars from regular service on the San Joaquins once new equipment becomes available.

Charger Locomotives

Caltrans recently completed a procurement of 22 new diesel-electric locomotives – called "Charger Locomotives" – eight of which were delivered by Siemens for use in the Northern California Fleet in early 2017. The eight locomotives are shared between the San Joaquins and Capitol Corridor trains, with six in service as of October 2017, and two in service since June 2018. The Charger Locomotives meet EPA Tier IV emission standards and are capable of 125 mph operation. These new locomotives will allow for the eventual replacement of the P42 locomotives currently being leased from Amtrak. Caltrans also has procured an additional 14 Charger Locomotives, which are used in Southern California.

New Equipment

Caltrans, in partnership with the Federal Railroad Administration and States for Passenger Rail Coalition, is working to provide new rail equipment to meet increased demand from growth on existing services and plans for service expansions on the three State-supported services. With the Charger Locomotive order complete, Caltrans is now in the process of procuring additional passenger rail cars for the Northern California Fleet. Caltrans was successful in bringing together Federal High-Speed Intercity Passenger Rail (HSIPR) program funding, American Recovery and Reinvestment Act (ARRA) funding, and Prop 1B funds to acquire this additional equipment.

Siemens Single-Level Passenger Rail Cars

Caltrans has an agreement with Sumitomo Corporation of Americas (SCOA) to provide 49 single-level rail cars for use in the Northern California Fleet. Siemens Mobility, Inc. (Siemens) is the car builder of this contract. SJJPA, CCJPA and LOSSAN are currently working with the State and SCOA to specify features in the new trains so they can operate efficiently in California. Delivery of these new cars are scheduled to begin in the summer of 2020 and end in 2023. The structure and design of these new rail cars will be based on the passenger cars being used in the recently-opened Brightline Service, which runs between West Palm Beach and Miami in Florida.

Accessibility of Equipment

SJJPA supports the State's goal to provide total accessibility to the State-owned equipment including all its features and amenities. No person shall be denied access on the basis of physical ability. Accessibility features for bi-level coaches include onboard wheelchair lifts, two designated spaces per train car for passengers in wheelchairs, and one wheelchair-accessible lavatory on the lower level of each passenger coach.

On a temporary basis, the State has deployed Comet Car trainsets on the San Joaquins. Since the Comet Car trainsets have high-floors and do not have onboard wheelchair lifts, hand-cranked mobile wheelchair lifts are currently utilized to provide accessibility at all San Joaquins stations. Each single-level Comet Car coach has one wheelchair-accessible lavatory. SJJPA will continue to closely monitor the performance of the Comet Car trainsets in relation to accessibility.

As with the Comet cars, the new single-level Siemens passenger rail cars have high-floors. In-terms of accessibility, SJJPA is currently exploring more efficient ways to provide accessibility than the hand-cranked mobile wheelchair lifts. SJJPA and Caltrans are working together to construct mini-high platforms. Caltrans is working on the design of the portable bridge plate that will be stored on the cars. In addition, Siemens is working on the car-borne bridge plate. Both solutions will accommodate level-boarding. Further planning will need to be undertaken to ensure that single-level rail cars are integrated effectively into the Northern California Fleet.

Passenger Information Displays and Wi-Fi

Currently, each passenger coach is equipped with electronic passenger information displays that provide the train number and destination, plus other public information. In FY 2017/18, Amtrak informed SJJPA that it had planned changes to its Wi-Fi program, which resulted in cancellation of Wi-Fi service support and maintenance. In response, SJJPA worked with Caltrans, CCJPA, and LOSSAN JPA to ensure passengers do not experience a disruption in service and CCJPA has taken responsibility for future management of Wi-Fi service in coordination with SJJPA and Caltrans. A Wi-Fi system upgrade will be performed by CCJPA and its contractors in FY 20/21 providing improved Wi-FI service to San Joaquins passengers.

Renewable Diesel Implementation

SJJPA is committed to helping meet California's Greenhouse Gas (GHG) emission reduction goals. SJJPA is currently working with the Capitol Corridor to test the use of renewable diesel. Testing began for the older F59 Locomotives in November 2017, but unfortunately needed to be redone. Testing in one Charger Locomotive is currently underway and scheduled for completion in early summer of 2020. Following the completion of testing, results will be documented in a report to be produced by the CCJPA. If results are favorable, renewable diesel could be in all the locomotives of the Northern California Fleet as early as the fall of 2020.

SJJPA is also committed to utilizing renewable diesel in bus fleets used to run the extensive Thruway Bus system. Several transit agencies, including the San Francisco Municipal Transportation Agency, are already successfully using renewable diesel in bus and automobile fleets. SJJPA plans to work with Amtrak to require use of renewable diesel in all future contracts with bus operators.

Maintenance and Renovation

Currently, SJJPA and CCJPA are responsible for the administration and maintenance supervision of the State-owned fleet of passenger cars and locomotives assigned to Northern California. CCJPA is the lead agency in the maintenance program of the Northern California Fleet, with SJJPA serving in a monitoring role to ensure the fleet is operated and maintained to the high standards of reliability, cleanliness, and safety. SJJPA will continue to work closely with CCJPA, Caltrans, and Amtrak to refine the maintenance and operations programs to improve the reliability, safety, and cost-effectiveness of the rail fleet.

Caltrans, Amtrak, and CCJPA have created a program of periodic overhauls to the existing fleet that will result in improved performance. The main engines of the original fleet of F59 Locomotives were rebuilt and upgraded from 2011-2015 to exceed current EPA TIER II emissions standards. All locomotives are now equipped with a digital security camera system to improve safety and security. In addition, 14 California Cab Cars have been converted to Cab/Baggage/Bike cars similar to the five newer Surfliner Cabs, to provide greater baggage storage and 13 more bike racks.

Additional projects underway include replacing HVAC units to provide better air quality and climate control using new environmentally-friendly technology and refrigerants; rehabbing the upper level of diner cars to improve seating capacity, food storage, lighting, and counter top space; improving monitoring equipment in cab cars and locomotives; and replacing door mechanics and side paneling on certain passengers cars. SJJPA and CCJPA are also planning to upgrade the Wi-Fi system during FY 2020/21.

4. OPERATING PLAN AND STRATEGIES

SJJPA is in the process of a significant optimization and expansion effort of the San Joaquins Service. SJJPA is pursuing a significant increase in the frequency of the San Joaquins between Sacramento and the San Joaquin Valley. This aggressive program is needed to serve existing market demand (to capture a larger share of the business and leisure travel market to/from Sacramento) and to enable the San Joaquins to provide better connectivity to the HSR infrastructure under construction in the San Joaquin Valley. The most immediate priority for expansion of service is the implementation of the 8th and 9th Daily Round-Trips. Details about capital improvements associated with the 8th and 9th Daily Round-Trips can be found in Chapter 5, along with information on the joint SJJPA/San Joaquin Regional Rail Commission (SJRRC) 2018 Transit and Intercity Rail Capital Program (TIRCP) grant application, which was successful in funding this expansion of service.

SJJPA introduced a new schedule in Spring 2019 which returned the San Joaquins to full-corridor service for 7 daily round trips and initiated a "slotted" schedule and distributed pad-time for improved on-time performance. In terms of optimizing operations, the slotted schedule SJJPA developed for Spring 2019 is based on a bi-hourly pulse system, providing statewide connectivity and consistent service frequency throughout the day. The pulse approach not only allows for improved service, but is also more effective operationally and makes better use of infrastructure investments. The schedule results in a fixed interval between trains, and symmetrical northbound and southbound operations that reduce the number of locations needed for passenger-on-passenger train meets. BNSF simulations show high on-time performance with this schedule. Building upon the Spring 2019 schedule, SJJPA is planning for an Spring 2020 schedule that will include reduced operating times between Bakersfield and Northern California and more detailed coordination with Capitol Corridor and Pacific Surfliner services to enhance ridership potential and on-time performance. Options to be considered to reduce travel times will include skip-stop/limited stop service, increasing train speeds up to 90 mph, reducing pad-time, and terminating some trains at Emeryville.

SJJPA is also continuing to contribute to the ongoing fleet analysis being conducted by Caltrans, which is examining ways to maximize deployment and scheduling efficiencies along the San Joaquins and Capitol Corridors, with the goals of allowing for increased capacity for rail service and more efficient utilization of equipment. SJJPA is also contributing to the Service Optimization Study, which is currently under development by CCJPA. The Study is an effort to identify solutions to optimize ridership and revenue and coordinate service transfers for Northern California's passenger rail system (including the Capitols, San Joaquins, ACE and Caltrain). Components of the Study include: integrated ticketing; strategies to improve the existing train scheduling and equipment utilization; a mode of access survey; and a reconciliation study between the California Amtrak ridership model and various Metropolitan Transportation Organization (MPO) models. SJJPA will ensure these ongoing studies include analysis regarding the integration of the planned 8th and 9th Daily Round-Trips, as well as additional round-trips in the future.

To enhance the current service of the San Joaquins, SJJPA is committed to working with CalSTA, Caltrans, CCJPA, LOSSAN, San Joaquin Regional Rail Commission, Amtrak, BNSF, UPRR, and regional and local transit providers to improve connections to local/regional transit service to trains and connecting bus service along the San Joaquins Corridor. To help achieve this, SJJPA will utilize its Member Agencies to assist in coordinating improved communications and connectivity. SJJPA is also working to optimize the San Joaquins Thruway Bus services by implementing the provisions of SB 742 (Allen), adjusting routes to promote higher ridership and be more cost-effective, and pursuing partnerships with public and private bus operators to reduce operating expenses and increase ticket revenue.

The CHSRA's Draft 2020 Business Plan anticipates HSR operations beginning on the Merced-Bakersfield HSR Interim Operating Segment by December 2028. SJJPA is working with CHSRA, CalSTA, Caltrans and SJRRC to ensure that improvements and service expansions for the San Joaquins and ACE services integrate with interim HSR service in the San Joaquin Valley and with the future expanded Valley-to-Valley HSR service between San Francisco and Bakersfield.

FY 2020/21 and FY 2021/22 Operating Plan

The FY 2020/21 and FY 2021/22 operating plan for San Joaquins includes the continuation of full-corridor service for seven daily round-trips:

Service Pattern in FY 2020/21 and FY 2021/22

Northbound Trains:

Bakersfield – Sacramento: 2 daily trains

Bakersfield – Oakland: 5 daily trains

Southbound Trains:

Sacramento – Bakersfield: 2 daily trains

Oakland – Bakersfield: 5 daily trains

Operating Plans Beyond FY 2021/2022

Commencement of the 8th and 9th Daily Round-Trips

Beyond FY 2021/22, SJJPA plans to launch the 8th and 9th Daily Round-Trips. This expansion of service will increase the total number of daily round-trip trains serving Sacramento from two to four (while maintaining five daily round-trips to the Bay Area). One of the round-trips serving the Bay Area will originate/terminate at the Cabral Station rail hub in Stockton and will serve as a connecting train (with a timed transfers) for passengers traveling on San Joaquin Valley - Sacramento trains.

Between Sacramento and Stockton, two of the four daily round-trips will utilize the UPRR Fresno Subdivision (which the San Joaquins currently use for service to the Sacramento Valley Station), while the other two will utilize the UPRR Sacramento Subdivision, a corridor currently not used by passenger rail services. While the Sacramento Subdivision does not connect to the Sacramento Valley Station, it does allow for the San Joaquins to provide service to six planned new stations, including four in Sacramento (Natomas, Old North Sacramento, Midtown, and City College), as well as in Elk Grove and Lodi. A shuttle serving the Natomas Station will also meet each San Joaquins train to provide a convenient connection to the Sacramento International Airport.

SJJPA long-range operating plans center on seeking capital and operational funding to increase the frequency of San Joaquins trains between Sacramento and Merced to achieve hourly service, while maintaining adequate service levels to locations into the Bay Area. With these frequencies, the San Joaquins will be well positioned to provide robust feeder service to future high-speed rail service between Sacramento and Merced, while truly transforming travel options between Sacramento and the San Joaquin Valley. SJJPA is also considering expanding service north of the Sacramento Region.

Rail Operating Strategies

The San Joaquins have great potential for increased ridership, revenue, service coordination, and performance. SJJPA has implemented a number of strategies to improve the San Joaquins. Some of the strategies listed are being pursued with little or no additional resources.

Increasing On Time Performance (OTP)

Staff has worked closely with Amtrak and host railroads to improve OTP, employing collaborative strategies and open channels of communication to resolve issues impacting OTP. This resulted in significant improvement in OTP between FY 2015 (73.6%) and FY 2016 (84%). Unfortunately, due to a significant amount of weather-related delays, OTP declined to 76.5% in FY 2017 (see Table 4.1). In FY 2018, OTP increased slightly to 77.7%. Much of the OTP issues in FY 2018 can be attributed to issues associated with the implementation of Positive Train Control (PTC). In FY 2019 the San Joaquins experienced a considerable drop in on-time performance compared to previous years. This was due to a combination of factors including higher levels of third party delays such as trespasser events and police activity, as well as a higher level of maintenance activities that brought an uptick in slow orders (mandated speed restrictions from the host railroads) which all contributed to the OTP of 63.7% in FY 2019. In response to this poor OTP, SJJPA staff in partnership with BNSF, Amtrak, and DB E&C has begun a schedule performance monitoring project that reviews operational performance data and develops action plans which are targeted to increase OTP for the San Joaquins. In the last four months since the end of FY 2019, San Joaquins OTP has increased to 82% in January 2020. SJJPA understands how critical OTP is for attracting and growing additional ridership markets, including business travel, and is committed to achieving the highest level possible.

Specific strategies for improving OTP include:

1. Deployed a slotted/pulsed schedule with pad-time distributed throughout the route in coordination with CalSTA, Caltrans, Amtrak, BNSF and UPRR.
2. Worked with Amtrak, BNSF and UPRR to resolve recurring issues related to the operation of PTC which cause unnecessary delays.
3. Coordinating with the host railroads and Amtrak to provide computer displays with real-time viewing of all train movement (freight and passenger) on the San Joaquins Corridor.
4. Conducting conference calls with the host railroads and Amtrak to discuss the types of delays, reasons for delays, and identifying potential solutions so future delays can be a prevented.
5. Coordinating with the host railroads to bring dispatchers out to tour the San Joaquins Corridor and ride the trains to develop an understanding of the territory being dispatched.
6. Working with the host railroads and Amtrak to identify capital and/or system improvements to improve on-time performance.
7. Working with Host Railroads to develop strategies and incentives that will lead to improved OTP, including providing additional incentive-based access payments between SJJPA and the host railroads similar to what has proven to be extremely successful with the Capitol Corridor over many years.

Table 4.1

On-Time Performance of the San Joaquins (Based on Federal Fiscal Year)	
FY 2012	88.1%
FY 2013	77.7%
FY 2014	75.4%
FY 2015	73.6%
FY 2016	84.0%
FY 2017	76.5%
FY 2018	77.7%
FY 2019	63.7%

Source: Amtrak, 2019

Reduce Travel Times between Northern California and Bakersfield to Under Six Hours

Currently, labor agreements limit the maximum scheduled trip time between two crew change points to six hours. Scheduled trips exceeding six hours from end to end, per current labor agreements, require a planned mid-route crew change. If a train consistently violates the agreement by running longer than six hours without a crew change, then crew penalties are incurred until the train reliably runs under the six-hour threshold.

Today's San Joaquins service between the Oakland Station in the Bay Area and Bakersfield is scheduled to run just over the six-hour threshold. In order to meet labor requirements, a crew change is currently scheduled at Merced. This is a significant expense for the operating budget. Furthermore, the implementation of PTC is estimated to increase the time it takes to swap crews by as much as 15 minutes due to a new set of procedural requirements. The new protocol will add a considerable amount of trip time for passengers. Given the significant cost and schedule implications of continuing to have a crew change in Merced, SJJPA is committed to developing a plan that will eliminate this crew change.

Several strategies to reduce operating times to under six hours between Northern California and Bakersfield will be explored during the latter part of FY 2020/21, including but not limited to the following:

- Identifying potential areas to institute operational efficiencies that would allow for reduced dwell times at several stations;
- Implementing measures that would allow for a reduction in schedule recovery time at strategic locations;
- Skipping a limited number of stations for each train, while ensuring all stations still have sufficient service each day;
- Terminating some trains in Emeryville;
- Having some trains skip Emeryville while continuing to terminate in Oakland;
- Utilizing increased acceleration/deceleration of the new Charger locomotives to reduce trip time; and
- Exploring the feasibility of increased speeds along portions of the corridor.

Other Rail Service Coordination Strategies

SJJPA will continue to evaluate existing train and connecting bus schedules and determine if there are potential changes which could improve ridership, revenue, and cost effectiveness. Schedule adjustments have the potential to improve the San Joaquins performance without additional resources.

Assess operational impacts and potential schedule changes from the implementation of planned and potential new stations along the existing San Joaquins Route, including Oakley, Hercules, Berkeley, Oakland Coliseum, and Madera, as well as additional stations in the Fresno and Bakersfield metropolitan areas.

Explore the feasibility and operational impacts of shifting service from the Stockton "San Joaquin Street" station location to the Cabral (ACE) Station in downtown Stockton or to a location in the vicinity (eastern side) of the Stockton Diamond Grade Separation.

Represent the San Joaquins at monthly Capital Improvement Team (CIT) meetings with the Union Pacific Railroad (UPRR). Operational issues encountered over the prior month and any upcoming capital and system projects that could affect train performance are discussed at these meetings.

Participate in quarterly CIT meetings with the BNSF and UPRR to discuss operational issues encountered over prior months and any upcoming capital and system projects that could affect train performance.

Work with the Capitol Corridor JPA, LOSSAN JPA, and Caltrans to provide improved connections to the Capitol Corridor and Pacific Surfliner.

Participate in the Bi-Monthly Construction meetings with LOSSAN and Caltrans to identify potential maintenance projects and projects required to increase service to 9 daily round-trips, as well as to monitor progress on projects in construction.

Work with the Federal Railroad Administration on regulatory requirements associated with the San Joaquins, i.e. Positive Train Control.

Thruway Bus Operating Strategies

Thruway Bus service is a key component of San Joaquins operations, providing important connections to transit systems and tourist destinations, such as Yosemite, San Francisco, and Southern California. Additionally, many routes operate through rural communities, offering corridor-wide connections to San Joaquins trains. However, Thruway Bus service was restricted to ticketed Amtrak train passengers which results in underutilization of bus capacity and high operating costs. Opening key segments of Thruway Bus service to non-rail passengers could reduce operating expenses, increase ticket revenue, increase public and environmental benefits, and complement/augment local and regional bus services.

To accomplish this, SJJPA successfully worked with Senator Allen, RailPAC, Central Valley Rail Working Group, and San Joaquin Valley Regional Planning Agencies' Directors' Committee on getting legislation (SB 742) passed and signed by the Governor that enables bus-only tickets to be sold on state-supported Thruway Bus services. SJJPA is working in coordination with private intercity bus providers and public local and regional bus providers to implement the provisions of SB 742. SJJPA is also pursuing partnerships with public and private operators that would allow San Joaquins passengers to utilize intercity bus services of other agencies/companies, while allowing non-Amtrak passengers to utilize the same services. By increasing the load factor on connecting bus services (i.e. the number of seats filled on each bus), SJJPA anticipates a significant reduction in operating expenses and higher ticket revenue.

Partnership with the Shasta Regional Transportation Agency on the "North State Intercity Bus System"

Shasta Regional Transportation Agency (SRTA) is currently planning a new express bus service between Redding and Sacramento as part of the proposed North State Intercity Bus System. To fund the necessary capital investments (including several electric buses), SRTA recently received a TIRCP award. SJJPA and SRTA have formed a partnership to that would allow San Joaquins passengers currently traveling on Amtrak Thruway Buses from Sacramento to Red Bluff or Redding to utilize the new SRTA express bus instead. Correspondingly, SJJPA staff is planning to terminate the Thruway Bus Route 3 in Chico (approximately 75 miles south of the current terminus in Redding) to save on operating costs, which

would enable SJJPA to financially support the operations of express bus service. A MOU will be negotiated between the two agencies that would outline the parameters of SJJPA's financial support, while ensuring San Joaquins passengers have seamless access/ticketing on the new SRTA express bus. The service would provide much faster travel times between Sacramento and Redding as the new line would run along I-5 corridor rather than the more circuitous SR 99 corridor.

Potential Partnership with Butte County Association of Governments

A similar partnership is being explored with the Butte County Association of Governments (BCAG). BCAG is planning a new commuter bus service between Chico and Sacramento. SJJPA and BCAG are exploring the possibility of BCAG incorporating the remainder of the Thruway Bus Route 3 (from Chico – Stockton) into new bus operations in exchange for operating support. SJJPA would produce the cost savings by eliminating the entire Thruway Bus Route 3.

Potential Partnerships with North Coast Stakeholders to Optimize Thruway Bus and Other Bus Services

Stakeholders in Marin and Sonoma Counties and farther north along the North Coast have expressed a strong interest in optimizing the Thruway Bus service (Route 7) that currently operates between McKinleyville and Martinez. SJJPA has engaged in initial discussions with representatives in various cities, State Senator McGuire's office, and officials from Sonoma-Marin Area Rail Transit (SMART) on developing strategies for improving utilization of the existing Thruway Bus service and to provide connecting Thruway Bus service to SMART trains. In FY 2020/21, SJJPA will continue planning work around these issues with the goal of identifying a range of solutions to increase the usefulness of Thruway Bus and other connecting bus services.

Implementation of SB 742 Provisions

SB 742 (Allen) was signed by Governor Newsom on October 8, 2019 and its provisions became law on January 1, 2020. The implementation of SB 742 will need to be phased in over time. SJJPA approved bus-only ticketing for Routes 10 (Bakersfield-Oxnard-Santa Barbara) and Route 12 (Bakersfield-Lancaster-Victorville) at the January 24, 2020 SJJPA Board Meeting. Approval for additional routes will be sought at future SJJPA Board Meetings until all of the routes are able to offer bus-only tickets. As specified in SB 742, before offering bus-only tickets on Thruway bus routes, SJJPA will consult with and consider local and regional public transit operators to determine if a local or regional public transit operator can provide the planned service and attempt to avoid conflicts with existing public transit services. SJJPA will also make a good faith effort to coordinate with private motor carrier services to provide timely connections with intercity rail services, including agreements to fund modifications or expansions of existing motor carrier services to better coordinate with existing services. The implementation of SB 742 is expected to enhance existing intercity private bus services and to avoid damage to these services if possible. SJJPA's efforts to implement SB 742 will be documented, presented, and available for public comment at applicable SJJPA Board Meetings.

Studies of New Proposals

In FY 2017/18 and FY 2018/19, SJJPA received three proposals received from stakeholder groups advocating for service changes to the San Joaquins, which are described below. SJJPA has committed to conducting analysis of these proposals.

Proposed Limited-Stop San Joaquins Rail Service between Sacramento and Bakersfield

In September 2017, a group of stakeholders from Kern County approached the SJJPA with a proposal for faster service between Sacramento and Bakersfield by running a morning northbound and evening southbound express train that would skip seven stations. The proposal would add Express Service in the morning direct to Sacramento from the South San Joaquin Valley (currently only served by a Thruway Bus connection in Stockton). The proposal was presented to the SJJPA Board on September 22, 2017. The Board directed staff to further study the proposal for consideration as part of the Spring 2020 schedule change. In 2020, SJJPA will conduct a more detailed analysis of the proposal in coordination with the State and host railroads. Analysis will include ridership forecasts (including potential Thruway Bus connections), operational analysis to verify travel time savings, and the identification of potential operational issues and/or benefits.

Proposed New Thruway Bus Route between Silicon Valley and Southern San Joaquin Valley

For several years, Kern COG has requested SJJPA run an additional Thruway Bus line between Silicon Valley and Madera with the goal of capturing additional ridership markets. SJJPA conducted detailed analysis regarding the feasibility of this proposal in FY 2018/19. Based on strong preliminary ridership and revenue forecasts, SJJPA is requested and received state funding to initiate a pilot program for a new Thruway Bus between San Jose and Madera. Detailed operating analysis in coordination with Amtrak led SJJPA (in coordination with the state) to adjust the service to be between San Jose and Merced because of cost savings and other operational efficiencies. After a first year initial ramp-up period, this new Thruway Bus route between San Jose and Merced (with stops at Los Banos and Gilroy) is expected to be revenue positive. The FY 2019/20 request for the pilot program start-up was to fund connections to two San Joaquins daily round trips in 2019/20. For FY 2020/21 it is anticipated that increases in San Joaquins ridership/revenue will enable expanding the San Jose to Merced Thruway Bus service to connect to six of the seven San Joaquins daily round trips in future fiscal years.

Proposed Altamont Corridor Used by San Joaquins

SJJPA has also received proposals from Train Riders Association of California (TRAC) suggesting that SJJPA seek private sector funding for a much faster Altamont alignment that would be shared by San Joaquins and ACE. TRAC's plan involves shifting San Joaquins off its current route between Stockton and Oakland to serve what TRAC believes is a larger market.

Coordination of Operations with Future High-Speed Rail Service

Recognizing the complimentary nature of the San Joaquins and the future high-speed rail system, a Joint Policy Statement was adopted by CHSRA, SJJPA, and Caltrans in 2013 that ensures cooperation and input of local communities on all decisions related to any changes in the San Joaquins and consistent planning between these agencies. As required by the enabling legislation for SJJPA, this Draft 2019 SJJPA Business Plan Update is consistent with the Draft 2018 California State Rail Plan (DCSRP) and the CHSRA's Draft 2020 Business Plan.

With California's phased approach to implementing the State's high-speed rail (HSR) project, conventional rail services are particularly critical to the success of the initial operating segment (IOS) of the proposed HSR system. The San Joaquins (including the Thruway Buses), with its desirable rail connectivity to the Bay Area, Sacramento, and the northern San Joaquin Valley, provides strong support for the proposed HSR IOS, which would run from Merced to Bakersfield. With billions of dollars being investing in the California HSR project, the improvement and expansion of the San Joaquins as a feeder network should be a very high priority for SJJPA, California High-Speed Rail Authority (CHSRA), the State, the regions, and the FRA, in consultation with the BNSF and UPRR.

SJJPA, along with CalSTA, Caltrans, and the Central Valley Rail Working Group worked cooperatively on the CHSRA's "Merced to Sacramento Connected Corridors North Study." The purpose of this study was to identify elements of an integrated investment program that aligns the goals of rail-planning efforts by SJJPA and the region more closely with the phased implementation of the High-Speed Rail (HSR) program. By collaborating to align regional goals, better passenger rail service can be delivered to the Northern San Joaquin Valley Region, from Merced to Sacramento, than would not be possible with uncoordinated efforts. The Study concluded that an incremental and well-coordinated approach to service expansion and capital investment leading to full HSR deployment will allow the region to achieve better, faster, and more-frequent service, sooner than would occur if each agency pursued their interests independently. The Connected Corridors North Study and CHSRA's coordination with SJJPA resulted in an approach for phased regional investment which is fully consistent with SJJPA's planning for service improvements. This collaborative effort enabled CHSRA to strongly support the joint SJJPA/SJRRC 2018 TIRCP application for providing additional passenger service to Sacramento which will serve as a complementary "feeder" service to HSR and is an important first step towards bringing direct HSR service to Sacramento.

SJJPA strongly supports Governor Newsom's and CHSRA's proposed Merced-Bakersfield HSR Interim Operating Segment with stops at Madera and Kings/Tulare. SJJPA has been working with SJRRC, CHSRA, Caltrans, CalSTA, and the CHSRA's Early Train Operator (ETO) on planning for integrating the San Joaquins and ACE services with the Merced-Bakersfield HSR Interim Operating Segment. Both the San Joaquins and ACE rail services would directly connect with HSR services at a multi-modal station in downtown Merced. For the San Joaquins, this will require a new track connection between the

BNSF and UPRR mainlines known as the Merced Intermodal Track Connector (MITC) Project (see Figure 4.1). In coordination with CHSRA and the City of Merced, the proposed multi-modal station at Merced would be elevated and have a northern boundary at "R" Street. SJJPA will take the lead in the environmental clearance/detailed design for the MITC Project (which will also environmentally clear the Merced Multimodal Station). To most efficiently integrate the San Joaquins and the interim HSR services, Merced will become the southern terminus for San Joaquins rail service once operations begin on the HSR infrastructure at the end of 2028. SJJPA will coordinate with SJRRC's Ceres to Merced environmental review process to plan and environmentally clear a layover and maintenance facility for ACE and San Joaquins services in Merced (see Figure 4.1).

The San Joaquins and ACE rail services will be key feeder services for the Merced-Bakersfield HSR Interim Operating Segment, providing important connectivity to the Northern San Joaquin Valley, Sacramento and to the Bay Area. In addition, the extensive San Joaquins Thruway Bus Network, will provide equally important connectivity to Southern California and the rest of the state (see figure 4.2). The initiation of the Merced-Bakersfield HSR Interim Operating Segment will lead to substantially improved intercity passenger rail service throughout California, with much higher frequencies of service, shorter travel times, better on-time performance, reduced emissions and GHG, improved safety, higher ridership and reduced state subsidies. SJJPA is committed to continuing to work with CHSRA, Caltrans, CalSTA and SJRRC to implement a fully integrated statewide intercity service which utilizes the HSR infrastructure between Merced and Bakersfield that will bring great benefits to the state, demonstrates electrified HSR operations, and leads to the expansion of the statewide HSR network.

Figure 4.1 – Merced Intermodal Track Connector and Station

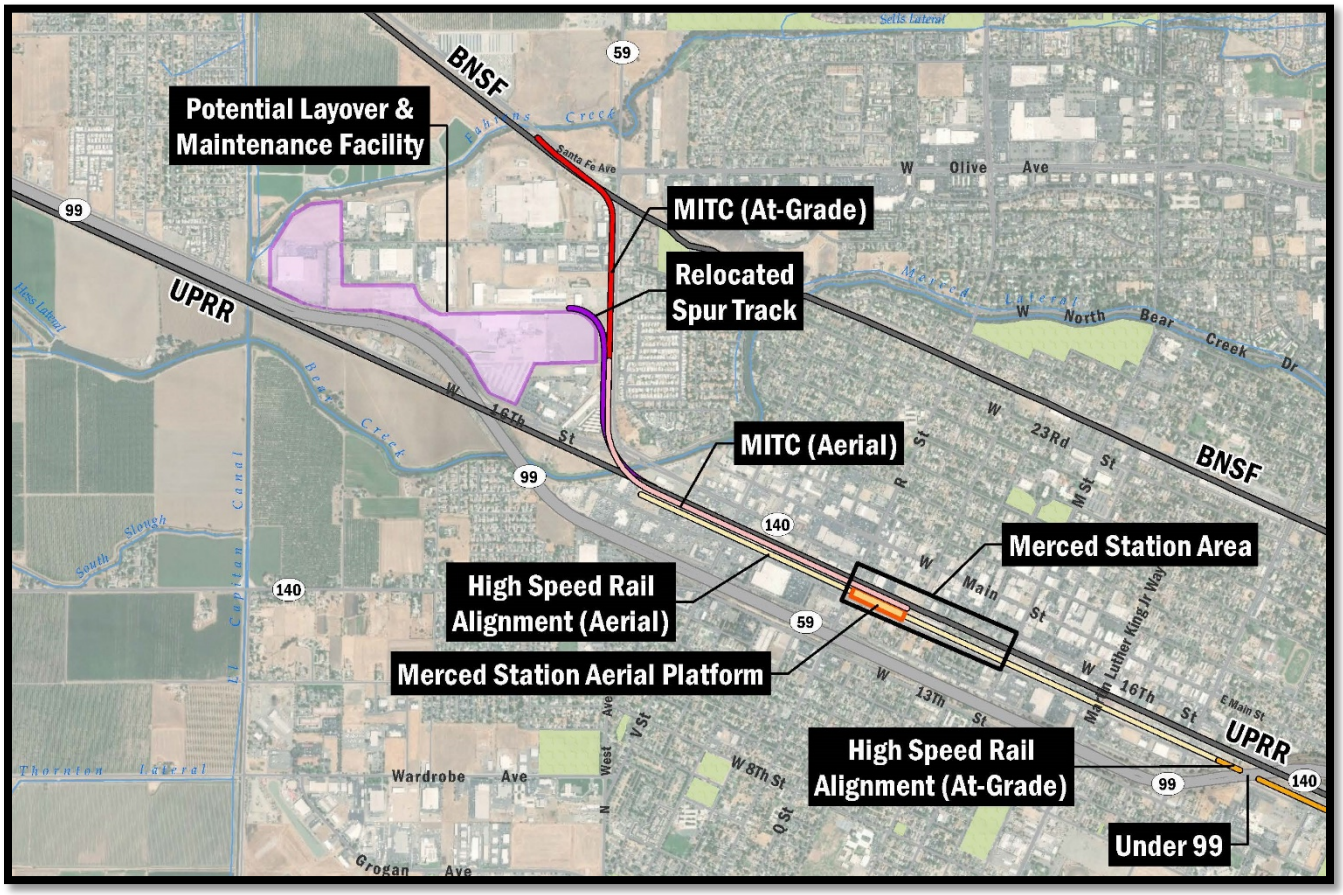
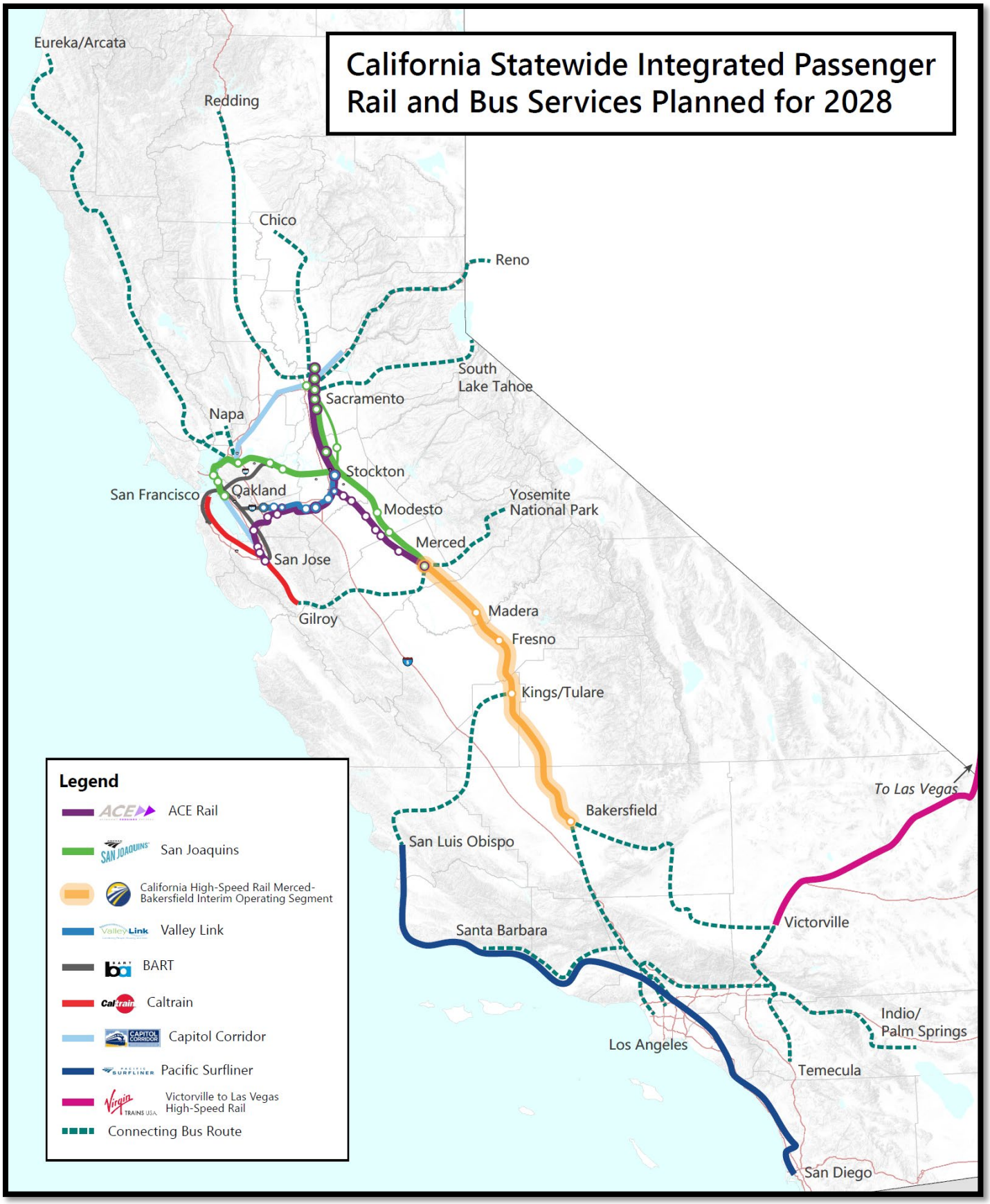


Figure 4.2


California Statewide Integrated Passenger Rail and Bus Services Planned for 2028
Eureka/Arcata
Redding
Chico
Reno
South Lake Tahoe
Sacramento
Napa
Stockton
San Francisco
Oakland
Modesto
Yosemite National Park
Merced
San Jose
Gilroy
Madera
Fresno
Kings/Tulare
Bakersfield
To Las Vegas
San Luis Obispo
Victorville
Santa Barbara
Indio/ Palm Springs
Los Angeles
Temecula
San Diego
Legend
ACE Rail
San Joaquins
California High-Speed Rail Merced-Bakersfield Interim Operating Segment
Valley Link
BART
Caltrain
Capitol Corridor
Pacific Surfliner
Victorville to Las Vegas High-Speed Rail
Connecting Bus Route

5. SHORT-TERM AND LONGER-TERM CAPITAL IMPROVEMENT PROGRAMS

A key goal of SJJPA is to build upon the State's efforts to improve the performance and increase the frequency of the San Joaquins and expand ridership through increased awareness of the service and the development of new ridership markets. SJJPA has developed an aggressive $1.5 billion "Estimated 10-Year Capital Improvement Program" to expand the capacity of the San Joaquins Corridor and prepare the San Joaquins to best complement and integrate with future HSR service. This chapter details this program, as well as identifying specific projects in SJJPA's Short-Term and Longer-Term Capital Programs.

Estimated 10-Year Capital Improvement Program

In coordination with the State, BNSF, and UPRR, SJJPA is in the process of implementing its Estimated 10-Year Capital Improvement Program (see Figure 5.1), which will transform the San Joaquins Corridor to one that will not only vastly improve intra-Central Valley and inter-Central Valley-Bay Area travel, but also performs as an efficient feeder service to the State's future high-speed rail (HSR) system. The improvements for this program will benefit multiple agencies and other rail services, and are consistent with the 2018 California State Rail Plan and the Draft 2020 CHSRA Business Plan. A major feature of this program is creation of a new passenger rail corridor along UPRR's Sacramento Subdivision between Sacramento and Stockton, on which San Joaquins trains are envisioned to share tracks and stations with Altamont Corridor Express (ACE) rail service. Improvements associated with Sacramento Subdivision are consistent with CHSRA's Connected Corridor North Study to bring early implementation of HSR to Sacramento. The Estimated 10-Year Capital Improvement Program also maintains and optimizes service to the Bay Area and improves safety and security along the San Joaquins Corridor. Ultimately this program of improvements is designed to allow for hourly service from Sacramento to Merced, while maintaining service levels in the other segments of the San Joaquins Corridor and for direct connectivity with the Merced-Bakersfield HSR Interim Operating Segment through the implementation of the MITC Project.

Elements of the Estimated 10-Year Capital Improvement Program include:

Corridor Capacity Enhancements for Additional Daily Round-Trips: This program includes the 8th and 9th Daily Round-Trips, which are detailed in the Short-Range Capital Improvement Program. It also includes additional round-trips to eventually achieve hourly service between Sacramento and Merced, which are discussed in the Longer-Term Capital Improvement Program. Capacity enhancements are also currently being evaluated between Stockton and Oakland.

New Maintenance and Layover Facilities: To support the 8th and 9th Daily Round-Trips, two layover facilities will also be needed as part of the Short-Term Capital Improvement Program. To provide additional service between Sacramento and Merced (eventually hourly), a new maintenance facility, and an expanded Stockton Regional Maintenance Facility, will be needed as part of the Longer-Term Capital Improvement Program.

Safety and Improvements: SJJPA is in the process of planning and implementing projects that will improve safety throughout the San Joaquins Corridor, including station lighting upgrades, improved pedestrian crossings at the tracks, new fencing along sections of the corridor with high incident rates, etc.

New Stations: As part of the 8th and 9th Daily-Round Trips and establishing service along the Sacramento Subdivision, the SJJPA is currently working to implement up to six new stations north of Stockton, including Lodi, Elk Grove, and four in Sacramento. A new station in Oakley is also being implemented, as is a relocated station in Madera. These are contained in the Short-Term Capital Improvement Program. New stations will also be considered as part of any extension of service north of Sacramento. SJJPA is also implementing numerous station enhancement and parking projects to ensure a high-quality passenger experience.

New Equipment: To enable additional round-trips and extensions of service, additional trainsets will be necessary beyond what is currently being procured by the State of California. In the Short-Term Capital Improvement Program, additional trainsets are included for the 8th and 9th Daily Round-Trips. To reach hourly service between Sacramento and Merced, another order of trainsets will be needed (see the Longer-Term Capital Improvement Program).

Service Extensions: In conjunction with the 8th and 9th Daily Round-Trips, SJJPA is working to extend service along the Sacramento Subdivision to new locations in Sacramento. Details are contained in the Short-Term Capital Improvement

Program. In the longer-term, extensions north of the Sacramento Region and to the Oakland Coliseum/Airport are being considered.

During implementation of this ambitious capital improvement program, SJJPA will continue to work with the State to:

Secure funding for future projects;

Ensure that projects meet the delivery schedule;

Minimize the construction impacts of projects;

Maximize the benefits of projects on overall service performance; and

Coordinate with CHSRA regarding MITC Project and Merced Intermodal Station, the Madera Relocated Station, and grade separations or improvements being done to the BNSF track as a result of the implementation of the initial construction of the HSR system.

The Estimated 10-Year Capital Improvement Program consists of a Short-Term Capital Improvement Program (0-5 years) and a Longer-Term Capital Improvement Program (5+ years), both of which are detailed below.

Table 5.1

Estimated 10-Year Capital Improvement Program ($ Millions)	
Project	**Cost**
Corridor Capacity Enhancements - Additional Daily Round Trips to Reach Hourly Service (Merced-Sacramento)*	$615
Corridor Capacity Enhancements (Stockton-Bay Area)**	$200
New Maintenance and Layover Facilities	$64
Safety Improvements (Grade Crossings Improvements/Fencing/Road Closures, etc.)	$38
New Stations***	$208
Service Extensions	$175
New Equipment	$200
TOTAL:	$1.5 Billion

Notes:

*Improvements needed to enable 8th and 9th Daily Round-Trips between Sacramento and Merced are defined in SJJPA's/SJRRC's TIRCP application. Additional capacity enhancement projects and/or capital access fees will be required to allow achieve hourly service between Sacramento and Merced, such as double-tracking, eliminating hold-outs at stations, increased capacity at the Stockton Cabral Station rail hub, Stockton Diamond Grade Separation, and Merced Intermodal Track Connection and Station projects.

**Improvements to allow additional train slots from Stockton to Oakland as necessary to ensure enough capacity exists for both San Joaquins and Capitol Corridor Services.

***Up to eight new stations are being planned along along the Sacramento Subdivison service extension (four in Sacramento plus stations in Elk Grove, Lodi and two more north of Sacramento). Madera and Oakley would also see new stations. Additional stations are being considered, but are beyond the 10-year horizon.

SJJPA is currently focused on implementing a substantial Short-Term Capital Improvement Program over the next five years. The Program contains four areas of improvements: 8th and 9th Daily Round-Trips, Other Station Projects, and Corridor and Other Projects (see Table 5.2).

8th and 9th Daily Round-Trips

The deployment of the 7th Daily Round-Trip between Oakland and Bakersfield on June 20th, 2016 was the first step in increasing San Joaquins service frequency. SJJPA is now focusing on improvements needed to increase frequency of service to Sacramento, with the next step being the implementation of the 8th and 9th Daily Round-Trips.

Many of the required capacity improvements for the 8th Daily-Round Trip are completed or will be completed shortly between Stockton and Fresno. These improvements consist primarily of double-tracking projects (see Tables 5.2). There are also plans to install second platforms at four stations over the next few years, which will reduce holdouts, thereby increasing capacity.

Determining improvements needed between Sacramento and Stockton for the 8th and 9th Daily Round-Trips have been more complicated. Running additional passenger trains on the UPRR's Fresno Subdivision will be very difficult in the near-term. Given this situation, SJJPA began exploring the option of utilizing the Sacramento Subdivision, a parallel UPRR-owned rail corridor to the west in coordination with CalSTA, CHSRA, Caltrans, SJRRC, and the Central Valley Rail Working Group. Feasibility studies by SJJPA/SJRRC and CHSRA determined that the Sacramento Subdivision was the most viable alternative for expanded passenger rail service from the San Joaquin Valley to Sacramento, and UPRR has indicated there is potential to provide passenger service on this corridor. In 2017, SJJPA's Board adopted the Sacramento Subdivision as the preferred corridor to pursue for future service expansion to Sacramento.

SJJPA has been engaged in planning and environmental work to determine needed improvements to establish passenger rail service along the Sacramento Subdivision as part of the development of a Transit and Intercity Rail Capital Program (TIRCP) grant application. SJJPA worked in partnership with San Joaquin Regional Rail Commission (SJRRC) on the TIRCP application, as the SJRRC-managed Altamont Corridor Express (ACE) rail service would share the tracks and stations along the Sacramento Subdivision with San Joaquins trains between Sacramento and Stockton. On January 12, 2018, SJPPA and SJRRC submitted the joint TIRCP to CalSTA. On April 26, 2018 CalSTA announced that the SJJPA/SJRRC "Valley Rail" application was awarded $500.5 million to expand San Joaquins and ACE services.

The following improvements related to the 8th and 9th Daily Round-Trips (see Table 5.2) were developed and included in the TIRCP application:

- Track Improvements (UPRR Sacramento Subdivision);
- New Stations (six along the Sacramento Subdivision, including Natomas, Old North Sacramento, Midtown, City College, Elk Grove, and Lodi);
- Track Extension (Stockton Cabral Station to the ACE Maintenance Facility);
- Layover Facilities (in Natomas for the Northern Terminus, in Merced, and a temporary facility in Fresno for the Southern Terminus of the expanded service);
- New Rolling Stock for the San Joaquins (two new 6-car trainsets); and
- Capital Access Fees.

With TIRCP funds now awarded, SJJPA-SJRRC is moving forward on constructing improvements for the Stockton-Sacramento segment along the Sacramento Subdivision. These improvements will also lay the groundwork for additional round-trips to Sacramento in the future for the San Joaquins and ACE services.

Other Station Projects

In addition to the station projects associated with the 8th and 9th Daily Round Trips, SJJPA is currently involved in several other station projects.

Wasco Station: The high-speed rail alignment goes directly through the Wasco Station site, necessitating a re-design and re-construction. SJJPA is working to ensure that high-quality access to the station is preserved during and after construction (which will be performed by the CHSRA).

Relocated Madera Station: SJJPA is working with CHSRA, Madera County, Madera CTC and the City of Madera to relocate the Amtrak station in Madera County. A new station location off Avenue 12 is being sought to support the potential for greater ridership and transit oriented development, improve connectivity and accessibility for transit and automobiles. The new station is being designed and environmentally cleared to enable future high-speed rail operations at this location. Funding for the Relocated Madera Station was included in the 2018 TIRCP award. The formal environmental review process and detailed design for the relocated station will be completed in 2020.

New Oakley Station: SJJPA is working with Amtrak, BNSF, and the City of Oakley on the development of the new station.

SJJPA included and was awarded the station platform and trackwork in its portion of the 2018 TIRCP application. The City of Oakley is providing matching funds for the parking and other station facilities.

Other Station Projects Include:

Allensworth Station - Platform and accessibility improvements (currently in planning);

New parking lots in Merced, Fresno, and other stations as needed; and

Station Enhancement Projects – lighting, signage, landscaping, repairs, etc. (non-Morning Express Stations).

Corridor and Other Projects

Stockton Wye: This project will provide a connector track between the UPRR Fresno Subdivision and the BNSF Stockton Subdivision, which will result in enhanced capacity of train movement within the busy rail environment of Stockton. This project supports SJJPA goals of increase capacity in the San Joaquins Corridor and the frequency of San Joaquins trains.

Platform Accessibility for High-Floor Cars: SJJPA currently operates two trainsets that consist of Comet Cars, which have high-floors, requiring passengers to utilize steep stairs to embark/disembark trains. This limits accessibility and slows boarding, increasing the dwell time of trains at stations. Additionally, the State is procuring new single-level passenger rail cars, which also have high-floors. These rail cars are expected to be assigned to the San Joaquins. To improve accessibility and speed boarding for existing and future high-floor passenger cars, SJJPA is currently exploring the possibility of installing Mini-High Platforms (small sections of the platform that are raised to the same height as the high-floor rail cars and accessible via a ramp from the lower part of the platform) at all existing and planned San Joaquins stations.

Stockton Diamond Grade Separation Project: This project is the grade separation of the intersection of the BNSF Stockton Subdivision and the Union Pacific (UP) Fresno Subdivision in south Stockton. This is the most heavily congested freight bottleneck in California. In addition to substantial freight and environmental benefits, this project will enable future expansion of ACE and San Joaquins services. In partnership with the SJRRC, SJJPA is pursuing state and federal funding in 2020 to implement this critical project, Valley Rail funding will be used as matching funding. The environmental and detailed design are being funded through ITIP funds.

Increasing Operating Speeds: Increasing the operating speed of the San Joaquins in key locations could reduce travel times, and improve reliability (i.e. on-time performance) in the San Joaquins Corridor. It could also help eliminate a costly crew change in Merced due to running times between Bakersfield and the Bay Area being just over six hours. In coordination with BNSF, UPRR, and Caltrans, SJJPA will work to identify locations along the San Joaquins Corridor where key track improvements (such as curve realignments) could increase speeds, potentially to 90 mph in certain locations. Any increase in speeds, especially if as high as 90 mph, should be balanced against the need for increased costs in maintenance of the tracks.

Cal PIDs Replacement/Upgrade: The Passenger Information Display System for California's Intercity Rail Services – or Cal PIDS – is the network of digital information signs present at all station platforms. The current generation of digital signs that make up Cal PIDS have limited capabilities and are reaching end of their useful lifespan. This project, in partnership

with CCJPA, will upgrade the entire Cal PIDS system, including the replacement and upgrade of all platform digital signs and back office systems that support them.

Safety Improvement Projects (Lighting, Security Cameras, Fencing, At-Grade Crossing Improvements, Grade Separations, Wayside Horns, and Quiet Zones): SJJPA currently is conducting comprehensive station area assessments for safety. Related projects being pursued include improving lighting and security camera infrastructure at both stations and platforms, walkways, parking lots, and other station improvements. Another high priority for SJJPA is to discourage trespassing along the corridor by installing fencing in high-incident areas.

Accidents between intercity passenger rail services and vehicles predominately occur where the railroad track and a road cross at the same level. These are called "at-grade" crossings. There are hundreds of at-grade crossings along the San Joaquins Route. SJJPA will continue to work with BNSF, UPRR, CCJPA (where the route is shared), and Caltrans to develop a plan and prioritization for at-grade crossing improvements. This will include an inventory of all previous at-grade crossing incidents along the route, potential improvements, and the identification of key crossings which should be prioritized for future grade separation. Grade crossing improvements will increase safety and will also improve the performance of the San Joaquins and freight operations.

Two approaches to ensuring at-grade crossing safety while also reducing community impacts are the use of Wayside Horns and the development of Quiet Zones. Wayside Horns are mounted on poles at an at-grade crossing and emit a sound which is directed at approaching motorists, pedestrians, and bicycles on the roadway. Where these are deployed, they eliminate the need for trains to use their horns through at-grade crossings. It is estimated that the area of noise impact is about 10% of the area compared to a train mounted horn. Wayside horns have already been successfully deployed on the San Joaquins alignment in the City of Escalon (at four at-grade crossings). The deployment of Wayside horns at other locations along the San Joaquins Route will be evaluated as a way of reducing community impacts from both the San Joaquins and freight operations.

An alternative to wayside horns are quiet zones, where horns are silenced by establishing a "New Quiet Zone." To accomplish this, the jurisdiction with authority of the grade crossing initiates a quiet zone establishment process following the procedures listed in 49 CFR Part 222. One method of establishing a Quiet Zone is to install Supplemental Safety Measures (SSMs) which are physical devices that improve crossing safety. Types of physical improvements that may be implemented to establish a quiet zone include signage, raised medians or median channelization, and/or quad gates. SJJPA will work with jurisdictions that are seeking to establish a quiet zone along the San Joaquins Corridor.

Grade separations at busy crossings are also effective in increasing safety. Given the high cost, these projects require a large effort. SJJPA will work with local jurisdictions to determine any locations that are candidates for a grade separations and to look for funding sources.

Table 5.2

San Joaquins Corridor - Short-Term Capital Projects ($ Millions)					
Improvement Program/Project (0-5 years)	**Project Cost**	**Funding Secured**	**Funding Sources**	**Lead Agency**	**Status**
Short-Term Service Improvements					
Temporary Layover Facility - Fresno	$1.7	$1.7	Cal OES	SJJPA	Completed
Modesto Station Parking Lot	$0.4	$0.4	LTF	City of Modesto	Construction
Turlock-Denair Station Parking Lot	$0.29	$0.29	Minor Cap/Cal OES	Stanislaus Co.	Completed
Stockton (Cabral) Station Parking Lot	$1.3	$1.3	CMAQ	SJJPA/SJRRC	Construction
Station Enhancements - Antioch	$0.3	$0.3	Cal OES	SJJPA/City	Completed
Station Enhacements - Security Cameras	$1.5	$1.5	Minor Cap/Cal OES	SJJPA	Construction
Station Enhacements - Other*	$2.3	$2.3	Minor Cap/Cal OES	SJJPA	Construction
8th and 9th Daily Round-Trips					
Track Improvements - UPRR Sac. Sub	$149.1	$149.1	TIRCP	SJJPA/UPRR	Planning/Env.
Track Improvements - BNSF Stock. Sub	$20.0	$20.0	TIRCP	SJJPA/BNSF	Design
New Stations (Lodi, Elk Grove, 4 in Sac.)	$111.5	$111.5	TIRCP	SJJPA	Planning/Env.
Track Extension (RMF to Cabral Station)	$23.7	$23.7	Prop 1A/CMAQ/Other	SJRRC/UPRR	Planning/Env.
New Rolling Stock	$87.6	$68.0	TIRCP	SJJPA	Planning/Env.
Merced-LeGrand Double Tracking (Seg. 2)	$23.2	$23.2	ITIP	Caltrans/BNSF	Construction
Stockton-Escalon Double Tracking (Seg. 3)	$20.5	$20.5	ITIP	Caltrans/BNSF	Construction
Stockton-Escalon Double Tracking (Seg. 4)	$23.0	$23.0	ITIP	Caltrans/BNSF	Construction
Layover Facility - Natomas	$17.7	$17.7	TIRCP	SJJPA	Planning/Env.
Merced Station Double Platform/Trackwork	$10.3	$10.3	ITIP	Caltrans/BNSF	Design/Const.
Modesto and Turlock-Denair Double Platforms	$20.0	$20.0	ITIP	Caltrans/BNSF	Planning
Capital Access Fees	TBD		TIRCP/SRA	SJJPA	Planning
Other Station Projects					
Wasco Station Reconstruction	TBD		CHSRA Funds	CHSRA	Design
Madera Station Relocation/Expansion	$26.7	$26.7	TIRCP	SJJPA	Planning/Env.
New Oakley Station	$8.6	$8.6	TIRCP	SJJPA	Design/Const.
Allensworth Accesssibility Improvements	$0.3	$0.3	Cost Savings	SJJPA	Planning
Turlock-Denair Station Bus Loop	TBD		TBD	SJJPA/Stan Co.	Planning
New Parking Lots	TBD		Cost Savings/SRA	SJJPA	Planning
Station Enhancements - Other**	$0.1	$0.1	Minor Cap/Cal OES	SJJPA	Planning
Corridor and Other Projects					
Stockton Wye	$8.7	$8.7	SRA	UPRR	Design/Const.
Platform Accessibility for High-Floor Cars	$5.0	$5.0	ITIP	Caltrans/SJJPA	Design
Increasing Operating Speeds (e.g. 90 mph)	TBD		TBD	SJJPA/BNSF	Planning
Cal PIDS Replacement/Upgrade	$0.9	$0.9	Cost Savings/SRA	SJJPA/CCJPA	Planning
Stockton Diamond Grade Separation	$237.0	$24.7	ITIP/SB 132	SJRRC/SJJPA/UP/BNSF	Planning
Stockton Rail Maintenance Facility Expansion	$15.0	$15.0	ITIP	SJRRC/SJJPA	Design
Safety Improvements***	TBD		TBD	SJJPA/CCJPA	Planning

Source: Caltrans Division of Rail and Mass Transportation and SJJPA, 2020.

Notes:

*Consists of a variety of station improvements that include lighting, signage, landscaping, repairs, and other projects

** Consists of non-Short-Term Service station improvements that include lighting, signage, landscaping, repairs, and other projects

*** Safety improvements could include upgrades to lighting, security cameras, fencing, and at-grade crossings, as well as grade separation projects

Longer-Term Capital Improvements

SJJPA is developing a comprehensive program of improvements to increase the frequency of trains beyond the 8th and 9th Daily Round-Trips, reduce travel time, increase ridership, and improve service reliability of the San Joaquins. Longer-term improvements are identified below. The development of these projects will require further review by SJJPA and is subject to approval from the State, Union Pacific, BNSF, local and regional agencies, and other interested parties.

Hourly Service (Sacramento and Merced)

SJJPA aims to continue to increase service between Sacramento and Merced until hourly frequencies are achieved. This purpose of this increase in frequency is twofold: 1) accommodate increasing demand for business travel and leisure day trips; and 2) provide a connection from Sacramento and Northern San Joaquin Valley to the high-speed rail system at the Merced Station. While improvements being planned as part of the 8th and 9th Daily Round-Trips will go a long way toward preparing the corridor for the future, it is likely additional capacity and other projects will be needed to reach hourly service, especially in the Stockton area and southward toward Merced.

Elements of achieving hourly service will include: increasing the capacity of Robert J. Cabral Station in downtown Stockton, constructing the grade separation of the Stockton Diamond (i.e. the intersection of UPRR Fresno Subdivision and the BNSF Stockton Subdivision), double-tracking projects work as necessary, the MITC Project to enable the multi-modal connection with the Merced-Bakersfield HSR Interim Operating Segment, construction of a new maintenance facility, and the procurement of additional rolling stock. The full extent of improvements required to reach hourly service are still being determined. Additionally, optimization of both scheduling and equipment has the potential to reduce the need for physical infrastructure. When optimization studies currently underway at Caltrans and CCJPA are completed, SJJPA will re-evaluate the need for some of the mentioned infrastructure projects. In addition to optimization, capital access fees are being considered as another approach to constructing infrastructure directly.

Corridor Capacity Enhancements (Stockton – Oakland)

Additional track improvements between Stockton and Oakland would improve the reliability of existing service as well as possibly allow for an increase in the number of daily round-trips from the five that operate today. Caltrans has previously identified a variety of improvements between Oakley and Port Chicago that SJJPA is considering. Additionally, significant investment would be required between Port Chicago and Oakland for improvements to allow additional trains to reach all the way to Oakland (from Martinez) for either the San Joaquins or Capitol Corridor. Additional specific projects still need to be identified to understand the full extent of the improvements needed. SJJPA will work with Caltrans, CCJPA, BNSF, and UPRR to determine the needs that remain beyond the current projects identified.

Longer-Term Projects (Under Development)

In addition to extension of service along the Sacramento Subdivision, SJJPA is investigating additional extensions. SJJPA is currently examining scenarios that could lead to service north of Sacramento. The 2013 State Rail Plan identifies a "San Joaquin Extension to Redding" as a potential expansion of the San Joaquins, and SJJPA is examining this possibility. As first steps, extensions to Yuba City/Marysville and Oroville are under consideration. Another extension of the San Joaquins SJJPA is studying is from the current terminus at Oakland Station to the Oakland Coliseum/BART Station (currently served by Capitol Corridor trains). Extending the service just five additional miles to this station would provide another direct link between the San Joaquins and BART, as well as new connections to the Coliseum complex and the Oakland Airport via the BART to OAK Automated Guideway Transit service (formerly called the Oakland Airport Connector). SJJPA also will continue to explore the longer-term possibility of having some San Joaquins in the future utilize the Altamont Corridor to bring San Joaquins to additional Bay Area markets.

Another project under consideration is to consolidate Stockton's two rail stations at Cabral Station, which would enable Stockton to be served by a single station, providing a safer environment for passengers, more secure parking, a direct connection to Sacramento – Fresno/Bakersfield San Joaquins trains, ACE commuter trains, and promote transit-oriented development. An alternative being investigated for Stockton is relocating the "San Joaquins Street" station to a location in the vicinity/east of the Stockton Diamond Grade Separation Project. This alternative would enable this relocated station to provide direct service to both the Bay Area and to Sacramento.

6. PERFORMANCE STANDARDS AND ACTION PLAN

Pursuant to AB 1779, the Secretary of CalSTA submitted a set of uniform performance standards on June 30, 2014 for all state-supported intercity passenger rail corridors. These standards require the administrators and operators of these intercity services to control cost and improve efficiency. SJJPA adopted the CalSTA performance standards on September 27, 2014.

CalSTA identified three uniform performance standards measures to be used for the State supported intercity passenger rail services: usage, cost efficiency, and service quality.

Usage – measured by passenger miles and ridership.

Cost Efficiency – measured by farebox recovery and total operating cost per passenger mile.

Service Quality – measured by endpoint on-time performance, all-station on-time performance, and operator responsible delays per 10,000 train miles.

In support of the State's performance standards, SJJPA has developed measures to continuously monitor the financial, operational, and ridership performance, as well as outreach effectiveness of the San Joaquins. Additionally, SJJPA already has and will continue to develop strategies to maintain successful performance of the San Joaquins.

In addition to the CalSTA performance standards, SJJPA has focused on the environmental impact of the San Joaquins and its role in helping to create a more sustainable California. Increases in San Joaquins ridership benefit the environment by reducing air pollution and greenhouse gas emissions and help to encourage sustainable, transit-oriented development. It is estimated that in FY 2016, San Joaquins passengers (including those on Thruway Buses) traveled over 240 million passenger miles, resulting in a significant net reduction in CO2 emissions. Additionally, SJJPA is pursuing use of renewable diesel fuel in all locomotives and buses, which will further reduce emissions, along with the planned 8th and 9th Daily Round-Trips and other proposed service increases.

FY 2020/21 and 2021/22 Action Plan

For FY 2020/21 and FY 2021/22, SJJPA will continuously develop action plans with service criteria and objectives to increase ridership, control costs, improve quality, increase the benefits of the San Joaquins Corridor, and better integrate all corridor public transit systems with the San Joaquins (including dedicated Thruway Bus services). Each action will be part of SJJPA's overall management of the San Joaquins as a transportation product in a highly competitive travel market. The following is a list of areas to be covered:

- Negotiate additional revisions to the Amtrak operating agreement to improve performance reporting and decrease operating costs. Plan to reinvest these savings to improve service.
- In coordination with CalSTA, Caltrans, Amtrak, BNSF and UPRR develop and deploy a revised schedule for Spring 2020 that builds upon the Spring 2019 slotted schedule and reduces the Bakersfield to Northern California travel time to under six hours.
- Continue to work jointly with the CHSRA, Caltrans, and CalSTA to develop viable strategies and solutions to support phased implementation of high-speed rail and to meet the needs of the San Joaquins and the stakeholder communities of the San Joaquins Corridor. This includes continuing Network Integration planning and coordination to support the success of the Merced-Bakersfield HSR Interim Operating Segment.
- Apply for state (TCEP and Congested Corridors) and federal (INFRA, and BUILD) funding to implement the Stockton Diamond Grade Separation Project, and complete the environmental and design work for this key project.
- Work with the state to identify funding and then lead the environmental and detailed design work for the MITC Project.
- Complete "South of Merced" Network Integration studies.

- Coordinate with SJRRC's Ceres to Merced environmental review process regarding the planning and environmental clearance for a layover and maintenance facility in Merced for ACE and San Joaquins services.
- Support the California Integrated Ticketing Program (CalITP) efforts and the early deployment of a pilot program that would include California's intercity and commuter rail services.
- Implement improvements needed for the planned 8th and 9th Daily Round-Trips in conjunction with UPRR, BNSF, Amtrak, and the State.
- Contribute to the ongoing fleet analysis being conducted by Caltrans, which is examining ways to maximize deployment and scheduling efficiencies along the San Joaquins and Capitol Corridors, allowing for increased capacity for rail service and more efficient utilization of equipment.
- Participate in the Statewide Working Group Fleet Management focus group that will address issues such as the retirement of the Comet Cars from regular service and the deployment of the new Siemens rolling stock (including any additional infrastructure needed associated with the new equipment).
- Contribute to the Service Optimization Study, which is currently under development by CCJPA. The Study is an effort to identify solutions to optimize ridership and revenue and coordinate service transfers for the Northern California passenger rail system (including the Capitols, San Joaquins, ACE and Caltrain).
- Develop SJJPA policy for service standards for extensions, new station stops, train running times, station design criteria, etc.
- Continue SJJPA's Marketing and Outreach efforts.
- Develop the FY 2021 SJJPA Business Plan Update for FY 2021/22 and FY 2022/23.
- Continue to participate in California's Network Integration Strategic Service Planning (NISSP) process.
- Continue daily performance reporting.
- Continue to coordinate with UPRR, BNSF, and Amtrak on schedule and train performance.
- Conduct market research to solicit feedback from passengers and potential riders to understand existing ridership markets and to identify emerging markets.
- Monitor and report on the status of Business Plan commitments.
- Continue to refine SJJPA's Capital Improvement Program.
- Work to improve coordination of fares and service schedules with connecting transit systems.
- Continue to evaluate measures to improve train and Thruway Bus performance, including modifications to existing service routes and taking on the procurement and management of Thruway Bus contracts.
- Work with Amtrak to create a set of monthly data reports for the Thruway Bus network, including easy to understand origin/destination data, bus stop utilization, and route capacity.
- Work with Amtrak to generate origin/destinations data by regions rather than just station pairs for both train and Thruway Bus trips.
- Expand efforts to monitor Thruway Bus performance.
- Work to improve areas surrounding Thruway Bus stops.
- Implement a pilot program for an additional Thruway Bus route to serve the travel market between the Southern San Joaquin Valley (Merced) and Silicon Valley (San Jose) with stops at Los Banos and Gilroy.
- Explore new partnerships with public or private bus operators and implement the provisions of SB 742 with the goal of allowing non-Amtrak passengers to utilize excess seating capacity on buses that connect with San Joaquins trains to save on operations costs.

- Continue analysis on operational impacts and ridership potential of the Kern County stakeholder proposal for express train service between Bakersfield and Sacramento for consideration as part of the Spring 2020 San Joaquins schedule.
- Identify future infrastructure (track, signal, and bridge) and facility projects to support increased service levels and extensions and improve performance of service.
- Monitor and expand the programs with transit agencies to improve and promote connectivity between the trains and local transit services.
- Implement a transit transfer program for San Joaquins passengers if funding permits.
- Pursue improved connectivity through partnerships with bike sharing, carsharing, ridesharing, ferry, and transportation network services, as well as increasing availability of car rental services where appropriate.
- Identify locations for electric car charging stations at San Joaquins stations.
- Increase bike parking and storage (i.e. lockers) capacity at stations, as well as ensuring enough bicycle racks are available onboard trains to meet demand.
- Explore implementing a business class section and/or "Quiet Car" on trains.
- Work with Amtrak to increase performance tracking through detailed monthly reports on ticketing (including e-Ticketing), delays, and food service.
- Work with UPRR, BNSF, Amtrak, and State to grow ridership and revenue by improving reliability, adjusting the service plan, and/or implementing projects that add capacity and reduce travel times.
- Work with Amtrak to secure additional cost efficiencies to be reinvested in service enhancements.
- Continue planning and environmental work related to additional service to Sacramento in coordination with BNSF, UPRR, CHSRA, CalSTA, and the Central Valley Rail Working Group.
- Continue working with Amtrak, CCJPA, LOSSAN, and Caltrans on identifying additional standards for equipment reliability and availability, maintenance of minimum trainset capacity, service performance, and crew size.
- Work with Amtrak, CCJPA, Caltrans, UPRR, and BNSF on identifying variables that effect on-time performance.
- Coordinate with Caltrans and Amtrak to identify and implement equipment modifications to increase reliability, improve passenger amenities, and improve service.
- Coordinate with Caltrans and the Statewide Intercity Passenger Rail Working Group to identify rolling stock needed for increased service levels.
- Coordinate with the California Freight Advisory Committee and provide input on the implementation of the California Freight Mobility Plan and the California Sustainable Freight Action Plan.
- Develop and work to establish a program to provide subsidies for residents of disadvantaged communities within the San Joaquins Corridor who cannot afford the regular fares.
- Work with Amtrak, BNSF, and UPRR to reduce run times between Bakersfield and Northern California to under six hours with the goal of avoiding the need for crew changes as part of the Spring 2020 schedule.
- Continue to work with CHSRA, Amtrak, the City and County of Madera, and CalSTA to relocate the Amtrak Madera station at Avenue 12 that would provide a seamless connection between the San Joaquins and future high-speed rail service, as well as improved access over the existing Madera Amtrak Station.
- Establish Redding – Sacramento as an "Emerging Corridor" for an extension of the San Joaquins to be eligible for potential state capital funding for emerging corridors.

- Explore applying for and utilizing Strategic Growth Council (SGC) grants to improve San Joaquins stations located in disadvantaged communities.
- Enact strategies to improve café car cost efficiency.

7. ESTABLISHMENT OF FARES

SJJPA will work with Caltrans and Amtrak to develop fares ensuring the service is attractive and competitive with other modes of transportation along the corridor. Available ticket types on the San Joaquins are: one-way, round-trip, 10-ride tickets, and monthly passes. The multi-ride tickets, and tickets purchased by seniors, students, veterans, military personnel, the disabled, and children under the age of 15 are sold at a discounted rate. Additionally, Amtrak provides reduced fares for groups of more than 15 people. A "Friends and Family" discount program has been established for the San Joaquins, enabling small groups of 2 to 6 passengers to travel for less every day of the week with the exception of a few black-out dates during peak travel periods. Passengers that buy one full-fare ticket save 50% on up to five companion fares with the Friends and Family discount. As of May 1, 2017, 10-ride tickets are valid for 60 days from the first use.

The current fare policy for the San Joaquins is reserved ticketing with no revenue management. The reserved ticketing policy requires a passenger(s) to purchase a ticket(s) for a specific train/thruway bus for a specific date of travel. Reserved ticketing helps operations better control the inventory of available seats to prevent standing conditions, especially during high traffic periods. The San Joaquins have a single, "one-bucket" fare grid with a peak fare plan for high traffic periods. The fare grid utilizes a distance based methodology with a descending per mile rate as the length of the trip increases. A 5% overbooking policy is in place to ensure no undue sold-out situations occur on short segments of the corridor. Reserved ticketing alerts ticket purchasers of "at-capacity" trains to help encourage them to purchase tickets for a less impacted train or another date.

SJJPA will look into other opportunities to increase fare revenue, including but not limited to:

- Explore smart-card fare collection technology or other current best-fit technology provided it can be incorporated into the Amtrak ticketing structure;
- Continue and expand the transit connectivity programs such as the Transit Transfer Program, joint ticketing, and transfer of motorcoach bus routes to parallel local transit services;
- Increase public awareness of the Service to increase ridership and revenue;
- Encourage new riders by promoting discounts for group travel and families; and
- Explore establishing a program to subsidize tickets for residents within disadvantaged communities along the San Joaquins Corridor who cannot afford to pay regular San Joaquins fares.

Amtrak Tariff Changes

On November 8, 2017, SJJPA was notified that Amtrak was changing its "Tariff Policy" to adjust the nationwide senior, disabled, child, and student discounts, as well as changes to its cancellation policy. Below is a summary of changes:

- Senior Discount Reduced from 15% to 10%, while applicable age increased from 62+ to 65+;
- Disabled Discount reduced from 15% to 10%;
- Reduce Child Discount being applied to 2 children for 1 adult to 1 child per adult; and
- Discontinue nationwide Student Discount.

Subsequent to the above changes in the tariff policy, SJJPA was later notified by Amtrak of changes to other discounts and its reservation cancellation/change policy. These policy changes increase cancellation and change fees for both Saver and Value Fares. Additionally, Amtrak has cancelled its AAA discount and will cancel the Veterans Advantage discount shortly. These changes were made without consultation with SJJPA or other Amtrak state partners.

In response to these changes, Amtrak provided SJJPA with a summary of projected ridership and revenue impacts on the San Joaquins for the Student, AAA, and Senior Discount changes. Ridership is projected to decrease by 10,295 while revenue is projected to increase $116,573.

The changes above do not align with SJJPA's marketing or fares strategy. To retain some of these discounts, SJJPA, CCJPA, and LOSSAN JPA partnered together to create the "California Everyday Discount" program. As a part of this program, the California JPAs retained the senior, disabled, veteran and student discounts. By partnering together, the JPAs ensure that riders within California interact with a united marketing message from all three corridors. The discount usage methodology has changed from a drop-down list to a promo code which may become a barrier to usage, but the JPAs are working together to educate passengers.

8. SERVICE AMENITIES AND FOOD SERVICE

The San Joaquins boasts many great amenities that are integral to the attraction of riders and are key marketable features of the service. These features add value to the customer experience. SJJPA is working with Caltrans, Amtrak, and the other JPAs to improve amenities and add additional services. The San Joaquins also provides a food and beverage service for passengers.

Service Amenities

All coaches in the Northern California Fleet have Wi-Fi service. This service is free to the customer and permits e-mail and webpage viewing. Amtrak's Wi-Fi service prohibits streaming services which would utilize large amounts of bandwidth. In FY 2016/17, SJJPA in partnership with Amtrak, launched AmtrakConnect onboard the San Joaquins. AmtrakConnect is a mini-site tailored to San Joaquins passengers that is automatically launched when users join the onboard Wi-Fi network. This platform is used to inform passengers of the train status, offer helpful information regarding their destination station, present information about discounts, and as a promotional tool for strategic marketing partnerships within the corridor. AmtrakConnect is continuing to be updated and expanded to improve the customer experience and offer more helpful information.

In FY 2017/18, Amtrak informed SJJPA that it had planned changes to its Wi-Fi program, which resulted in cancellation of Wi-Fi service support and maintenance. In response, SJJPA worked with Caltrans, CCJPA, and LOSSAN JPA to ensure passengers do not experience a disruption in service and CCJPA has taken responsibility for future management of Wi-Fi service in coordination with SJJPA and Caltrans. A Wi-Fi system upgrade will be performed by CCJPA and its contractors in FY 20/21 providing improved Wi-FI service to San Joaquins passengers.

Bi-level coaches have bicycle storage units that hold three bicycles on the lower level of the car. In addition, 14 first generation California Cab Cars (8300-series) have undergone a retrofit to hold 13 bicycles as opposed to 7 bicycles. The five Surfliner Cab Cars (6000-series) have storage space for up to 13 bicycles in the lower baggage area. Comet Car coaches have no bicycle storage. For the Comet Car trainsets, there are 4 bicycle storage units in the "Cabbage" car which also is used for baggage. It is important to note that on the Comet Car trainsets, bicycles are only accommodated at staffed stations.

Both the bi-level and Comet coaches feature comfortable seating. Seating arrangements offer passengers a traveling experience without a middle seat with ample leg room. Power plug access is available at each seat and can power and charge passengers' various electronic devices. Drop-down trays for holding food, laptops, or other items are also provided. Each coach car features areas where four seats are arranged with a work table. The overall seating arrangements offers a relaxed customer experience. Additionally, the San Joaquins feature overhead luggage racks and a no baggage fee policy for two checked bags and two carry-on bags within specified dimension and weight requirements.

Food and Beverage Services

Each San Joaquins train has a café car which offers food and beverage service throughout most of the end-to-end trip. SJJPA and CCJPA share the Oakland Amtrak Commissary where product is warehoused and ordered to be loaded onto the trainsets. Due to the co-location of the commissary, SJJPA and CJJPA share in the responsibility of providing oversight and direction for the café car program which is generally consistent across trainsets for both corridors.

A wide variety of entrees, snacks, and beverages are available. SJJPA is evaluating the existing food and beverage service to provide high quality options in the most efficient and cost-effective manner. Topics being evaluated include: menu; inventory and storage; increasing the capacity and usefulness of the space in the cars; patron flow; signage and information; securing and accounting for stock and materials; restocking logistics; and hours of operation. SJJPA has

reduced the number of items on the menu to ease loading, reduce cost, provide a simpler customer experience, open storage space for limited-time specialty items, and make it easier to promote items on the menu. In addition to these efforts, SJJPA is considering café car changes to underperforming trainsets including the removal of the café car or utilization of lower-cost cart service as well as vending cars. While evaluating changes to the current partnership with Amtrak to increase the cost recovery of the café, SJJPA is evaluating the use of a third-party vendor to provide this service. Third-party vendors are utilized on other Amtrak operated corridors with significant success in cost recovery efforts with the added benefits of simplified operations and reporting of performance.

SJJPA is actively increasing the sale of and promotional opportunities for products grown or produced in the San Joaquins Corridor. The San Joaquins offers a very unique opportunity to highlight and promote food and beverage products from the San Joaquins Corridor and can help market the service and the corridor. SJJPA is continuing to work with Amtrak and CCJPA to explore providing more locally-sourced food and beverage products in the most cost-effective way on an ongoing basis. Current local offerings include: craft beer, coffee, hot dogs, and San Joaquin Valley nuts.

9. MARKETING AND OUTREACH

The San Joaquins serve markets from Bakersfield to Sacramento via the San Joaquin Valley and branch off from Stockton through the East Bay Area to Oakland. The San Joaquins are unique in the State and Nation, with a vast network of Thruway Bus services that provide convenient connections between northern and southern California. Between the trains and connecting buses, the San Joaquins provide easy access to many of California's popular destinations, including: cultural attractions; museums; universities; amusement parks; entertainment and music venues; national, state, regional, and local parks; state and county fairs and festivals; seasonal cuisine and artisan foods; the State Capitol; and major population centers.

SJJPA staff has developed and continues to implement the SJJPA Marketing and Outreach Plan, which focuses on a combination of advertising, social media, and grassroots strategies. It is the combination of strategies and channels that provide greater coverage and focus to the Marketing and Outreach Plan, providing SJJPA the best opportunity to reach community stakeholders and passengers.

The marketing and outreach efforts have resulted in corridor-wide support from stakeholders for Intercity Passenger Rail. Many corridor stakeholders and stakeholder groups have submitted grant application support letters and have attended SJJPA Board of Directors meetings to support planning efforts for Morning Express Service and future service expansion. In addition, many stakeholder groups have taken group trips on the San Joaquins to experience the service and promote its use on social media. Stakeholder individuals that utilize the service are continuing to participate in SJJPA's 'Look Who's Riding' social media campaign, which shares photos and testimonials from corridor stakeholders.

Increase in Marketing Funds

SJJPA is requesting an increase in the yearly allocation from $1,000,000 to $1,500,000 to better facilitate marketing and advertising to the entirety of the San Joaquins Corridor. Recent data provided by Amtrak shows that approximately 13.6% of San Joaquins passengers live in the Bay Area and 9.4% of live in the Los Angeles Region. This amounts to over 20% of San Joaquins passengers living in high cost regions for marketing and advertising. Additionally, the San Joaquins spans the largest geographic area of the three California Intercity Passenger Rail Services. With vital thruway bus services originating in communities as far north as McKinleyville and Redding to as far south as San Diego, the San Joaquins serves a large geographic area with diverse set of Designated Marketing Areas (DMA). The increase in budget will allow SJJPA to more equitably and realistically market to the San Joaquins Corridor, including in the larger markets like the Bay Area and Los Angeles and the smaller more disadvantaged markets in the Thruway Corridors.

Grassroots Outreach Strategies

SJJPA contracts with qualified Outreach Teams to engage in several activities to reach corridor communities and stakeholders including: engaging stakeholders, working with the media, facilitating group trips, tabling at large local events, and presenting to community groups.

Engaging Stakeholders

Local, committed stakeholders are vital to promote the service, improve local presence, and activate communities to ride the train. Stakeholder education meetings and presentations are key components to the grassroots marketing efforts.

Stakeholder group outreach is a key component of both the Outreach Team contracts as well as a staff priority. There are several key groups, chambers, partnerships, agencies, universities, and organizations within the corridor that are an essential component of awareness and messaging multiplication. SJJPA is also expanding outreach to include other stakeholder groups throughout corridor, including bicycle coalitions, university Alumni Associations, League of California Cities, and California State Association of Counties.

Each Outreach Team is leveraging its contacts and SJJPA contacts, while also placing and emphasis on new stakeholder acquisition, to schedule formal meetings that serve to education stakeholders about the San Joaquins Service. A key

component to Stakeholder Development is to create a reliable database of contacts to inform about service updates, call upon for help, and utilize to increase the SJJPA message throughout the corridor.

SJJPA staff also coordinates and hosts regular meetings of the San Joaquin Valley Rail Committee (SJVRC). The SJVRC is a technical advisory committee composed of a diverse group of rail advocates from various backgrounds and affiliations. Committee members represent all the counties through which the San Joaquins operate, as well as Thruway Bus regions including Los Angeles, San Francisco, and Northern California. SJVRC members provide critical feedback to SJJPA staff on how to improve the San Joaquins from the perspective of ordinary citizens.

Working with the Media

The media is an important aspect of any marketing plan. The localized Outreach Teams assist with media relations, utilizing their established relationships with local and regional media. The Outreach Teams help to schedule interviews, facilitate press conferences, and ensure that SJJPA press releases and media advisories are successfully delivered.

Facilitating Group Trips

In partnership with the community groups, agencies, organizations, school groups, businesses, and other stakeholders, Outreach Teams are facilitating group trips on the San Joaquins. They assist with building itineraries, navigating ticket purchases, offering safety information, and other supporting activity necessary to accomplish the group trip.

Getting groups on the train helps cultivate community ambassadors by offering firsthand experience of the service. Outreach Teams' efforts in this area ensure that engaged parties do not just hear a presentation but ride the service, helping them get over the hurdle of the 'first ride' and using this as an opportunity to engage their constituents through testimonials via social media and other means.

Tabling at Local Events

A key grassroots initiative for SJJPA is to meet current and potential riders in their communities. To this end, SJJPA Outreach Teams are tabling at local community events in the corridor to hand out service information, educate potential riders on the service, promote discounts, provide train safety information, and listen to the community's feedback on the service. Event tabling is an important strategy for reaching Hispanic and disadvantaged communities, allowing Outreach Teams to meet these communities in their contexts with materials adapted to their language. Additionally, Outreach Teams employ or contract bi-lingual service ambassadors for SJJPA.

Presenting to Community Groups

Service education and awareness is an important grassroots marketing principle. To educate corridor communities and stakeholders, Outreach Teams frequently give presentations to community groups, organizations, school groups, businesses, and others to grow awareness of the service and cultivate community ambassadors.

Advertising

In addition to the grassroots efforts, SJJPA is engaging in targeted advertising campaigns through both digital and traditional advertising channels. The advertising program utilizes a multi-touch methodology by which multiple mediums are employed to reach a broad base of current and potential riders with opportunity for the targets to see the advertising multiple times. Digital advertising types being utilized include: display networks, digital radio, social media, and pre-roll video advertising. Traditional advertising types being utilized include: television, radio, print, billboards, and theatre screen advertising. Advertising is being deployed primarily in English and Spanish with other languages being adapted on a targeted basis.

SJJPA will be placing a higher priority on advertising due to the success of past campaigns in driving traffic to the website and passenger preferences for purchasing tickets through online methods such as AmtrakSanJoaquins.com, Amtrak.com, and the Amtrak Mobile App.

In addition to traditional advertising, SJJPA is placing Amtrak San Joaquins logos and the phrase "Your Train Connection" on the sides of Thruway Buses throughout the state to increase public awareness and exposure to the service. This strategy will increase the reach and scope of SJJPA advertising efforts, as well as, serve as a cost-effective means of attracting additional ridership.

Social Media

Building on SJJPA's successful social media strategy for the Amtrak San Joaquins, SJJPA is expanding the use of social media. Social Media strategies include both content posting and paid advertising. SJJPA is utilizing the following platforms: Facebook, Instagram, Twitter, and YouTube. Social Media is an effective tool to engage customers, increase communication, and ensure brand visibility. Capitalizing on SJJPA's extensive grassroots efforts, content is being aggregated corridor-wide to market station area communities and events. Discounts and promotions are organically posted as part of customer conversations, as well as in social advertising with a primary focus on Facebook.

Social Media is also being used to create a one-click channel to AmtrakSanJoaquins.com or subsequent discount pages. Social media platforms offer extensive targeting capability, ensuring relevant content and promotions are reaching the desired demographics.

Increase Marketing and Outreach to Universities and Community Colleges Served by Thruway Buses

The San Joaquins' Thruway Bus network provides connections to numerous universities and community colleges throughout California. SJJPA has initiated efforts to engage students through event tabling and will work to expand outreach efforts to additional campuses. By conducting outreach to students attending schools near Thruway Bus stops, SJJPA will work to inform students on the many benefits of the San Joaquins and attract additional ridership.

Increase Marketing and Outreach to Military Personnel and Veterans

The San Joaquins currently provides discounts for both active military personnel and veterans. However, Amtrak will be cancelling the veterans discount shortly. SJJPA is currently exploring ways to preserve this important discount. SJJPA will focus a portion of its efforts engaging these groups with discount education as well as targeted trip planning ideas.

Market Analysis

SJJPA is utilizing market analysis reports performed by Amtrak and Caltrans to inform its marketing efforts and tailor messages. Caltrans has indicated its suspension of further market analysis programs. To continue to gather this market data, SJJPA is requesting additional funds in the amount of $200,000 to perform market analysis on a bi-annual basis. Marketing analysis research will be performed both onboard to gather current ridership data and via other means (phone surveys, online surveys, in person intercepts, etc.) to collect non-rider data. Data will be compiled into a report and utilized to inform ongoing marketing efforts and messaging. A bi-annual methodology is being employed to allow time for advertising and other marketing strategies that are based on market analysis to have sufficient time to penetrate the market.

10. ANNUAL FUNDING REQUIREMENT

The annual state budget includes a line item for the operating costs of the three state-supported intercity rail services. For each service, the state budget provides funding for intercity train operations, a marketing budget, minor capital projects, and the administrative staff budgets. The California Legislature approved the FY 2019/20 State budget that continues this support.

A primary purpose of this Business Plan is to request the annual funds required by SJJPA to operate, administer, and market the San Joaquins for agreed-upon service levels. This chapter documents ridership and revenue projections; FY 2018/19 financial numbers (actuals); operating, marketing, and administrative funding requests of SJJPA for FY 2020/21 and FY 2021/22; and special funding requests for the marketing of new rail services and to conduct market analysis. Also documented are operating cost analysis and cost savings due to management decisions, and proposed uses for these funds per the ITA.

Ridership and Revenue Projections

Ridership projections by Amtrak for Federal FY 2019 (October 2018 – September 2019) for the San Joaquins anticipated a 5.5% increase from FY 2018 actual ridership (increasing from 1,078,707 in FY 18 to 1,139,630 in FY 19). Actual Federal FY 19 ridership was 6% less than was forecasted by Amtrak (1,071,190 actual vs. 1,139,630 forecast). Actual ridership for FY 19 decreased 0.7% compared with FY 18 (1,071,190 vs. 1,078,707 respectively).

For FY 2019, Amtrak forecasted an increase in ticket revenue of 3.6%, from $32,923,626 in FY 18 (actuals) to $34,124,000 in FY 19 (forecasted). FY 2019 actual San Joaquins ticket revenue was 6.8% less than was forecasted by Amtrak ($31,884,583 actual vs. $34,124,000 forecast) and was 3.2% less than actual ticket revenue for FY 18 ($32,923,626 actual).

Amtrak's Federal FY 2020 (October 2019 – September 2020) forecast for San Joaquins ridership is 1,115,500. This represents an increase of 4% from actual FY 19 ridership. Ticket revenue for Federal FY 2020 is estimated at $33,413,644 (an increase of 4.7% from actual FY 19 ticket revenues).

SJJPA expects to receive Amtrak's forecasts for FY 2021 (October 2020– September 2021) for both ridership and ticket revenue in April of 2020. Amtrak does not yet have San Joaquins ridership and revenue forecasts for FY 2022.

FY 2018/19 Operating Fiscal Report (Actuals)

The net operating costs (expenses less revenue) for Amtrak to operate the San Joaquins for FY 2018/2019 was $50,622,776, which was $5,828,996 above the FY 2018/19 allocation of $44,793,780. A supplemental shortfall request was approved in June 2019 in the amount of $5,245,000 for operations expenses in excess of the original allocation. There were no other operating costs incurred outside of the Amtrak contract.

FY 2018/19 Administrative Fiscal Report (Actuals)

The net administrative costs for SJJPA to manage and administer the San Joaquins for FY 2018/2019 was $2,135,360.

Operating Funding Request (FY 2020/21 and FY 2021/22)

The financial performance of the San Joaquins is dependent on several institutional arrangements. The most important arrangement is the contract with Amtrak to operate the service and maintain any assigned equipment and facilities.

San Joaquins operating expenses that fall under the Amtrak contract include:

- Onboard labor;
- Equipment maintenance;
- Railroad performance incentives;
- Train fuel and power;
- Property insurance for state-owned rolling stock operated (maintained by Amtrak);
- Liability insurance and indemnification;
- Lease of Amtrak equipment;
- Commissary and station costs;
- Terminal yard costs;
- Police presence;
- Support of Amtrak's national and local operation (e.g. phone information and reservations system); and
- Connecting bus service and other operating expenses.

The CTC allocated SJJPA $56,676,590 in operating funding for FY 2019/20. Of this, $51,374,350 will be utilized for the Amtrak contract. SJJPA used the remaining $3,616,000 for several operational items outside of the Amtrak contract, which are described below. The funding request for FY 2020/21 is $58,805,207 for the Amtrak contract and $1,400,000 for the non-Amtrak operational items (see Table 10.3). For FY 2021/22 the San Joaquins projected funding request is $60,569,363 for the Amtrak contract and $1,450,000 for non-Amtrak operational items, for an increase of 3% over the FY 2020/21 funding request.

Difference between the Amtrak State Payment Forecast and the Operations Budget

No difference is anticipated.

Operating Costs not included in Amtrak State Payment Forecast

SJJPA is in the process of taking on more direct responsibility for the operations of the San Joaquins outside of the Amtrak operating contract for operational items such as Host Railroad Incentive Payments, station leases and insurance, thruway bus management support, and market research and ridership support. See Table 10.3 for a total estimated budget for non-Amtrak items.

SJJPA is also considering partnering with private and/or public bus operators to improve connecting bus service for San Joaquins passengers that would be outside of the Amtrak operating contract. Costs for these services are not determined yet, but a net savings is anticipated in costs as these partnerships would replace existing Thruway Bus services, and fill excess seating capacity, potentially as early as FY 2020/21.

Administrative Funding Request (FY 2020/21 and FY 2021/22)

Funds are required for the SJJPA to provide administrative support for the San Joaquins. SJJPA administrative costs for FY 2020/21 are proposed at $3,247,589. For FY 2021/22, SJJPA administrative costs are estimated at $3,328,779. See Table 10.1 for a summary of these administrative costs alongside operations and marketing costs. These costs are based on a 3.4% increase for cost escalation. See Table 10.2 for a breakout of budgeted administrative costs.

Marketing Funding Request (FY 2020/21 and 2021/22)

For FY 2020/21and FY 2021/22, SJJPA assumes "Marketing Expenses" of $1,500,000 for the ongoing annual marketing program, for which SJJPA has developed a Marketing and Outreach Plan. This represents a $500,000 increase from previous years. Recent data provided by Amtrak shows that approximately 13.6% of San Joaquins passengers are from the Bay Area and 9.4% of are from the Los Angeles Region. This amounts to over 20% of San Joaquins passengers are from high cost regions for marketing and advertising. Additionally, the San Joaquins spans the largest geographic area of the three Intercity Passenger Rail Services. With vital thruway bus services originating in communities as far north as McKinleyville and Redding to as far south as San Diego, the San Joaquins serves a large geographic area with diverse set of Designated Marketing Areas (DMA). The increase in budget will allow SJJPA to more equitably and realistically market to the San Joaquins Corridor, including in the larger markets like the Bay Area and Los Angeles and the smaller more disadvantaged markets in the Thruway Corridors. The marketing expenses represent only those direct expenses attributed to SJJPA and do not include any costs for marketing programs provided solely by Amtrak or the State.

Minor Capital Funding Request (FY 2020/21 and FY 2021/22)

SJJPA is requesting the continuation of the $500,000 per year provided for "Minor Capital" projects (projects valued at $291,000 or less). This funding is critical to keeping the San Joaquins Corridor in a state of good repair, as well as making small service improvements.

Market Analysis Funding Request (FY 2020/21)

SJJPA is currently utilizing market analysis reports performed by Amtrak and Caltrans to inform SJJPA marketing efforts and to tailor messaging. However, Caltrans has indicated its suspension of further market analysis programs. Additionally, the market analysis Amtrak provides SJJPA is insufficient to meet the needs for planning and marketing the San Joaquins, as SJJPA is unable to control the data points that are captured. To continue to gather necessary market data, SJJPA is requesting additional funds in the amount of $200,000 to perform market analysis research on a bi-annual basis. Marketing analysis research will be performed both onboard to gather current ridership data and via other means (phone surveys, online surveys, in person intercepts etc.) to collect non-rider data.

Operating Cost Analysis and Management Actions Resulting in Operating Cost Reductions/Revenue Enhancements

Per the ITA, SJJPA is currently planning to program any potential cost savings realized as a result of ongoing management actions to service improvements. Cost savings at this time have been exhausted on operations expenses from the previous year with the exception of investment income for the 2018-19 administration and marketing funds received on an advance basis. A list of potential items that could utilize these cost savings is outlined below.

Potential Cost Savings Utilization

California Passenger Information Display System (Cal PIDS) Upgrade – SJJPA portion of the project;

New Station and Parking Improvements- Land acquisition and construction costs;

Accessibility improvements to various San Joaquins stations; and

Contribute to the SJJPA's reserve account.

Table 10.1

SJJPA State Funding Request for the San Joaquins			
Expense Category	**FY 2019/20 (Approved/Current)**	**FY 2020/21 (Requested)**	**FY 2021/22 (Projected)**
Operating			
-Amtrak Contract	$56,676,590	$58,805,207	$60,569,363
-Other Operations1	$3,616,000	$1,400,000	$1,450,000
Administrative	$3,140,802	$3,247,589	$3,328,779
Marketing	$1,000,000	$1,500,000	$1,500,000
Minor Capital	$500,000	$500,000	$500,000
Connected Corridor Schedule Advertising	$500,000		
Total Request	**$65,433,392**	**$65,452,796**	**$67,348,142**
1 Expenses under the "Other Operations" category (i.e. outside of the Amtrak contract)			

Table 10.2

Administrative Budget for the San Joaquins - Detail (FY 2019/20 - FY 2021/22)			
Expense Category	**FY 2019/20 (Approved/Current)**	**FY 2020/21 (Requested)**	**FY 2021/22 (Projected)**
Salaries/Benefits/Contract Help	$2,094,382	$2,361,112	$2,433,439
Office Expenses/Postage/Memberships, etc.	$28,333	$29,517	$30,255
Computer Systems	$5,000	$5,000	$5,000
Communications	$28,905	$28,977	$29,701
Motor Pool	$24,314	$29,779	$30,523
Transportation/Travel	$30,000	$40,000	$40,000
Training	$7,605	$7,605	$7,795
Audits/Regulatory Reporter	$16,500	$17,000	$17,000
Professional Services - Legislative	$28,500	$34,486	$34,486
Professional Services - Legal	$75,000	$75,000	$75,000
Professional Services - General	$109,267	$111,015	$110,863
Software Integration & License Fees	--	$20,000	$20,000
Professional Services - Operations	$20,000	$20,000	$20,500
Professional Services - Grants	$67,000	$67,000	$67,000
Professional Services - Planning	$150,000	$150,000	$150,000
Communications - Operations	$10,250	$11,016	$11,291
Publication/Legal Notices	$10,000	$10,000	$10,000
Maintenance of Headquarters	$82,361	$109,623	$112,364
Insurance - Admin	$16,000	$16,000	$16,000
Insurance - Railroad	$32,000	$77,850	$77,850
Insurance Management Fees	$5,000	$2,500	$5,000
Security Services/Safety Programs	--	$24,109	$24,712
Sub-Total	**$2,840,417**	**$3,247,589**	**$3,328,779**
Professional Services - Planning			
Insurance - Railroad			
Software Integration & License Fees	$20,000*		
Salaries & Benefits for New Positions	$280,385*		
Total	**$3,140,802**	**$3,247,589**	**$3,328,779**

*Note: These budget line items are being requested to be included in the annual budget, rather than as “one-time” expenses. Therefore, they are included in main the administrative budget request for FY 2020/21.

Table 10.3

FY 2020/2021 Other Operations	
Expense Category	**FY 2020/21**
Station Leases and Insurance	$100,000
Thruway Bus Management Support	$100,000
Host Railroad Maintenance Agreement	$1,000,000
Market and Ridership Research Support	$200,000
Total Other Operations	**$1,400,000**

11. SEPARATION OF FUNDING

As identified in the Joint Exercise of Powers Agreement (JEPA) for the SJJPA, the Controller of the Managing Agency of the SJJPA shall perform the functions of Auditor and Controller of the SJJPA, and the Treasurer of the Managing Agency of the SJJPA shall perform the functions of Treasurer of the SJJPA. SJJPA has selected SJRRC as the Managing Agency for the SJJPA during the term of the ITA. SJRRC utilizes the Auditor-Controller and the Treasurer of the County of San Joaquin. SJRRC has established the appropriate accounting and financial procedures to ensure that the funds appropriated and otherwise secured during FY 2020/21 and FY 2021/22 for SJJPA to support the San Joaquins are solely expended to operate, administer, and market the San Joaquins.

The ITA includes language confirming that the State shall perform audits and reviews of financial statements of the SJJPA with respect to the San Joaquins. In addition, per the Managing Agency Services Agreement between the SJJPA and the SJRRC, SJJPA will require that the Auditor-Controller shall provide for an annual independent audit of the accounts of SJJPA (pursuant to Section 6506 of the Government Code) within six (6) months of the close of the applicable fiscal years.

The County of San Joaquin Auditor Controller and Treasurer are the official Auditor Controller and Treasurer of SJJPA. The County of San Joaquin maintains a separate fund for all financial activities of SJJPA and provide monthly reports to SJJPA. Day-to-day accounting transactions are performed by the SJRRC Fiscal Department under the direction of the Controller and Director of Fiscal Services. The SJRRC/SJJPA Controller will provide for an annual independent audit of the accounts of SJJPA (pursuant to Section 6506 of the Government Code) within six (6) months of the close of the applicable fiscal years.

12. SAFETY AND SECURITY

Establishing and maintaining the highest possible levels of safety and security in a passenger rail operation begins with clear, comprehensive safety messaging and effective, involved leadership. This messaging and the role that leadership plays must both be crafted from an awareness of what is happening in every level of the operation and the extent to which safety and security play a significant role in the duties and responsibilities of all employees every day.

SJJPA's Safety and Security Program will focus on the following areas:

- Vehicular and pedestrian safety at highway/rail grade crossings, including private crossings in rural areas of the San Joaquin Valley;
- Pedestrian safety along the railroad right-of-way;
- Security inside and around stations and at Thruway Bus stops;
- Security onboard trains and on Thruway Buses;
- Safety and security training of personnel involved in all aspects of operating the San Joaquins; and
- Emergency preparedness training and exercises with first responders in coordination with Amtrak, host railroads, state and federal regulatory agencies.

Components of the Program include:

- Assuring a common understanding of safety and security objectives, targets and goals throughout the San Joaquins Service workforce;
- Communicating and strengthening safety and security strategies and policies;
- Creating and sustaining a strong safety and security culture shared by everyone involved in operating the San Joaquins;
- Ensuring the program applies to all activities involving the design, construction, testing, operations, and maintenance of the rail service and system;
- Assigning each manager, department, employee, and contractor with responsibility and accountability for safety and security program implementation and compliance;
- Requiring a robust communications protocol, including cooperation among all managers, departments, employees and contractors relative to matters of safety and security;
- Coordination with Amtrak and the two host freight railroads over whose rail lines the service is operated, the Burlington Northern Santa Fe (BNSF) Railway and the Union Pacific Railroad (UPRR);
- Pursuing an aggressive safety and security program of capital improvements; and
- Identifying relationships and responsibilities with local, state, and federal agencies that are responsible for and have governance over the San Joaquins Service, including the Federal Railroad Administration (FRA), National Transportation Safety Board (NTSB), California Public Utilities Commission (CPUC), Transportation Security Administration (TSA), and the California Office of Emergency Service (CalOES).

SJJPA collaborates with Amtrak, host railroads, and regulatory partners to identify and fully address safety concerns. As part of this collaboration, SJJPA participates in:

Corridor Improvement Team (CIT) meetings;

Northern California Rail Safety Team activities;

Partnership Performance Action Teams (PPAT);

Regional Transit Strategies Working Group (RTSWG);

Northern California Emergency Preparedness Task Force meetings; and

Joint Terrorism Task Force meetings.

SJJPA will continue to work with Amtrak, BNSF and UPRR to identify safety and security issues, develop remediation strategies, and to secure grant funding to expand and enhance safety and security programs onboard all trains and Thruway buses, and along the railroad right-of-way.

Safety and Security Program for 2020/2021 and 2021/2022

The primary objectives of SJJPA's Safety and Security Program for FY 2020/21and FY 2021/22 is to continue a broad-based program of educational activities and to aggressively pursue capital improvements that help eliminate unsafe conditions.

Safety and Security Educational Activities

SJJPA's educational efforts focus on increasing public awareness of rail safety and security along the San Joaquins Corridor and to ensure all personnel involved in operating the San Joaquins have the proper training to be effective in implementing SJJPA's Safety and Security Program. To increase awareness of the public, a wide range of populations and stakeholders will be targeted, including the existing base of employees, non-English speakers, agriculture and seasonal workers, school groups, community audiences, professional drivers, law enforcement officers, and emergency responders. To this end, SJJPA will continue to leverage a network of rail safety education resources through California Operation Lifesaver (CAOL) to inform communities about safe behavioral practices around the San Joaquins Rail Corridor.

Educating railroad personnel is as critical as raising public awareness. SJJPA will continue to take advantage of Department of Homeland Security (DHS) training resources and safety and security grant programs to build upon related activities already underway and to develop and implement new programs. Specific training efforts include but are not limited to the following:

- Emergency Preparedness Training for rail corridor first responders;
- Rail security awareness training for train crews, maintenance staff, bus operators, and station staff;
- Disaster simulations to ensure employee and first responder readiness; and
- Emergency Preparedness Training for passenger operations that connect to the San Joaquins.

To support these educational and training activities, SJJPA will continue to conduct a systematic evaluation of current safety and security practices of all personnel involved with operating the San Joaquins. As part of this process, SJJPA will identify responsible parties for safety and security work to ensure they receive necessary training and education.

Safety and Security Capital Improvements

An important aspect of safety and security are implementing physical improvements that will improve the safety and security of the Corridor and of train operations. In an effort to identify needed physical improvements, SJJPA will continue to conduct a systematic evaluation of the conditions along the railroad right-of-way and in and around San Joaquins stations (including parking lots and platforms), as well as onboard trains. California's Office of Emergency Services has provided much of the funding for SJJPA's Safety and Security capital improvements. Important capital projects that SJJPA is currently implementing or currently pursuing include:

- Fencing projects at locations identified based on incident hot spots and high numbers of near misses;
- Increased lighting at stations, parking lots, as well as installing blue light phone towers (originally developed for use on college campuses); and
- Improved safety and security-related signage, including messaging around suicide prevention and railroad safety.

A critical capital improvement being implemented is Positive Train Control (PTC), which is an advanced railroad communication system, consisting of signaling and other equipment along tracks as well as on-board trains. PTC increases the operational safety of passenger trains (and freight trains) by preventing the following:

- Train-to-train collisions;
- Over-speed derailments;
- Incursions into established work zone limits; and
- Movement of a train through a main line switch in the improper position.

SJJPA cooperated with Amtrak, UPRR, and BNSF to implement PTC along the entire San Joaquins Corridor and onboard all San Joaquins trains. Amtrak has completed the installation of onboard PTC equipment. BNSF and UPRR completed work on the track portion of PTC. Testing took place for the system during FY 2018/19 and PTC came online in October 2018, meeting the Federally-mandated deadline.

Other activities SJJPA will employ to improve safety and security include:

- Attending listening sessions with station personnel to help identify safety/security concerns and suggestions for improvements/solutions;
- Embracing the Transportation Security Administration's (TSA) offer to conduct threat / vulnerability assessments and station security profiles;
- Encouraging more police presence and patrol at stations by making areas available to officers that are stocked with snacks/beverages, and have Wi-Fi, printers, CCTV usage, and other amenities;
- Work with host railroads to ensure the corridor is kept clear of homeless encampments, and other unauthorized activities.

13. STATION AREA DEVELOPMENT

There are great benefits to enhancing development patterns and increasing development densities near San Joaquins stations. In addition to potential benefits from minimizing land consumption needs for new growth, increased dense development near San Joaquins stations concentrates activity conveniently located to these stations. This promotes increased use of the San Joaquins, generating additional ridership and revenue to benefit the State. It also accommodates new growth on a smaller footprint. A dense development pattern can better support a comprehensive and extensive local transit and shuttle system, bicycle and pedestrian paths, and related amenities that can serve the local communities. Local governments will determine which mechanisms best suit each community and could be implemented to enhance the benefits from potential San Joaquin station area development.

Applying transit-oriented development (TOD) measures around rail stations is a strategy that works for large, dense urban areas, as well as smaller central cities and suburban areas. Local governments play a significant role in implementing station area development by adopting plans, policies, zoning provisions, and incentives for higher densities, and by approving a mix of urban land uses. TOD measures generally applied to areas within about one-half mile of stations.

Implementation Strategies for TOD at San Joaquins Stations

The responsibility and powers needed to focus growth and station area development guidelines in the areas around San Joaquins stations reside primarily with local government. Key ways in which SJJPA can help ensure that the San Joaquins become an instrument for encouraging implementation of station area development principles include:

1. Encourage local governments to prepare/update and adopt station area plans, amend city and county general plans, and promote TOD in the vicinity of San Joaquins stations.

2. Assist local governments in securing grants/funding for planning and implementing TOD around San Joaquins stations.

3. Work with communities and organizations to support TOD and with developers to implement TOD.

4. Require new San Joaquins stations be developed as a multi-modal transportation hubs.

5. Encourage the location of new San Joaquins stations in traditional city centers and/or areas with high-potential for TOD.

6. Encourage planning consistent with SB 375 (Sustainable Communities Strategy), transit priority areas, infill development, and TOD.

7. Prepare station areas for potential changes in first- and last-mile access including the growth of micro-mobility, and shared, connected, electric, and automated vehicles.

Transit Oriented Development Around San Joaquins Stations

The San Joaquins has 18 rail stations. Most of the San Joaquins stations are multi-modal transportation hubs and many are located in traditional city centers. Table 13.1 presents the existing amenities and services at San Joaquin stations, as well as a preliminary assessment of their potential for new TOD. TOD opportunities are considered low at San Joaquins stations that are located in outlying areas away from the city centers/downtowns. The highest potential for new TOD at San Joaquins stations is likely to be in the major cities. To encourage TOD, SJJPA is working to improve the usability of stations and Thruway Bus stops. Comprehensive assessments have begun with the objective of updating and improving signage at and near stations and stops to enhance the experience of riders.

There are several large TODs that have developed or are being developed in the vicinity of San Joaquins stations or planned new stations. There are also opportunities to encourage TOD at several other stations. In addition to

encouraging TOD, SJJPA is working with local and regional governments to improve transit connectivity at the stations described below, along with other stations.

Sacramento TOD

SJJPA's plans for four new stations in Sacramento provide a great opportunity to not only leverage TOD that is already underway (especially around the planned Midtown Station), but to encourage TOD from the presence of new San Joaquins rail stations. In addition to Midtown, Natomas and Old Town Sacramento hold promise for TOD in the immediate vicinity of the planned station sites.

A 244-area mixed-use TOD called The Railyards is currently being developed on land immediately north of the Sacramento Valley Station, which San Joaquins trains currently share with Capitol Corridor trains. Plans call for a mix of housing types, a large retail component of over one million square feet, a significant level of office space at 2.3 million square feet, along with other uses such as a hotel and recreational cultural land uses. SJJPA supports The Railyards development as a way to activate the environment surrounding the station, and believe it will engender additional rail ridership.

Stockton ACE Station (Cabral Station) TOD

A master plan was approved by the City of Stockton in 2016 for a TOD called the Open Window Project, which is being developed by a local development company named Open Window Project, LLC. The plan calls for over 1,000 housing units and 400,000 square feet of commercial space within a 15-block area immediately west of the Robert J. Cabral Station (Cabral Station), which serves as the Downtown Stockton Station for the San Joaquins. This station serves all San Joaquins trains to/from Sacramento. Open Window Project, LLC has expressed interest in highlighting the rail connections available at the station in their marketing efforts. SJJPA is very supportive of this development as it will not only improve connectivity and walkability to the station, but will greatly improve the surrounding neighborhood, which will likely lead to ridership increases on the San Joaquins. In support of furthering development around the station, the San Joaquin Regional Rail Commission recently received a grant in the amount of $2 million for a streetscape improvement project along Channel Street, which directly connects the Cabral Station to the new development and greater downtown, as well as San Joaquin Regional Transit District's Downtown Transit Center.

Richmond TOD

The Richmond Station is located in between a previously developed TOD that includes several hundred units of housing, along with a few shops that greet people entering/exiting the BART/Amtrak Station complex. There is also another TOD under construction at the other entrance/exit to the station. Additionally, there is a large bus depot at the station, providing excellent connectivity. Richmond TOD is good case study in TOD for the San Joaquins as it is one of the most developed in the system.

Antioch TOD

The Antioch Station is located in Antioch's downtown along the waterfront. SJJPA sees great potential for a re-designed station that enhances its waterfront location by opening up views of the Bay, while also integrating with other planned downtown improvements. SJJPA is currently working with Amtrak and the City of Antioch to plan for improvements at the station that would seamlessly blend with city plans for a public plaza and other enhancements along the waterfront in the downtown district. SJJPA is also supporting private TOD projects being planned in the vicinity that would enable more people to live downtown and utilize the San Joaquins by walking to the station.

Madera TOD

SJJPA has been working with the Madera County Transportation Commission and the City of Madera and County of Madera to find an improved location for a relocated Madera Station. The existing station has limited use, no transit connections, poor access to SR-99, and its location is expected to see only marginal growth in employment and transportation demand.

A relocated Madera station is being pursued by SJJPA for a location just north of the new Avenue 12 grade separation. Avenue 12 is a primary transit corridor for Madera County. A proposed station north of Avenue 12 would be consistent

with the growth of Madera east of the BNSF line; provides the opportunity for TOD in the station vicinity; and will be closer to Madera Community College.

Fresno TOD

While most TOD planning is focused on the immediate vicinity of the future HSR station in Fresno, which lies about one mile to the west of the Amtrak Station, SJJPA sees a great opportunity to encourage further development of the downtown in between the two stations. Also, development is already happening. Several multi-family housing developments have recently been completed or are underway within walking distance of the station.

Oakley TOD

SJJPA has been coordinating with the City of Oakley to implement a San Joaquins station for several years. The City has recently completed a feasibility study to determine the best location for the proposed station. The Oakley Station is a key component of the future Morning Express Service to the Bay Area. The SJJPA/SJRRC 2018 TIRCP award included the construction of the station platform and track, while the City of Oakley is developing local access elements and parking facilities. High-levels of growth is taking place in eastern Contra Costa County. It is anticipated that a new San Joaquins station will encourage TOD in the vicinity.

Bakersfield TOD

The Bakersfield Amtrak station is very accessible to the heart of downtown. The station is within walking distance of two hotels, the convention center and arena, many government office buildings, the county library, the city's ice and aquatic centers, a movie theater, Mill Creek Linear and Central Parks, and numerous affordable and market-rate housing options. This site offers continued opportunities for the station to catalyze transit-oriented development.

Table 13.1: San Joaquins Stations and TOD Potential

Station	Station Ownership	Existing Amenities/Transit Connectivity	Within City Center	New TOD Potential
Sacramento	City of Sacramento	Enclosed waiting room, ticket office, ticket machine, restrooms, phone, ATM, 165 overnight parking spaces, Amtrak Thruway Bus, Local/ Regional Bus Services and Light Rail	Yes	High
Lodi	City of Lodi	Enclosed waiting room, ticket machine, phone, 380 parking spaces, Amtrak Thruway Bus, Local/Regional Bus Services	Yes	Medium
Stockton-ACE	City of Stockton	Enclosed waiting room, ticket machine, phone, 185 parking spaces, Amtrak Thruway Bus, ACE Commuter Rail & Local/Regional Bus Service	Yes	High
Oakland-Jack London Square	Port of Oakland	Enclosed waiting room, ticket office, ticket machine, restrooms, phone, ATM, 500 short-term and 500 long-term parking spaces, Amtrak Amtrak Thruway Bus, Local/Regional Bus Services, Ferry	Yes	High
Emeryville	City of Emeryville	Enclosed waiting room, ticket office and machine, restrooms, ATM, 125 shared parking spaces, Amtrak Thruway Bus, Local/Regional Buses	Yes	High
Richmond	Union Pacific	Platform with shelter, ticket machine, phone, 400 shared parking spaces, Local/Regional Bus Services, BART	Yes	High
Martinez	City of Martinez	Enclosed waiting room, ticket office, ticket machine, restrooms, phone, 370 parking spaces, Amtrak Thruway Bus, Local/Regional Bus Services	Yes	Medium
Antioch	City of Antioch	Platform with shelter, ticket machine; City parking available, Bus Service	Yes	Medium
Stockton-Amtrak	BNSF	Enclosed waiting room, ticket office, ticket machine, restrooms, phone, 24 parking spaces	No	Low
Modesto	City of Modesto	Enclosed waiting room, ticket office, ticket machine, restrooms, phone, 187 parking spaces, Local/Regional Bus Service	No	Low
Turlock/Denair	BNSF/Amtrak	Platform with shelter, ticket machine, 45 parking spaces, Dial-a-Ride	No	Low
Merced	State of California	Enclosed waiting room, ticket office, ticket machine, restrooms, phone, 46 parking spaces, Amtrak Thruway Bus, Local/Regional Bus Service	Yes	Medium
Madera	Madera County	Platform only, ticket machine, restrooms,19 parking spaces, Dial-a-Ride	No	Low
Fresno	City of Fresno	Enclosed waiting room, ticket office, ticket machine, restrooms, phone, 169 parking spaces, Bus Service	Yes	High
Hanford	City of Hanford/BNSF	Enclosed waiting room, ticket office, ticket machine, restrooms, phone, 47 parking spaces, Amtrak Thruway Bus, Local/Regional Bus Service	Yes	Medium
Corcoran	City of Corcoran	Enclosed waiting room, ticket machine, restrooms, phone, 90 parking spaces, Local/Regional Bus Services	Yes	Medium
Wasco	City of Wasco	Platform with shelter, ticket machine, 35 parking spaces, Bus Services	Yes	Medium
Bakersfield	City of Bakersfield	Enclosed waiting room, ticket office, ticket machine, restrooms, phone, ATM, 347 parking spaces, Amtrak Thruway Bus Services, Bus Services	Yes	High