

Photo courtesy of Amtrak®



Ridership on trains such as this Pacific Surfliner rolling down the Southern California coast is projected to grow faster than the state's population, according to the 2018 Draft California State Rail Plan. The Surfliner is one of three Caltrans-supported passenger rail lines in the state.

# Plan Pictures Future of Train Travel in State

## Caltrans Report: System Upgrades Needed to Draw More Passengers, Freight

Caltrans' newly released draft 2018 [California State Rail Plan](#) envisions an era of sustainable, door-to-door mobility in which travelers seamlessly transfer between services with a single ticket, and freight shipments traveling a more direct and efficient path to their intended markets.

The draft plan forecasts a rail system by 2040 that's so intuitive and interconnected it will become the preferred mode for many trips in California. At the same time, an investment in the state's rail delivery system is predicted to generate multiple economic benefits while easing highway congestion and air pollution as more people and shipments ride the rails.

The draft plan debuts at an opportune time. The Road Repair and Accountability Act of 2017 (Senate Bill 1), passed earlier this year, is set to provide long-term revenues to upgrade the state's passenger and freight rail system, in addition to other public and private investment.

According to the rail plan, the demand will be

there. By 2040, passenger rail trips are expected to increase more than tenfold to over 1.3 million per day, outpacing California's projected population growth of 30 percent. Freight loads, crucial to the sixth largest economy in the world, will be 38 percent higher in 2040 than they were in 2013, the plan estimates.

By 2040, the plan forecasts:

- More trains, more often — with departures every 30 minutes or better in most markets.
- Efficiencies that double freight movement on existing rail corridor rights-of-way.
- Improved trade corridors, rail yards and terminals tied together in an integrated freight transport system. In addition, short lines that are a critical link in the state's rail shipping picture will be upgraded to haul heavier loads.
- Significantly faster trips using high-speed rail.
- Express buses in dedicated lanes to carry passengers to and from rail with reliable journey times.
- Quick and easy transfers between bus and rail

With more alternatives to driving or using trucks to haul freight, the state would see a substantial reduction in greenhouse gas emissions.

service at transit hubs that synchronize connections and reduce delay.

- Single-ticket system integration.
- Clean and quiet electric trains powered by 100 percent renewable energy.

Current ridership on intercity rail service that Caltrans supports — the Capitol Corridor (Auburn-Bay Area), the San Joaquin (Sacramento-Bakersfield), and Pacific Surfliner (San Luis Obispo-San Diego) — and regional systems totals about 110,000 daily trips now. If allowed to develop at its present pace, ridership would grow gradually to an estimated 161,000 daily trips by 2040, the report says.

### A big upside from more riders, freight

But the system could serve 1.3 million daily passengers by 2040 if train service is expanded, upgraded, and integrated, the plan asserts. That represents 6.8

percent share of the daily passenger miles logged by all modes of travel — about 20 times more than the .34 percent share rail captures now.

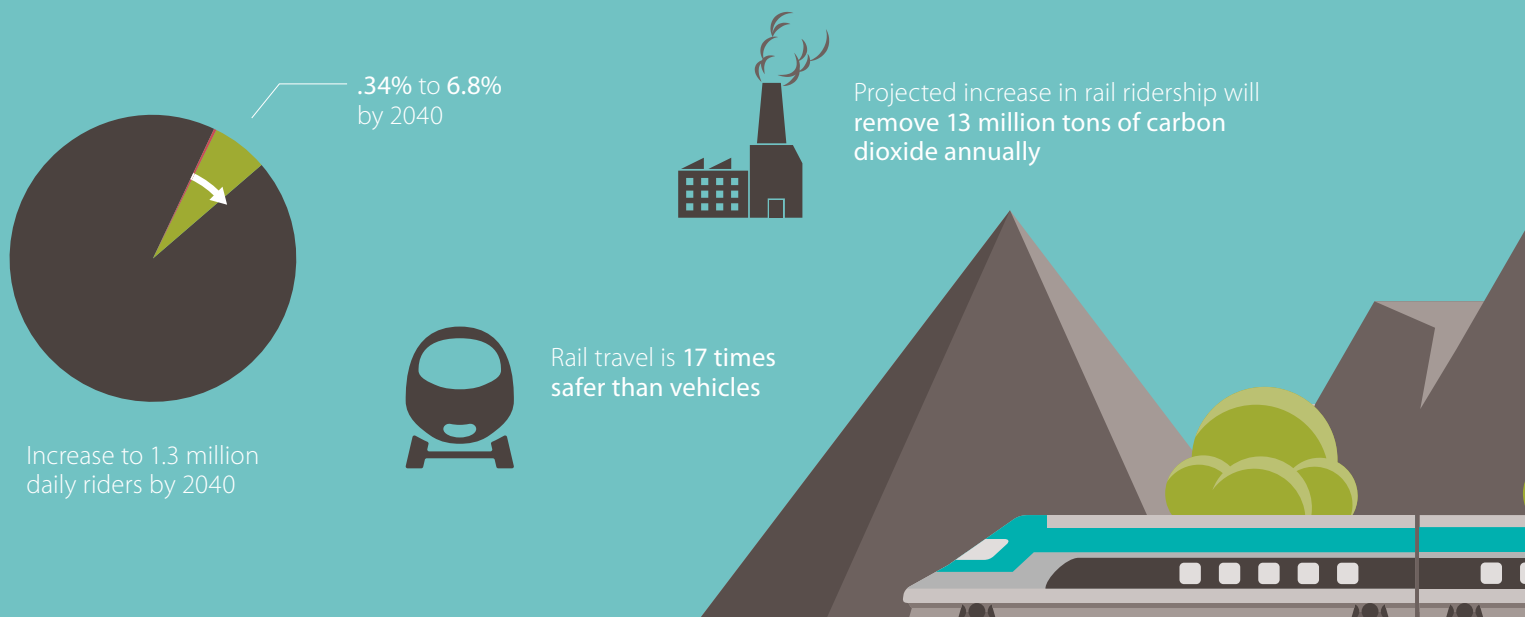
To realize these projections, 88 million daily passenger miles would shift from highways to railroads. The plan projects that more than half of all passenger trips would be on electric-powered trains.

With more alternatives to driving or using trucks to haul freight, the state would see a substantial reduction in greenhouse gas emissions. Such a shift would remove more than 13 million metric tons of carbon dioxide annually — the equivalent of planting more than 166 million urban trees each year.

Congestion also should lessen if more travelers chose rail over vehicles, and more truck loads are carried by rail, the plan says.

The plan suggests that travel by rail should also yield considerable safety benefits. The risk of death is currently 17 times lower in a train than a car or truck, according to the Federal Railroad Administration. A reduction of 74 million fewer vehicle miles traveled (VMT) on highways could eliminate as many as 250 fatalities and 19,000 transportation-related injuries by 2040 in California based on current rates, according to the rail plan.

## Rail Passenger Ridership Projection 2040



The plan estimates a nearly 2-to-1 return on rail investment. Nearly \$41 billion of direct investment from private railroads and regional agencies could generate nearly \$77.5 billion in economic benefits by 2040 through new construction, more jobs, and growing tax revenues.

The draft document was prepared with input from passenger rail operators; planning agencies; freight rail interests; tribal nations; private railroads;

transit operators; environmental and agricultural interests, and neighboring states.

The rail plan will still undergo review and is subject to revision. A final plan is expected in 2018. **MM**

*Source: Caltrans Rail Planning Branch; Andrew Cook, Branch Chief; Shannon Simonds, Transportation Planner*

# A Rail Renaissance

## The Short-Term Plan (2022)

- Caltrain (Bay Area-Santa Clara commuter line) electrification
- Passenger service expanded to Redlands (San Bernardino County), Salinas (Monterey County) and Larkspur (Marin County)
- Committed rail improvements/extensions
- More bus connections to fill schedule gaps
- Elimination of existing rail freight bottlenecks
- Statewide service planning – connect train routes and schedules

## The 10-Year Plan (2027)

- High-Speed Rail — Central Valley to Silicon Valley
- High-Speed Rail service expanded to the San

- Francisco Transbay Terminal, Merced, Coachella Valley and Las Vegas
- More frequencies on existing lines using available capacity
- Timed connections between services
- Fully operational integrated ticketing
- Rail freight improvements on shared passenger lines and major trade corridors

## The Vision (2040)

- High-Speed Rail — Anaheim to San Francisco by 2029
- Frequent, high-performance rail connections to HSR from Sacramento, Inland Empire, San Diego
- New regional rail system connections to expand the network
- Regular frequencies and fast services

North of Fresno, spanning the San Joaquin River, a viaduct to allow High-Speed Rail trains to travel over the top of existing tracks is being built.



Photo courtesy of California High Speed Rail Authority