

# Rail Corridor Crossing Policy (DRAFT)

## Pedestrian Design

A key to planning and designing pedestrian paths is directness of travel. Providing pathways that serve circulation demands and minimize out-of-direction travel will help maximize safe crossing behavior. Pedestrian planners generally agree that spacing of approximately ¼ mile is desirable to achieve this aim. Using this distance as a rough guideline, the selection of actual crossing locations should be based on various factors, including:

- **Existing & Planned Transportation Networks:** Direct connections to streets and other multimodal facilities, both existing and planned, increase a crossing's circulation benefits. Conversely, barriers in the transportation network—for example, a lack of nearby crossings of adjacent Coast Highway 101—can inhibit circulation from a rail crossing.
- **Connecting Key Origins and Destinations:** Schools, beaches, parks, and commercial/civic land uses typically have high demand, with most trips originating from local residences and parking areas.
- **Existing Crossing Locations:** Observing where pedestrians currently cross the tracks, albeit illegally, often indicates where demand is highest for new crossings.
- **Physical Geography:** The presence of geographic barriers (e.g. drainage, topography, environmentally sensitive areas) may limit the ability to add a crossing.

Safety is an overall consideration in identifying potential pedestrian rail crossing locations. Acknowledging that illegal crossings occur and understanding where they occur will help in developing recommendations on where formal crossings are needed, which in turn can improve compliance. Feasibility and cost will be important considerations as well, but first it is important to understand where rail crossings are needed in order to ensure that their selection leads to improvements in public safety.

## Rail Operations

Grade-separated rail crossings, such as the recent project near Santa Fe Drive, typically do not affect rail operations following the completion of construction. Some locations may even require grade-separated crossings to accommodate sight lines for approaching trains. However, while often preferable, grade separations are significantly more expensive than at-grade crossings and take longer to implement.

At-grade crossings are regulated by both the Federal Railroad Administration (FRA) and California Public Utilities Commission (CPUC), whose overarching aim is to improve public safety in rail corridors. Both agencies heavily scrutinize applications for new at-grade crossings, but approvals are possible if the applicant can show that implementation will result in a net safety improvement over existing conditions—such as by reducing illegal crossings. One potential strategy is to package new at-grade crossings into a comprehensive rail-safety program that includes other measures such as barriers at non-crossing locations. The City of San Clemente used this approach to obtain approvals for several new at-grade crossings on its section of the LOSSAN Rail Corridor.

## Prioritization & Phasing

As it is infeasible to construct a large number of crossings at one time, the proposed crossings should be prioritized into groups based on an evaluation of policy goals and well as site-specific opportunities and constraints. In general, the prioritization objectives are:

- Achieve roughly ½-mile spacing across the whole corridor, then focus on ¼-mile spacing.
- Close significant gaps in crossings.
- Serve higher-demand areas and facilities.
- Improve access to beaches, commercial/civic areas, and transportation networks.
- Emphasize projects with higher feasibility and/or lower cost of implementation.

# Proposed Crossing Locations

To implement this *Rail Corridor Crossing Policy* and achieve the ultimate vision of roughly ¼-mile spacing throughout the corridor, rail crossings are proposed at the following approximate locations. All locations are listed below with brief evaluations, and also mapped at the end of this report.

As the planning process continues, these preliminary locations should be analyzed further, including:

- Review of engineering feasibility including site-specific opportunities and constraints.
- Evaluation of potential pros and cons of at-grade versus grade-separated crossings.
- Prioritization into phased groups based on policy goals and overall feasibility.

**Mile Markers:** The crossings are listed from north to south by their linear position along the rail corridor, with La Costa Avenue at Mile 0.0 and the inlet of San Elijo Lagoon at Mile 5.0.

## Mile 0.0: La Costa Avenue (EXISTING)

- Existing grade-separated roadway crossing. Auto-oriented, high stress for multimodal users.
- Requires out-of-direction travel to/from Vulcan Avenue. Direct connection to La Costa Avenue, a major east-west route with bike lanes. Access to South Ponto Beach. New crosswalks and roundabout at Coast Highway 101 planned in Streetscape project.

## Mile 0.3: Bishop's Gate Road

- **West:** Few commercial or other attractors. No direct connections to east-west streets. Entrance to Seabluffe gated community limits public beach access (better beach access at La Costa Avenue and Grandview Street). New crosswalks and roundabout at Coast Highway 101 planned in Streetscape project.
- **East:** Few commercial or other attractors. No direct connections to east-west streets. For some users, could be preferable to high-stress, out-of-direction crossing at La Costa Avenue.

## Mile 0.5: Grandview Street / Hillcrest Drive

- Planned pedestrian crossing identified in *General Plan, Pedestrian Crossing Alternatives Analysis, and North Coast Corridor Public Works Plan/Transportation & Resource Enhancement Program (PWP/TREP)*.
- **West:** New crosswalks and roundabout at Coast Highway 101 planned in Streetscape project, plus a "parking pod" approximately 200' to the south of Grandview Street. Access to Grandview Beach and Coast Highway 101 commercial. Direct connections to east-west streets.
- **East:** Access to Leucadia Oaks Park. Direct connections to east-west streets.

### Mile 0.8: Jupiter Street

- **West:** New crosswalks and roundabout at Coast Highway 101 planned in Streetscape project, plus a “parking pod” approximately 200’ to the north of Jupiter Street. Access to Coast Highway 101 commercial. Limited public beach access (better beach access at Leucadia Boulevard and Grandview Street). Direct connections to east-west streets.
- **East:** Connections to east-west streets within 0.1 mile.

### Mile 1.0: Phoebe Street

- Deficiency identified in *Pedestrian Travel & Safe Routes to School Plan*.
- **West:** New crosswalk at Coast Highway 101 planned in Streetscape project. Access to Coast Highway 101 commercial. Limited public beach access (better beach access at Leucadia Boulevard and Grandview Street). Direct connections to east-west streets.
- **East:** Connections to east-west streets within 0.1 mile.

### Mile 1.3: Leucadia Boulevard (EXISTING)

- Existing at-grade roadway crossing. SANDAG has long-term (2040) plans for grade separation, identified in both *San Diego Forward: The Regional Plan* and *North Coast Corridor PWP/TREP*.
- Access to Beacon’s Beach and Coast Highway 101 commercial. Direct connection to Leucadia Boulevard, a major east-west route with bike lanes and pedestrian facilities.

### Mile 1.5 or 1.7: Daphne Street or Basil Street

- **West:** New crosswalks at Coast Highway 101 planned in Streetscape project at both Daphne and Basil Streets, plus a “parking pod” immediately to the south of Basil Street. Limited public beach access (better beach access at Leucadia Boulevard and El Portal Street). Access to Coast Highway 101 commercial.
- **East:** No direct connections to east-west streets. Limited, auto-oriented commercial on Vulcan.

### Mile 1.9: El Portal Street (In Progress)

- Planned pedestrian crossing, currently funded and in design by City of Encinitas. Identified in *Pedestrian Travel & Safe Routes to School Plan* and *Pedestrian Crossing Alternatives Analysis*.
- **West:** New crosswalks and roundabout at Coast Highway 101 planned in Streetscape project, plus a “parking pod” approximately 200’ to the north. Access to Stonesteps Beach. Direct connections to east-west streets.
- **East:** Access to Paul Ecke Central Elementary and Orpheus Park. Direct connections to east-west streets.

### Mile 2.1: Marcheta Street / Orpheus Ave

- **West:** New crosswalk at Coast Highway 101 planned in Streetscape project. Access to Coast Highway 101 commercial. Direct connections to east-west streets.
- **East:** Direct connections to east-west streets.

### Mile 2.5: Encinitas Boulevard (EXISTING)

- Existing grade-separated roadway crossing.
- Access to major commercial and civic, Moonlight State Beach, Cottonwood Creek Park. Direct connection to Encinitas Boulevard, a major east-west route with bike lanes and pedestrian facilities.

### Mile 2.6: Encinitas COASTER Station / C Street (EXISTING)

- Existing at-grade pedestrian crossing at Encinitas Station.
- Access to major commercial and civic, library, COASTER parking, Moonlight State Beach.

### Mile 2.7: D Street (EXISTING)

- Existing at-grade roadway crossing.
- Access to major commercial and civic, Moonlight State Beach.

### Mile 2.8: E Street (EXISTING)

- Existing at-grade roadway crossing.
- Access to major commercial and civic.

### Mile 3.1 or 3.2: H Street or I Street

- **West:** Abuts rear of private commercial parcels. Circulation could work at H or I Streets, but would require easement etc. Limited public beach access (better beach access at D Street and Santa Fe Drive). Direct connections to east-west streets.
- **East:** Access to Mildred MacPherson Park. Direct connections to east-west streets.

### Mile 3.4: Santa Fe Drive (EXISTING)

- Existing below-grade pedestrian crossing.
- Access to Swami's Beach and Coast Highway 101 commercial. Direct connection to Santa Fe Drive, major east-west route with bike lanes and pedestrian facilities.

### Mile 3.7-3.8: North Cardiff Area

- **West:** Limited public beach access (better beach access at Santa Fe Drive and Verdi Avenue). Few commercial/civic attractors between Santa Fe Drive & Verdi Avenue. No direct connections to east-west streets.
- **East:** Few commercial/attractors or east-west public streets between Santa Fe Drive & Verdi Avenue. No direct connections to east-west streets.

### Mile 4.0 or 4.2: Verdi Avenue or Montgomery Avenue

- Planned pedestrian crossing, identified in *Pedestrian Travel & Safe Routes to School Plan* and *Pedestrian Crossing Alternatives Analysis*. Currently under study by City of Encinitas, partially funded.
- **West:** Access to San Elijo State Beach. No direct connections to east-west streets.
- **East:** Access to Cardiff Elementary. Direct connections to east-west streets.

### Mile 4.5: Birmingham Drive

- Deficiency identified in *Pedestrian Travel & Safe Routes to School Plan*.
- **West:** Access to San Elijo State Beach.
- **East:** Access to San Elijo Avenue commercial. Direct connection to Birmingham Drive, major east-west route with bike and pedestrian facilities.

### Mile 4.7: Chesterfield Drive (EXISTING)

- Existing at-grade roadway crossing. Multimodal improvements currently under construction through SANDAG's San Elijo Lagoon Double Track project.
- Access to San Elijo Avenue commercial and Glen Park. Direct connection to Chesterfield Drive/Manchester Avenue, major east-west route with bike facilities.

## Previously Studied Crossing Locations

Table 1 shows the locations along the Rail Corridor that one or more planning and policy documents have identified as potential crossing locations.

**Table 1: Summary of Previously Proposed Rail Crossings**

Document → Location↓	General Plan	Bikeway Master Plan	Ped Travel & Safe Routes to School	Pedestrian Crossing Alternatives Analysis	North Coast Corridor PWP/TREP	SANDAG Regional Plan
<i>La Costa Ave</i>		Existing Bike GS (Class II)				
<i>Hillcrest Dr / Grandview St</i>	Proposed Ped GS			Proposed Ped GS	Proposed Bike/Ped GS	
<i>Phoebe St</i>			Deficiency Identified			
<i>Leucadia Blvd</i>	Proposed Road GS	Proposed Bike AG (Class II)			Proposed Road GS	Proposed Road GS
<i>Union St</i>			Deficiency Identified			
<i>El Portal St (Ecke)</i>			Proposed Bike/Ped GS	Proposed Ped GS		
<i>Encinitas Blvd</i>		Existing Bike GS (Class II)				
<i>D St</i>		Proposed Bike AG (Class III)				
<i>Santa Fe Dr</i>				Proposed Ped GS		
<i>Verdi Ave</i>			Deficiency Identified			
<i>Montgomery Ave</i>			Deficiency Identified	Proposed Ped GS		
<i>Mozart Ave</i>			Deficiency Identified			
<i>Birmingham Dr</i>			Deficiency Identified			
<i>Chesterfield Dr</i>		Proposed Bike AG (Class III)				

GS = Grade Separation

AG = At Grade

The following documents were reviewed but do not identify any specific crossings: *Recreational Trails Master Plan* (2002), *Cardiff Specific Plan* (2010), *Downtown Encinitas Specific Plan* (1994), *North 101 Corridor Specific Plan* (1997).