

ROAD REPAIR AND ACCOUNTABILITY ACT OF 2017
PROJECT BASELINE AGREEMENT

Build North Coast Corridor Batiquitos in San Diego County

Resolution SCCP-P-2324-03B

(to be completed by CTC)

1. FUNDING PROGRAM

- Active Transportation Program
- Local Partnership Program (Competitive)
- Solutions for Congested Corridors Program
- State Highway Operation and Protection Program
- Trade Corridor Enhancement Program

2. PARTIES AND DATE

- 2.1 This Project Baseline Agreement (Agreement) effective on December 7, 2023 (will be completed by CTC), is made by and between the California Transportation Commission (Commission), the California Department of Transportation (Caltrans), the Project Applicant, San Diego Association of Governments, and the Implementing Agency, San Diego Association of Governments, sometimes collectively referred to as the "Parties".

3. RECITAL

- 3.1 Whereas at its June 28, 2023 meeting the Commission approved the Solutions for Congested Corridors Program and included in this program of projects the Build North Coast Corridor Batiquitos in San Diego County, the parties are entering into this Project Baseline Agreement to document the project cost, schedule, scope and benefits, as detailed on the Project Programming Request Form attached hereto as Exhibit A, the Project Report attached hereto as Exhibit B, the Performance Metrics Form, if applicable, attached hereto as Exhibit C, as the baseline for project monitoring by the Commission.
- 3.2 The undersigned Project Applicant certifies that the funding sources cited are committed and expected to be available; the estimated costs represent full project funding; and the scope and description of benefits is the best estimate possible.

4. GENERAL PROVISIONS

The Project Applicant, Implementing Agency, and Caltrans agree to abide by the following provisions:

- 4.1 To meet the requirements of the Road Repair and Accountability Act of 2017 (Senate Bill [SB] 1, Chapter 5, Statutes of 2017) which provides the first significant, stable, and on-going increase in state transportation funding in more than two decades.
- 4.2 To adhere, as applicable, to the provisions of the Commission:
- Resolution [redacted], "Adoption of Program of Projects for the Active Transportation Program", dated [redacted]
 - Resolution [redacted], "Adoption of Program of Projects for the Local Partnership Program", dated [redacted]
 - Resolution G-23-45, "Adoption of Program of Projects for the Solutions for Congested Corridors Program", dated 6/28/2023
 - Resolution [redacted], "Adoption of Program of Projects for the State Highway Operation and Protection Program", dated [redacted]
 - Resolution [redacted], "Adoption of Program of Projects for the Trade Corridor Enhancement Program", dated [redacted]

- 4.3 All signatories agree to adhere to the Commission's Guidelines. Any conflict between the programs will be resolved at the discretion of the Commission.
- 4.4 All signatories agree to adhere to the Commission's SB 1 Accountability and Transparency Guidelines and policies, and program and project amendment processes.
- 4.5 San Diego Association of Governments agrees to secure funds for any additional costs of the project.
- 4.6 San Diego Association of Governments agrees to report to Caltrans on a quarterly basis; on the progress made toward the implementation of the project, including scope, cost, schedule, and anticipated benefits/performance metric outcomes.
- 4.7 Caltrans agrees to prepare program progress reports on a on a semi-annual basis and include information appropriate to assess the current state of the overall program and the current status of each project identified in the program report.
- 4.8 San Diego Association of Governments agrees to submit a timely Completion Report and Final Delivery Report as specified in the Commission's SB 1 Accountability and Transparency Guidelines.
- 4.9 San Diego Association of Governments agrees to submit a timely Project Performance Analysis as specified in the Commission's SB 1 Accountability and Transparency Guidelines.
- 4.10 All signatories agree to maintain and make available to the Commission and/or its designated representative, all work related documents, including without limitation engineering, financial and other data, and methodologies and assumptions used in the determination of project benefits and performance metric outcomes during the course of the project, and retain those records for six years from the date of the final closeout of the project. Financial records will be maintained in accordance with Generally Accepted Accounting Principles.
- 4.11 The Inspector General of the Independent Office of Audits and Investigations has the right to audit the project records, including technical and financial data, of the Department of Transportation, the Project Applicant, the Implementing Agency, and any consultant or sub-consultants at any time during the course of the project and for six years from the date of the final closeout of the project, therefore all project records shall be maintained and made available at the time of request. Audits will be conducted in accordance with Generally Accepted Government Auditing Standards.

5. SPECIFIC PROVISIONS AND CONDITIONS

- 5.1 Project Schedule and Cost
See Project Programming Request Form, attached as Exhibit A.
- 5.2 Project Scope
See Project Report or equivalent, attached as Exhibit B. At a minimum, the attachment shall include the cover page, evidence of approval, executive summary, and a link to or electronic copy of the full document.
- 5.3 Performance Metrics
See Performance Metrics Form, if applicable, attached as Exhibit C.
- 5.4 Additional Provisions and Conditions *(Please attach an additional page if additional space is needed.)*

A) SANDAG will be the lead agency in the development of the project. The project will be constructed through the Caltrans North County Corridor Construction Manager/ General Contractor (CMGC) Contract through a Project Implementation Order with Caltrans.

B) The project will be constructed in accordance with the "Memorandum of Understanding Between the San Diego Association of Governments, The North San Diego County Transit Development Board, and the Metropolitan Transit Development Board Defining the Functions and Responsibilities of the Three Agencies" Addendum 18 with the Owner/Operator of the railroad, North County Transit District (NCTD).

C) The State will not cover costs in the event of a cost overrun. In the event of cost overrun SANDAG will be responsible for providing additional funding. Local TransNet funding has been identified to cover cost overruns.

Attachments:

- Exhibit A: Project Programming Request Form
- Exhibit B: Project Report
- Exhibit C: Performance Metrics Form *(if applicable)*

SIGNATURE PAGE
TO
PROJECT BASELINE AGREEMENT

Project Name **Build North Coast Corridor Batiquitos in San Diego County**

Resolution **SCCP-P-2324-03B**

(to be completed by CTC)

Hasan Ikh rata

Sep 20, 2023

Hasan Ikh rata

Date

Executive Director, San Diego Association of Governments

Project Applicant

Hasan Ikh rata

Sep 20, 2023

Hasan Ikh rata

Date

Executive Director, San Diego Association of Governments

Implementing Agency

Gustavo Dallarda

10/13/2023

Gustavo Dallarda

Date

District Director

California Department of Transportation

Michael Keever
Michael Keever (10/1, 2023 17:50 PST)

12/01/2023

Tony Tavares

Date

Director

California Department of Transportation

Tanisha Taylor

12/21/23

Tanisha Taylor

Date

Executive Director

California Transportation Commission

Signature: *Hasan Ikh rata*

Email: hik@sandag.org

Build NCC Batiquitos

Fiscal Year 2022 Solutions for Congested Corridors Program



Project Description

Build NCC Batiquitos implements critical rail infrastructure improvements as a component of a multimodal approach to congestion relief within the Interstate 5 North Coast Corridor (NCC) in San Diego County. The project replaces a single track wooden trestle bridge, built in the 1940s, with a modern, double track concrete rail bridge and adds 0.6 miles of double track across the Batiquitos Lagoon between the cities of Carlsbad and Encinitas.

Benefits

Enhancements to rail infrastructure is a key component of improving all travel modes within NCC to reduce congestion and greenhouse gas emissions. The Project eliminates a significant bottleneck, resulting in 5.5 miles of continuous double track within the corridor. This improvement will make travel by rail more reliable and more attractive as an alternative to driving a car and will result in a reduction of over 411 million vehicle miles traveled, 166,000 tons of carbon dioxide, and 1.9 million hours in travel time over a 20-year period. SANDAG is working to promote transportation equity by improving the safety, reliability, and affordability of transit for the benefit of all communities. Double tracking helps rail operators meet current train volumes and facilitate increases in passenger and freight service in the future. This Project specifically provides a double track area for trains to pass so that passenger rail trains will no longer get stuck behind slow-moving freight trains.

In addition to improving rail operations and promoting transportation equity, the Project ensures a critical transportation asset remains in a state of good repair. The existing bridge is nearing the end of its useful service life and replacing the wooden trestle rail bridge with a concrete bridge will protect against the impacts of climate change and reduce risk of a rail closure that would cost the region approximately \$300 million in lost revenue. Replacing the wooden trestle rail bridge will improve overall lagoon health by providing a wider channel underneath the bridge, increasing tidal flushing; and the Project's design avoids or minimizes impacts to Batiquitos Lagoon and limits interference with rail service during its construction.

Project Manager

Tim DeWitt, Senior Engineer

Phone: (619) 699-1935

Email: Tim.DeWitt@sandag.org

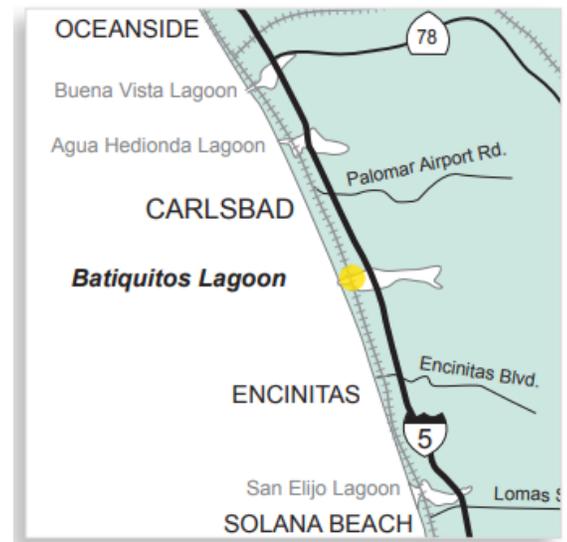
Schedule

Construction is scheduled for 2024-2026.

Total Project Cost: \$117.8 million

Total Grant Request: \$103.3 million

Project Map



Project Webpage

<http://keepsandiegomoving.com/BLDT>

PROJECT REPORT EQUIVALENT

Project Title *Build North Coast Corridor Batiquitos in San Diego County*

Project Location Description The proposed project is located between MP 234.5 and MP 235.1 on the San Diego Subdivision of the Los Angeles-San Diego-San Luis Obispo (LOSSAN) Corridor. The north segment of the project between MP 234.5 and the Batiquitos Lagoon (MP 234.8) is located in the City of Carlsbad. The remainder of the project (south of Batiquitos Lagoon) MP 234.8 to MP 235.1 is located in the City of Encinitas. The Avenida Encinas overpass and the Batiquitos Lagoon Bridge fall within the project limits.



Vicinity Map



I, J. Blake Loftus, Deputy Project Manager – RailPros have been given full authority by San Diego Association of Governments (SANDAG) to prepare this report. I certify that the information and data contained in this report are true to the best of my knowledge and belief and I understand that disciplinary action may be taken in the event that the following information are found to be falsified.

J. Blake Loftus
J. Blake Loftus

9/20/23
Date

Deputy Project Manager
Title

RailPros
Agency/Company

I have reviewed the information contained in this report and find the data and information to be complete, current, and accurate

Timothy DeWitt
Tim DeWitt, Project Manager

9/20/2023
Date

San Diego Association of Governments
Agency

Table of Contents

Contents

1.	INTRODUCTION.....	5
2.	BACKGROUND	6
3.	PURPOSE AND NEED	6
	Purpose	6
	Need:	7
	A. Single Track Bottleneck	7
	B. Replace Aging Bridge.....	8
	C. Regional and System Planning	9
	D. Traffic	10
4.	ENVIRONMENTAL CLEARANCE DESCRIPTION	10
5.	CONSIDERATIONS REQUIRING DISCUSSION.....	10
	5A. Hazardous Waste	10
	5B. Value Analysis	10
	5C. Resource Conservation.....	11
	5D. Right-of-Way Issues	11
	5E. Environmental Compliance.....	11
	5F. Air Quality Conformity	11
	5G. Title VI Considerations	11
	5H. Noise Abatement Decision Report.....	12
6.	FUNDING, PROGRAMMING AND ESTIMATE	12
	Funding	12
	Programming	12
	Estimate	14
7.	DELIVERY SCHEDULE.....	16
8.	RISKS	17
9.	EXTERNAL AGENCY COORDINATION.....	17
10.	ADDITIONAL INFORMATION	18
11.	ATTACHMENTS	18

1. INTRODUCTION

The project involves the addition of 0.6 miles of second main track between Control Point (CP) Ponto at Mile Post (MP) 234.5 near the Avenida Encinas overpass and a new Control Point CP La Costa at MP 235.1 just north of the La Costa Avenue overpass. The project also involves the replacement of the existing 300-foot long, single-track Batiquitos Lagoon bridge (BR 234.8, shown below) with a modern, double-track concrete bridge. The existing wood trestle bridge was built in 1942 and is inadequate for scour depth as described in the “Project Purpose and Need” section.

Other associated improvements include expanding and armoring the existing Least Tern nesting site in the southwestern corner of the lagoon, removing the old and unnatural rock revetment underneath the existing bridge, performing grading, drainage, and signal improvements, and performing additional grading, temporary access, and fencing improvements about 1/4 of a mile north of the new second main track extension resulting in a total project area length of 1 mile.

Project Limit/Footprint	<p><i>District 11-San Diego County-LOSSAN/I-5 Corridor</i></p> <p><i>Begin Rail Mile Post 234.5 / End Mile Post 235.1</i></p> <p><i>The project is located on the LOSSAN Rail Corridor, crossing the Batiquitos Lagoon. The northern portion of the project is located in the City of Carlsbad and the southern portion of the project is located in the City of Encinitas.</i></p>
Total Project Cost	\$117,794,511
Outputs	0.6 Miles of New Track
Environmental Determination or Document	<p>FTA NEPA CE</p> <p>Project is preempted from CEQA</p>

2. BACKGROUND

There is currently a single track bottleneck through the southern portion of the City of Carlsbad and through the City of Encinitas. This project was originally part of the larger Ponto to Moonlight Double Track project. The project was cost prohibitive as a single project and was split out into segments. This segment includes replacement of the aging Batiquitos Lagoon wood trestle bridge and 0.6 miles of double track.

The preliminary engineering and environmental clearance for the project was funded with FTA funding and the environmental clearance was obtained in 2014. The project was advanced to the 60% design level utilizing the FTA funding and local matching funding. Over the course of the preliminary engineering it was determined that the project would be included in Caltrans's North Coast Corridor Construction Manager / General Contractor (CMGC) program. The CMGC contractor reviewed and had input on the preliminary design of the project and provided value engineering and suggestion to make the project more constructable to the design consultant.

The PS&E funding for the project was provided by the Senate Bill 1 (SB1) Local Partnership Program in 2018. The input from the CMGC contractor was incorporated into the final design and the design was completed in February 2022.

Construction funding was approved for the project through the Solutions for Congested Corridors Program, which was announced in Spring 2023. Negotiations with the CMGC contractor have recommenced and construction is anticipated to begin in Mid-2024.

3. PURPOSE AND NEED

Purpose:

The primary purpose of the project is to eliminate a single track bottleneck between the existing CP Ponto at MP 234.5 and the proposed new control point CP La Costa at MP 235.1 to be located just north of the single track underpass at La Costa.

In addition to providing a second main track the project will also replace the aging wood trestle bridge across the Batiquitos Lagoon with a new modern concrete bridge.

Need:

A. Single Track Bottleneck

Constructing this 0.6-mile long second main track to extend the existing double-track north of the project area will increase rail capacity and reliability on the Los Angeles-San Diego-San Luis Obispo (LOSSAN) Corridor.

The Project is necessary to support current and future growth in LOSSAN Corridor rail service demand while maintaining safety. Without increasing the amount of double track on the LOSSAN corridor, increases in train service will not be possible without degrading overall service reliability.

The existing single track within the project limits negatively affects reliability in the corridor. This portion of the corridor requires trains to wait outside of the single track segment between CP Ponto (MP 234.5) and CP Swami (MP 238.0), in order to take turns using the single track during train meets and passing movements. This reduces the overall capacity of the system, results in increased travel time, reduces operational flexibility, and results in delays to other trains if a train is late.

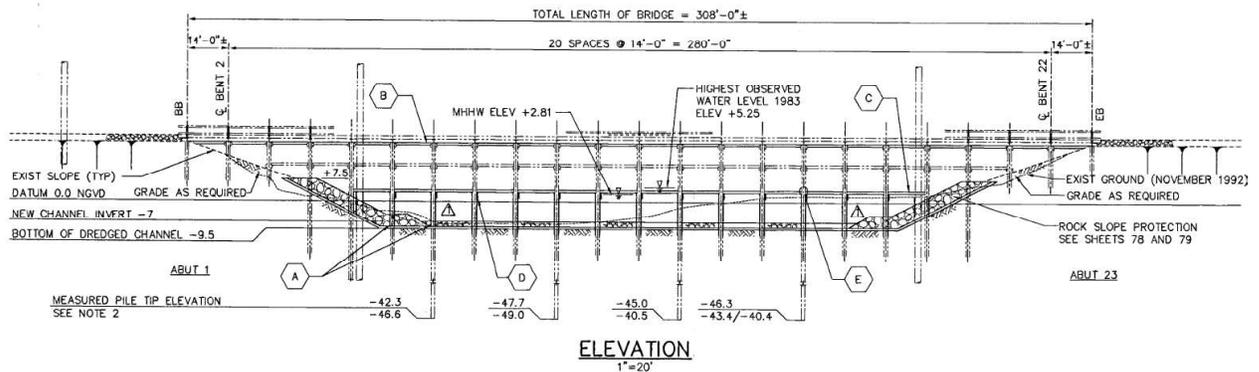
By adding a second track, the project would eliminate a 0.6-mile segment of the existing 3.5-mile single track bottleneck. This will allow additional flexibility in scheduling train meets and passes and reduce the occurrence and resulting delay time of conflicts at the location.



B. Replace Aging Bridge

In addition to providing a second main track the project will also replace the aging wood trestle bridge across the Batiquitos Lagoon with a new modern concrete bridge. The existing trestle bridge pile tips are within 20 ft of the scour depth, and with the age of the bridge, could be at risk of washout during a 100 year flood event. The depth of the new bridge piles, based on the 100% design, are a minimum of 90 feet below the current scour depth. See the attached hydraulic analysis for more information on the calculated scour depth. If the bridge were to washout during a flood then it would have wide reaching impacts on the regional economy. As the only viable rail line to the ports of San Diego and the second busiest passenger rail line in the country there would be far reaching effects if the rail line was taken out of service due to a bridge failure. It is currently estimated that a one year shut down to rebuild a portion of the rail line would cost the region approximately \$300 million in lost revenue.

The February 2020 Bridge inspection report notes that ongoing maintenance is required. The recommended immediate action includes installing pile shims, outrigger replacement, and banding installation at piles. The inspection report further notes that Bent 12 Pile #2 is rotten, and that existing piles at Bents 7, 8, and 9 are pumping under train traffic and should be monitored moving forward. This deterioration and the associated ongoing maintenance would be addressed through replacement of the bridge.



C. Regional and System Planning

It is an objective for SANDAG, NCTD, Amtrak, and BNSF to increase the efficiency of this rail corridor not only to accommodate existing train volumes, but also to provide for future demand for rail services on the corridor. Double tracking this segment directly supports this goal. Without increasing the amount of double track on the corridor, increases in either passenger and/or freight train service will not be possible without a degradation in overall service reliability.

The proposed project is consistent with key regional and corridor plans including SANDAG's Regional Transportation Plan (2021), SANDAG's San Diego Forward: The Regional Plan (2015), the LOSSAN Program Environmental Impact Report / Environmental Impact Statement by Caltrans and the Federal Railroad Administration (Record of Decision, 2009), and the Infrastructure Development Plan (IDP) for the LOSSAN Corridor in San Diego County (2018). The project also is a part of coastal rail double track improvements identified in the TransNet Early Action Program (EAP), San Diego's half-cent sales tax program for local transportation projects.

The *Infrastructure Development Plan for the LOSSAN Rail Corridor in San Diego County (IDP)* (2018) advises that this project must be completed in the mid-term to meet future planned service levels. Mid-term service expansion, which

equates roughly to year 2025. Other project benefits include improving operational flexibility, achieving a consistent peak period service headway, and reducing potential freight delays by adding capacity mid-corridor.

D. Traffic

This project, in conjunction with other corridor capital improvements, will provide the infrastructure for operators to increase train service and reduce headways between trains. Reduced headways will make train service more appealing to the public and increase ridership.

This project will increase use of transit and remove associated passenger vehicles and truck traffic, thereby reducing congestion and the number of vehicular accidents along the I-5 corridor.

4. ENVIRONMENTAL CLEARANCE DESCRIPTION

The project is one of several rail improvements in San Diego County that was covered under a Federal Transit Administration (FTA) National Environmental Policy Act (NEPA) Categorical Exclusion (CE) that was approved in July 2014. The Interstate Commerce Commission Termination Act ("ICCTA"), 49 U.S. Section 10101 et seq., preempts the Proposed Project from the CEQA.

5. CONSIDERATIONS REQUIRING DISCUSSION

5A. Hazardous Waste

The EDR study identified no sites within 0.25 mile of the study area that were identified as having open release cases. Based on the review of the EDR study, it does not appear that the environmental conditions of the subject property have been impacted. Due to the long history of the railway in this area, there is a potential for accumulation of herbicides and metals in the shallow soil along the railway.

5B. Value Analysis

A Benefit to Cost Analysis was performed as part of the Solutions for Congested Corridors Grant application, submitted to Caltrans in 2022. It was determined that the project has a Benefit to Cost Ratio of 2.3.

Additionally, as part of the design process the CMGC contractor on the project

has provided value engineering and constructability input on the 30% and 60% project submittals in order to reduce cost on the project. These suggestions were incorporated into the final design.

5C. Resource Conservation

It is planned to place beach sand quality soil from excavations and grading on the project onto the adjacent beach to replenish the beach sand that has been lost to natural erosion.

5D. Right-of-Way Issues

The State Lands Lease required to construct the project was approved in April 2020. A Right of Entry Permit will be required from California Department of Fish and Wildlife prior to construction. No issues are anticipated obtaining the permit. There are no other ROW concerns on the project.

5E. Environmental Compliance

The project was included in a Categorical Exclusion that was approved by the FTA in July 2014. The project is preempted from CEQA.

5F. Air Quality Conformity

Air Quality impacts were analyzed as part of the Benefits to Cost Analysis on the project. It is anticipated that the project will have a positive impact on Air Quality and Greenhouse Gas emissions by promoting and increasing train ridership and thereby removing single cars from adjacent highways. It is estimated that the project will reduce daily VMT by over 56,000 over the first twenty years of service and eliminate 8,000 tons of Carbon dioxide and 9 tons of carbon monoxide annually.

The replacement of the aging bridge will also eliminate the potential for freight diversion to trucks on the highway if the bridge had to be shut down to freight trains.

5G. Title VI Considerations

A Social Equity Engagement and Analysis was conducted as part of the development of SANDAG's 2021 Regional Plan. Expanding the regional transportation system aligns with SANDAG's goal of improving equity. The additional passenger rail service that will result from this project is anticipated to be a positive benefit to disadvantaged and low-income communities. Furthermore construction of this project will be subject to all Title VI requirements.

Fund Source	Fiscal Year Estimate								
	Prior	23/24	24/25	25/26	26/27	27/28	28/29	Future	Total
SB1 LPP									
Component	In thousands of dollars (\$1,000)								
PA&ED Support									
PS&E Support	1,250								1,250
Right-of-Way Support									
Construction Support									
Right-of-Way Construction									
Total	1,250								1,250

Fund Source	Fiscal Year Estimate								
	Prior	23/24	24/25	25/26	26/27	27/28	28/29	Future	Total
SB1 SCCP									
Component	In thousands of dollars (\$1,000)								
PA&ED Support									
PS&E Support									
Right-of-Way Support									
Construction Support									
Right-of-Way Construction		103,300							103,300
Total		103,300							103,300

Estimate

The project estimate is provided below. The project estimate is based on actual costs for environmental clearance and design. The Construction Cost is based on the Design Consultant's 100% Engineers Estimate. Soft Costs for the construction phase are based on typical percentages of the construction cost, based on similar projects constructed by SANDAG on the LOSSAN Corridor. The Construction Costs and expenditures are escalated to the anticipated year of expenditure based on the rates predicted by the SANDAG economics team.

District 11 – San Diego County – LOSSAN/I-5 Corridor - MP 234.5 / MP 235.1
EA563GA – PPNO SC001
Solutions for Congested Corridors
September / 2023

Batiquitos Lagoon Double Track (CP Ponto to CP La Costa)					
PROJECT COST ESTIMATE			Design Level: 100%		
Revised: 11/21/22			Estimated By: TD, DB, BL		
Item	Quantity (Actuals)	Unit	Unit Price	Amount (Actuals)	Subtotal
DESIGN					
Agency Design Admin-SANDAG	2.84%	x	CCE	\$ 1,736,200	
Agency Program Mgmt-SANDAG	0.93%	x	CCE	\$ 567,997	
Agency Design Admin-NCTD	0.19%	x	CCE	\$ 117,800	
Design-Alternatives Analysis and Environmental	2.10%	x	CCE	\$ 1,281,921	
Design-Preliminary to 30%	2.69%	x	CCE	\$ 1,643,075	
Design-30% to 90%	6.12%	x	CCE	\$ 3,736,072	
Design-90% to Final PS&E, Bid Support	3.46%	x	CCE	\$ 2,109,709	
Independent Peer Reviews	1.09%	x	CCE	\$ 666,996	
Total	19.43%				DESIGN TOTAL \$11,859,770
RIGHT OF WAY					
ROW Support		1	LS	\$43,000	\$ 43,000
ROW Capital		1	LS	\$48,000	\$ 48,000
					RIGHT OF WAY TOTAL \$91,000
CONSTRUCTION CONTRACT ESTIMATE					
<i>(from 100% Design Est. HNTB 2/2/22)</i>					
Track		1	LS	\$3,956,843	\$ 3,956,843
Polution Control and SWPPP		1	LS	\$1,601,387	\$ 1,601,387
Site Civil		1	LS	\$6,275,867	\$ 6,275,867
Site Civil - Inlet and Bridge RSP		1	LS	\$15,792,673	\$ 15,792,673
Permanent Revegetation		1	LS	\$379,181	\$ 379,181
Drainage		1	LS	\$634,784	\$ 634,784
Bridge 234.8		1	LS	\$9,497,989	\$ 9,497,989
Br. 324.5 Overhead Pier Protection		1	LS	\$178,883	\$ 178,883
Retaining Walls		1	LS	\$2,110,288	\$ 2,110,288
Signals & Communications		1	LS	\$3,009,705	\$ 3,009,705
Nesting Site Restoration		1	LS	\$851,386	\$ 851,386
					Base Construction Estimate (BCE) \$44,288,986
General					
Contractor Mobilization	10.0%	X	BCE	\$ 4,428,899	
Bonds and Insurance	5.3%	X	BCE	\$ 2,347,316	
Time Related Overhead (Per Caltrans Contract)	10.0%	X	BCE	\$ 4,428,899	
Construction Contingency	12.5%	X	BCE	\$ 5,536,123	
					CONSTRUCTION CONTRACT ESTIMATE (CCE) \$61,030,222
ANCILLARY CONSTRUCTION COSTS					
Design Support During Construction	4.00%	x	CCE	\$ 2,441,200	
Construction Management	15.00%	x	CCE	\$ 9,154,500	
Agency Construction Admin. (SANDAG)	3.50%	x	CCE	\$ 2,136,000	
Agency Construction Program Mangament	0.50%	x	CCE	\$ 305,100	
Legal Services	0.25%	x	CCE	\$ 152,500	
Communications	0.25%	x	CCE	\$ 152,500	
NCTD Admin, Signal & PTC Support	1.00%	x	CCE	\$ 610,300	
Flagging Services (NCTD)	4.00%	x	CCE	\$ 2,441,200	
Pre Construction Sevices (Caltrans)		1	LS	\$656,000	\$ 656,000
Ancillary Cost Contingency	3%	%	CCE	\$ 1,830,907	
Total	28.5%				ANCILLARY CONSTRUCTION COSTS \$19,880,207
OFF-SITE ENVIRONMENTAL MITIGATION					
Tidal Wetlands Permanent Impact Mitigation	0.26	Acre		\$1,150,938	\$ 299,244
Tidal Wetlands Temporary Impact Mitigation	0.24	Acre		\$780,241	\$ 187,258
Other Wetlands Permanent Impact Mitigation	1.92	Acre		\$407,053	\$ 781,542
Other Wetlands Temporary Impact Mitigation	2.76	Acre		\$345,272	\$ 952,951
Uplands Permanent Impact Mitigation	3.85	Acre		\$262,415	\$ 1,010,298
Uplands Temporary Impact Mitigation	0.26	Acre		\$188,278	\$ 48,952
Other		Acre		\$	\$ -
Subtotal					\$3,280,244
Project Contingency					
Contingency	10.0%	%	CCE	\$ 6,103,022	
					Project Contingency \$6,103,022
TOTAL PROJECT COST ESTIMATE (FY22 Dollars)					\$102,244,466
COST ESCALATION					
Year of Expenditure	Annual %	Cumulative Escalation	Expenditures (Actuals)	TOTAL Escalation	
Previous Years		0.0%	\$ 11,341,172	\$ -	
FY22 - Final Design (1/2 Year Escalation)	7.9%	7.9%	\$ 609,598	\$ 48,158	
FY23 - Permit & Bidding	4.4%	12.3%	\$ -	\$ -	
FY24 - 50% Construction	2.9%	15.2%	\$ 39,156,053	\$ 5,947,804	
FY25 - 100% Construction	2.8%	18.0%	\$ 39,156,053	\$ 7,055,921	
FY26 - Complete Construction	2.8%	20.9%	\$ 11,981,589	\$ 2,498,161	
Project Estimate without Escalation				\$102,244,466	
Estimated Escalation				\$ 15,550,045	
PROJECT COST IN YEAR OF EXPENDITURE DOLLARS				\$ 117,794,511	
Project Risk Category based upon the SANDAG Cost Estimating Guide is: High Risk					

7. DELIVERY SCHEDULE

Project Milestones	Milestone Date (Month/Day/Year)	Milestone Designation (Target/Actual)
Project Study Report Approved	10/01/2013	Actual
Begin Environmental (PA&ED) Phase	10/01/2013	Actual
Circulate Draft Environmental Document – Document Type (ND/MND)/FONSI	04/01/2014	Actual
Draft Project Report	07/01/2014	Actual
End Environmental Phase (PA&ED Milestone)	07/01/2014	Actual
Begin Design (PS&E) Phase	05/01/2015	Actual
End Design Phase (Ready to List for Advertisement Milestone)	12/31/2023	Target
Begin Right of Way Phase	05/01/2015	Actual
End Right of Way Phase (Right of Way Certification Milestone)	12/31/2023	Target
Begin Construction Phase (Contract Award Milestone)	08/01/2024	Target
End Construction Phase (Construction Contract Acceptance Milestone)	08/01/2027	Target
Begin Closeout Phase	08/02/2027	Target
End Closeout Phase (Closeout Report)	02/01/2028	Target

8. RISKS

Major Risks with their proposed mitigation are shown below:

Major Risk	Mitigation
The Agreed to Price (ATP) that is negotiated with the contractor may exceed the project budget.	The project estimate and budget include contingency in the event that the ATP exceeds the initial construction estimate.
Least Tern Nesting Season may have an adverse effect on the construction schedule as the resource agencies are not allowing certain work activities during nesting season.	The nesting season limitations are going to be placed into the project specifications and the contractor will work with the Construction Management team to build a schedule that optimizes work that can be permitted during certain seasons.
There is a potential need for earthwork treatment at the bridge foundations.	Additional earthwork treatment has been included as an additional bid quantity within the specifications.
Flagging costs may exceed the initial estimate.	Contingency has been included in the project budget to address potential overruns for flagging costs.
There are risks associated with construction in a lagoon environment, including storm damage to temporary work bridges and berms.	The responsibility for the risk associated with storm damage is transferred to the contractor in the specifications.

9. EXTERNAL AGENCY COORDINATION

The project requires the following coordination:

Federal Transit Administration

Lead Agency on NEPA CE documentation - **Approved**

US Army Corps of Engineers

Clean Water Act Section 404 Permit – **Approved**

State Lands Lease - **Approved**

US Fish and Wildlife Service

Endangered Species Act Section 7 Consultation Biological Opinion-
Approved

State Historic Preservation Office

Section 106 State Historic Preservation Act Consultation – **Approved**

California Coastal Commission

Federal Coastal Consistency Certification - **Approved**

California Public Utilities Commission

GO 88-B Modification of an Existing Rail Crossing - **Approved**

Regional Water Quality Control Board

Clean Water Act Section 401 Permit - **Approved**

California Department of Fish and Wildlife

Right of Entry Permit – **In Progress**

Local Agency

MOU 18 Agreement with NCTD – **Approved**

10. ADDITIONAL INFORMATION

The project is being included in the Caltrans CMGC Contract with Flatiron, Skanska, Stacey and Witbeck (FSSW). FSSW is currently under contract and performing construction on the North Coast Corridor program with Caltrans. The program includes highway, rail, and trail improvements in the I-5 corridor of San Diego County. The CMGC contract will be administered by Caltrans and the day to day construction management will be performed by SANDAG. Negotiations have commenced to reach an Agreed to Price (ATP) for this segment of work.

11. ATTACHMENTS

- A. Project Programming Request PPR (8 pages)
- B. Project Location Map (1 page)
- C. Engineers Estimate (5 pages)

Amendment (Existing Project) <input type="checkbox"/> YES <input checked="" type="checkbox"/> NO				Date	10/06/2023 11:43:40
Programs <input type="checkbox"/> LPP-C <input type="checkbox"/> LPP-F <input type="checkbox"/> SCCP <input type="checkbox"/> TCEP <input type="checkbox"/> STIP <input checked="" type="checkbox"/> Other					
District	EA	Project ID	PPNO	Nominating Agency	
75	R563GA		SC001	San Diego Association of Governments	
County	Route	PM Back	PM Ahead	Co-Nominating Agency	
San Diego County				North San Diego County Transit District	
				MPO	Element
				SANDAG	Rail
Project Manager/Contact			Phone	Email Address	
Tim DeWitt			619-699-1935	tim.dewitt@sandag.org	

Project Title

Build North Coast Corridor (NCC) Batiquitos

Location (Project Limits), Description (Scope of Work)

The project is located in the Cities of Carlsbad and Encinitas, on the Los Angeles - San Diego - San Luis Obispo (LOSSAN) Rail Corridor between mileposts 234.5 and 235.1. The project scope includes the following:

- Construction of 0.6 miles of new second main track
- Modification of the railroad system by removing Control Point (CP) Ponto at MP 234.5 and installing a new CP La Costa at MP 235.1
- Re-alignment and construction of a new concrete double track bridge through the waterway entrance to the Batiquitos Lagoon
- Construction of drainage and culvert improvements through the existing trench north of the lagoon
- Expansion and improvement of the existing Least Tern site on the southwestern corner of the lagoon
- Relocation of utilities and construction of various other ancillary civil and track improvements.

Component	Implementing Agency
PA&ED	San Diego Association of Governments
PS&E	San Diego Association of Governments
Right of Way	San Diego Association of Governments
Construction	San Diego Association of Governments

Legislative Districts

Assembly:	77	Senate:	38	Congressional:	49
-----------	----	---------	----	----------------	----

Project Milestone	Existing	Proposed
Project Study Report Approved	10/01/2013	
Begin Environmental (PA&ED) Phase		10/01/2013
Circulate Draft Environmental Document Document Type CE		04/01/2014
Draft Project Report		07/01/2014
End Environmental Phase (PA&ED Milestone)		07/01/2014
Begin Design (PS&E) Phase		05/01/2015
End Design Phase (Ready to List for Advertisement Milestone)		12/31/2023
Begin Right of Way Phase		05/01/2015
End Right of Way Phase (Right of Way Certification Milestone)		12/31/2023
Begin Construction Phase (Contract Award Milestone)		08/01/2024
End Construction Phase (Construction Contract Acceptance Milestone)		08/01/2027
Begin Closeout Phase		08/02/2027
End Closeout Phase (Closeout Report)		02/01/2028

Purpose and Need

The segment of Interstate-5 (I-5) in the North Coast Corridor (NCC) of San Diego County serves as a major transportation corridor, facilitating interregional goods movement and connecting people to socioeconomic opportunities and coastal resources. The 27-mile-long stretch of interstate is in the Coastal Zone and passes through 6 coastal cities – Oceanside, Carlsbad, Encinitas, Solana Beach, Del Mar, and San Diego, which is home to 1.8 million people and 1.1 million jobs. Jobs, coastal resources, regional attractions, and freight network in the NCC generate a variety of transportation needs that put a significant strain on the corridor. In 2010, the NCC accommodated over 1.4 million daily vehicle trips just on I-5 (or approximately 13% of the 11.5 million daily vehicle trips that occurred within San Diego County). By 2040, I-5 in the NCC is projected to accommodate nearly 1.8 million daily vehicle trips (an increase of more than 26% over existing conditions).

Existing transportation facilities focus primarily on moving cars, not people; and highway demand currently exceeds capacity. This has resulted in considerable congestion, increased travel times, decreased reliability and limited travel choices, particularly for commute trips during peak periods and recreational trips on weekends. As San Diego and California continue to grow, these problems will get worse, affecting the region's quality of life and inhibiting coastal access and economic growth in the San Diego region and beyond.

To focus on managing demand, SANDAG and the California Department of Transportation (Caltrans) developed the NCC Program, a comprehensive set of transportation strategies to provide travelers choices for the future while enhancing environmental health and quality of life for residents. The NCC Program, known colloquially as Build NCC, is comprised of three primary focus areas – the I-5 Express Lanes Project, coastal rail and transit enhancements, and environmental protection and coastal access improvements (Figure 1). To date, SANDAG and Caltrans have constructed 9 miles of new managed lanes, 1.5 miles of new rail double track, and 7 miles of new bike and pedestrian paths in the corridor. Yet more work needs to be done to substantially reduce I-5 congestion, encourage mode shift, and address regional and state climate action goals. Build NCC Batiquitos (the Project) will implement vital rail improvements included in Build NCC to further reduce congestion in the heavily traveled I-5 corridor.

The Project will eliminate a single track bottleneck between CP Ponto and the proposed new control point CP La Costa to be located just south of Batiquitos Lagoon. The existing single track segment negatively affects reliability in the corridor since trains have to take turns using the single track during train meets and passing movements. The Project will eliminate .6 miles of the existing 3.5 mile single track bottleneck which will allow additional flexibility in scheduling train meets and passes while also reducing the occurrence and resulting delay time of conflicts at the location. This project is part of the overall Interstate 5 North Coast Corridor project utilizing the Construction Manager/General Contractor (CM/GC) method of procurement in partnership with Caltrans.

This project increases capacity by adding a second track; reduces recurring and costly maintenance due to aging structures; enhances operational flexibility and reliability that can translate to reduced travel times and improved on-time performance of trains; and allows for increased freight and passenger rail services that can have positive impacts on ridership and revenue and reduced greenhouse gas emissions.

NHS Improvements YES NO Roadway Class NA Reversible Lane Analysis YES NO

Inc. Sustainable Communities Strategy Goals YES NO Reduce Greenhouse Gas Emissions YES NO

Project Outputs

Category	Outputs	Unit	Total
Rail/ Multi-Modal	Miles of new track	Miles	0.6

Date 10/06/2023 11:43:40

Additional Information

Project Benefits

Specific benefits of the Project include:

- Reducing vehicle miles traveled (VMT) of more than 411 million over 20 years
 - Saving an estimated 1.9 million person hours of travel time saved over 20 years
- A savings of nearly 166,000 tons of carbon dioxide over the next 20 years
- A Cost/Benefit Ratio of 2.3
 - Adding 1,480 jobs to the regional economy
 - Increasing capacity by eliminating 0.6 miles of a 3.5-mile bottleneck of single-track capacity
 - Providing the only mid-corridor location in San Diego County for passenger trains to bypass slower freight trains to improve travel time delays and schedule reliability
 - Reducing train wait times and delays of 4,284 minutes per year
 - Improving operational reliability and flexibility by allowing for consistent peak period Pacific Surfliner and COASTER service (20-minute headways throughout the day), which will provide another alternative to driving the parallel I-5
 - Enabling five freight slots per day in each direction during passenger off peak hours
 - Additional service made possible by implementing the Project will serve as mitigation for planned future I-5 construction
 - Completing an additional rail network segment as called for in the 2018 California State Rail Plan
 - Replacing of an old wooden trestle bridge built in the 1930s which is nearing the end of its useful life
 - Reducing recurring rail maintenance costs by \$11,000 annually
 - Improving lagoon health by expanding the mouth of the lagoon under the new bridge thus providing a significant increase to tidal flushing

The project schedule has changed from the original PPR submitted with the application. The reason for the changes is as follows.

The contract award milestone was extended several months from the initial application based on updated schedules from the CMGC team and Caltrans staff regarding ICE and CGMC estimating team availability and the timeframe to execute Task Orders and agreements. The ROW milestone was also extended based on feedback from DRMT regarding requirements for the ROW Cert.

Performance Indicators and Measures						
Measure	Required For	Indicator/Measure	Unit	Build	Future No Build	Change
Congestion Reduction	LPPC, SCCP, LPPF	Change in Daily Vehicle Miles Travelled	Miles	12,286,698	12,373,140	-86,442
			VMT per Capita	0	0	0
	LPPC, SCCP, LPPF	Person Hours of Travel Time Saved (Only 'Change' required)	Person Hours	98,178	0	98,178
			Hours per Capita	0	0	0
System Reliability (Freight)	LPPC, SCCP, LPPF	Peak Period Travel Time Reliability Index (Only 'No Build' Required)	Index	0	0	0
	LPPC, SCCP, LPPF	Level of Transit Delay (if required)	% "On-time"	0	0	0
Air Quality & GHG (only 'Change' required)	LPPC, SCCP, TCEP, LPPF	Particulate Matter	PM 2.5 Tons	25	0	25
			PM 10 Tons	25	0	25
	LPPC, SCCP, TCEP, LPPF	Carbon Dioxide (CO2)	Tons	0	165,882	-165,882
	LPPC, SCCP, TCEP, LPPF	Volatile Organic Compounds (VOC)	Tons	0	7	-7
	LPPC, SCCP, TCEP, LPPF	Sulphur Dioxides (SOx)	Tons	0	2	-2
	LPPC, SCCP, TCEP, LPPF	Carbon Monoxide (CO)	Tons	0	177	-177
	LPPC, SCCP, TCEP, LPPF	Nitrogen Oxides (NOx)	Tons	399	0	399
Safety	LPPC, SCCP, TCEP, LPPF	Number of Fatalities	Number	439	441	-2
	LPPC, SCCP, TCEP, LPPF	Fatalities per 100 Million VMT	Number	0.005	0.005	0
	LPPC, SCCP, TCEP, LPPF	Number of Serious Injuries	Number	24,592	24,719	-127
	LPPC, SCCP, TCEP, LPPF	Number of Serious Injuries per 100 Million VMT	Number	0.28	0.28	0
Economic Development	LPPC, SCCP, TCEP, LPPF	Jobs Created (Only 'Build' Required)	Number	1,348	0	1,348
Cost Effectiveness (only 'Change' required)	LPPC, SCCP, TCEP, LPPF	Cost Benefit Ratio	Ratio	2.3	0	2.3
Vehicle Volume	LPPC, LPPF, SCCP	Existing Average Annual Vehicle Volume on Project Segment	Number	0	0	0
	LPPC, LPPF, SCCP	Estimated Year 20 Average Annual Vehicle Volume on Project Segment with Project	Number	0	0	0

Fund #4:	Local Funds - Local Measure (Committed)								Program Code
Existing Funding (\$1,000s)									Funding Agency
Component	Prior	20-21	21-22	22-23	23-24	24-25	25-26+	Total	
E&P (PA&ED)									San Diego Association of Governmen
PS&E									
R/W SUP (CT)									
CON SUP (CT)									
R/W									
CON									
TOTAL									
Proposed Funding (\$1,000s)									
E&P (PA&ED)									1:1 Local Match for LPP(F)
PS&E	1,250							1,250	
R/W SUP (CT)									
CON SUP (CT)									
R/W									
CON									
TOTAL	1,250							1,250	
Fund #5:	Local Funds - Local Measure (Committed)								
Existing Funding (\$1,000s)									Funding Agency
Component	Prior	20-21	21-22	22-23	23-24	24-25	25-26+	Total	
E&P (PA&ED)									
PS&E									
R/W SUP (CT)									
CON SUP (CT)									
R/W									
CON									
TOTAL									
Proposed Funding (\$1,000s)									
E&P (PA&ED)	1,984							1,984	
PS&E	1,336							1,336	
R/W SUP (CT)									
CON SUP (CT)									
R/W									
CON					2,640			2,640	
TOTAL	3,320				2,640			5,960	

Fund #6:	State SB1 SCCP - Solution for Congested Corridors Program (Committed)								Program Code
Existing Funding (\$1,000s)									
Component	Prior	20-21	21-22	22-23	23-24	24-25	25-26+	Total	Funding Agency
E&P (PA&ED)									
PS&E									
R/W SUP (CT)									
CON SUP (CT)									
R/W									
CON									
TOTAL									
Proposed Funding (\$1,000s)									Notes
E&P (PA&ED)									
PS&E									
R/W SUP (CT)									
CON SUP (CT)									
R/W									
CON					103,300			103,300	
TOTAL					103,300			103,300	

Attachment B: Location Map



Batiquitos Lagoon Double Track (CP Ponto to CP La Costa)

PROJECT COST ESTIMATE

Design Level: 100%

Revised: 11/21/22

Estimated By: TD, DB, BL

Item	Quantity (Actuals)	Unit	Unit Price	Amount (Actuals)	Subtotal
DESIGN					
Agency Design Admin-SANDAG	2.84%	x	CCE	\$ 1,736,200	
Agency Program Mgmt-SANDAG	0.93%	x	CCE	\$ 567,997	
Agency Design Admin-NCTD	0.19%	x	CCE	\$ 117,800	
Design-Alternatives Analysis and Environmental	2.10%	x	CCE	\$ 1,281,921	
Design-Preliminary to 30%	2.69%	x	CCE	\$ 1,643,075	
Design-30% to 90%	6.12%	x	CCE	\$ 3,736,072	
Design-90% to Final PS&E, Bid Support	3.46%	x	CCE	\$ 2,109,709	
Independent Peer Reviews	1.09%	x	CCE	\$ 666,996	
Total	19.43%				DESIGN TOTAL \$11,859,770
RIGHT OF WAY					
ROW Support		1	LS	\$43,000	\$ 43,000
ROW Capital		1	LS	\$48,000	\$ 48,000
					RIGHT OF WAY TOTAL \$91,000
CONSTRUCTION CONTRACT ESTIMATE					
<i>(from 100% Design Est. HNTB 2/2/22)</i>					
Track	1	LS	\$3,956,843	\$ 3,956,843	
Pollution Control and SWPPP	1	LS	\$1,601,387	\$ 1,601,387	
Site Civil	1	LS	\$6,275,867	\$ 6,275,867	
Site Civil - Inlet and Bridge RSP	1	LS	\$15,792,673	\$ 15,792,673	
Permanent Revegetation	1	LS	\$379,181	\$ 379,181	
Drainage	1	LS	\$634,784	\$ 634,784	
Bridge 234.8	1	LS	\$9,497,989	\$ 9,497,989	
Br. 324.5 Overhead Pier Protection	1	LS	\$178,883	\$ 178,883	
Retaining Walls	1	LS	\$2,110,288	\$ 2,110,288	
Signals & Communications	1	LS	\$3,009,705	\$ 3,009,705	
Nesting Site Restoration	1	LS	\$851,386	\$ 851,386	
					Base Construction Estimate (BCE) \$44,288,986
General					
Contractor Mobilization	10.0%	X	BCE	\$ 4,428,899	
Bonds and Insurance	5.3%	X	BCE	\$ 2,347,316	
Time Related Overhead (Per Caltrans Contract)	10.0%	X	BCE	\$ 4,428,899	
Construction Contingency	12.5%	X	BCE	\$ 5,536,123	
					CONSTRUCTION CONTRACT ESTIMATE (CCE) \$61,030,222
ANCILLARY CONSTRUCTION COSTS					
Design Support During Construction	4.00%	x	CCE	\$ 2,441,200	
Construction Management	15.00%	x	CCE	\$ 9,154,500	
Agency Construction Admin. (SANDAG)	3.50%	x	CCE	\$ 2,136,000	
Agency Construction Program Mangament	0.50%	x	CCE	\$ 305,100	
Legal Services	0.25%	x	CCE	\$ 152,500	
Communications	0.25%	x	CCE	\$ 152,500	
NCTD Admin, Signal & PTC Support	1.00%	x	CCE	\$ 610,300	
Flagging Services (NCTD)	4.00%	x	CCE	\$ 2,441,200	
Pre Construction Sevices (Caltrans)		1	LS	\$656,000	\$ 656,000
Ancillary Cost Contingency	3%	%	CCE	\$ 1,830,907	
Total	28.5%				ANCILLARY CONSTRUCTION COSTS \$19,880,207
OFF-SITE ENVIRONMENTAL MITIGATION					
Tidal Wetlands Permanent Impact Mitigation	0.26	Acre	\$1,150,938	\$ 299,244	
Tidal Wetlands Temporary Impact Mitigation	0.24	Acre	\$780,241	\$ 187,258	
Other Wetlands Permanent Impact Mitigation	1.92	Acre	\$407,053	\$ 781,542	
Other Wetlands Temporary Impact Mitigation	2.76	Acre	\$345,272	\$ 952,951	
Uplands Permanent Impact Mitigation	3.85	Acre	\$262,415	\$ 1,010,298	
Uplands Temporary Impact Mitigation	0.26	Acre	\$188,278	\$ 48,952	
Other		Acre		\$ -	
Subtotal					\$3,280,244
Project Contingency					
Contingency	10.0%	%	CCE	\$ 6,103,022	
					Project Contingency \$6,103,022
TOTAL PROJECT COST ESTIMATE (FY22 Dollars)					\$102,244,466
COST ESCALATION					
Year of Expenditure	Annual %	Cumulative Escalation	Expenditures (Actuals)	TOTAL Escalation	
Previous Years		0.0%	\$ 11,341,172	\$ -	
FY22 - Final Design (1/2 Year Escalation)	7.9%	7.9%	\$ 609,598	\$ 48,158	
FY23 - Permit & Bidding	4.4%	12.3%	\$ -	\$ -	
FY24 - 50% Construction	2.9%	15.2%	\$ 39,156,053	\$ 5,947,804	
FY25 - 100% Construction	2.8%	18.0%	\$ 39,156,053	\$ 7,055,921	
FY26 - Complete Construction	2.8%	20.9%	\$ 11,981,589	\$ 2,498,161	
					Project Estimate without Escalation \$102,244,466
					Estimated Escalation \$ 15,550,045
PROJECT COST IN YEAR OF EXPENDITURE DOLLARS				\$ 117,794,511	

Project Risk Category based upon the SANDAG Cost Estimating Guide is: **High Risk**

SANDAG: Batiquitos Lagoon Double-Track (BLDT) Project CIP 1239816					Prepared by: HNTB	
100% Construction Cost Estimate (CCE)					Date: Feb. 2022	
			2021			
Item	Quantity	Unit	Unit Price	Amount 100%		Subtotals
Minor Concrete (Pervious Pavement, 6" THK over 6" Class 2 Base)	3,506	SF	\$27	\$95,959		
Steel Fence (7.2' High)	148	LF	\$137	\$20,254		
Concrete Slope Protection Removal (at Encinas OH)	1,458	SF	\$5.95	\$8,675		
12" Aband. Gas Main (Removal / Slurry Fill)	1100	LF	\$68	\$74,613		
						\$6,506,126
4 - Site Civil - Inlet & Bridge RSP						
Remove Existing Rock	12,500	CY	\$34.00	\$425,000		
Temporary Shoring (West of Ex. BR 234.8)	6,000	SF	\$250	\$1,500,000		
Temporary Construction (Access road for RSP site work)	48,800	SF	\$0.39	\$19,041		
EXCAVATION UNDERWATER for RSP - North	41,800	CY	\$43	\$1,797,296		
EXCAVATION UNDERWATER for RSP - South	16,300	CY	\$43	\$700,859		
Temporary Construction (Work Berm & Platform)	1	LS	\$1,365,390	\$1,365,390		
CLASS 8 NON-WOVEN GEOTEXTILE FILTER	29,800	SF	\$8.00	\$238,400		
CLASS VIII RSP - North	8,600	CY	\$240	\$2,064,000		
CLASS V RSP- North	6,900	CY	\$223	\$1,538,700		
CLASS I RSP W/ NON-WOVEN GEOTEXTILE FILTER FABRIC - North	5,100	CY	\$240	\$1,224,000		
CLASS VIII RSP - South	8,600	CY	\$240	\$2,064,000		
CLASS V RSP - South	6,900	CY	\$223	\$1,538,700		
CLASS I RSP W/ NON-WOVEN GEOTEXTILE FILTER FABRIC - South	5,100	CY	\$240	\$1,224,000		
						\$15,699,385
5 - Permanent Revegetation						
Move-In/Move-Out (Permanent Hydroseeding Erosion Control)	3	EA	\$875	\$2,625		
On-Site Revegetation (Hydroseeding w/ BFM including testing)	59,900	SY	\$7.90	\$473,210		
On-Site Revegetation (365-Day Irrigation-Hand water w/ hose & water truck)	12	EA	\$2,000	\$24,000		
On-Site Revegetation (365-Day Maintenance)	12	EA	\$6,500	\$78,000		
Resod & Restore Irrigation	2,705	SF	\$5.00	\$13,525		
						\$591,360
6 - Drainage						
Remove Concrete Channel	2,000	SF	\$7.25	\$14,500		
Remove 22" Steel Culvert	40	LF	\$28	\$1,120		
Articulated Concrete Block (ACB) Ditch (w/ 6" THK Bedding & Soil Infill)	3,600	SF	\$24.00	\$86,400		
RSP (Class VII)- Rock Chute - Grouted	135	CY	\$209	\$28,215		
RSP (Class I) - North	60	CY	\$150	\$9,000		
RSP (Class 1)- South	127	CY	\$150	\$19,050		
24" RCP (D-3000) Storm Drain	210	LF	\$314	\$65,940		
42" RCP (D-3000) Storm Drain	125	LF	\$425	\$53,125		
8" PVC Underdrain (Sch 80)	146	LF	\$116	\$16,936		
Minor Concrete (U-Ditch w/Grate)	65	LF	\$225	\$14,625		
Minor Concrete (Headwall)	4	EA	\$6,850	\$27,400		
Minor Concrete (Drop Structure)	1	EA	\$2,500	\$2,500		
Minor Concrete (Trackside Ditch Type 1)	1736	LF	\$137	\$237,572		
Minor Concrete (Trackside Ditch Type 2)	200	LF	\$89	\$17,850		
Minor Concrete (Trackside Ditch 3)	55	LF	\$145	\$7,975		
Ballast Lined Ditch	310	LF	\$24	\$7,440		
Concrete Headwall (L Type Headwall & Slope Paving)	1	EA	\$5,500	\$5,500		
Gravity Block Retaining Wing Wall (MP 235.13)	100	SF	\$109	\$10,948		
Hand Rails	20	LF	\$55	\$1,100		
						\$627,196
7 - Br.234.8 - Batiquitos Lagoon Rail Bridge						
Furnish 30" OD CISS Pile	4,112	LF	\$328	\$1,348,736		
Drive 30" OD CISS Pile	4,112	LF	\$268	\$1,102,016		
Furnish 36" OD CISS Pile	803	LF	\$417	\$334,851		
Drive 36" OD CISS Pile	803	LF	\$298	\$239,294		
Structural Concrete, Bridge	379	CY	\$1,785	\$676,515		
Structural Concrete, Piles	693	CY	\$1,785	\$1,237,005		
Furnish and Erect Precast 56' Box Girder	24	EA	\$108,000	\$2,592,000		
Bar Reinforcing Steel (Epoxy Coated) (Bridge)	277,000	LB	\$3.00	\$831,000		
Cable Railing	754	LF	\$55	\$41,470		
Structural Steel (Restrainer Rod Assembly)	24,700	LB	\$12	\$296,400		
Miscellaneous Metal (Walkway)	672	LF	\$18	\$12,096		
Elastomeric Bearing Pad Assembly Abutment (3 pads at each box end)	8	EA	\$4,165	\$33,320		
Elastomeric Bearing Pad Assembly Pier (3 pads at each box end)	40	EA	\$3,570	\$142,800		
Asphalt Membrane Waterproofing	10,444	SF	\$17	\$177,548		
Structural Excavation	34	CY	\$188	\$6,392		
Structural Backfill	84	CY	\$125	\$10,500		
Br. 234.8 Removal	1	LS	\$655,500	\$655,500		
						\$9,734,973
8 - Br.234.5 - Avenida Encinas Overhead Pier Protection						
Structural Excavation (Pier Protection Wall)	194	CY	\$188	\$36,491		
Structural Backfill (Pier Protection Wall)	71	CY	\$125	\$8,903		
Structural Concrete (Pier Protection Wall)	93	CY	\$969	\$89,952		
Bar Reinforcing Steel (Pier Protection Wall)	18,800	LB	\$2.00	\$37,600		
						\$172,947
9 - Site Structural - Retaining Walls						
Soldier Pile RW 2022W						
Structural Excavation (Soldier Pile Wall)	41	CY	\$135	\$5,535		
Structural Backfill (Soldier Pile Wall)	14	CY	\$130	\$1,820		
Structural Concrete Backfill (Soldier Pile Wall)	24	CY	\$443	\$10,632		
Lean Concrete Backfill	9	CY	\$350	\$3,150		
Steel Soldier Pile (W14x68)	42	LF	\$63	\$2,646		
Steel Soldier Pile (W14x132)	55	LF	\$144	\$7,920		
Steel Soldier Pile (W18x211)	109	LF	\$371	\$40,439		

SANDAG: Batiquitos Lagoon Double-Track (BLDT) Project CIP 1239816					Prepared by: HNTB	
100% Construction Cost Estimate (CCE)					Date: Feb. 2022	
Item	Quantity	Unit	2021		Subtotals	
			Unit Price	Amount 100%		
Drilled Hole (30" Dia.)	139	LF	\$184	\$25,576		
Structural Concrete (Retaining Wall)	18	CY	\$1,027	\$18,486		
Bar Reinforcing Steel (Retaining Wall)	2,700	LB	\$2.00	\$5,400		
Minor Conc (Gutter)	41	LF	\$60	\$2,460		
Timber Lagging	151	CF	\$59	\$8,909		
Zinc Primer	406	SF	\$7.00	\$2,842		
Miscellaneous Steel (Studs)	160	LB	\$3.00	\$480		
Cable Railing	41	LF	\$55	\$2,255		
					\$138,550	
Soldier Pile RW 2023W						
Structural Excavation (Soldier Pile Wall)	97	CY	\$135	\$13,095		
Structural Backfill (Soldier Pile Wall)	20	CY	\$130	\$2,600		
Structural Concrete Backfill (Soldier Pile Wall)	38	CY	\$443	\$16,834		
Lean Concrete Backfill	12	CY	\$350	\$4,200		
Steel Soldier Pile (W14x68)	24	LF	\$63	\$1,512		
Steel Soldier Pile (W21x201)	223	LF	\$227	\$50,621		
Drilled Hole (30" Dia.)	15	LF	\$184	\$2,760		
Drilled Hole (36" Dia.)	138	LF	\$198	\$25,944		
Structural Concrete (Retaining Wall)	23	CY	\$1,027	\$23,624		
Bar Reinforcing Steel (Retaining Wall)	3,100	LB	\$2.00	\$6,200		
Timber Lagging	213	CF	\$58	\$12,384		
Zinc Primer Coating	636	SF	\$6.56	\$4,169		
Miscellaneous Steel (Studs)	215	LB	\$6.78	\$1,458		
Cable Railing	40	29	\$55	\$2,200		
					\$167,601	
Temporary Shoring (Laydown area next to RW2023)	3,850	SF	\$108	\$415,800		
					\$415,800	
Soldier Pile RW 2025W						
Structural Excavation (Soldier Pile Wall)	326	CY	\$135	\$44,010		
Structural Backfill (Soldier Pile Wall)	40	CY	\$130	\$5,200		
Structural Concrete Backfill (Soldier Pile Wall)	47	CY	\$473	\$22,231		
Lean Concrete Backfill	21	CY	\$391	\$8,211		
Steel Soldier Pile (W14x68)	109	LF	\$68	\$7,412		
Steel Soldier Pile (W14x132)	111	LF	\$144	\$15,984		
Steel Soldier Pile (W14x109)	76	LF	\$172	\$13,072		
Steel Soldier Pile (W14x82)	24	LF	\$192	\$4,608		
Steel Soldier Pile (W18x175)	123	LF	\$205	\$25,215		
Drilled Hole (30" Dia.)	274	LF	\$184	\$50,416		
Structural Concrete (Retaining Wall)	64	CY	\$1,027	\$65,728		
Bar Reinforcing Steel (Retaining Wall)	8,900	LB	\$2.00	\$17,800		
Minor Concrete (Gutter)	138	LF	\$62	\$8,556		
Timber Lagging	517	CF	\$58	\$29,986		
Zinc Primer	919	SF	\$6.90	\$6,343		
Miscellaneous Steel (Studs)	390	LB	\$6.90	\$2,692		
Cable Railing	138	LF	\$55	\$7,590		
					\$335,054	
PMB (T-Wall) 2039E						
STRUCTURAL EXCAVATION (PMB WALLS)	1,100	CY	\$90	\$99,000		
STRUCTURAL BACKFILL-PERVIOUS (PMB WALLS)	39	CY	\$143	\$5,577		
STRUCTURAL BACKFILL-COMPACTED (PMB WALLS)	990	CY	\$143	\$141,570		
PMB RETAINING WALL	978	SF	\$97	\$94,866		
Cable Railing	92	LF	\$55	\$5,060		
					\$346,073	
PMB (T-Wall) 2045E						
Structural Excavation	740	CY	\$90	\$66,600		
Structural Backfill - Pervious	20	CY	\$143	\$2,860		
Structural Backfill - Compacted	543	CY	\$143	\$77,649		
PMB RETAINING WALL	530	SF	\$97	\$51,410		
Cable Railing	56	LF	\$55	\$3,080		
					\$201,599	
Soil Nail RW 2059E						
Structural Excavation (Soil Nail Wall)	446	CY	\$135	\$60,210		
Structural Shotcrete	32	CY	\$1,075	\$34,400		
Bar Reinforcing Steel (Retaining Wall)	5,270	LB	\$2.00	\$10,540		
Soil Nail Assembly	862	LF	\$77	\$66,374		
Misc Metal	1,125	LB	\$6.84	\$7,698		
Minor Conc (Gutter)	94	LF	\$62	\$5,828		
Cable Railing	94	LF	\$55	\$5,170		
					\$190,220	
Ground Anchor Diaphragm RW 2059E						
Structural Excavation (Ground Anchor Wall)	86	CY	\$135	\$11,610		
Structural Backfill (Ground Anchor Wall)	39	CY	\$218	\$8,502		
Ground Anchor-Subhorizontal	45	EA	\$4,653	\$209,385		
Structural Concrete	35	CY	\$1,027	\$35,945		
Structural Shotcrete	41	CY	\$1,075	\$44,075		
Minor Conc (Gutter)	92	LF	\$62	\$5,704		
Bar Reinforcing Steel (Retaining Wall)	21,000	LB	\$2.00	\$42,000		
Cable Railing	92	LF	\$55	\$5,060		
					\$362,281	
					\$2,157,178	
10 - Railway Signaling and Communications						
Testing at 233 Signals - MP 233.5	1	LS	\$29,931	\$29,931		
Install Electric Switch Lock Case - MP 234.2	1	LS	\$261,081	\$261,081		
Remove Existing CP Ponto - MP 234.5	1	LS	\$71,616	\$71,616		
Install New CP La Costa - MP 235.1	1	LS	\$1,364,317	\$1,364,317		
Testing at 236 Intermediate Signals - MP 236.5	1	LS	\$29,931	\$29,931		
Wireless Mesh Node Relocation	1	LS	\$50,000	\$50,000		

SANDAG: Batiquitos Lagoon Double-Track (BLDT) Project CIP 1239816					Prepared by: HNTB	
100% Construction Cost Estimate (CCE)					Date: Feb. 2022	
2021						
Item	Quantity	Unit	Unit Price	Amount 100%	Subtotals	
Fiber Duct Bank and Cable Relocation	1	LS	\$780,932	\$780,932		
Signal Spare Parts	1	LS	\$62,116	\$62,116		
					\$2,649,924	
11 - Nesting Site Restoration						
GRAVEL BACKING (D50= 1.5 IN W/ CLASS 8 RSP GEOTEXTILE)	1300	CY	\$127	\$165,100		
Cobble Slope Protection	3850	CY	\$78	\$300,300		
Salvaged RSP (400 lb or less)	1300	CY	\$102	\$132,600		
Native/Reuse Sand Fill (Non-pay item)	7350	CY	\$42	\$308,700		
Erosion Control for Nesting Site Restoration						
Temporary ESA/SILT Fence	2,000	LF	\$9.00	\$18,000		
Turbidity Curtain	750	LF	\$70	\$52,500		
Oil Containment Boom	750	LF	\$70	\$52,500		
Temporary Channel Crossing (incl. 5 rows of 42" HDPE Pipe)	1	LS	\$41,650	\$41,650		
					\$1,071,350	
Base Construction Cost Est. (BCE)					\$43,789,672	



U.S. Department
of Transportation
**Federal Transit
Administration**

REGION IX
Arizona, California,
Hawaii, Nevada, Guam
American Samoa,
Northern Mariana Islands

201 Mission Street
Suite 1650
San Francisco, CA 94105-1839
415-744-3133
415-744-2726 (fax)

FEB 27 2014

Mr. Gary L. Gallegos
Executive Director
San Diego Association of Governments
401 B St., Suite 800
San Diego, CA 92101

Attention: Rob Rundle

Re: Pacific Surfliner Bridges Project

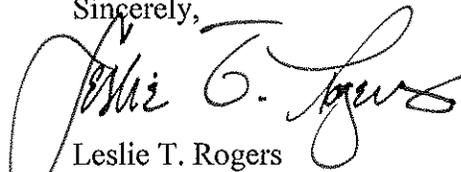
Dear Mr. Gallegos:

The Federal Transit Administration has completed its review of the San Diego Association of Governments' (SANDAG) letter, dated January 27, 2014, requesting an environmental determination for the Pacific Surfliner Bridges Project. Your letter and supporting documentation states that the project is consistent with the criteria associated with a categorical exclusion type (d)(2). Based on the information submitted, we have determined that the project qualifies as a categorical exclusion under 23 CFR § 771.118(d)(2): bridge replacement, or rail grade separation.

This review, which is based on past experience with similar projects, finds that the project: does not induce significant environmental impacts to planned growth or land use for the area; does not require the relocation of significant numbers of people; does not have a significant impact on natural, cultural, recreational, historical or other resource; does not involve significant air, noise, or water quality impacts; does not have significant impacts on travel patterns; does not result in a use or constructive use of historic or other resources within the meaning of Section 4(f) of the Department of Transportation Act, 49 USC § 303; and does not otherwise, either individually or cumulatively, have any significant environmental impact.

If you have any questions about this review, please contact Mr. Alex Smith at (415) 744-2599.

Sincerely,



Leslie T. Rogers
Regional Administrator

DOT**FTA**

U.S. Department of Transportation

Federal Transit Administration

Application

Recipient ID:	1620
Recipient Name:	SAN DIEGO ASSOCIATION OF GOVERNMENTS
Project ID:	CA-95-X129-03
Budget Number:	4 - Budget Approved
Project Information:	LOSSAN Corridor/Trk Rehab/Renov

Part 2: Project Information

Project Type:	Grant	Gross Project Cost:	\$23,260,474
Project Number:	CA-95-X129-03	Adjustment Amt:	\$0
Project Description:	LOSSAN Corridor/Trk Rehab/Renov	Total Eligible Cost:	\$23,260,474
Recipient Type:	Council of Governments	Total FTA Amt:	\$20,592,498
FTA Project Mgr:	Susan Chu	Total State Amt:	\$0
Recipient Contact:	Michelle Smith	Total Local Amt:	\$2,667,976
New/Amendment:	Amendment	Other Federal Amt:	\$0
Amend Reason:	Increase Award	Special Cond Amt:	\$0
Fed Dom Asst. #:	20507	Special Condition:	None Specified
Sec. of Statute:	5307-3	S.C. Tgt. Date:	None Specified
State Appl. ID:	None Specified	S.C. Eff. Date:	None Specified
Start/End Date:	Jan. 30, 2014 - Jun. 30, 2019	Est. Oblig Date:	None Specified
Recvd. By State:	Jun. 26, 2014	Pre-Award Authority?:	Yes
EO 12372 Rev:	Not Applicable	Fed. Debt Authority?:	No
Review Date:	None Specified	Final Budget?:	No
Planning Grant?:	NO		
Program Date (STIP/UPWP/FTA Prm Plan) :	Dec. 14, 2012		
Program Page:	SAN114		
Application Type:	Electronic		
Supp. Agreement?:	No		
Debt. Delinq. Details:			

Urbanized Areas

UZA ID	UZA Name

60190

SAN DIEGO, CA

Congressional Districts

State ID	District Code	District Official
6	49	Darrell E Issa
6	50	Duncan Hunter
6	51	Juan Vargas
6	52	Scott H Peters
6	53	Susan A Davis

Project Details

Amendment No. 3

Amendment No. 3 adds \$20,592,498 FFY 14 CMAQ funds to this grant. All funding will be requested at 88.53%. This was part of Amendment No. 12 to the 2012 RTIP which was federally approved on February 27, 2014. Additional funding is expected to aid in the funding of the various projects included in this grant.

122403

This additional funding will provide funds for the construction phase of 2 projects along the LOSSAN Coastal Rail Corridor.

-- The San Diego River Bridge (CIP 1239815; SAN114) will provide double tracking of the COASTER bridge over San Diego River from Mile Post (MP) 263.2 to MP 264.1 and consists of constructing 0.9 miles of double-track and a new bridge. Total project will consist of FTA and local TransNet funds with a total project cost of \$82,400,249, whereas \$10,296,249 of the transfer will aid in funding this project. Total amount of CMAQ/FTA Transfer funds is \$10,296,249 with local funding of approximately \$72,000,000.

-- The Batiqitos Lagoon Double Track (CIP 1239816; SAN114) will construct 2.7 miles of double-track and a new bridge over Batiqitos Lagoon along the Coastal Rail Corridor over Batiqitos Lagoon from Mile Post (MP) 234.5 to MP 237.2. Total project will consist of FTA and local TransNet funds with a total project cost of \$61,400,265, whereas \$10,296,249 of the transfer will aid in funding this project. Total amount of CMAQ/FTA transfer funds is \$10,296,249 with local funding of about \$51,000,000

The above amount is in addition to the previously approved transfers of \$68,919,000 of STP and \$41,420,000 of CMAQ funds to FTA Grant CA-95-X129 (EA: 11-956666, MPO ID: SAN114/119/132/73) federally approved August 1, 2011 and August 23, 2012 and April 12, 2013 respectively. Including this amendment, the Federal funds total \$130,931,498. These funds are expected to fully fund the scope of this project.

The LOSSAN Rail Corridor Agency is a joint powers agency that was formed in 1989 to coordinate intercity rail service between Los Angeles and San Diego. In 2001, the agency expanded to include rail agencies and operators north of Los Angeles to San Luis Obispo. LOSSAN seeks to increase ridership, revenue, capacity, reliability, and safety on the 351 mile long coastal rail corridor from San Diego to Los Angeles to San Luis Obispo. Members of LOSSAN consist of the rail owners and operators and regional transportation planning agencies along the six-county coastal corridor.

In 2013, legislation was approved (SB 1225) that enables substantial changes to the LOSSAN Joint Powers Agreement, including the ability for LOSSAN to take on the day-to-day responsibility of managing the Pacific Surfliner service, introduction of supermajority voting for key policies, and the switch of the Riverside County Transportation Commission from ex-officio member to voting member and Caltrans from voting member to ex-officio member. These changes were unanimously approved by LOSSAN member agencies. LOSSAN selected OCTA to become the LOSSAN Managing Agency which is responsible for administering LOSSAN and negotiating an Interagency Transfer Agreement with the State to transition the operating responsibility from the state to LOSSAN by June 2015.

The LOSSAN rail corridor or Pacific Surfliner corridor, is the second busiest intercity rail corridor in the nation supporting commuter, intercity, and freight rail services. The existing right-of-way includes 47 rail bridges, with 34 of them more than 50 years old.

The 351-mile rail corridor stretches from San Luis Obispo to San Diego, connecting major metropolitan areas of Southern California and the Central Coast. Train operations on the line include Amtrak's Pacific Surfliner; the Southern California Regional Rail Authority's Metrolink and the North County Transit District's COASTER and SPRINTER passenger rail services; and Union Pacific and BNSF Railway freight rail services.

Each year, more than 2.7 million intercity passengers and 4.5 million commuter rail passengers (Metrolink and COASTER) travel the LOSSAN corridor. One in every nine Amtrak riders uses the corridor.

The 60-mile San Diego segment of the LOSSAN corridor extends from the Orange County line to the Santa Fe Depot in downtown San Diego. The segment passes over six coastal lagoons, Camp Pendleton, and the cities of Oceanside, Carlsbad, Encinitas, Solana Beach, and Del Mar before coming to its final destination in downtown San Diego. Approximately 50 trains operate each weekday on the segment south of Oceanside.

During the next 20 years, SANDAG plans to construct nearly \$1 billion in improvements in the San Diego County section, including a primary effort to double track the corridor from Orange County to downtown San Diego. As a companion to the I-5 freeway, the San Diego segment of the LOSSAN corridor plays a critical role in the movement of people and goods within the region's North Coast Corridor.

Projects included in this grant are located in the San Diego region of the San Diego-Los Angeles-San Luis Obispo (LOSSAN) rail corridor and will provide track improvements including crossover and double tracking and stub and run-through tracks along the corridor.

San Diego County is represented on LOSSAN by board members from North County Transit District (NCTD), San Diego Metropolitan Transit System (MTS), and SANDAG. NCTD is responsible for operating, and service planning associated with the COASTER commuter rail service, and maintenance of the tracks along the entire corridor from the County Line to Downtown San Diego. NCTD is the owner of the rail right of way from the County Line to the southern boundary of the city of Del Mar. SANDAG is responsible long range planning and implementation of transit capital projects including all double track projects within San Diego County. MTS owns the LOSSAN corridor from the southern boundary of the city of Del Mar to Downtown San Diego. BNSF Railway operates freight service on the LOSSAN corridor in San Diego County.

SANDAG, in cooperation with the state Department of Transportation (Caltrans), the North County Transit District (NCTD), AMTRAK and Burlington Northern Santa Fe Railway conducted a major rail corridor study which determined the need for improvement. Many areas were identified and initial work will provide track improvements at bottleneck locations and includes crossover track, double track, and stub, grade separations, bridge replacements, bluff stabilization, positive train control and run-through tracks at various stations along the corridor to help prevent train-to-train collisions.

The corridor improvements are located in the cities of San Diego, Solana Beach, Encinitas, Carlsbad, Oceanside and Camp Pendleton. These improvements will increase the amount of double track on the 60-mile corridor from 32 miles to 46 miles, improve operational effectiveness and reliability and will increase the capacity on the corridor from 73 trains to 93 trains.

The rail system will have direct connectivity to the State's future High-Speed Train (HST) network by providing improvements to key feeder service in the LOSSAN corridor that will connect to HST at Anaheim and Los Angeles. These track capacity improvements are included in the state priorities outlined in the California State Rail Plan.

SAN114, 2008 RTIP, Amend# 24, 4/16/2010, State Approved 4/20/2010.

Amendment No. 2

This Amendment adds \$36,180,000 FFY 12 STP funds to this grant. All funding will be requested at 88.53%. Additional funding is expected to aid in the funding of the various projects included in this grant. The above amount is in addition to the previously approved transfer of \$32,739,000 of STP and \$41,420,000 of CMAQ funds to FTA Grant CA-95-X129 (EA: 11-956666, MPO ID: SAN114/119/132/73) federally approved August 1, 2011 and August 23, 2012 respectively. Including this amendment, the Federal funds total \$110,339,000. These funds are expected to fully fund the scope of this project.

Amendment No. 2 (March 2013) added funds to fund for the increase in budget for the San Elijo Lagoon (Cardiff to Craven) Double Tracking project (SAN73). This project will design and construct double tracking for the Coastal Rail Trail from CP Cardiff (MP 240.4) to CP Craven (MP 240.7) across the San Elijo Lagoon. This project and all projects included in the grant do not add additional service. Total project will consist of FTA and local TransNet funds with a total project cost of \$76,700,366, whereas \$36,180,000 of the transfer will aid in funding this project.

Amendment No. 1

This Amendment adds \$21,001,000 in RSTP funding (SAN117 & SAN119) and \$41,420,000 in CMAQ funding (SAN119 &

SAN132) to this grant. All funding will be requested at 88.53%. 2010 RTIP, 12/10/10 Amend# 2, State approved 1/3/2011 and Federal approval received 1/28/2011. Funding transfer of \$19,318,000 in CMAQ and \$21,001,000 of RSTP to the FTA was approved on 3/22/2011. Additional CMAQ transfer of \$22,102,000 is pending.

Amendment No. 1 (June 2011) added funds to fund several projects along the Coastal Rail Corridor for the Preliminary Engineering and Construction phases. The projects include:

-- Sorrento Valley Double Track (CIP 1239807; SAN119) which will construct double track, including signals, track elevation out of the floodplain and a new double track bridge from MP 247.8 to MP 248.9. This project and all projects included in the grant do not add additional service. Total project will consist of FTA, state and local TransNet funds with a total project cost of \$30,789,755 whereas \$16,728,000 of the transfer will aid in funding this project.

-- Elvira to Morena Double Track (CIP 1239811, SAN132) which will construct 2 miles of double track and realignment including signals and switches between MP 257.9 and MP 260.5. This project and all projects included in the grant do not add additional service. Total project will consist of FTA, FRA and local TransNet funds with a total project cost of \$95,000,492 whereas \$29,567,000 of the transfer will aid in funding this project.

Earmarks

No information found.

Security

No – We will not expend at least 1% of the 5307 funds in this grant application for security purposes.

1. No Deficiency found from threat/vulnerability assessment.

Grant applicant has conducted a threat and vulnerability assessment and finds there are no deficiencies that require additional investment in security projects at this time. [The threat and vulnerability assessment is No.8 in Top 20 Security Action list at <http://transit-safety.volpe.dot.gov/security/SecurityInitiatives/Top20/default.asp>]

Part 5. Environmental Findings

12200 LOSSAN Corridor	5	\$130,931,498	\$153,719,776
------------------------------	---	---------------	---------------

Finding No. 1 - Class II(c)

C08 - Maintenance, rehab, reconstruction of facilities

Maintenance, rehabilitation, and reconstruction of facilities that occupy substantially the same geographic footprint and do not result in a change in functional use, such as: improvements to bridges, tunnels, storage yards, buildings, stations, and terminals; construction of platform extensions, passing track, and retaining walls; and improvements to tracks and railbeds.

DOT**FTA**

U.S. Department of Transportation

Federal Transit Administration

Application

Recipient ID:	1620
Recipient Name:	SAN DIEGO ASSOCIATION OF GOVERNMENTS
Project ID:	CA-95-X129-01
Budget Number:	2 - Budget Approved
Project Information:	LOSSAN Corridor/Trk Rehab/Renov

Part 5. Environmental Findings

122403 REHAB/RENOV LINE EQUIP/STRUCTURES - RSTP	0	\$23,078,000	\$31,909,217
---	---	--------------	--------------

Finding No. 1 - Class II(c)

C18 - Track & railbed maintenance/improvements

Track and railbed maintenance and improvements when carried out within the existing right-of-way.

Finding Details: These LOSSAN corridor improvements are located in the cities of San Diego, Carlsbad, Oceanside and Camp Pendleton. These improvements will increase the amount of double track on the 60 mile corridor from 32 miles to 42 miles.

Based on the information submitted, FTA finds that the project qualifies as a categorical exclusion under 23 CFR 771.117 (c) and is consistent with the requirements for this categorical exclusion. This review, which is based on past experience with similar projects, finds that the project: does not induce significant environmental impacts to planned growth or land use for the area; does not require the relocation of significant numbers of people; does not have a significant impact on natural, cultural, recreational, historical or other resource; does not involve significant air, noise, or water quality impacts; does not have significant impacts on travel patterns; or does not otherwise, either individually or cumulatively, have any significant environmental impact. All rehab/renovation will be conducted on already existing structures and carried out within the existing right of way. Based on the foregoing, SANDAG believes that this project qualifies for a categorical exclusion (CE) pursuant to 23 CFR 771.117 (c) (18) and requests your approval of the same.

122303 CONSTRUCT LINE EQUIP/STRUCTURE - RSTP	0	\$9,661,000	\$10,912,685
--	---	-------------	--------------

Finding No. 1 - Class II(c)

C18 - Track & railbed maintenance/improvements

Track and railbed maintenance and improvements when carried out within the existing right-of-way.

Finding Details: These LOSSAN corridor improvements are located in the cities of San Diego, Carlsbad, Oceanside and Camp Pendleton. These improvements will increase the amount of double track on the 60 mile corridor from 32 miles to 42 miles.

Based on the information submitted, FTA finds that the project qualifies as a categorical exclusion under 23 CFR 771.117 (c) and is consistent with the requirements for this categorical exclusion. This review, which is based on past experience with similar projects, finds that the project: does not induce significant environmental impacts to planned growth or land use for the area; does not require the relocation of significant numbers of people; does not have a significant impact on natural, cultural, recreational, historical or other resource; does not involve significant air, noise, or water quality impacts; does not have significant impacts on travel patterns; or does not otherwise, either individually or cumulatively, have any significant environmental impact. All rehab/renovation will be conducted on already existing structures and carried out within the existing right of way. Based on the foregoing, SANDAG believes that this project qualifies for a categorical exclusion (CE) pursuant to 23 CFR 771.117 (c) (18) and requests your approval of the same.

122303 CONSTRUCT LINE EQUIP/STRUCTURE - CMAQ	0	\$24,669,000	\$27,865,130
---	---	--------------	--------------

Finding No. 1 - Class II(c)**C18 - Track & railbed maintenance/improvements**

Track and railbed maintenance and improvements when carried out within the existing right-of-way.

Finding Details: These LOSSAN corridor improvements are located in the cities of San Diego, Carlsbad, Oceanside and Camp Pendleton. These improvements will increase the amount of double track on the 60 mile corridor from 32 miles to 42 miles.

Based on the information submitted, FTA finds that the project qualifies as a categorical exclusion under 23 CFR 771.117 (c) and is consistent with the requirements for this categorical exclusion. This review, which is based on past experience with similar projects, finds that the project: does not induce significant environmental impacts to planned growth or land use for the area; does not require the relocation of significant numbers of people; does not have a significant impact on natural, cultural, recreational, historical or other resource; does not involve significant air, noise, or water quality impacts; does not have significant impacts on travel patterns; or does not otherwise, either individually or cumulatively, have any significant environmental impact. All rehab/renovation will be conducted on already existing structures and carried out within the existing right of way. Based on the foregoing, SANDAG believes that this project qualifies for a categorical exclusion (CE) pursuant to 23 CFR 771.117 (c) (18) and requests your approval of the same.

122303 CONSTRUCT LINE EQUIP/STRUCTURE - CMAQ	0	\$16,751,000	\$18,921,270
---	---	--------------	--------------

Finding No. 1 - Class II(c)**C18 - Track & railbed maintenance/improvements**

Track and railbed maintenance and improvements when carried out within the existing right-of-way.

Finding Details: These LOSSAN corridor improvements are located in the cities of San Diego, Carlsbad, Oceanside and Camp Pendleton. These improvements will increase the amount of double track on the 60 mile corridor from 32 miles to 42 miles.

Based on the information submitted, FTA finds that the project qualifies as a categorical exclusion under 23 CFR 771.117 (c) and is consistent with the requirements for this categorical exclusion. This review, which is based on past experience with similar projects, finds that the project: does not induce significant environmental impacts to planned growth or land use for the area; does not require the relocation of significant numbers of people; does not have a significant impact on natural, cultural, recreational, historical or other resource; does not involve significant air, noise, or water quality impacts; does not have significant impacts on travel patterns; or does not otherwise, either individually or cumulatively, have any significant environmental impact. All rehab/renovation will be conducted on already existing structures and carried out within the existing right of way. Based on the foregoing, SANDAG believes that this project qualifies for a categorical exclusion (CE) pursuant to 23 CFR 771.117 (c) (18) and requests your approval of the same.

California Transportation Commission
2022 Solutions for Congested Corridors Program Guidelines

Existing Average Annual Vehicle Volume on Project Segment		18,770 Trains				
Estimated Year 20 Average Annual Vehicle Volume on Project Segment with Project		35,040 Trains				
Measure	Metric	Project Type	Build	Future No Build	Change	Increase/Decrease
Congestion Reduction	Change in Daily Vehicle Miles Traveled (VMT)	All	12,286,698	12,373,140	-86,442	Decrease
	Person Hours of Travel Time Saved		98,178	0	98,178	Increase
	(Optional) Change in Daily Vehicle Hours of Delay	Highway	NA	NA	NA	NA
	(Optional) Percent Change in Non-Single Occupancy Vehicle Travel	Local Road, Highway	NA	NA	NA	NA
	(Optional) Per Capita and Total Person Hours of Delay per Year		NA	NA	NA	NA
Throughput	(Optional) Other Information	All				
	(Optional) Peak Period Person Throughput – by applicable mode	All				
	(Optional) Passengers Per Vehicle Service Hour	Transit Rail and Transit Bus				
	(Optional) Other Information	All				
System Reliability	Peak Period Travel Time Reliability Index (“No Build” Number Only)	National and State Highway System Only	NA	NA	NA	NA
	Level of Transit Delay	Transit Rail and Transit Bus	NA	NA	NA	NA
	(Optional) Other Information	All				

California Transportation Commission
2022 Solutions for Congested Corridors Program Guidelines

Measure	Metric	Project Type	Build	Future No Build	Change	Increase/ Decrease	
Safety	Number of Fatalities	All	439	441	-2	Decrease	
	Rate of Fatalities per 100 Million VMT		.005	.005	No Change	No Change	
	Number of Serious Injuries		24,592	24,719	-128	Decrease	
	Rate of Serious Injuries per 100 Million VMT		0.280	0.280	No Change	No Change	
	(Optional) Number of Non-Motorized Fatalities and Non-Motorized Serious Injuries						
	(Optional) Other Information						
	(Optional) Number or Rate of Property Damage Only Collisions						
	(Optional) Number or Rate of Non-Serious Injury Collisions		Local Road, Highway				
(Optional) Accident Cost Savings							
Economic Development	Jobs Created	All	1,348	0	1,348	Increase	
	(Optional) Other Information						
Air Quality and Greenhouse Gases	Particulate Matter (PM 10)	All			25	Increase	
	Particulate Matter (PM 2.5)				25	Increase	
	Carbon Dioxide (CO2)				-165,882	Decrease	
	Volatile Organic Compounds (VOC)				-7	Decrease	
	Sulphur Oxides (SOx)				-2	Decrease	
	Carbon Monoxide (CO)				-177	Decrease	
	Nitrogen Oxides (NOx)				399	Increase	

California Transportation Commission
 2022 Solutions for Congested Corridors Program Guidelines

Measure	Metric	Project Type	Build	Future No Build	Change	Increase/ Decrease
Accessibility	(Optional) Number of Jobs Accessible by Mode	All				
	(Optional) Access to Key Destinations by Mode	All				
	(Optional) Percentage of Population Defined as Low Income or Disadvantaged within 1/2 mile of a rail station, ferry terminal, or high-frequency bus stop	Transit Rail and Transit Bus				
Cost Effectiveness	(Optional) Other Information	All				
	Cost-Benefit Ratio	All	2.3	NA	2.3	Increase
	(Optional) Other Information					