



ADMINISTRATION, PROJECTS & PLANNING
EXECUTIVE COMMITTEE
MEETING

MONDAY, FEBRUARY 8, 2021
3:30 PM

Zoom link:

<https://us02web.zoom.us/j/82914295532?pwd=RmE2Qmd0ZC9WZW8xcWZadGJvSW5iUT09>

Webinar ID: 829 1429 5532
Passcode: 166162

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Susan Cleveland-Knowles

Tiburon
Alice Fredericks

County of Marin
Damon Connolly
Katie Rice
Stephanie Moulton-Peters
Dennis Rodoni
Judy Arnold

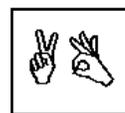
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• Before the meeting: email your comments to dmerleno@tam.ca.gov. Please email your comments no later than 5:00 P.M. Sunday, February 7, 2021 to facilitate timely distribution to Committee members. Please include the agenda item number you are addressing and your name and address. Your comments will be forwarded to the Committee members and will be placed into the public record.

• During the meeting (only): Your meeting-related comments may be sent to info@tam.ca.gov. During the meeting your comments will be read (3-minute limit per comment) when the specific agenda item is considered by the Committee. Your comment will also become part of the public record. (In order to ensure staff receives your comment during the meeting, it is recommended that you send your comment using info@tam.ca.gov early in the meeting.

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Late agenda Late agenda material can be inspected in TAM's office between the hours of 8:00 a.m. and 5:00 p.m.
TAM is located at 900 Fifth Avenue, Suite 100, San Rafael.

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AGENDA

1. Chair's Report (Discussion)
2. Commissioners Comments (Discussion)
3. Executive Director's Report (Discussion)
4. Open time for public expression, up to three minutes per speaker, on items not on the Board of Commissioners' agenda. (While members of the public are welcome to address the Board, under the Brown Act, Board members may not deliberate or take action on items not on the agenda, and generally may only listen.)
5. Approval of Minutes from November 9, 2020 Meeting (Action) – **Attachment**
6. TAM Response to 2019-2020 Marin County Civil Grand Jury Report on "Roadblocks to Safer Evacuation in Marin" (Action) – **Attachment**
7. Review and Accept the February 2021 Project Status Report (Action) - **Attachment**



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MEETING OF THE
TRANSPORTATION AUTHORITY OF MARIN
EXECUTIVE COMMITTEE
Administration, Projects & Planning
November 9, 2020
3:30 PM

Virtual Meeting

<https://us02web.zoom.us/j/81898075840?pwd=ckZxZnVBb1BEa2h0cUdJK01GUGRvQT09>

Webinar: 818 9807 5840

Password: 087201

Members Present: Alice Fredericks, Tiburon Town Council, Committee Chair
Gary Phillips San Rafael City Council
Brian Colbert, San Anselmo Town Council
Kate Sears, Marin County Board of Supervisors
Damon Connolly, Marin County Board of Supervisors

Staff Members Present: Anne Richman, Executive Director
Bill Whitney, Principal Project Delivery Manager
Denise Merleno, Executive Assistant
David Chan, Manager of Programming & Legislation
Derek McGill, Planning Manager
Helga Cotter, Senior Accountant
Li Zhang, Deputy Executive Director/Chief Financial Officer
Scott McDonald, Senior Transportation Planner

Chair Alice Fredericks called the meeting to order at 3:30 p.m. Chair Fredericks welcomed everyone to the Committee's virtual meeting and asked Denise Merleno, TAM's Executive Assistant, to conduct a roll call to ensure a quorum. Ms. Merleno confirmed the quorum and described how the public could provide comment during the meeting.

1. Chair's Report (Discussion)

Chair Fredericks noted she did not have a report.

2. Commissioners Comments (Discussion)

There were none.

3. Executive Director's Report (Discussion)

Executive Director (ED) Anne Richman provided an update on the election results relating to transportation, which included an increase in Novato's Transient Occupancy Tax, and a 9-year ¼-cent-sales tax increase for San Rafael. She also reported that Sonoma County Transportation Authority's (SCTA's) measure to renew the existing ¼-cent sales tax for 20 years passed, which provides approximately \$26 million in revenue annually, and Caltrain was

TAM APP Executive Committee Meeting
November 9, 2020

successful in gaining its first dedicated source of funding through a 1/8-cent sales tax measure in San Francisco, San Mateo and Santa Clara Counties. The 30-year measure should raise \$100 million annually in funding. ED Richman noted that statewide Proposition 22 appeared to have passed that would allow ridesharing and food delivery services to consider drivers to be contractors rather than employees. As a result, the Conect2Transit Program, TAM's partnership program with Marin Transit and Uber, is able to continue under the current terms.

ED Richman reported on TAM's Part-Time Transit Lane Study, which analyses the feasibility of allowing buses to bypass heavy traffic on Highway 101 by using the existing shoulder between Novato and San Rafael. She stated that a survey has been released to understand how the shoulder could be utilized to better serve transit riders and that a video describing the project has been uploaded to TAM's website in English and Spanish.

ED Richman reported that staff from TAM and Marin Transit participated in a webinar series, Innovations in Mobility, which aired on October 29, 2020. The webinar featured the Connect2Transit Program and has been posted on the American Public Transportation Association's (APTA's) website. ED Richman also noted that an automatic translation feature has been added to the TAM and the Marin Commutes websites to enable translation in a wide variety of languages.

ED Richman stated that the Metropolitan Transportation Commission (MTC) will shortly release the Annual Pavement Condition Report, which documents the 3-year average Pavement Condition Index (PCI) for each jurisdiction in the Bay Area. Most Marin towns and cities are in the fair condition category.

Finally, ED Richman reported that Sonoma Marin Area Rapid Transit (SMART) has hired Heather McKillop as the new Chief Financial Officer (CFO), who was previously CFO and Assistant General Manager for Denver Regional Transportation District (RTD). She also reported that Tony Tavares, Caltrans District 4 Director, will be moving on to the position of Director of District 7 in the Los Angeles area.

4. Open time for public expression

Chair Fredericks asked Ms. Merleno if public comment had been received and hearing that there was none, she closed this item to public comment.

5. Approval of the Minutes from September 14, 2020 Meeting (Action)

Commissioner Phillips moved to approve the Minutes of September 14, 2020, which Commissioner Sears seconded. A roll call vote was conducted and the motion passed unanimously.

6. TAM Response to 2019-2020 Marin County Civil Grand Jury Report on 'Climate Change: How Will Marin Adapt?' (Action)

Senior Transportation Planner Scott McDonald presented the staff report, which asked the Administration, Projects & Planning (APP) Executive Committee to review, provide comments and refer the response to the Marin County Civil Grand Jury Report on 'Climate Change: How Will Marin Adapt?', to the TAM Board for review and acceptance.

Mr. McDonald discussed the findings and recommendations made by the 2019-20 Civil Grand Jury relating to adaptation planning in the County for climate change and the agency's required response. He stated that the response reflects climate change efforts in which TAM is engaged, including participation in the Marin Climate Energy Partnership (MCEP) and Marin Drawdown Executive Steering Committee & Transportation Subcommittee.

TAM APP Executive Committee Meeting
November 9, 2020

Mr. McDonald discussed TAM's response and stated that staff is requesting feedback to the response and seeking authorization to refer the item to the TAM Board for acceptance at its November 19, 2020 meeting.

Commissioner Sears commended the response to the Grand Jury Report and expressed her support. Commissioner Connolly stated that the response seemed consistent with the response from the County and he discussed the format used in the response with Mr. McDonald.

Commissioner Phillips commented on the use of language relating to future planning or funding, and he expressed a preference for language reflecting certainty.

Chair Fredericks asked if staff had received any public comment and hearing that none had been received, she closed this item to public comment.

Commissioner Sears moved to recommend that the Committee refer the response to the Marin County Civil Grand Jury Report on 'Climate Change: How Will Marin Adapt?', to the TAM Board for review and acceptance, which Commissioner Phillips seconded. A roll call vote was conducted and the motion passed unanimously.

7. Measure AA Category 2.3 Sea Level Rise Program (Discussion)

Planning Manager Derek McGill presented the staff report, stating that staff is seeking initial input from the APP Executive Committee and the TAM Board, and will continue to refine the program in coming months.

Mr. McGill discussed TAM's programs that focus on mitigating the effects of sea level rise and support climate change adaptation. He also discussed a sea level rise project managed by the County, Marin Bay Waterfront Adaptation Vulnerability Evaluation (BayWAVE).

Mr. McGill introduced Chris Choo, Principal Watershed Planner for Marin County Public Works Department. Ms. Choo discussed areas along the transportation corridors that experience frequent flooding with a minimum of 3 feet of water. She noted that the State is asking local jurisdictions to plan for 3.5 feet of flood water by 2050.

Ms. Choo discussed a 2017 Vulnerability Assessment and a study undertaken during the past year of impacts to locations that are particularly prone to flooding, such as Paradise Drive in Corte Madera, and the difficulty of emergency access. She stated that the County is working with transit agencies to gather data on routes and transit riders, which will be used to consider options to address flooding in areas that affect a large portion of the population, such as the Manzanita transit stop.

Mr. McGill discussed other local and regional programs that address sea level rise, noting that TAM staff is working with the City of San Rafael's Community Development Team on adaptation and sea level rise planning through the City's General Plan.

Mr. McGill explained that TAM's Measure AA ½-Cent Transportation Sales Tax Expenditure Plan has set aside 1% of the annual revenue collection for sea level rise needs, which equates to approximately \$240,000 per year. He discussed the desire to use the funds for local or regional scale projects and the advantages and disadvantages for funding each type of project. He noted that small capital projects, such as local road rehabilitation, would provide near term mitigations with small impacts, while large-scale projects would allow TAM funds to support major improvements with more significant transportation impacts. However, he noted that the process for bigger regional projects would be slower and requires significantly more funding as well.

Mr. McGill stated that staff is seeking guidance from the commissioners about the type of projects they would like to see the funds focus on and TAM's role in the process.

TAM APP Executive Committee Meeting
November 9, 2020

Commissioner Sears and Mr. McGill discussed whether the funds should primarily be used for sea level rise adaptation/mitigation, or for transportation-related projects and Mr. McGill noted that the funding requirements are flexible. Commissioner Sears expressed her support for using the funds for small capital projects, which show visible improvements to the public.

Commissioner Colbert discussed the need to be transparent about leveraging small funds for large projects. He stated his opposition to using the funds for long-term transportation projects while the effects of the Shelter-in-Place Order on transit is unknown.

Chair Fredericks stated that the funding priorities would be clearer when projects are submitted for the Board's consideration and she asked Mr. McGill to clarify the difference between adaptation and mitigation. Mr. McGill explained that mitigation involves measures that stop greenhouse gas (GHG) emissions entering into the atmosphere, as opposed to adapting to the changes brought by climate change such as sea level rise and droughts.

Commissioner Phillips expressed his support for Commissioner Sears' comment that she would favor investment in small capital projects. He discussed the need for sea level rise problems to be solved at a national level, noting that local jurisdictions would never be able to come up with sufficient funding to address the impacts of sea level rise.

Commissioner Sears commented that no progress would be made if jurisdictions relied solely on funding at the national level and Commissioner Connolly stated that progress is being made towards sea level rise mitigation through the Federal Water Resources Development Act.

Ms. Choo stated that the intention is to understand how flooding would affect residents beyond their immediate surroundings, noting that the solutions to protecting large infrastructure are limited.

ED Richman confirmed staff's intent to begin discussions on funding sea level rise projects, noting that it is unusual for a transportation agency to have dedicated funding for this effort.

Chair Fredericks asked if staff had received any public comment and hearing that none had been received, she closed this item to public comment.

The meeting was adjourned at 4:30 p.m.



DATE: February 8, 2021

TO: Transportation Authority of Marin Administration, Projects & Planning Executive Committee

FROM: Anne Richman, Executive Director *Anne Richman*
David Chan, Manager of Programming and Legislation

SUBJECT: TAM Response to 2019-2020 Marin County Civil Grand Jury Report on “Roadblocks to Safer Evacuation in Marin” (Action), Agenda Item No. 6

RECOMMENDATION

Review and refer the response to the Marin County Civil Grand Jury Report on “Roadblocks to Safer Evacuation in Marin” as shown in Attachment C to the TAM Board for acceptance.

BACKGROUND

On December 14, 2020, the 2019-2020 Marin County Civil Grand Jury released its Report on “Roadblocks to Safer Evacuation in Marin.” Local municipalities, County of Marin, and TAM and Marin Wildfire Prevention Authority (MWPA) Board of Directors are required to respond to the findings and recommendations in the Report. A copy of the Grand Jury Report is enclosed as Attachment A.

DISCUSSION

The Grand Jury Report discusses the 2020 fire season in California that included five of the six largest wildfires in the state’s history. Wildfires raged throughout the state and Marin residents were not immune from wildfire threats. Marin residents were particularly wary of the Woodward Fire in the Point Reyes National Seashore that could have forced evacuation at a moment’s notice.

While evacuation never materialized, the Grand Jury Report asked the question whether Marin residents can evacuate safely if ordered. The Grand Jury Report discusses the need for a comprehensive countywide evacuation plan and suggests agencies that can contribute to the effort. The Grand Jury Report discusses infrastructure choke points at key corridors that are impediments to safe evacuation. Certain locally enacted policies and infrastructure improvements were considered remedies to infrastructure choke points. Lastly, the Report examines jurisdictional responsibilities of the different agencies that would be needed to successfully implement infrastructure improvements and promulgate safety policies, including specific roles and responsibilities for TAM.

The Grand Jury Report recognizes the enormity of the recommended tasks needed to effectuate a Countywide Evacuation Plan. The Grand Jury Report also recognizes evacuation routes may pose conflicts with existing policies for these routes. For example, a route deemed as a suitable evacuation route may also be a route that

has been troubled with safety concerns for students, pedestrians, and bicyclists. These safety concerns are usually addressed by slowing vehicle speed and/or reducing capacity of the roadway with infrastructure modifications that may conflict with evacuation goals.

The Grand Jury Report concludes with nine findings and five recommendations for specific Marin agencies to address. TAM is required to respond to the following findings and recommendations: F1, F2, F6-F9, and R4. TAM staff has conducted a thorough review of the report and provided responses to these findings and recommendations (Attachment C).

The main issue for TAM's response is whether to consider evacuation as a criterion for funding programs. While TAM could consider this in some cases, staff believes that it is unlikely to be appropriate for all funding sources, and additionally could raise policy issues if/where in conflict with other goals. This is further described in the attached draft response. It should also be noted that TAM staff have already been working collaboratively with the new MWPA in providing technical information and input for their efforts, and we plan to continue doing so.

Agencies required to respond to Grand Jury reports generally have no more than 90 days to issue a response, and the response deadline for this Grand Jury Report is March 14, 2021.

FISCAL CONSIDERATION

There are no fiscal impacts associated with the recommended response.

NEXT STEPS

Upon acceptance by the TAM Board, TAM staff will respond by transmitting Attachments B and C to the Marin Civil Grand Jury before the deadline of March 14, 2021.

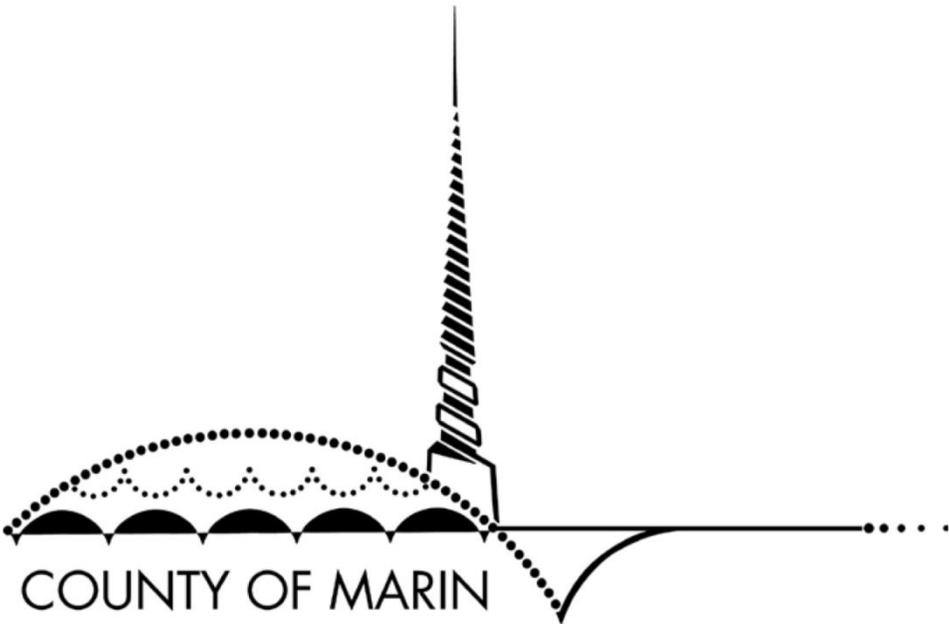
ATTACHMENTS:

Attachment A – Roadblocks to Safer Evacuation in Marin Report
Attachment B – Cover Letter to Grand Jury
Attachment C – TAM's Draft Response to the Grand Jury Report

2019–2020 MARIN COUNTY CIVIL GRAND JURY

Roadblocks to Safer Evacuation in Marin

December 14, 2020



A Note about the Coronavirus Pandemic

The 2019–2020 Marin County Civil Grand Jury is issuing its reports during the unprecedented conditions of the COVID-19 pandemic. We are well aware that Marin County is in crisis and that critical public health concerns, operational difficulties, and financial challenges throughout the county have a greater claim to government attention right now than the important issues raised by this Grand Jury.

We are confident that, in due course, Marin will come through this crisis as strong as ever.

Roadblocks to Safer Evacuation in Marin

SUMMARY

California's 2020 fire season got off to an early start in mid-August with dry lightning that sparked five of the six largest wildfires in the state's history.¹ As of the end of September, nearly four million acres had burned, 22 major wildfires were still active, and 30 people were dead.²

As fires burned throughout the San Francisco Bay Area, anxious Marin residents sheltered from heavy smoke and kept a wary eye on the Woodward Fire in the Point Reyes National Seashore, hoping they would not be forced to evacuate at a moment's notice. People worried whether it would be possible to evacuate safely. The Grand Jury chose to investigate this question. Specifically, the jury sought to determine whether Marin's evacuation needs are considered adequately when government entities plan and build improvements to roads and traffic infrastructure.

Funding for transportation-related infrastructure projects is complicated, involving agencies at the local, county, regional, state, and federal levels. The rules and regulations governing these funding sources were largely developed before wildfire was the threat it has become in recent years and before the citizenry was fully aware of the urgent need to be able to evacuate quickly and safely. For instance, the Transportation Authority of Marin was chartered at a time when traffic congestion was high on Marin's priority list and wildfire evacuation was a remote concern. Times have changed.

Today, there is considerable uncertainty about who has the ultimate responsibility for building the transportation infrastructure capable of evacuating Marin residents safely in a rapidly evolving emergency. The Transportation Authority of Marin has not been willing to include evacuation as a criterion when funding roadway projects. The recently created Marin Wildfire Prevention Authority has neither the authority nor the funds to address the infrastructure needs. In fact, the county, towns, and cities have responsibility for public safety, but they have not prioritized evacuation needs when funding public works projects.

The Grand Jury recommends the following:

- Marin's county, town, and city governing bodies should include evacuation needs among their criteria for evaluating and recommending public works projects, and that they call on the Transportation Authority of Marin to do the same
- Marin's county, town, and city governing bodies should address evacuation infrastructure needs as they update their general plans

¹ Michael McGough, "5 of the 6 Largest California Wildfires in History Started in the Last 6 Weeks," *Sacramento Bee*, September 22, 2020, <https://www.sacbee.com/article245917915.html>.

² Phil Helsel, "Deadly Fires in California have claimed at least 30 lives this year," NBC News, September 30, 2020, <https://www.nbcnews.com/news/us-news/deadly-fires-california-have-claimed-least-30-lives-year-n1241632>.

- The Transportation Authority of Marin should formally establish evacuation as one of its criteria for consideration when planning and funding traffic projects
- The Marin Wildfire Prevention Authority should invite a Transportation Authority of Marin representative to become an at-large, nonvoting member of its Advisory/Technical Committee to support program development, funding, and implementation of improvements to evacuation routes

APPROACH

The Grand Jury interviewed officials of the Transportation Authority of Marin (TAM) and the Marin Wildfire Prevention Authority (MWPA), as well as county supervisors, city and town council members, city managers, public works directors, fire and police officials, agency legal counsel, and staff of the Marin County Office of Emergency Services. The Grand Jury reviewed TAM's charter as well as its response to a previous Grand Jury wildfire report that called on TAM to assume some responsibility for evacuation planning. In addition, it reviewed the authorizing documents of the MWPA, attended public meetings, and examined county and municipal general plans.

The Grand Jury investigation focused exclusively on evacuation as it relates to planning, funding, and implementing public works projects on our roads.

BACKGROUND

Marin County has made progress in addressing the threat of wildfire with the formation and funding of the MWPA that was recommended by the 2018–19 Marin County Civil Grand Jury. With the leadership of fire officials and FIRESafe Marin, county residents are establishing certified Firewise neighborhoods focused on vegetation management and hardening homes against the risk of fire. The MWPA is getting off to a good start with several important initiatives, including inspection, vegetation management, public education, establishment of refuge centers, signage, planning, and mapping.

Planning to safely evacuate a community is complex and includes the need to consider public works projects for making rapid evacuation possible along Marin's narrow and congested roads. The September 2020 Glass Fire forced the sudden evacuation of 68,000 Sonoma County residents and resulted in gridlock on a major route.³ During the 2018 Camp Fire in Paradise, flames raced at a rate of more than one football field every three seconds.⁴ In that fire, eight people perished in their cars trying to escape.

In Marin, evacuation needs are not routinely included in the criteria used by county and municipal public works departments or TAM to prioritize and finance traffic projects. When it comes to planning and funding public works projects, the primary considerations are the safety

³ Lori A. Carter, Kevin Fixler, Guy Kovner, et al., "Live Updates: More Fire Evacuation Orders Issued for East Santa Rosa," Santa Rosa Press Democrat, September 28, 2020, <https://www.pressdemocrat.com/article/news/live-updates-more-fire-evacuation-orders-issued-for-east-santa-rosa/amp/>.

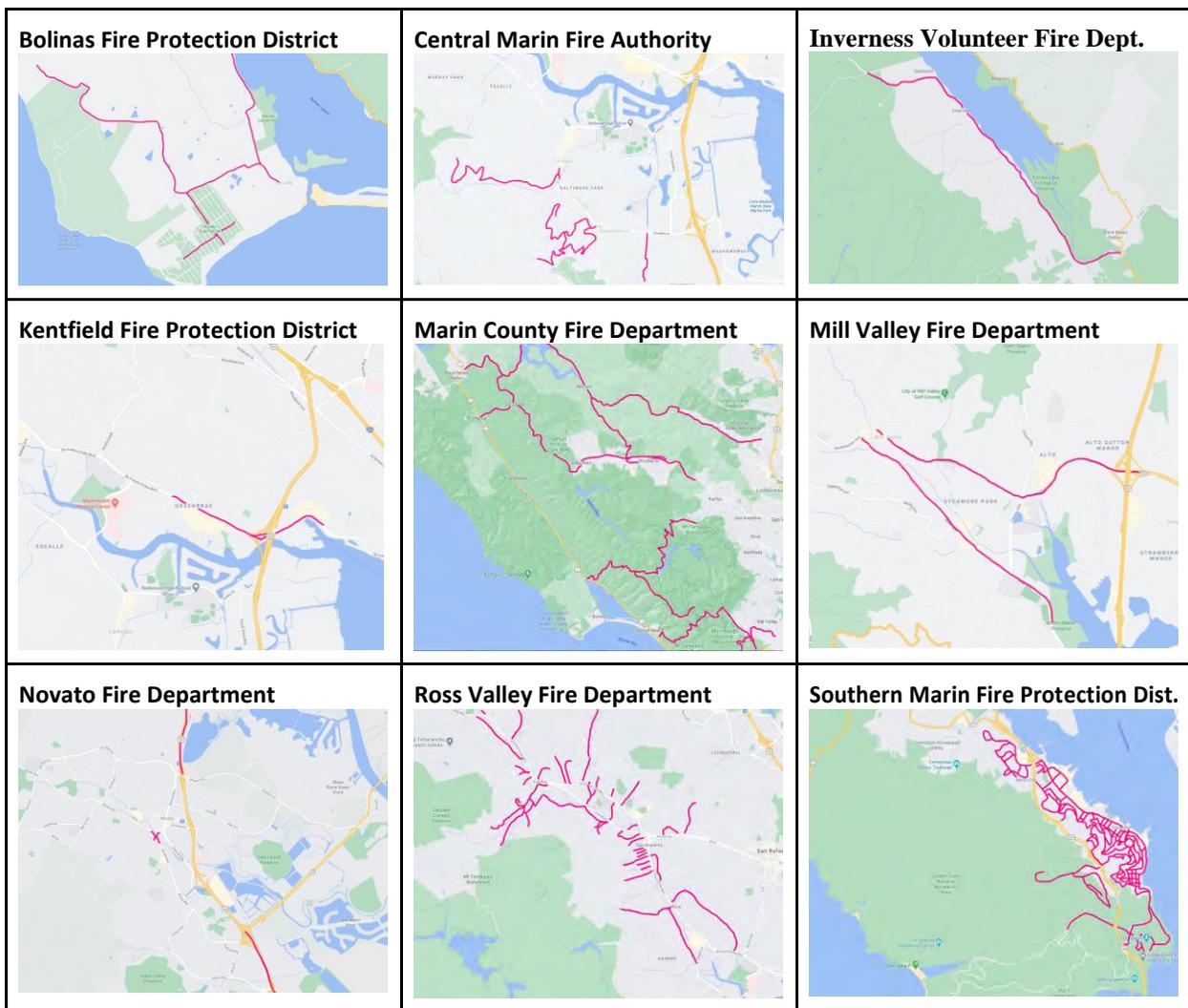
⁴ Judson Jones, "One of California Wildfires Grew So Fast It Burned the Equivalent of a Football Field Every Second," CNN, November 10, 2018, <https://www.cnn.com/2018/11/09/us/california-wildfires-superlatives-wcx/index.html>.

of pedestrians, bicyclists, and drivers as well as smooth, efficient traffic flow and congestion management. In numerous jurisdictions, evacuation needs do not make the list of approved criteria that are evaluated when deciding on a project. As one official put it, evacuation is “not on the radar.”

Traffic Congestion and Evacuation Challenges

Marin’s unique geography creates exceptional challenges for transportation planners across the county. The 2018–2019 Marin County Civil Grand Jury presented an extensive list of choke points identified by Marin’s fire districts.⁵ Some of these are illustrated in Figure 1.

Figure 1. Choke Points Identified by Fire Districts in 2019



⁵ Marin County Civil Grand Jury, *Wildfire Preparedness: A New Approach*, Appendix C, April 25, 2019, <https://www.marincounty.org/-/media/files/departments/gj/reports-responses/2018-19/wildfire-preparedness--a-new-approach.pdf?la=en>.



Road narrowing at eastbound East Blithedale Avenue approaching Highway 101. (Photo by Spencer Sias)

The problem is compounded when evacuation routes cross multiple jurisdictions where no single agency has authority to make improvements along the entire route. These problems are illustrated at several locations in Marin.

For example, Mill Valley's Miller Avenue and Blithedale Avenue are the primary evacuation routes for more than 15,000 people, almost all of whom live in a fire-prone wildland-urban interface area. Normal traffic there is consistently backed up at three key choke points: the intersection of Camino Alto and East Blithedale, the Highway 101 interchange at Blithedale, and the heavily gridlocked intersection on Shoreline Highway (Highway 1) at Tam Junction. Evacuation to refuge centers near Highway 101 will almost certainly not be possible for many Mill Valley residents. Two of the three choke points that affect Mill Valley lie outside its city limits. To address this problem, multi-jurisdictional cooperation among TAM, Mill Valley, Marin County, and Caltrans will be needed.

The two primary emergency exits from San Anselmo and Fairfax are Sir Francis Drake Boulevard and Red Hill Avenue, which pass through many choke points across multiple jurisdictions, including Ross, San Rafael, Larkspur, County of Marin, and the Caltrans interchanges at Highway 101.

Similar choke points exist in Sleepy Hollow, where the Butterfield Road escape route runs across the jurisdictions of unincorporated Marin County and San Anselmo. Santa Venetia's escape route on San Pedro Road crosses unincorporated Marin County, San Rafael, and the Caltrans interchange at Highway 101. Evacuation along Novato Boulevard involves the City of Novato and the county.

In addition to the choke points on major arterial routes, natural and constructed obstacles on Marin's narrow hillside and feeder roads impede safe evacuation.

DISCUSSION

Planning for safe wildfire evacuation is complicated. It requires multi-agency cooperation to address a multitude of tasks by many different departments and administrators under the direction of Marin's elected officials. These tasks are performed by county and municipal public works, fire, and law enforcement agencies; the Marin County Office of Emergency Services; and the Marin Wildfire Prevention Authority; as well as by regional, state and federal agencies.

Current thinking among most of the county's public safety officials is that residents needing to evacuate should get into their cars, drive down to valley floors, and then go to mapped refuge centers. If necessary, evacuees can then move onto highways and out of the county. Refuge centers are typically large parking lots, playing fields at schools and community centers, and shopping malls. Putting aside the question of whether the designated refuge centers are large enough to accommodate all the evacuees from heavily populated areas, the paths to reach these refuge centers could be impassable. In the long run, it will be essential to move traffic through known choke points in order to ensure public safety in a swiftly moving emergency requiring mass evacuation with little or no warning.

Fire professionals tell residents that they will be safe in their cars on pavement en route to valley floors or designated refuge centers.⁶ They stress that residents should evacuate as soon as they are warned to avoid congestion and panic. However, fires often strike suddenly and create the need to move thousands of cars immediately with little or no warning.

While Marin's agencies are implementing many aspects of evacuation planning, they are not considering infrastructure improvements such as the removal of impediments or the widening of roads for evacuees and emergency vehicles. In interviews with the Grand Jury, many officials expressed reluctance to take on these specific evacuation infrastructure challenges because of the enormous costs, potential litigation, environmental complexities, neighborhood resistance, and lack of authority. Furthermore, it is not clear who has responsibility for addressing this critical need. Nevertheless, the dire consequences of failing to address this challenge could result in a catastrophe that far outweighs the cost of improving our roads to support mass evacuation.

Political Confusion

Marin has political as well as physical impediments to safe evacuation.

At present, it is not clear who has the political authority for all of the many aspects of planning and implementing evacuations. In fact, no single governmental entity has the authority or has accepted responsibility for overseeing and executing all of these tasks.

In interviews with the Grand Jury, public officials often expressed the belief that some other agency had the responsibility for evacuation. For example, some public works directors and city managers believe that fire and law enforcement are in charge of evacuation and involved in its planning. Transportation officials said that the county's Office of Emergency Services is in

⁶ FIRESafe Marin, "Wildfire Evacuation Guide," accessed November 5, 2020, https://firesafemarin.org/index.php?option=com_content&view=article&id=100&Itemid=614.

charge. However, when asked, officials from the Office of Emergency Services and law enforcement responded that they focus on evacuation only during active emergencies.

The Grand Jury heard from several elected officials that they anticipate that the new wildfire authority will take care of evacuation planning. To add to the muddle, there was often confusion over what planning for evacuation actually entails. No one had a complete grasp of all of the interconnected components, whether it is educating the public, cutting back vegetation, improving mapping and signage, designating refuge centers, executing evacuation during emergencies, or actually building and improving the infrastructure to support a mass evacuation.

After completing its investigation, the Grand Jury believes that the ultimate responsibility for road improvements and establishing safe evacuation routes lies with our elected officials, specifically the Marin County Board of Supervisors as well as Marin's town and city councilmembers. For a fully functional evacuation infrastructure, these officials must execute their local policies and decisions through their public works, fire, and law enforcement departments and agencies while also coordinating with one another across jurisdictions. They must also reach out to the state and federal transportation agencies to seek funds. All of this work will require the support of the Transportation Authority of Marin and the new Marin Wildfire Prevention Authority. No jurisdiction or agency can do this entirely by itself.

County, Towns, and Cities

It is up to the county and municipalities to propose and build the public works infrastructure needed to support evacuation as well as emergency access by fire equipment and first responders. It is critical that they remediate traffic choke points and improve key narrow roads within their boundaries. They also must look beyond their borders at cross-jurisdictional evacuation routes that will be needed to accommodate mass evacuations.

While jurisdictions may have the resources for small projects, they will need to coordinate with one another and regional, state, and federal transportation agencies to obtain the funding required for larger local and cross-jurisdictional projects. Major public works projects can involve enormous expense, generate litigation, and take years to accomplish. However, the Grand Jury believes that even small projects that address evacuation can make a big difference over time.

Elected officials through their local public works departments are responsible for building and maintaining a safe road infrastructure for the public, whether they are in automobiles, on bikes, or on foot. Safe, smooth, and efficient traffic flow on an everyday basis is their prime consideration. Evacuation has not been one of the criteria in planning road projects but given the effects of climate change and the rising risk of fire, it cannot be ignored.

Public works decisions are often made in response to demands from local residents who lobby for specific improvements in their neighborhoods. The Grand Jury heard from a number of public works directors that they respond to appeals from parents in regard to pedestrian safety. There have not been similar appeals from the public for evacuation-related improvements.

The responsibilities of each public works department end at its jurisdictional boundaries. While there has been some informal coordination between cities, there is no formal plan for coordinating traffic flow across cross-jurisdictional evacuation routes.

Each jurisdiction has its own challenges and priorities, and the solutions to those challenges may conflict with evacuation concerns. In some cases, individual jurisdictions have chosen to address local demands for quieter, slower streets by narrowing major routes within their cities.

Mill Valley is a good example of trying to balance evacuation with safe traffic flow, aesthetics, and other competing requirements. In 2017, Miller Avenue was re-stripped to narrow the road from four lanes to two lanes in order to add a bike lane and needed parking in the downtown area. In 2019, after evacuation concerns were expressed, the city amended the plan to prohibit parking on Miller Avenue on “red flag” days when fire danger is high. This compromise is a recognition of the need to be able to evacuate large numbers of vehicles out of the city in an emergency.

Individual governing bodies of the cities, towns, and the county should direct their departments of public works to add evacuation as an important criterion to be considered as part of their normal planning process. This does not need to be an onerous addition. A simple item on a checklist should be included with a short explanation of how evacuation would be impacted.

The county and municipal elected officials have the ultimate responsibility for evacuation and public roadways, and they can also strongly influence the policies and decisions of the Transportation Authority of Marin. TAM is a resource and the primary source of funding for transportation infrastructure projects in the county. Its board is composed solely of a councilmember from every town and city as well as all five members of the county’s board of supervisors. Unless the county, towns, and cities prioritize infrastructure work to improve evacuation, this work will not happen.

As part of fulfilling their responsibility for evacuation safety, Marin’s board of supervisors and municipal councils should each pass a resolution requesting TAM establish a policy to examine the impact on evacuation of every road project presented to it for funding.

County and Municipal General Plans

County and municipal general plans lay out each jurisdiction’s vision for long-term development, including its traffic infrastructure. General plans are required by state law, and the law requires that general plans include evacuation as a component of their safety element. Specifically, it states that “the safety element . . . shall also address evacuation routes . . . and minimum road widths and clearances around structures, as those items relate to identified fire and geologic hazards.”⁷

In addition, the 2015 Governor’s Office of Planning and Research’s *Fire Hazard Planning* guide recommends that general plans include evacuations.⁸ Specifically, the guidelines call for:

- Designating and maintaining safe emergency evacuation routes on publicly maintained roads for all communities and assets at risk

⁷ California Government Code 65302(g), https://leginfo.ca.gov/faces/codes_displaySection.xhtml?sectionNum=65302.&lawCode=GOV.

⁸ Governor’s Office of Planning and Research, *Fire Hazard Planning*, May 2015, p. 21, [Fire Hazard Planning: General Plan Technical Advice Series](#).

- Identifying potential circulation improvements necessary to avoid unacceptable community risks

The Grand Jury reviewed the general plans of the county and the municipalities and found that evacuation is not adequately addressed. As of October 2020, only Belvedere, Mill Valley, and Novato had included evacuation in their general plans, although several other jurisdictions are in the process of making some changes.

California state law also mandates that general plans be updated on a regular basis. These plan updates provide government officials the opportunity to consider evacuation when making decisions involving land use, development, and infrastructure. Given the dangers illustrated by the 2020 wildfire season, the Grand Jury believes that the county, cities, and towns should amend their general plans to explicitly address evacuation issues. Specifically, they should identify the roads within their jurisdictions that create unacceptable community risks and plan to improve them as soon as possible.

The Transportation Authority of Marin

In its *Wildfire Preparedness: A New Approach* report, the 2018–19 Marin County Civil Grand Jury made four recommendations calling on the Transportation Authority of Marin to participate in planning, prioritizing, and funding evacuation projects.⁹ TAM responded to that Grand Jury report by stating that “TAM is a funding agency and does not set local policy.”¹⁰ During subsequent interviews, the 2019–2020 Grand Jury heard TAM officials continue to deny that the agency has any role or responsibility for considering evacuation needs in its transportation projects. However, the current Grand Jury believes that the TAM board can and should ensure that evacuation considerations are integrated as a criterion into the planning and funding of all transportation projects.

TAM is ideally positioned to help address the county’s evacuation infrastructure needs. It is the only entity in Marin with countywide authority over transportation projects. It is also the primary agency through which Marin’s major transportation projects are developed and funded. Its board is broadly representative of Marin’s jurisdictions, and therefore it can support large cross-jurisdictional projects along Marin’s major evacuation routes. By coordinating grant applications for multi-jurisdictional and countywide evacuation infrastructure projects, TAM can strengthen Marin’s chances of obtaining regional, state, and federal funds.

TAM was established as Marin’s official congestion management agency¹¹ and is the major source of funding for many Marin transportation projects, both small and large. It provides funding for roads, bikeways, sidewalks, and pathways. It also supports local transit services and school safety programs. TAM gets funding from local sales taxes and a local vehicle registration fee, as well as from regional, state, and federal grants.

⁹ Marin County Civil Grand Jury, *Wildfire Preparedness: A New Approach*, p. 24.

¹⁰ Transportation Authority of Marin, “Response to Grand Jury Report “Wildfire Preparedness - A New Approach,” June 27, 2019, <https://www.marincounty.org/-/media/files/departments/gj/reports-responses/2018-19/responses/wildfire-preparedness-a-new-approach/wildfire--tam.pdf?la=en>.

¹¹ Transportation Authority of Marin, “Overview,” accessed November 5, 2020, <https://www.tam.ca.gov/overview/>.

In 2018, Marin’s voters approved Measure AA, a ½-cent sales tax to support local transportation projects. This tax is expected to generate up to \$273 million that could be used to improve local roads over the next 30 years.¹² This money is prescribed for many purposes, but one such purpose is to make investments to address congestion and improve “traffic flow” on local streets and road corridors. Of the \$273 million, TAM estimates that \$7.2 million will be available annually for maintenance of Marin’s local transportation infrastructure, including roads, bike paths and walking paths. The measure also makes an additional \$1.9 million available on an annual basis to reduce congestion on Highway 101 and adjacent roadways.

Local spending in these areas could help to alleviate impediments to safe evacuation. The money could also be used as matching funds to obtain larger regional, state, and federal grants. This can be accomplished within the Measure AA framework approved by Marin’s voters, and it would be in keeping with the vital public interest in having safe evacuation routes.

The Grand Jury’s review indicates that TAM has the discretion as well as financial resources to address unanticipated events under existing rules. For example, TAM recently made Quick Build Grants to towns and cities to close streets to traffic so restaurants could provide outdoor dining during the COVID-19 pandemic.¹³

TAM does not need to amend its charter or amend the expenditure plan for AA funds in order to consider evacuation routes in its funding algorithms. The TAM board is not prohibited from establishing a policy that every project submitted for funding must consider the impact of the project on mass evacuation. TAM’s board can also direct its staff to work with the county and municipalities to ensure that every project proposal includes consideration of the impact on Marin’s evacuation infrastructure.

TAM could be more effective if it works directly with the new Marin Wildfire Prevention Authority to help identify and fund evacuation infrastructure projects. TAM has traffic models and an extensive set of data that could be extremely useful for evacuation planning.¹⁴

The Marin Wildfire Prevention Authority

The Marin Wildfire Prevention Authority is a new, countywide agency dedicated to all aspects of wildfire prevention and preparation. It is the first agency of its kind in the state and represents a pioneering effort in fire prevention. When it was being formed, the MWPA was presented as the agency that would address Marin’s wildfire prevention, evacuation infrastructure, and planning needs.

¹² Transportation Authority of Marin, *2018 Final Expenditure Plan*, p.9, accessed October 15, 2020, https://2b0kd44aw6tb3js4ja3jprp6-wpengine.netdna-ssl.com/wp-content/uploads/2018/07/TAM_2018FinalExpenditurePlan_062918.pdf.

¹³ Will Houston, “Marin Grant Program Offers Virus Aid for Outdoor Commerce,” *Marin Independent Journal*, July 12, 2020, <https://www.marinij.com/2020/07/12/marin-grant-program-offers-virus-aid-for-outdoor-commerce/>.

¹⁴ Transportation Authority of Marin, *Travel Demand Model & Traffic Monitoring*, accessed October 3, 2020, <https://www.tam.ca.gov/planning/travel-demand-model-traffic-monitoring/>.

The Measure C initiative placed on the ballot to fund the MWPA specifically stated:

Marin Wildfire Prevention Measure. To support coordinated wildfire prevention including early detection, warning and alerts; reducing vegetation; ensuring defensible space around homes, neighborhoods and critical infrastructure; and *improving disaster evacuation routes/procedures*; shall the Marin Wildfire Prevention Measure, levying up to 10¢ per building square foot tax (\$75 per multifamily unit or as described in the full measure) for ten years, providing \$19,300,000 annually, with annual inflation adjustments, independent citizen oversight/audits, and low-income senior exemptions, be adopted?¹⁵

In addition, the campaign literature promoting Measure C to fund MWPA explicitly promised to address evacuation infrastructure. The image below shows a Measure C campaign flyer describing in the second bullet point that a yes vote on Measure C will “improve evacuation routes and infrastructure for quicker, safer evacuations.”

**DON'T PLAY WITH FIRE:
IT'S NOT WORTH THE RISK**

LOCAL LEADERS AGREE — VOTE YES ON C
League of Women Voters of Marin County
Coalition of Sensible Taxpayers (COST)
Marin Independent Journal
Marin County Fire Chief's Association
FIRESafe MARIN
Marin Association of REALTORS®
Marin Conservation League
Conservation Corps North Bay
North Bay Leadership Council
Jared Huffman, US Congressman
Mike McGuire, CA State Senator
Judy Arnold, Marin County Board of Supervisors
Damon Connolly, Marin County Board of Supervisors
Katie Rice, Marin County Board of Supervisors
Dennis Rodoni, Marin County Board of Supervisors
Kate Sears, Marin County Board of Supervisors
James Andrews, Mayor, Town of Corte Madera
Denise Athas, Mayor, City of Novato
Elizabeth Brekhus, Mayor, Town of Ross
Renee Goddard, Mayor, Town of Fairfax
Ford Greene, Mayor, Town of San Anselmo
Gary Phillips, Mayor, City of San Rafael
Catherine Way, Mayor, City of Larkspur
Jim Wickham, Mayor, City of Mill Valley
**Partial list. Titles for identification purposes only.*

We teach our children not to play with fire and now it's our turn to follow this commonsense advice. With longer, hotter and drier fire seasons combined with Marin's abundant natural vegetation that could fuel a wildfire, we've been fortunate to date. Destructive and fatal wildfires in Sonoma, Paradise and elsewhere have taught us that we must be proactive. Voting Yes on C — the Marin Wildfire Prevention Measure — will help protect Marin from the very real threat of wildfire.

VOTE YES ON MEASURE C TO:

- Improve emergency alert and fire warning systems
- Improve evacuation routes and infrastructure for quicker, safer evacuations
- Reduce hazardous vegetation using environmentally-responsible practices
- Expand defensible space and fire safety inspections
- Protect roads, bridges, power and communication lines, schools and police and fire stations
- Provide support for seniors, low-income homeowners and people with disabilities needing assistance to keep their homes fire resistant
- Expand neighborhood wildfire safety and preparedness programs

STRICT FISCAL ACCOUNTABILITY:

- All funds must be spent locally for wildfire prevention and preparedness only
- By law, no funds can be taken by the State
- An independent citizens' oversight committee ensures funds are spent properly
- Low-income senior citizens are eligible for an exemption from the cost
- Administrative costs are strictly capped at no more than 6% so funds go directly to wildfire prevention

YES ON C FOR WILDFIRE SAFETY

VOTE YES ON C TO PROTECT MARIN FROM WILDFIRE

Ad paid for by Committee for Wildfire Safety — Yes on C, committee major funding from Christian Larsen FPPC# 1422676.

Yes4WildfireSafety.org
/Yes4WildfireSafety

Measure C campaign flyer promising, among other statements, that a yes vote would “improve evacuation routes and infrastructure for quicker, safer evacuations.”

¹⁵ Marin County Registrar of Voters, “March 3, 2020 - Measure C,” emphasis added, <https://www.marincounty.org/depts/rv/election-info/election-schedule/page-data/tabs-collection/2020/march-3/measure/measure-c-tab>.

Marin voters approved the ballot initiative with a 71 percent majority.

The Grand Jury is concerned that Marin’s public may have a false sense of security regarding evacuation routes, thinking that all issues relating to the matter will be handled by the new government agency. Local officials told the Grand Jury that citizens are not calling on them to improve evacuation routes in current or future infrastructure projects. They are not demanding action on the inevitable, and possibly lethal, road congestion that will occur in the event of a mass evacuation.

From its interviews and investigation, the Grand Jury confirmed that not only the public, but others, including some government officials, expect that evacuation improvements will fall under the purview of the MWPA. FIRESafe Marin, a nonprofit organization formed by Marin County’s fire chiefs, produced and distributed a fact sheet about the new agency and described one of its tasks as “improving evacuation routes and infrastructure to enhance traffic flow and promote safe evacuation.”¹⁶ Seeming to further support this assumption, the MWPA website states that one of its roles is to “improve disaster evacuation routes for organized evacuation.”¹⁷ Despite these assertions, the MWPA does not plan to actually make infrastructure improvements.

The MWPA is funding major vegetation management projects, creating evacuation maps, applying for and giving grants, providing defensible space evaluations, and planning many other important tasks. However, it should be clearly understood that the MWPA does not have the political authority to initiate the public works projects to build safe mass evacuation routes, nor does it have sufficient financial resources to fund them.

The MWPA is composed of 17 different jurisdictions. Rather than giving the MWPA top-down authority, its formation agreement requires that all its actions are to be achieved through cooperation among its constituent jurisdictions. It cannot impose a requirement for major infrastructure work on the county or any individual jurisdiction. Political authority remains with the towns, cities, and county.

Although the tax for the MWPA is expected to raise approximately \$19.3 million per year, this amount of money is not enough to cover the cost of any major roadway improvement. The MWPA is planning to fund and execute other evacuation-related projects. For instance, it has allocated \$1 million for a traffic study of evacuation routes. This traffic study could be the blueprint for planning future roadway improvements; but beyond this, the agency will not be responsible for executing or funding such work.

It would make sense for the MWPA and the Transportation Authority of Marin to coordinate this infrastructure planning work with the towns, cities, and county. To facilitate this coordination, the MWPA should invite a TAM representative to become an at-large, nonvoting member of its Advisory/Technical Committee.

¹⁶ FIRESafe Marin, “Local Wildfire Prevention & Mitigation Initiative,” accessed October 4, 2020, https://www.firesafemarin.org/images/articles/mwpa/JPA_FactSheet_Final.pdf.

¹⁷ Marin Wildfire Prevention Authority, “About Us,” accessed October 17, 2020, <https://www.marinwildfire.org/about-us>.

CONCLUSION

Planning, executing, and building for evacuation is an enormous, complex, expensive, and time-consuming task that can only be achieved one step at a time. As a start, to meet the need for safer evacuation, Marin's officials and agencies should consider evacuation impacts whenever they are planning a new roadway improvement project. Success in this endeavor will require dedicated attention by our elected leaders and cooperation across and within Marin's jurisdictions as well as the Transportation Authority of Marin and the Marin Wildfire Prevention Authority. With recognition of the progress made so far and in view of the extensive work that remains to be done, the Grand Jury is recommending the next steps needed to build for evacuation.

FINDINGS

- F1. No single agency or jurisdiction is taking responsibility and authority for building infrastructure for safe evacuation routes across jurisdictions in Marin County.
- F2. There is confusion in the county as to who has ultimate responsibility and authority for ensuring that Marin has safe evacuation routes.
- F3. Marin County Board of Supervisors and town and city councils have the responsibility for safe evacuation routing, and they have not sufficiently considered evacuation as a criterion when approving improvements to roads and traffic infrastructure in their jurisdictions.
- F4. County and municipal administrators, public works, and traffic engineers have not adequately considered mass evacuation as a criterion for planning and funding traffic infrastructure improvements.
- F5. Most Marin jurisdictions have not yet included urgently needed evacuation plans in their general plans as required by state law and as recommended by the Governor's Office of Planning and Research.
- F6. As Marin's designated "congestion management agency," the Transportation Authority of Marin, is best positioned to coordinate and support the funding of public works projects for improving evacuation routes, including cross-jurisdictional evacuation routes.
- F7. Contrary to its previous responses to the Grand Jury, the Transportation Authority of Marin is not precluded or constrained from incorporating evacuation planning needs as a criterion in its infrastructure projects.
- F8. The Transportation Authority of Marin's decision-making process is inadequate unless it includes evacuation as a criterion when funding improvements.
- F9. The Marin Wildfire Prevention Authority's Advisory/Technical Committee would benefit from having the expertise of the Transportation Authority of Marin to advise on evacuation infrastructure needs.

RECOMMENDATIONS

- R1. Within 180 days of the date of this report, the governing boards of the County of Marin and its cities and towns should direct their respective planning and public works departments to include evacuation needs among their criteria for evaluating and recommending public works projects.
- R2. Within 180 days of the date of this report, the governing boards of the County of Marin and its cities and towns should adopt resolutions calling on the Transportation Authority of Marin to include evacuation needs among the criteria it considers when planning and funding public works projects.
- R3. In calendar year 2021, the County of Marin and its cities and towns should update the safety elements of their general plans to include evacuation planning.
- R4. Within 120 days of the date of this report, the Transportation Authority of Marin should establish a criterion requiring that evacuation impacts be examined and stated when planning and funding infrastructure projects.
- R5. Within 120 days of the date of this report, the Marin Wildfire Prevention Authority should invite a Transportation Authority of Marin representative to become an at-large, nonvoting member of its Advisory/Technical Committee to support program development, funding, and implementation of improvements in evacuation routes.

REQUEST FOR RESPONSES

According to the California Penal Code, agencies required to respond to Grand Jury reports generally have no more than 90 days to issue a response. It is not within the Grand Jury's power to waive or extend these deadlines, and to the Grand Jury's knowledge, the Judicial Council of California has not done so. But we recognize that the deadlines may be burdensome given current conditions caused by the COVID-19 pandemic.

Whether the deadlines are extended or not, it is our expectation that Marin's public agencies will eventually be able to return to normal operations and will respond to this report. In the meantime, however, public health and safety issues are of paramount importance and other matters might need to wait.

Pursuant to Penal Code Section 933.05, the Grand Jury requests responses as shown below. Where a recommendation is addressed to multiple respondents, each respondent should respond solely on its own behalf without regard to how other respondents may respond.

Pursuant to Penal Code Section 933.05, the Grand Jury requests responses from the following governing bodies:

- County of Marin Board of Supervisors (F1–F5, R1–R3)
- Belvedere City Council (F1–F5, R1–R3)
- Corte Madera Town Council (F1–F5, R1–R3)
- Fairfax Town Council (F1–F5, R1–R3)
- Larkspur City Council (F1–F5, R1–R3)
- Mill Valley City Council (F1–F5, R1–R3)
- Novato City Council (F1–F5, R1–R3)
- Ross Town Council (F1–F5, R1–R3)
- San Anselmo Town Council (F1–F5, R1–R3)
- San Rafael City Council (F1–5, R1–R3)
- Sausalito City Council (F1–F5, R1–R3)
- Tiburon Town Council (F1–F5, R1–R3)
- Transportation Authority of Marin Board of Directors (F1, F2, F6–F9, R4)
- Marin Wildfire Prevention Authority Board of Directors (F1, F2, F9, R5)

The governing bodies indicated above should be aware that the comment or response of the governing body must be conducted in accordance with Penal Code Section 933(c) and subject to the notice, agenda and open meeting requirements of the Brown Act.

Note: At the time this report was prepared information was available at the websites listed.

Reports issued by the Civil Grand Jury do not identify individuals interviewed. Penal Code Section 929 requires that reports of the Grand Jury not contain the name of any person or facts leading to the identity of any person who provides information to the Civil Grand Jury. The California State Legislature has stated that it intends the provisions of Penal Code Section 929 prohibiting disclosure of witness identities to encourage full candor in testimony in Grand Jury investigations by protecting the privacy and confidentiality of those who participate in any Civil Grand Jury investigation.



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Tiburon
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County of Marin
Damon Connolly
Katie Rice
Stephanie Moulton-Peters
Dennis Rodoni
Judy Arnold

February 26, 2021

The Honorable Judge Andrew Sweet
Marin County Superior Court
P.O. Box 4988
San Rafael, CA 94913-4988

Ms. Lucy Dilworth, Foreperson
Marin County Civil Grand Jury
3501 Civic Center Drive, Room #275
San Rafael, CA 94903

SUBJECT: Response to Marin County Civil Grand Jury Report on “Roadblocks to Safer Evacuation in Marin”

Dear Judge Sweet and Ms. Dilworth:

On February 25, 2021, the Transportation Authority of Marin (TAM) Board of Commissioners reviewed and approved TAM’s response to the Marin County Civil Grand Jury Report on “Roadblocks to Safer Evacuation in Marin.” Attached is TAM’s response for your review and acceptance.

Please contact TAM’s Executive Director, Anne Richman, at arichman@tam.ca.gov or 415-226-0820 if you have any questions about TAM’s response.

Sincerely

Eric Lucan
Chairperson, TAM Board of Commissioners

Attachment: TAM Response to Grand Jury Report

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TAM RESPONSE TO GRAND JURY REPORT

Report Title: Roadblocks to Safer Evacuation in Marin

Report Date: December 14, 2020

Agenda Date: February 25, 2021

Response by: Transportation Authority of Marin (TAM)

FINDINGS

- F1. No single agency or jurisdiction is taking responsibility and authority for building infrastructure for safe evacuation routes across jurisdictions in Marin County.**

Response: Partially agree.

There is currently no single agency or jurisdiction with the broad-based authority for building infrastructure across multi-jurisdictions in Marin County. Operating, maintaining, and improving infrastructure are the responsibilities of the individual jurisdiction, including all liabilities and associated risks. Generally, when an agency seeks to implement infrastructure improvements beyond its boundary, the implementing agency enters into a cooperative agreement with neighboring agency or agencies specific to the project. To date, TAM is not aware of any agency in Marin County that would transfer responsibility and authority of its assets to an outside agency.

- F2. There is confusion in the county as to who has ultimate responsibility and authority for ensuring that Marin has safe evacuation routes.**

Response: Partially disagree.

It is TAM staff's understanding that the newly formed Marin Wildfire Prevention Authority (MWPA) is in the process of developing evacuation plans county-wide, including an assessment of evacuation routes. This work is being planned in cooperation with a range of partners including emergency responders, local jurisdictions, Caltrans, CHP, and TAM. In the event of an emergency, emergency response agencies (police, fire) would have authority over an evacuation. These responsibilities seem clear. Additionally, each local municipality has designated evacuation routes and is responsible for the development of safety elements in its general plan, and local hazard mitigation plan that identify risks, and mitigations to these risks. Recent state legislation, AB 747, requires that local jurisdictions without existing adopted local hazard mitigation plans to identify evacuation routes and their capacity, safety, and viability under a range of emergency scenarios before January 2, 2022. Each local municipality is aware of the requirements and responsibility to coordinate with neighboring municipalities in joint efforts.

- F6. As Marin's designated "congestion management agency," the Transportation Authority of Marin, is best positioned to coordinate and support the funding of public works projects for improving evacuation routes, including cross-jurisdictional evacuation routes.**

Response: Disagree.

TAM provides various funding to jurisdictions for local public works (transportation) projects but does not have the authority to define the scope of a project. Local municipalities control their assets and coordinate with adjacent jurisdictions when improving their infrastructure. Transportation

projects often include a variety of funding sources and TAM's funds may only be one of many sources. Additionally, TAM is not involved in the development of local hazard mitigation plans, general plan safety elements, and in identifying the wide range of risks from natural hazards, nor appropriate mitigations to these risks. To the extent that TAM can serve as a resource to support local transportation improvements that might be feasible and desired by a local jurisdiction, TAM can consider how it might do so.

TAM's largest source of funding is from the Measure AA Expenditure Plan that was approved by Marin voters in 2018, authorizing TAM to collect a 1/2 cent sales tax for transportation improvements. The Measure AA Expenditure Plan is divided into categories and sub-categories of funding for specific projects and programs.

Of the funds collected, 95.5% of the funds either goes directly to transit agencies and municipalities by formulas or for programs enumerated in the Expenditure Plan.

Out of the 95.5% noted, 77% of the funds are distributed to transit agencies and municipalities by formula annually - 55% to transit and 22% to municipalities for local streets and roads maintenance. Note that the transit funds are typically used primarily for operations rather than for capital projects. TAM could encourage transit agencies and municipalities to consider evacuation goals with the use of Measure AA funds but the ultimate decisions rest with governing boards of each agency. The other 18.5% in this formula is allocated to programs managed by TAM but has no reasonable nexus to evacuation efforts, with 10.5% to the Safe Routes to School Program that promote safe walking and bicycling to schools and the Crossing Guard Program that covers the costs of deploying crossing guards at key intersections. The Safe Pathway Program receives 4% of the Measure AA funds for infrastructure projects that encourage students to walk or bike to schools by making safety infrastructure improvements to key school corridors. These safety improvements are typically antithesis to evacuation goals because they are designed to reduce vehicular speed and capacity. Another 3.5% is reserve for improvements to Highway 101 and 0.5% for implementing commute alternatives and trip reduction strategies.

The remaining 4.5% (local interchanges, sea level rise mitigation projects, and operational improvements to local streets and roads through innovative technology) that TAM manages may present opportunities whereby evacuation goals may be used as criteria in project evaluation along with other criteria mandated by the Measure AA Expenditure Plan.

TAM also receives state and federal funds for transportation projects in the County. State and federal funds come with specific requirements and are often designated for use on specific projects. When allowed, TAM could consider evacuation as a criterion in project evaluation for those funds.

- F7. Contrary to its previous responses to the Grand Jury, the Transportation Authority of Marin is not precluded or constrained from incorporating evacuation planning needs as a criterion in its infrastructure projects.**

Response: Partially disagree.

TAM manages the distribution of a variety of local, state, and federal funds that have specific criteria in infrastructure project evaluation or may be designated for specific projects. When opportunities are permissible to include evaluation criterion in the project evaluation, TAM will consider doing so.

- F8. The Transportation Authority of Marin’s decision-making process is inadequate unless it includes evacuation as a criterion when funding improvements.**

Response: Disagree.

As noted above, TAM manages a variety of other local, state, and federal funds. TAM is required to evaluate projects in accordance with criteria set forth by each funding source. The evaluation criteria vary from source to source. TAM is legally and contractually obligated to follow the criteria established by each funding source. Where permissible and not inconsistent to the funding sources, TAM can include evacuation goals in project evaluation along with goals set forth by funds sources.

- F9. The Marin Wildfire Prevention Authority’s Advisory/Technical Committee would benefit from having the expertise of the Transportation Authority of Marin to advise on evacuation infrastructure needs.**

Response: Agree.

TAM’s representation on MWPA’s Advisory/Technical Committee would be beneficial to support evacuation planning. TAM staff have been working cooperatively with MWPA on several efforts already, including providing administrative and technical information as MWPA ramps up their new agency and work. TAM will continue to coordinate with MWPA to support their efforts.

RECOMMENDATION

- R4. Within 120 days of the date of this report, the Transportation Authority of Marin should establish a criterion requiring that evacuation impacts be examined and stated when planning and funding infrastructure projects.**

Response: Partially disagree.

Where allowed, TAM can consider establishing criterion to examine evacuation impacts based on the requirements and eligible activities of each funding source at the time funding becomes available. Establishing funding criteria in advance of understanding the requirements of any particular funding source is not feasible or appropriate.

Additionally, staff and the TAM Board would need to carefully consider the nuanced appropriateness of such a requirement in each case, including any potential policy or operational conflicts (or co-benefits). An example of this is the potential conflict between the goal of making streets wider to carry more cars to accommodate the event of an evacuation, and the also important goal of reducing vehicle miles travelled and emissions by making streets more friendly for bikes and pedestrians which often occurs by taking space from auto lanes for pathways or crossings. Additionally, TAM would want to include recognition that emergency responders would have ultimate authority in the event of an emergency, and not impinge on that authority. In some cases, operational improvements may be more appropriate than infrastructure improvements. Finally, TAM also recognizes that local agencies have the authority and are responsible for advancing transportation projects within their jurisdictions in accordance with local plans and policies and are required to balance the many needs of their communities.

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DATE: February 8, 2021

TO: Transportation Authority of Marin Administration, Projects & Planning Executive Committee

FROM: Anne Richman, Executive Director *Anne Richman*
Project Delivery Team

SUBJECT: Review and Accept the February 2021 Project Status Report (Action), Agenda Item No. 7

RECOMMENDATION

The Administration, Projects and Planning (APP) Executive Committee review the February 2021 Project Status Report and refer it to the TAM Board for review and acceptance.

BACKGROUND

In an effort to provide up to date funding and expenditure information that can help the Board and the general public understand the overall status of the suite of projects that TAM manages, the first TAM Project Status Report was developed and provided to the then-called TAM Finance and Policy Executive Committee for review at its October 8, 2018 meeting. It was determined through the report development and review process that updated TAM Project Status Reports will be presented to the Board and public for review every 6 months, with the last report provided in the summer of 2020.

DISCUSSION/ANALYSIS

Project Status Report Highlights:

The Project Status Report covers on-going projects that are active and those that are in the planning phase.

Active Projects covers all projects that are in environmental, design or construction phases. These projects are well defined and, in most cases, fully funded. This report includes five active projects: US 101 Marin-Sonoma Narrows – B7 and B8; North-South Greenway Gap Closure Project – North Segment; North-South Greenway Gap Closure Project – South Segment; Class IV Bikeway on the I-580 Sir Francis Drake Boulevard off-ramp, and Improve Bellam Boulevard off-ramp from Northbound US 101.

Planning Projects cover emerging high priority projects for which TAM is studying various options. These projects most likely will become active projects in the foreseeable future. The report includes four projects in the planning phase: Northbound US 101 to Eastbound Interstate 580 Direct Connector, State Route 37, Improvements to Highway 101 Interchanges, and Marin County Part Time Transit Lanes Study.

In addition to the active and planning project reports, staff have included an update on the Alternative Fuels program as requested at the October 2020 TAM Board meeting.

FISCAL IMPACTS

Not Applicable

NEXT STEPS

The next Project Status Report update will be provided in the summer of 2021.

ATTACHMENTS

Attachment A -February 2021 TAM Project Status Report
Attachment B - Presentation



Transportation Authority of Marin

Project Status Report

February 2021

ON-GOING PROJECTS

A. PROJECTS – ACTIVE

US 101 Marin-Sonoma Narrows Overview 1

US 101 Marin-Sonoma Narrows – B7 and B8 2

North-South Greenway Gap Closure Project – Northern Segment..... 4

North-South Greenway Gap Closure Project – Southern Segment..... 6

Class IV Bikeway on the I-580 Sir Francis Drake Blvd Off-Ramp 8

Improve Bellam Boulevard Off-Ramp from Northbound US 101 10

B. PROJECTS - PLANNING PHASE

Northbound US 101 to Eastbound I-580 Direct Connector 12

State Route 37 14

Improvements to Highway 101 Interchanges and Approaching Roadway..... 16

Marin County US 101 Part Time Transit Lane Study 18

Alternative Fuel Program 20

C. OTHER

Project Phase Definitions 22

Acronyms and Abbreviations 23

Project US 101 Marin-Sonoma Narrows Overview

Partners Caltrans, Sonoma County Transportation Authority and Transportation Authority of Marin
Jurisdiction(s) Novato, Petaluma

Scope

Widening of approximately 17 miles of US 101 from four to six lanes by adding HOV lanes in each direction; improving public transit and access to SMART rail network; installing continuous Class I and Class II bikeways between Novato and Petaluma; and constructing new interchanges and frontage roads to remove unsafe access from private properties and local roads.

Project will be completed through a series of phases based on operational priority and funding availability.

Status

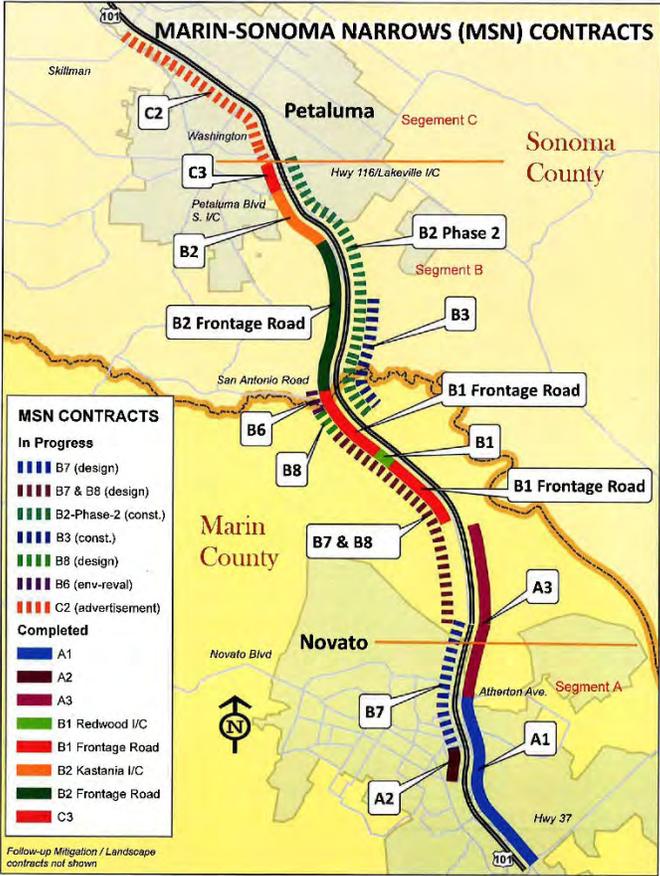
- Design is complete for the HOV lanes between North Novato to Olompali. (MSN B7)
- Construction is complete for the Highway 101 San Antonio Creek bridge and curve correction (Segment B3), spanning three miles at the Marin/Sonoma County line.
- All remaining HOV Sonoma County segments are either underway or completed.

Issues/Areas of Concern

- Additional funding is needed to complete the remaining segments in Marin, and allocated RM3 funds are still in court litigation.

MARIN-SONOMA NARROWS STATISTICS

Project length.....17 miles
 Avg. daily traffic – 2017.....153,000 vehicles
 Avg. daily truck traffic – 2013.....6,200 trucks
 Marin County / Sonoma County total
 populations.....258,000/495,000
 Vehicle hours of delay (at less than 35 mph).....978,400
 Funds programmed for MSN.....~\$632,600,000
 Funds needed to complete MSN.....~ \$110,000,000



Phase Status	
A1	Completed
A2	Completed
A3	Completed
B1 Phase I	Completed
B7 (Formerly B1-Phase II; See Fact Sheet)	Partially Funded
B2 Phase I	Completed
B2 Phase II	In Progress
B3	Completed
B8 (Formerly A4 & B5; See Fact Sheet)	Partially Funded
B6	In Progress
C1	Completed
C2	In Progress
C3	Completed

Project US 101 Marin-Sonoma Narrows – B7 and B8

Partners Caltrans, Sonoma County Transportation Authority, and Transportation Authority of Marin
Jurisdiction(s) Novato

Scope

Construct a southbound HOV lane from 0.3 mile south of the Marin/Sonoma County line to just south of Franklin Avenue Overhead, and a northbound HOV lane from 1.7 miles north of Atherton Avenue Overcrossing to 0.3 mile south of the Marin/Sonoma County line, improving mobility for public transit and access to SMART rail system. Project includes bridge widening, interchange modifications (Redwood Landfill Interchange), completing all HOV lanes in the NB and SB directions, standardizing shoulders, Class II bike lane construction and correcting the roadway horizontal alignment and vertical profile, along with relocating remaining utilities.

- MSN B8 utility relocation design is on-going.
- SB1 SCCP funds were awarded in December 2020.
- RM3 litigation elevated to the State Supreme Court.
- Schedules will remain on-hold until further notice.



Status

- Working with engineering consultant and Caltrans to design the project. The project design is currently fully funded with local and federal funds, with HOV Lane design completed in December 2020. Competitive SB1 Solutions for Congested Corridor Program (SCCP) funding was applied for and approved. On hold for remaining construction funds.

Schedule

Planning	N/A
Environmental Clearance	2009
Design	2019-2020
Right of Way and Utilities	2018-2023
Construction	2020-2023

Issues/Areas of Concern

- The project is an aggregate of three MSN projects, formerly called the B1 Phase II, A4 and B5 projects. Due to desire to complete the design plan by December 2019 and the potential lengthy process with right-of-way (ROW) acquisition, the project will be split into two concurrent paths: (1) design and construction of the HOV lanes (MSN B7) and (2) ROW acquisition and utility relocation (MSN B8).
- Approximately \$132 million is needed to complete construction.

Estimated Cost by Project Phase

Planning	N/A
Environmental Clearance	N/A
Design	\$8,300,000
Right of Way and Utilities	11,100,000
Construction	123,100,000
TOTAL	\$142,500,000

Updates from Previous Report

- B7 (HOV Lanes) design completed in December 2020.

Funding by Source

STIP Right of Way Excess Fund	\$4,550,000
SB1-LPP	500,000
Measure AA Sales Tax	2,800,000
STP	2,000,000
SB1	40,100,000
RM3 & Other	92,550,000
TOTAL	\$142,500,000

Project US 101 Marin-Sonoma Narrows – B7 and B8

Contracts and Agreements Managed by TAM

Contract or Agreement No.	Amend No.	Open/ Closed	Agency/Consultant	Description	Appropriated Amount	Funding Source	Billed to Date	Percent Billed
C-FY18-12	5	Open	BKF Engineers	Design and Support Engineering Services	\$6,500,000	STIP ROW Fund & STP	\$6,274,828	96%
				TOTAL	\$6,500,000		\$6,274,828	96%

Project North-South Greenway Gap Closure Project – Northern Segment (Larkspur Segment)

Partners TAM, MTC, Caltrans and the City of Larkspur

Jurisdiction(s) Caltrans and the City of Larkspur

Scope

The Northern Segment of the North-South Greenway Gap Closure Project will close a key gap in the local and regional non-motorized transportation network between the Central Marin Ferry Connector bridge over Sir Francis Drake Boulevard and the pedestrian overcrossing of US 101. The Gap Closure Project is being delivered in two segments, the Northern Segment and the Southern Segment. (Northern Segment shown in the adjacent graphic as orange alignment.)



Status

- Environmental analysis is complete. Final design is complete for project in Caltrans R/W and nearly complete for project on Old Redwood Highway
- Northern Segment construction documents prepared in two phases, work within Caltrans ROW and work along Old Redwood Highway within the City of Larkspur. This allows phasing of construction.
- Construction contract awarded and mobilization expected in Feb 2021.

Issues/Areas of Concern

None

Updates from Previous Report

- Financial information updated.
- Project in Caltrans R/W that crosses Corte Madera Creek will begin construction in February 2021.
- Caltrans is administering the construction phase. TAM and our designers are supporting their efforts.
- Construction of the Old Redwood Highway portion will follow the Caltrans project.

Schedule

Planning	Complete
Environmental Clearance	Complete
Design	In Progress
Right of Way and Utilities	In Progress
Construction	2021-2022

Estimated Cost by Project Phase

Planning	-
Environmental Clearance	\$1,100,000
Design	3,785,000
Right of Way and Utilities	-
Construction	15,603,637
TOTAL	\$20,488,637

Funding by Source

RM2	\$16,585,000
CMAQ (Old Redwood Highway)	1,120,000
Measure A Interest Funds	1,000,000
SB1 LPP Incentive	\$1,500,000
BAAQMD Grant	283,637
TOTAL	\$20,488,637

Project: North-South Greenway Gap Closure Project – Northern Segment

Contracts and Agreements Managed by TAM

Contract or Agreement No.	Amend No.	Open/ Closed	Agency/Consultant	Description	Appropriated Amount	Funding Source	Billed to Date	Percent Billed
C-FY15-08	5	Open	Moffatt & Nichol	Environmental, Plans, Specifications and Estimates, Construction Administration (PAED, PS&E) (CON Support)	\$3,785,000	RM2	\$3,392,800	90%
				TOTAL	\$3,420,000		\$3,392,800	90%

Project **North-South Greenway Gap Closure Project – Southern Segment
(Larkspur & Corte Madera Segment)**

Partners MTC, SMART, the City of Larkspur and the Town of Corte Madera

Jurisdiction(s) Larkspur, Corte Madera

Scope

The Southern Segment of the North-South Greenway Gap Closure Project will close a key gap in the local and regional non-motorized transportation network between the southern terminus of the Northern Segment through a private easement (not yet secured) then along the SMART right-of-way south to Wornum Drive to connect to existing multi-use paths. The Gap Closure Project is being delivered in two segments, the Northern Segment and the Southern Segment. (Southern Segment shown in the adjacent graphic as red alignment.)

Status

- The use of the SMART right-of-way has been secured.
- The County of Marin Department of Public Works has agreed to be the implementing agency for the initial alternative’s alignment analysis and environmental analysis. TAM is the project sponsor.

Issues/Areas of Concern

- The Southern Segment requires acquisition of private right-of-way by means of easement.
- Subject to resolving the funding constraints project delivery for the Southern Segment has been suspended.

Updates from Previous Report

- Financial information updated.
- Remaining funds re-directed to the Northern Segment to close a shortfall in the construction phase. Funding grants will be pursued in the future.



Schedule

Planning	Completed
Environmental Clearance	TBD
Design	TBD
Right of Way and Utilities	TBD
Construction	TBD

Estimated Cost by Project Phase

Planning	
Environmental Clearance	\$700,000
Design	TBD
Right of Way and Utilities	850,000
Construction	TBD
TOTAL	\$1,550,000

Funding by Source

RM2	\$1,550,000
TOTAL	\$1,550,000

Project North-South Greenway Gap Closure Project – Southern Segment

Contracts and Agreements Managed by TAM

Contract or Agreement No.	Amend No.	Open/Closed	Agency/Consultant	Description	Appropriated Amount	Funding Source	Billed to Date	Percent Billed
A-FY14-22		Open	Marin County, Dept of Public Works	Project Management	\$1,350,000*	RM2	\$446,015	33%
A-FY14-21		Closed	Sonoma-Marín Area Rail Transit District (SMART)	Boundary Survey and Title Research	\$75,000	RM2	\$52,652	100%
A-FY18-18		Closed	Sonoma-Marín Area Rail Transit District (SMART)	Right-of-Way	\$850,000	RM2	\$850,000	100%
				TOTAL	\$2,275,000		\$1,348,667	59%

- A portion of this allocation re-directed to another project

Project	Class IV Bikeway on the I-580 Sir Francis Drake Blvd Off-Ramp
Partners	Caltrans, Transportation Authority of Marin, BATA, and City of San Rafael
Jurisdiction(s)	Caltrans and City of San Rafael

Scope

Create a two-way barrier separated Class IV Bikeway on the Sir Francis Drake off-ramp connecting Francisco Blvd East with Andersen Drive. The new Bikeway utilizes the shoulder between the outside barrier and the single lane travel way.

Status

TAM has been working with Caltrans, the Bay Area Toll Authority (BATA) and the City of San Rafael to deliver the project for public use. Caltrans is collecting data a part of a four-year pilot project.

TAM has provided funding for the project development and capital construction costs. Caltrans has provided staff to review and approve the project at their cost. BATA has provided construction support at their cost.

Issues/Area of Concern.

None

Updates from Previous Report

Project construction complete. BATA and the City of San Rafael are making improvements to Francisco Blvd East to enhance access to the Richmond San Rafael Bridge.



Schedule	
Planning	Complete
Environmental Clearance	Complete
Design	Complete
Right of Way and Utilities	Complete
Construction	Complete

Estimated Cost by Project Phase	
Planning	
Environmental Clearance	\$50,000
Design & CON Support	390,000
Right of Way and Utilities	
Construction	1,300,000
TOTAL	\$1,740,000

Funding By Source	
Measure A Sales Tax	\$1,740,000
TOTAL	\$1,740,000

Project Class IV Bikeway on the I-580 Sir Francis Drake Blvd Off-Ramp

Contracts and Agreements Managed by TAM

Contract or Agreement No.	Amend No.	Open/Closed	Agency/Consultant	Description	Appropriated Amount	Funding Source	Billed to Date	Percent Billed
C-FY17-02	3	Open	BKF Engineers	Provide environmental and design services.	\$440,000	Measure A/AA Sales Tax	\$394,411	89%
A-FY 20-34	0	Open	Bay Area Toll Authority	Capital Construction	\$1,300,000	Measure A Sales Tax	0	
				TOTAL	\$1,740,000		\$394,411	23%

Project	Improve Bellam Boulevard Off-Ramp from Northbound US 101
Partners	Caltrans, Transportation Authority of Marin, and City of San Rafael
Jurisdiction(s)	Caltrans and City of San Rafael

Scope

Improve the Bellam Avenue off ramp from US 101 by widening the two lanes immediately past the core point. Traffic making a left turn at Bellam will be directed to the left lane, while traffic heading to I-580 or turning right on Bellam will stay in the right lane. An extra lane will be added near Bellam to reduce the lane changes required to make a right on Bellam if exiting from eastbound I-580.

Status

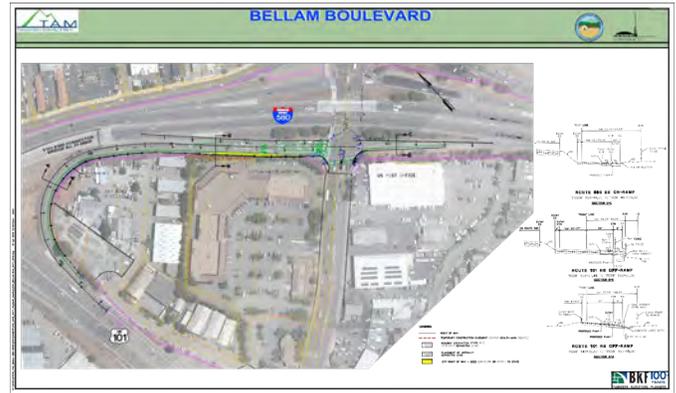
The CEQA document was recorded on August 15, 2018. Design approval from Caltrans is expected in 2021 along with the right of way certification. The County of Marin has signed the co-operative agreement which may have to be increased. The Project has required a redesign and is short funds to complete.

Issues/Area of Concern

The recent design changes along with the transfer of funds from this project to the Sir Francis Drake Flyover have left a funding shortfall of approximately \$3.8 million. The TAM Board in May 2020 approved \$1.7 million in Local Partnership Program (LPP) funds to help close that gap. The Right of Way agreement with Marin Square has expired and will require new negotiations.

Updates from Previous Report

Redesign due to unanticipated Bay Mud soil conditions is nearing approval by Caltrans. This change along with a transfer of money to another project has led to a funding shortfall that has been partially met by the transfer of LPP money. The shortfall has increased since the last report due to updated construction estimates.



Schedule

Planning	Complete
Environmental Clearance	Complete
Design	Complete Mar 2021
Right of Way and Utilities	Apr 2021
Construction	Begin Aug 2021

Estimated Cost by Project Phase

Planning	\$30,000
Environmental Clearance	90,000
Design	1,040,000
Right of Way and Utilities	600,000
Construction	5,900,000
TOTAL	\$7,660,000

Funding By Source

Measure A and AA Sales Tax	\$3,837,000
Local Partnership Program	\$1,737,000
TOTAL	\$5,574,000

Project Improve Bellam Boulevard Off-Ramp from Northbound US 101

Contracts and Agreements Managed by TAM

Contract or Agreement No.	Amend No.	Open/Closed	Agency/Consultant	Description	Appropriated Amount	Funding Source	Billed to Date	Percent Billed
C-FY17-02	3	Open	BKF Engineers	Complete design services including environmental.	\$1,130,000	Measure A/AA Sales Tax	\$803,384	71%
A-FY19-17		Open	County of Marin	Agreement to manage construction including construction management	\$4,000,000 (See Bullet Below)	Measure A Sales Tax	\$63,888	1%
				TOTAL	\$5,130,000		\$867,272	17%

- This agreement was executed based on original cost estimates and will need to be amended.

Project	Northbound US 101 to Eastbound I-580 Direct Connector
Partners	Caltrans, Metropolitan Transportation Commission, Transportation Authority of Marin, City of San Rafael and City of Larkspur
Jurisdiction(s)	Caltrans and City of San Rafael

Scope

Construct a direct connection route between northbound US 101 to eastbound I-580 accessing the Richmond-San Rafael Bridge for travel eastbound toward Contra Costa County. The eastbound approach to the RSR Bridge is one of only two toll bridges in the Bay Area accessed by low speed local roads with traffic signals resulting in traffic delays on local roads and US 101.



Status

In 2018, voters approved Regional Measure 3 in an amount that would fully fund Alternative 3. This Alternative will be very similar to the existing Bellam off-ramp from US 101, however Bellam Boulevard would be crossed with an elevated structure. I-580 would be widened to three lanes.

Issues/Area of Concern

Approval would be required from Caltrans to accept the relatively slow design speed associated with the curve of Alternative 3. Increasing traffic in the area may someday require that the design accommodate the westbound I-580 to southbound US 101 movement. The design for this project must consider rough design of that concept, to accommodate potential future construction.

Updates from Previous Report

Outreach has begun. Initial meetings have taken place for an Ad Hoc Committee of TAM Board members, an Executive Steering Committee, a Technical Advisory Committee and a Stakeholder Working Group consisting of 20 individuals that will help guide the design alternative process. Currently there are seven alternatives. Schedule was updated.

Schedule

Planning	2020
Environmental Clearance	2024
Design	2026
Right of Way and Utilities	2026
Construction	2029

Estimated Cost by Project Phase

Planning	\$1,750,000
Environmental Clearance	3,500,000
Design	9,000,000
Right of Way and Utilities	18,000,000
Construction	115,000,000
TOTAL	\$147,250,000

Funding by Source

RM3	\$135,000,000
Measure A Sales Tax	100,000
Measure AA Sales Tax	16,500,000
TOTAL	\$151,600,000

Project Northbound US 101 to Eastbound I-580 Direct Connector

Contracts and Agreements Managed by TAM

Contract or Agreement No.	Amend No.	Open/ Closed	Agency/Consultant	Description	Appropriated Amount	Funding Source	Billed to Date	Percent Billed
C-FY12-09	1	Closed	CSW/Stuber-Stroeh Engineering Group (Task Order 32)	Develop Alternatives, Cost Estimates, Graphic Rendering, Environmental Evaluation	\$102,000	Measure A Sales Tax	\$102,000	100%
C-FY20-01	1	Open	Kimley-Horn & Associates, Inc.	Project Approval and Environmental Document (PAED)	\$6,500,000	Measure AA Sales Tax	\$1,152,984	18%
C-FY20-02		Open	Fremier Enterprises Inc.	Project Management	\$400,000	Measure AA Sales Tax	\$70,384	17%
				TOTAL	\$7,002,000		\$1,325,368	19%

Project State Route 37

Partners Caltrans, Metropolitan Transportation Commission, and Transportation Authority of Marin, Sonoma, Napa and Solano Counties

Jurisdiction(s) Marin County

Scope

State Route 37 is a key transportation corridor stretching from US 101 in Marin County to Interstate 80 in Solano County. Within the past six years, it has been studied by UC Davis, Caltrans and MTC. It is being evaluated by a policy committee comprised of transportation authorities from Marin, Sonoma, Solano and Napa counties to address sea level rise, traffic congestion, transit options and recreational activities.

Status

MTC funded and completed a Corridor Plan in June 2018, prioritizing congestion relief in Segment B in Solano and Sonoma Counties. Segment A consists of Marin and portions of Sonoma County. Segment C is located in Solano County.

Caltrans conducted public outreach in conjunction with the Corridor Plan with a series of workshops, web surveys and two rounds of focus meetings.

Issues/Area of Concern

A 1,500-foot segment of the four-lane freeway, between US 101 and Atherton Avenue in Novato, had been closed due to the flooding of Novato Creek in January and February 2017. Caltrans spent about \$6 million to reopen the highway. The same segment along with portions near Atherton Ave flooded in February of 2019, leading to additional highway closures.

Updates from Previous Report

MTC commenced a Design Alternative Assessment study for Segment A, which will conclusively define various alternatives for the year 2100 ultimate project. The work will support, in parts, Caltrans’ on-going environmental clearance of interim projects in Segment A.

MTC continues the work to environmentally clear the interim congestion relief project in Segment B. They plan to be in construction by 2024.

Caltrans commenced a corridor-wide Planning & Environmental Linkage (PEL) study from US-101 to I-80 to document a preliminary consultation process with the regulatory agencies of all key issues present in the corridor in an effort to streamline future environmental clearance of the ultimate project. It anticipates completion by mid 2022.



Schedule – Segment A

Planning	2018
Environmental Clearance	2022
Design	TBD
Right of Way and Utilities	TBD
Construction	TBD

Estimated Cost by Project Phase – Segment A

Planning	TBD
Environmental	TBD
Design	TBD
Right of Way and Utilities	TBD
Construction	TBD
TOTAL	TBD

Funding by Source – Segment A

City/County	\$169,765
TOTAL	\$169,765

Project State Route 37

Contracts and Agreements Managed by TAM

Contract or Agreement No.	Amend No.	Open/Closed	Agency/Consultant	Description	Appropriated Amount	Funding Source	Billed to Date	Percent Billed
A-FY16-10		Closed	Solano Transportation Authority	Design Alternatives	\$40,000	City/County	\$40,000	100%
C-FY17-16	1	Closed	CSW/Stuber-Stroeh Engineering Group (Task Order 11)	Segment A - Improvement Concept Study	\$88,000	City/County	\$85,922	97%
A-FY19-10		Closed	NVTA, STA, SCTA and TAM	SR37 Travel Behavior Feasibility Study	\$11,765	City/County	\$11,765	100%
A-FY19-07		Closed	County of Marin	SR37 Adaptation Study	\$30,000	City/County	\$30,000	100%
				TOTAL	\$169,765		\$167,687	98%

Project **Improvements to Highway 101 Interchanges and Approaching Roadway**

Partners Caltrans, Marin County, Marin’s Cities, Marin Transit, Golden Gate Transit

Jurisdiction(s) Marin County

Scope

The Measure AA Expenditure Plan includes a category that provides funding for studies of interchanges on Highway 101. The implementation category goal is to “Improve Highway 101 local interchanges and freeway access routes to reduce congestion, improve local traffic flow, and address flooding impacts throughout the county”.

These funds will be used to address Highway 101 interchanges at a number of locations in Marin and will be used as “seed money” to attract regional, state and federal funds for planning, public outreach, and to develop the scope of improvements needed for all users of the interchanges.

Status

TAM has retained a consulting firm to assist staff with the development of long-term program goals and objectives and to prepare initial studies of the interchanges. The initial studies will be developed to outline existing conditions, define constraints, and present opportunities for improvements. Based on the findings in the studies an implementation & prioritization plan will be developed and presented to the Board to define future actions.

Issues/Area of Concern

None

Updates from Previous Report

Staff and the consulting team are well underway with data collection, preparing report exhibits and documenting existing conditions and deficiencies.



Schedule	
Planning	2020-2022
Environmental Clearance	TBD
Design	TBD
Right of Way and Utilities	TBD
Construction	TBD

Estimated Cost	
Planning	\$1,875,000
Environmental	TBD
Design	TBD
Right of Way and Utilities	TBD
Construction	TBD
TOTAL	TBD

Funding by Source	
Measure AA Sales Tax	\$1,875,000
TOTAL	\$1,875,000

Project Improvements to US 101 Interchanges and Approaching Roadway

Contracts and Agreements Managed by TAM

Contract or Agreement No.	Amend No.	Open/ Closed	Agency/Consultant	Description	Appropriated Amount	Funding Source	Billed to Date	Percent Billed
C-FY20-05		Open	HNTB Corporation	Professional Engineering Services	\$1,875,000	Measure AA Sales Tax	\$485,173	26%
				TOTAL	\$1,875,000		\$485,173	26%

Project	Marin County US 101 Part Time Transit Lane Study
Partners	Caltrans, Marin County, Marin’s Cities, Marin Transit, Golden Gate Transit
Jurisdiction(s)	Marin County

Scope

This study will provide a feasibility assessment for part-time bus operations on the shoulder of US 101 in Marin County. Bus on Shoulder is a proven concept to improve transit reliability and speed according to recent FHWA guidance, and the study will be used to assess feasibility of a pilot project on Highway 101 in Marin County as part of a system of enhancements planned for the corridor. The study will identify the proposed location of bus on shoulder facilities in the county, preferred operational concept, and quantify potential user benefits and improvement costs.



Status

TAM has retained a consulting firm to assist staff with the development of the feasibility study and concept design, cost estimates and operational plans for the project among other items. Based on the findings in the studies an implementation plan will be developed and presented to the Board to define future actions.

Issues/Area of Concern

None

Updates from Previous Report

Work is continuing on the Feasibility study, and is advancing concept design, operations plans, and cost estimates for Technical Advisory Committee Review.

Schedule

Planning	2020/2021
Environmental Clearance	TBD
Design	TBD
Right of Way and Utilities	TBD
Construction	TBD

Estimated Cost

Planning	TBD
Environmental	TBD
Design	TBD
Right of Way and Utilities	TBD
Construction	TBD
TOTAL	TBD

Funding by Source

Caltrans Planning Grant	\$308,000
TOTAL	\$308,000

Project Marin County US 101 Part Time Transit Lane Study

Contracts and Agreements Managed by TAM

Contract or Agreement No.	Amend No.	Open/ Closed	Agency/Consultant	Description	Appropriated Amount	Funding Source	Billed to Date	Percent Billed
C-FY20-07		Open	Kimley-Horn and Associates, Inc.	Planning Services	\$308,000	Caltrans Grant	\$137,980	45%
				TOTAL	\$308,000		\$137,980	45%

Project	Alternative Fuel Program
Partners	Public Agencies
Jurisdiction(s)	Marin County

Scope

The Alternative Fuel Program supports the development of alternative fuel infrastructure (such as electric vehicle charging stations) and public agency fleet replacement needs. The program also supports education and outreach of the benefits of alternative fuel vehicles.

Status

Ongoing. Major update of the program was announced in October 2020 including budget amendment, and work is underway. Staff have completed invoicing for College of Marin and San Rafael City Schools installations of 149 EV Charging Stations. A funding agreement with Marin General Services Authority was approved by their board to conduct a countywide EV Readiness plan. Staff have begun development of an equity outreach program with discussions with County Equity Office underway. Technical reports released to Public and agency partners.

Issues/Area of Concern

The California Electric Vehicle Incentive Program (CALeVIP) program is not advancing at state level until FY21/22 at earliest.

Updates from Previous Report

N/A – First Report for this Program.



Project Alt Fuel Program

Expenditures Managed by TAM

Contract or Agreement No.	Amend No.	Open/Closed	Description	Agency/Consultant	Appropriated Amount	Funding Source	Billed to Date	Percent Billed
N/A		Open	EV Fleet Rebate Program	Belvedere	N/A	Measure B VRF	\$2,000	N/A
N/A		Open	EV Charging Station Rebate Program	San Rafael City Schools (117 heads), College of Marin (32 heads)	N/A	Measure B VRF	\$244,922	N/A
Various		Open	Outreach and Technical Assistance	Multiple	N/A	Measure B VRF	\$52,208	N/A
				TOTAL			\$299,130	

PROJECT PHASE DEFINITIONS

Planning – Complete project studies to define general project parameters.

Environmental Clearance – Completion of and approval of environmental studies and/or reports. Environmental analysis assesses the potential impacts a project may have on the natural and/or built environment.

Design – Engineer and design project leading to the preparation of plans, specifications and construction estimates. Resource agency permits are obtained in the final design stage in preparation to advertise the project for construction bidding.

Right of Way and Utilities – Establish cost and obtain ownership/passage through a given area for the benefit of project completion. Establish utilities needed for the project and relocation if necessary. Right-of-way certification required if using federal funds or if the project is on state highway system.

Construction – Includes actual construction, construction management and construction related design. Actual construction close-out duration may go for years after scheduled completion date shown.

Project Management – Project or construction management and oversight support of projects to carry out elements of construction. Project management is provided by in-house agency staff and consultants. Typically includes construction materials testing for contract compliance.

Project Status Report**ACRONYMS AND ABBREVIATIONS**

ABAG	Association of Bay Area Governments
ATP	Active Transportation Program
BAIFA	Bay Area Infrastructure Financing Authority
BAAQMD	Bay Area Air Quality Management District
Caltrans	California Department of Transportation
CEQA	California Environmental Quality Act
CMAQ	Congestion Mitigation and Air Quality Improvement Program
CMP	Congestion Management Program
CO-OP	Cooperative Agreement
CTC	California Transportation Commission
DPW	Department of Public Works
EEMP	Environmental Enhancement and Mitigation
EIR	Environmental Impact Report
EIS	Environmental Impact Study
ENV MITG	Environmental Mitigation
EV	Electric Vehicles
FHWA	Federal Highway Administration
FTA	Federal Transit Administration
GGT	Golden Gate Transit
GGBHTD	Golden Gate Bridge Highway and Transportation District
HOT Lane	High Occupancy Toll Lane
HOV Lane	High Occupancy Vehicle Lane
ITIP	Interregional Transportation Improvement Program
ITS	Intelligent Transportation Systems
JARC	Job Access and Reverse Commute Program
LOS	Level of Service
MCBC	Marin County Bicycle Coalition
MPO	Metropolitan Planning Organization
MPWA	Marin Public Works Association
MT	Marin Transit
MTC	Metropolitan Transportation Commission

Project Status Report

ACRONYMS AND ABBREVIATIONS

MTS	Metropolitan Transportation System
NEPA	National Environmental Policy Act
NOP	Notice of Preparation
NTPP	Non-motorized Transportation Pilot Program
OBAG	One Bay Area Grant
PA&ED	Project Approval & Environmental Document
PCA	Priority Conservation Area
PCI	Pavement Condition Index
PDA	Priority Development Area
PS&E	Plans, Specifications and Engineers Estimates
PSR	Project Study Report
RHNA	Regional Housing Needs Allocation
RM 2	Regional Measure 2
ROW	Right of Way
ROW CAP	Right of Way Capital
RTIP	Regional Transportation Improvement Plan
RTP	Regional Transportation Plan
SAFETEA-LU	Safe Accountable Flexible Efficient Transportation Equity Act: A Legacy for Users
SCS	Sustainable Communities Strategy
SLPP	State Local Partnership Program
SMART	Sonoma Marin Area Rail Transit
SR2S	Safe Routes to School
STA	State Transit Assistance
STIP	State Transportation Improvement Program
STIP-IIP	Interregional Transportation Improvement Program
STIP-RIP	Regional Transportation Improvement Program
STP	Surface Transportation Program
TBD	To Be Determined
TCRP	Traffic Congestion Relief Program
TEA-21	Transportation Equity Act for the 21 st Century
TIP	Federal Transportation Improvement Program
VRF	Vehicle Registration Fee



TAM Project Update

Administration, Projects and Planning Executive Committee

February 8, 2021

TAM Project Update

- Marin Sonoma Narrows
 - ✓ RM 3 funding progress, SB 1 SCCP Fund Award
- State Route 37
 - ✓ Segment A and B planning and environmental clearance
- North-South Greenway Gap Closure
 - ✓ Northern Segment construction underway
- Improvements to Highway 101 Interchanges
 - ✓ Studies underway

TAM Project Update

- Northbound US 101 to Eastbound I-580
Direct Connector
 - ✓ Major update
- Bellam Blvd Off-Ramp from US 101
 - ✓ Major Update
- Marin County Bus on Shoulder Feasibility
Study
 - ✓ Major update
- Alternative Fuels Program

Measure AA Funded Interchange Studies

Scope:

- Prepare a High-Level Study for Twelve Interchanges on Highway 101
- Evaluate and Propose Operational and Safety Improvements for All Users

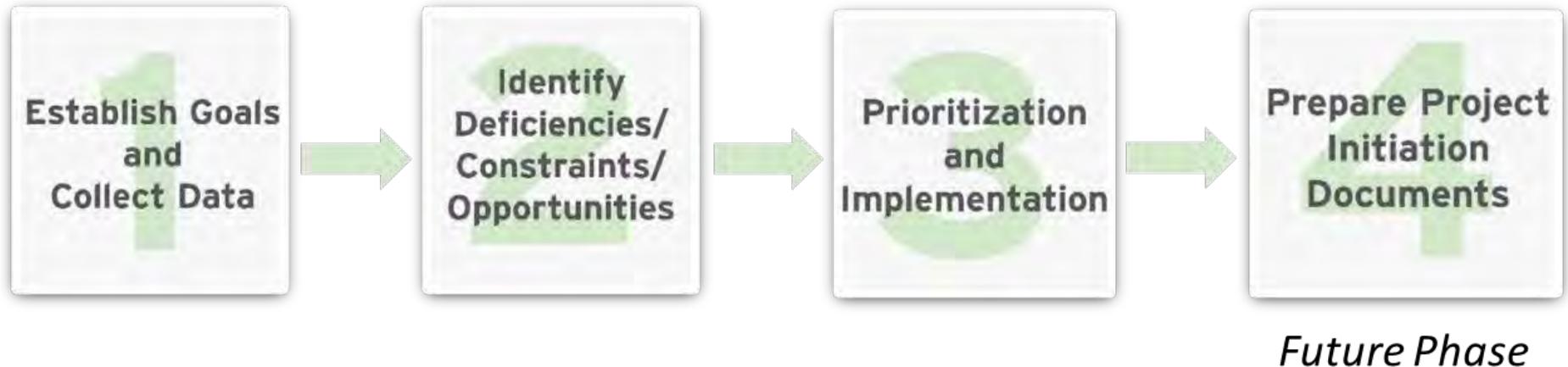
Milestones:

- Prepare Existing Conditions, Constraints and Opportunities Memorandum - 2020/2021
- Select Interchanges for a more in-depth Study (PID)



Measure AA Funded Interchange Studies

Study Process



Measure AA Funded Interchange Studies

Proposed Goals and Objectives

- Goal 1: Enhance Health and Safety
- Goal 2: Relieve Local Traffic Congestion
- Goal 3: Improve Multimodal Access to/from and across Highway 101
- Goal 4: Promote Economic Vitality
- Goal 5: Implementability

Measure AA Funded Interchange Studies

Selected 12 Interchanges

- Alexander Avenue
- Sausalito/Marin City
- Tiburon Blvd./East Blithedale Avenue
- Paradise Drive/Tamalpais Drive
- Sir Francis Drake Boulevard
- San Rafael On-Ramp at 2nd Street and Hetherton Avenue
- Merrydale Road/North San Pedro Road
- Manuel T. Freitas Parkway
- Lucas Valley Road/Smith Ranch Road
- Ignacio Boulevard
- Alameda Del Prado
- San Marin Drive/Atherton Avenue



Measure AA Funded Interchange Studies

Tamalpais Drive/Paradise Drive

Multimodal Infrastructure LEGEND



- Study Boundary
- Traffic Signal
- Golden Gate Transit Bus Stop
- Marin Transit Bus Stop
- Class I Path
- Class II Bike Lane
- Sidewalk
- Sidewalk Under Freeway



Measure AA Funded Interchange Studies

Tamalpais Drive/Paradise Drive

Crash Type



LEGEND

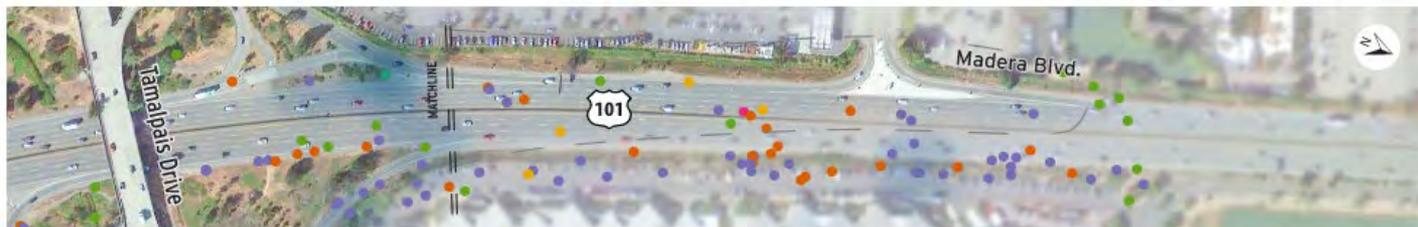
[- - -] Study Boundary

Type of Crash

- Head-On
- Side Swipe
- Rear End
- Broadside
- Hit Object
- Other

Pedestrian & Bicycle Involvement

- Involving Pedestrian
- Involving Bicycle



Measure AA Funded Interchange Studies

Tamalpais Drive/Paradise Drive

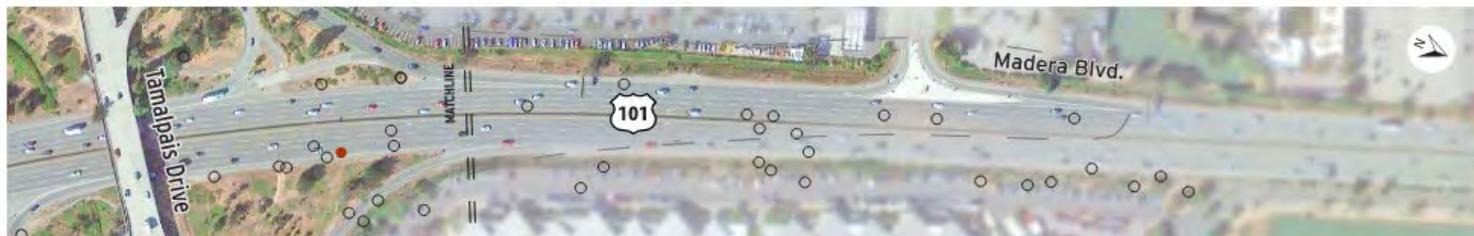
Crash Severity

LEGEND

 Study Boundary

Crash Severity
 Minor Injury
 Severe Injury
 Fatality

Pedestrian & Bicycle Involvement
 Involving Pedestrian
 Involving Bicycle



Measure AA Funded Interchange Studies

Tamalpais Drive/Paradise Drive

Transit Ridership

LEGEND

[- - -] Study Boundary

 Golden Gate Transit Bus Stop
 Marin Transit Bus Stop

 Class I Path
 Class II Bike Lane

 Sidewalk
 Sidewalk Under Freeway

Onboardings  Offboardings



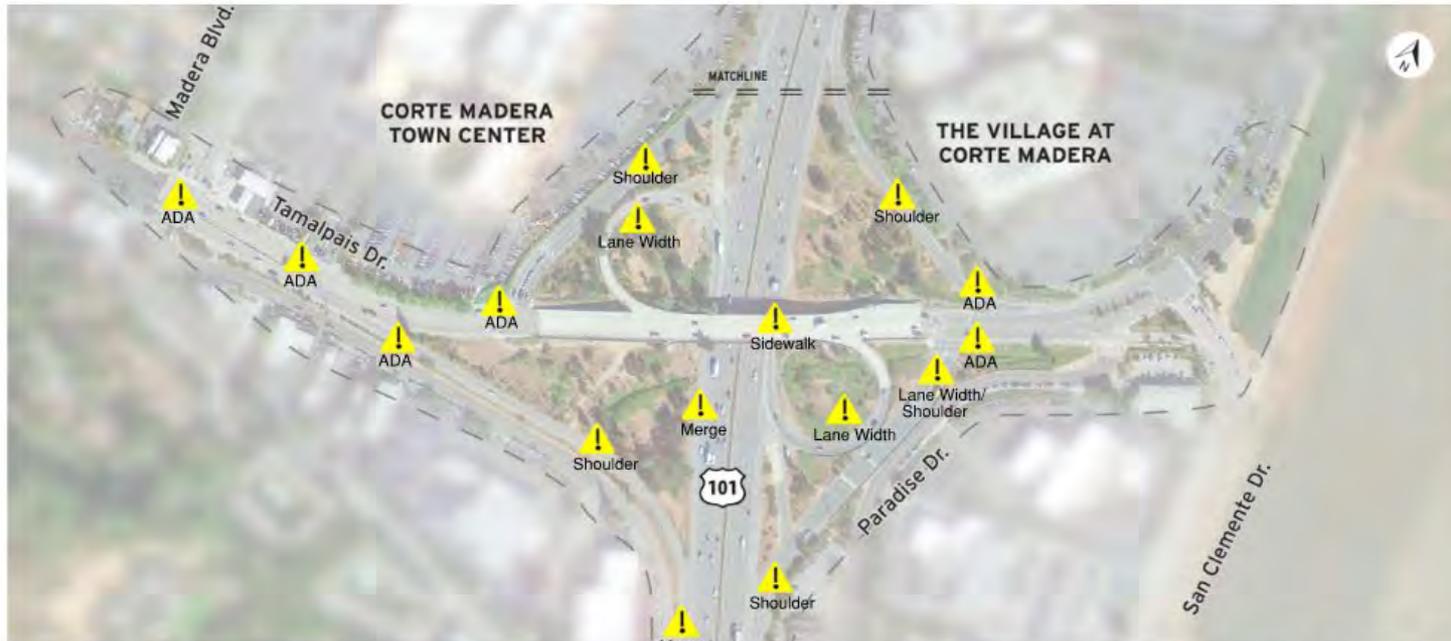
Measure AA Funded Interchange Studies



Tamalpais Drive/Paradise Drive

Nonstandard Design Features

Highlights



- Substandard truck lane width on ramps
- Substandard sidewalk width
- Substandard weaving between exit and on-ramp
- Substandard merge at on-ramps
- Substandard lane and shoulder widths at on- and off-ramps
- Substandard distance between successive NB on-ramps
- Striping on Tamalpais Drive poorly defined
- Existing curb ramps not meeting current ADA standards

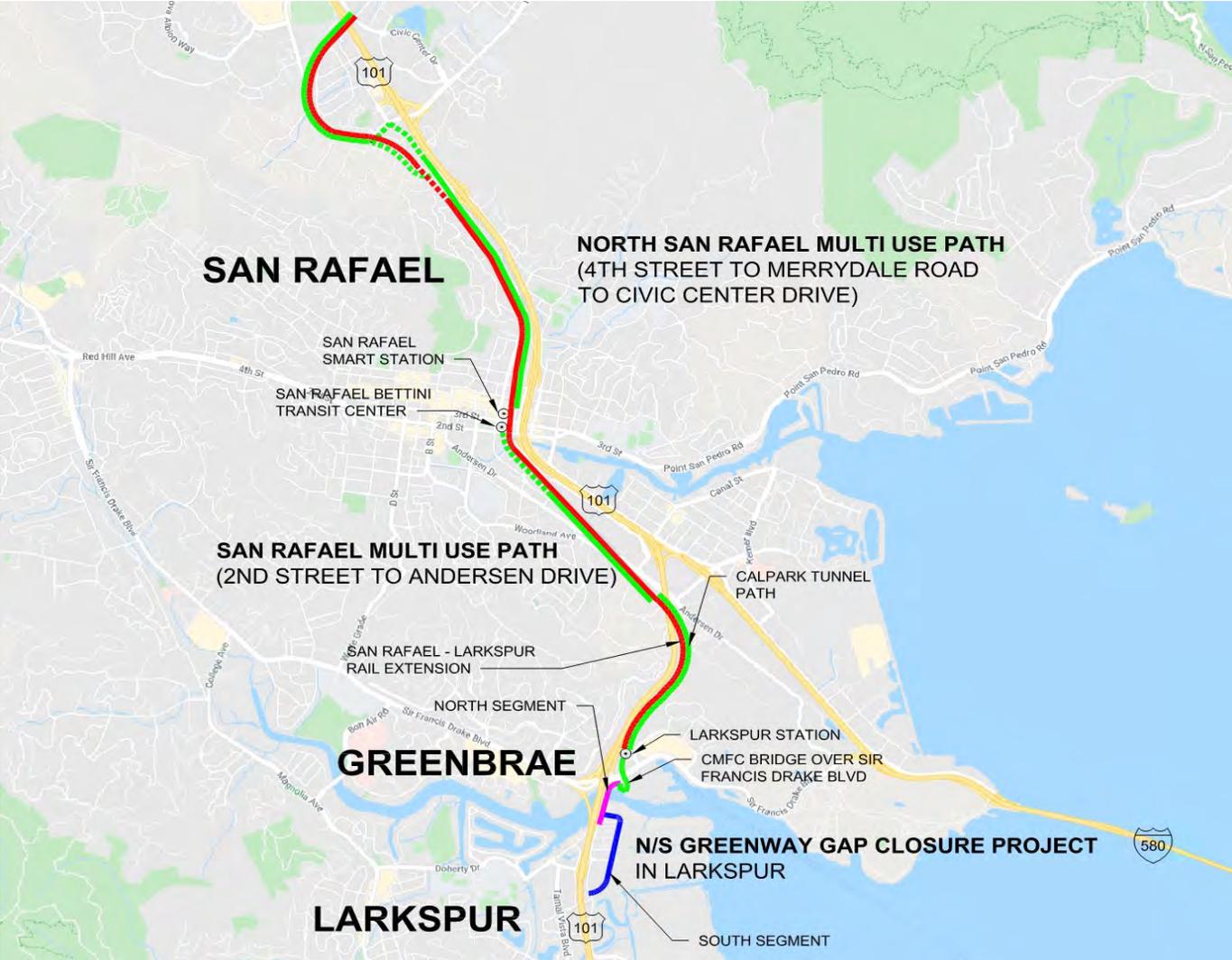


LEGEND

- Study Boundary
- Nonstandard Design Feature



North South Greenway – Central Marin



North South Greenway – Northern Segment



Marin 101-580 Direct Connector

Initial Alternatives Considered

NB US 101 to EB I-580 Direct Connector Project



Low Speed Option (Alt 3A)



Marin 101-580 Direct Connector Update

- AdHoc Meeting – November 2020
- Executive Steering Committee – September 2020
- TAC Meeting – October 2020
- Stakeholder Working Group Meeting – January 2021
- Other Stakeholder Meetings
- Seven Current Alternatives
- Five Additional Alternatives being Prepared
- Equity Discussions

Marin 101-580 Direct Connector Timeline

Phase	Begin	Complete
Planning	2020	Mid 2022
Environmental Doc and Alternative Selection	Late 2021	Late 2024
Design and Right of Way	Late 2023	Early 2026
Construction	Mid 2026	Early 2029

Bellam Blvd Off-Ramp Improvements



Bellam Blvd. Project History

- Preliminary Engineering – Fall 2015
- Board Funding Approval - July 2016
- Approved Environmental Document - July 2018
- Cooperative agreement signed with Marin County – October 2018
- Caltrans approval expected Spring 2021

Bellam Blvd. Recent Developments

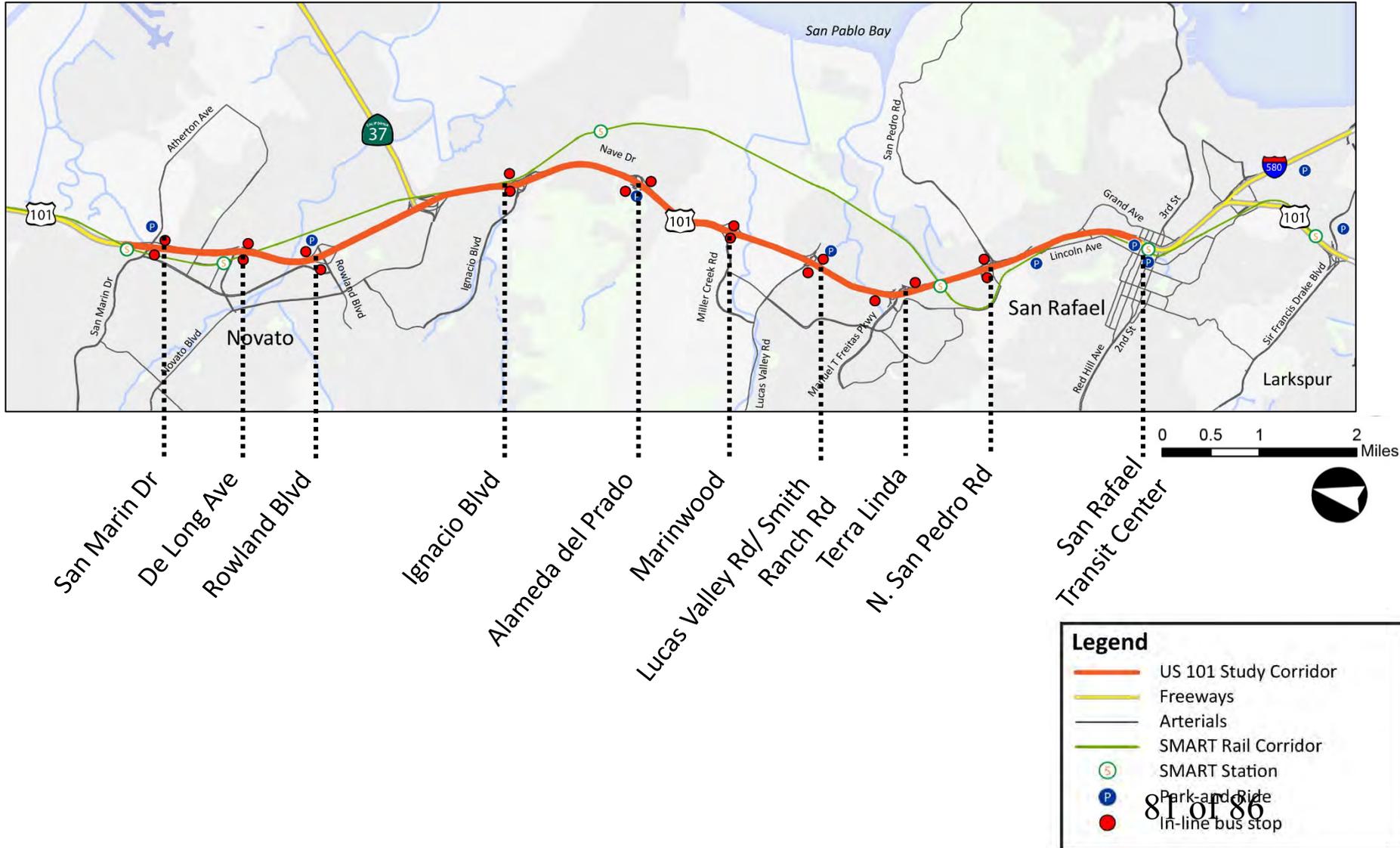
- Bay Mud found on Site
- Redesign of Project Retaining Wall and Roadway Section required
- Aerially Deposited Lead plan requires revision
- Project has approximately \$4 million shortfall
- TAM Board approved \$1.7 million in LPP Formulaic funds in Spring 2020

US 101 Part Time Transit Lanes Feasibility Study

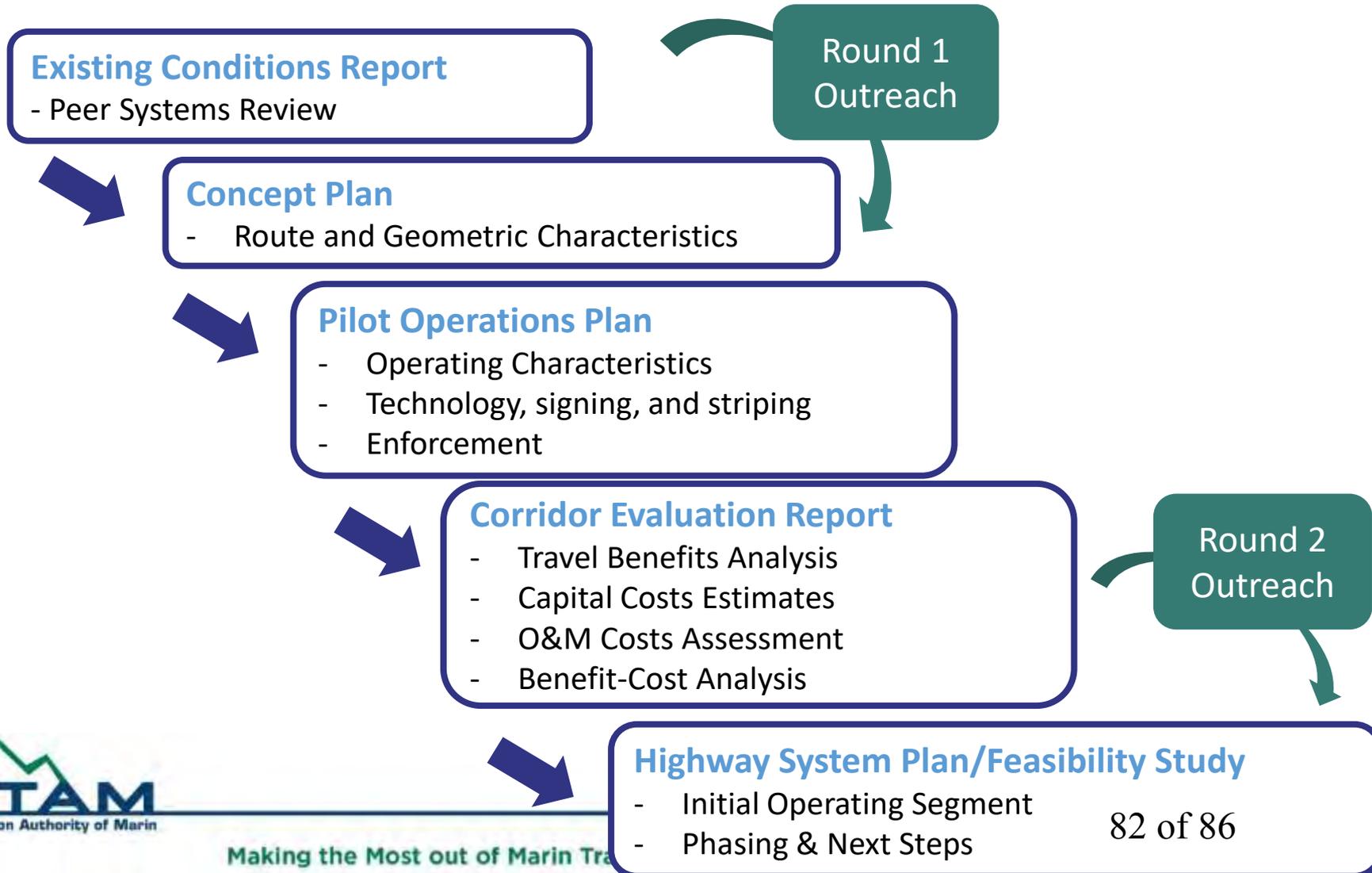
- Caltrans Planning Grant \$308,000
- Partners Include:
 - Transit Operators, MTC, CHP, County of Marin, San Rafael & Novato, Caltrans
- Assess part-time transit lanes on US-101 in northern Marin County
 - Determine suitability of shoulders, slip lanes, and auxiliary lanes for bus use
 - Develop concept plans
 - Evaluate travel benefits
 - Determine next steps for implementation and assess relationship to other ongoing US-101 projects



Part Time Transit Lane Study Area



Tasks & Deliverables



Capital Improvements Summary

- Limited shoulder widening in some segments (one of the following)
 - Restripe to narrow inside shoulder by up to 2'
 - Restripe to narrow general purpose lane by up to 1'
 - Widen shoulder (where no ROW or significant grading needed)
- Static signage and markings
- CHP pullouts
- Drop inlet grate (drainage) modifications



Alternative Fuel Program

- First Report: October 2020 Program Update
- MGSA Approval of Funding Agreement for MCEP EV Readiness Plan
- CalEVIP Funding – Paused until Late 2021
- EV Fleet Replacements
 - 1 Chevy Bolt ZEV Purchased (Belv.)
- EV Charging Stations
 - 117 San Rafael City Schools
 - 32 Heads at College of Marin
- Outreach & Technical Assistance
 - Resources launched
 - Equity discussions with County Staff
 - Clean Cars for All (BAAQMD) Reduced Funds





Questions and Discussion