

City of Woodland Comprehensive Safety Action Plan

Scope of Services

Fehr & Peers will work with City of Woodland staff and our subconsultants, Mark Thomas and AIM Consulting, to complete the following scope of work to develop a Comprehensive Safety Action Plan (CSAP) for the City of Woodland. The vision, goals, and strategies for this plan are based upon the Safe System approach, which incorporates five elements of a safe transportation system: safe road users, safe vehicles, safe speeds, safe roads, and post-crash care. The CSAP is intended to meet the USDOT's eligibility requirements for Safe Streets and Roads for All (SS4A) implementation funds, meet the guidelines for Caltrans' Highway Safety Improvement Program (HSIP) funds, and identify implementable projects and actionable strategies City staff can advance with a focus on the Main Street/SR-113/I-5 interchanges and ramp intersections.

Task 1. Project Management

Purpose: Solidify common understanding and expectations for the work plan, deliverables, and schedule. Conduct regular check-in meetings with project team to remain in alignment throughout the development of the Woodland CSAP.

Task 1.1 Kick-Off Meeting

Fehr & Peers will facilitate a kick-off meeting to confirm the project goals, tasks, timeline, and expectations. In advance of the kick-off meeting, we will prepare a draft data request list and work with the City of Woodland project manager to confirm attendees and materials for the meeting.

Task 1.2 Monthly Meetings

Fehr & Peers is committed to regular, ongoing communication with the City to facilitate smooth project delivery. For the duration of the project, we will provide monthly invoices and progress reports. We also will facilitate virtual 1-hour meetings on a monthly basis (or other appropriate period) with the City to provide regular opportunities to discuss the project, monitor project progress, prepare for upcoming tasks, debrief on completed tasks, and address issues to ensure plan development remains on schedule and within budget. Fehr & Peers will provide meeting agendas and notes for the progress meetings. We are open to having some of those meetings in-person if desired by City staff.

Task 1 Deliverables

- Monthly invoices and progress notes
- Kick-off meeting summary
- Monthly meeting agendas and minutes

Task 2. Develop Vision Zero Policies

Purpose: Evaluate safety-related progress and practices in the City of Woodland. Establish a Vision Zero goal.

Task 2.1 Current Practices & Progress

Our team has organized this subtask into two core activities. The first is to document progress made since adoption of the 2023 *Woodland Local Road Safety Plan (LRSP)*, and the City's 2024 *Active Transportation Plan (ATP)*; and the second is to benchmark existing policies, plans, guidelines, and/or standards in those plans and other documents, such as the 2021 *Engineering Standards*, to identify opportunities to institutionalize safety.

TRACKING PROGRESS

Fehr & Peers will work with City staff to document the progress made in implementing recommendations from the City's LRSP and ATP. A 'brag sheet' will be created to show the safety infrastructure improvements that the City has implemented in the past few years. We will also review the City's Capital Improvement Program (CIP) to identify upcoming projects intended to address safety.

BENCHMARKING ASSESSMENT & RECOMMENDATIONS

Physical infrastructure is only one piece of the safety puzzle. Ensuring that local codes, programs, and policies prioritize safety is equally critical to improving safety systemically throughout Woodland.

In recent work on other Safety Action Plans, Fehr & Peers developed a Safe System benchmarking assessment tool. The tool consolidates common policies and processes at a local level and then identifies how those can be enhanced to integrate the Safe System approach. It includes federal and state policies that have been either recently established and/or updated. For example, it includes considerations for AB 413 which prohibits parking within 20 feet of marked and unmarked crosswalks. It also includes speed limit setting practices consistent with AB 43 as reflected in the most recent *California Manual on Uniform Traffic Control Devices (CA MUTCD 2014, Revision 8)*.

We will apply the Safe System benchmarking tool to the City's existing policies, plans, guidelines, and/or standards related to transportation planning, funding, and design. As part of conducting the assessment, we will meet with City staff to confirm our understanding of how such resources are applied and any common but less documented practices. We will provide a written draft version of the assessment and related recommendations.

Task 2.2 Task Force Work Session

To ensure adoption beyond the initial champions and to meet SS4A requirements, a team of key stakeholders, elected officials, and City staff should help steer and develop the Vision Zero policy and implementation approach. We recommend using the same Task Force that helped develop the City's LRSP in 2022, which included the following:

- City Council Infrastructure Subcommittee
- Public Works Department staff
- Community Development Department staff
- Woodland Police Department community relations commander

- Woodland Fire Department chief
- Representatives from Bike Campaign and Outta Sight (advocates for the visually impaired).

Fehr & Peers will meet with the Task Force to review the draft benchmarking assessment and determine which implementation steps the City will follow to institutionalize Vision Zero. The Vision Zero policies will include the following components, as required by SS4A:

- Commitment language in the plan, including a target year for eliminating fatal and severe injuries.
- City Council resolution formalizing the commitment and directing staff to take action to implement the Safe System Approach.
- An accompanying staff report clarifying the changes caused by the policy (in line with the findings from the benchmarking assessment) and an accountability plan to monitor progress and adherence.

Task 2 Deliverables

- Benchmarking assessment review table and recommendations memorandum
- Draft and Final Vision Zero policy language
- Draft presentation slides for Task Force meeting

Task 3. Data Collection & Analysis

Purpose: Establish a baseline understanding of road safety performance across the City. Identify crash profiles and priority Safety Corridors (consistent with CA MUTCD definition of “Safety Corridors”) informed by a holistic database inclusive of crash data, operational characteristics, roadway characteristics, land use data, and socio-demographic data. Identify safety countermeasures and multimodal improvements at interface of East Main Street/I-5/SR 113.

Task 3.1 Review Existing Collision Data

Fehr & Peers will review existing collision data and work with City staff to supplement that collision data with contextual data, socio-demographic data, as well as potential innovative data sources.

COLLISION DATABASE DEVELOPMENT

The LRSP used collision data from 2009 to 2020, which largely reflects pre-pandemic conditions. Fehr & Peers will analyze the most recent years of data (at least 5 years is best practice—i.e., 2020 to 2024). This collision data should reflect the most recent travel and collision trends, as well as the infrastructure upgrades that have already been made in the City. Data will be extracted from the California Highway Patrol’s *California Crash Reporting System* (CCRS) and the City’s *Crossroads* collision database and validated for accuracy. The new collision data will be merged with the collision dataset developed for the LRSP to create a comprehensive collision dataset. Comparative analysis will be performed to identify any major changes in collision data trends, such as in different hotspot locations or primary collision factors.

CONTEXTUAL DATABASE DEVELOPMENT

Fehr & Peers will use data provided by the City, supplemented by publicly available data, to enhance the collision database with contextual characteristics. We will identify roadway and land use variables,

many of which were collected during the previous LRSP and ATP, that can provide a broader perspective on factors influencing collision patterns. Specific potential data attributes include intersection controls, crossing types, sidewalk gaps, bike facility types, bike facility gaps, transit stops, posted speeds, streetlights, functional classifications, number of vehicle travel lanes, schools, parks, healthcare, and community centers. Discussions with City staff will help identify other relevant and available contextual data to include in the database, for example recent speed survey data.

The data analysis will also include an investigation of how collisions impact groups differently. Fehr & Peers will work with the City to define specific populations and/or geographies—for example youth, seniors, low-income communities—and assess to what extent these vulnerable groups experience a disproportionate burden in traffic collisions.

Innovative data sources provide additional options for developing a deeper understanding of contextual factors. As part of this task, Fehr & Peers will evaluate Urban SDK data (purchased by the City) to enhance the overall safety analysis. Urban SDK data provides information to estimate average travel speeds and volumes on roadways across the City.

Task 3.2 Data Analysis and Findings

Using the updated database from Task 3.1, Fehr & Peers will update crash profiles developed for the City's LRSP and develop a priority Safety Corridor network.

COLLISION LANDSCAPE

Fehr & Peers will provide a visual summary of the collision landscape in the City of Woodland by building on maps and figures developed for the City's LRSP. The maps and figures will display key patterns in the collision data by mode, severity, and crash type over time. Crash data from locations where safety improvements have been recently implemented will be reviewed to determine if changes in collision rate or type are observable.

Consistent with FHWA Systemic Safety Approach, we will pair collision data with contextual factors and socio-demographic data to develop a systemic analysis matrix and identify top crash types and top systemic risk factors that capture the most common and most severe collision patterns and contexts in Woodland. This work will include considering the extent to which youth, seniors, people of color, and other vulnerable groups are reflected in the collision profiles and potential for disproportionate burden of traffic collisions for those vulnerable populations. We will present the findings from the analysis through charts, tables, maps and graphics to communicate the outcome visually and in a manner that facilitates taking action to address the top crash profiles.

PRIORITY SAFETY CORRIDORS

Fehr & Peers will develop priority Safety Corridor network using the data collected in Task 3.1. We will use weighting criteria and methodology consistent with the "Safety Corridor" definition in the CA MUTCD 2014, Revision 8 (Effective January 11, 2024). As part of this analysis, we will overlay the updated corridor profiles with various equity measures at the federal, state, and regional levels. Similar to the analysis as part of the collision landscape, this will also help describe the extents to which vulnerable or disadvantaged populations experience a disproportionate burden due to traffic violence.

A draft analysis of the collision landscape, collision profiles, and Safety Corridors will be presented to the City for review. We have assumed one round of review and collaboration. Fehr & Peers will document and incorporate all City staff comments prior to community input.

Task 3.3 Focused Analysis of East Main Street/I-5/SR 113 Interface

The City of Woodland is currently coordinating with Caltrans and local regional partners to identify improvements to address major collision hotspots at the interfaces of the State-maintained highways and freeways with local roadways within the City. Various safety efforts have identified the interface between I-5, SR 113, and East Main Street as one of the greatest traffic safety concerns within the City of Woodland. Therefore, one of the focused elements of this CSAP is to identify future year safety countermeasures and multimodal improvements at this location. Fehr & Peers will coordinate with City staff regarding future efforts to address safety concerns at this location, including the I-5/SR 113 Freeway Connector project, which would eliminate the need that currently exists for certain freeway-to-freeway movements to exit on and utilize East Main Street.

EXISTING CONDITIONS

Fehr & Peers will collect midweek AM (6 to 9) and PM (3 to 6) peak period traffic counts (including vehicles, bicyclists, pedestrians, and trucks) at the following six signalized intersections on East Main Street on a single weekday.

1. East Main Street/Matmor Road
2. East Main Street/SR 113 Southbound Ramps
3. East Main Street/SR 113 Northbound Ramps
4. East Main Street/Pioneer Road/I-5 Southbound On-Ramp
5. East Main Street/I-5 Northbound Off-Ramp
6. East Main Street/Hazel Court

Fehr & Peers will conduct a site visit on the days of the counts to observe travel behavior at the study intersections and to observe queuing for critical turn movements. We will also confirm posted speed limits and lane configurations, and record other relevant roadway and land use conditions. We will request traffic signal timing data for the six study intersections from the City.

In addition to the traffic counts, we will collect maximum vehicle queues in 15-minute increments at the three freeway off-ramps in the study area. This data collection is necessary for microsimulation calibration purposes and to evaluate the operational and safety effects of countermeasures on freeway off-ramp queues.

Fehr & Peers will use the East Main Street SimTraffic microsimulation network developed for the Woodland Research and Technology Park traffic study as a starting point. SimTraffic is appropriate for this analysis (instead of the deterministic Synchro program) because it provides more robust analysis of queuing interactions at and between intersections. We will update the model and validate against observed vehicle queues and also include heavy vehicle percentages and conflicting pedestrians/bicyclists as measured.

Mark Thomas will develop a base map using aerial imagery. The base map will include the aerial photo and AutoCAD line work that includes curb lines, ADA ramps, existing striping, and features that may control the project designs at the intersections and intervening roadway segments at I-5, SR 113, and East Main Street. The base map will be compared to City provided as-builts to confirm existing street dimensions. Existing right of way will be depicted using available City GIS maps in AutoCAD

format. Site visits by Mark Thomas staff will be conducted on one day to observe existing conditions and prepare updates to existing base mapping as necessary.

This task does not include conducting topographic surveys or detailed right of way research or mapping. These items may be provided if requested for additional scope and budget to be determined.

CUMULATIVE YEAR CONDITIONS

Fehr & Peers will coordinate with Caltrans, the City of Woodland, and Mark Thomas to identify published cumulative year turning movement traffic forecasts for the study intersections, including forecasts with and without construction of the I-5/SR 113 Freeway Connector project. If such estimates are unavailable, we will use the latest version of the City's travel demand forecasting (TDF) model to develop turning movement traffic forecasts using the "difference method" forecasting procedure.

Fehr & Peers will then analyze cumulative year "no project" weekday AM and PM peak hours consistent with the *Highway Capacity Manual, 7th Edition* (Transportation Research Board, 2022). We will report intersection level of service (LOS) and maximum vehicle queues at the study intersections, including the freeway off-ramps queues. This scope of services excludes any freeway segment analysis.

The project team will analyze a single project alternative at the intersections and intervening roadway segments at I-5, SR 113, and East Main Street, based on cost; vehicle, pedestrian and bicyclist safety; accessibility; utility and right of way impacts; and consistency with adjacent construction projects to obtain City consensus on the configuration and extent of the project. This analysis will include review of design features such as vehicle and bicycle lane widths, gaps in existing sidewalks and bike facilities, potential buffers, intersection modifications, street maintenance, and access to adjacent land uses. If applicable, Fehr & Peers will use the SimTraffic microsimulation model developed for existing conditions to test the alternative, which may include signal timing operations changes, restriping, roadway modifications, and/or new infrastructure affecting intersection operations.

The result of this process will be development of a single strip map design for each roadway segment with conceptual roadway cross sections and intersection improvement details. The strip map will be provided to the City for discussion. This will allow the project team to "screen" the potential options for the safety improvements, and advance the alternative that is most feasible and has City support.

Mark Thomas will prepare a single preliminary cost estimate based on the plan produced. Construction costs will be developed using current bid results from similar projects, Caltrans database information, and Caltrans' latest *Construction Cost Manual*.

Mark Thomas will work with Fehr & Peers to prepare graphics to be included in the appendix of the report. The graphics will include cross sections, labeled dimensions, and colors to represent the project alternative.

Based on the screened/final alternative, Fehr & Peers will re-analyze the weekday AM and PM peak hours consistent with the *Highway Capacity Manual, 7th Edition* (Transportation Research Board, 2022). We will report intersection level of service (LOS) and maximum vehicle queues at the study intersections, including the freeway off-ramps queues. We will use the latest version of the City's TDF

model to determine the cumulative year effect of constructing the SR 113/I-5 Freeway Connector project and to develop turning movement traffic forecasts.

Task 3 Deliverables

- Draft and Final collision landscape analysis and crash profile identification
- Draft and Final Safety Corridor analysis
- Conceptual plans and preliminary cost estimate for the interface of East Main Street/I-5/SR 113

Task 4. Community Engagement

Purpose: Conduct comprehensive and equitable community engagement to develop a federally-compliant CSAP, including both public and private sector stakeholders and community groups in an inclusive and representative process. Building community support for the policy and related recommendations is vital for ensuring ongoing support for implementation.

Task 4.1 Community Engagement Plan

Fehr & Peers will work with our subconsultant, AIM Consulting, to lead the community and stakeholder engagement program for the CSAP. The engagement process will ensure that residents, schools, advocacy groups, and organizations are meaningfully involved in developing a plan that reflects local priorities and lived experiences.

Engagement will focus on youth and families in disadvantaged neighborhoods, consistent with the City's grant objective to improve safety outcomes for young walkers and bicyclists. Woodland's unique community context—where over half of local schools have student populations with 75% or more qualifying for free and reduced lunch—will shape the project team's targeted, inclusive outreach.

The project team will develop a Community Engagement Plan (CEP) that defines objectives, audiences, and methods for all outreach activities throughout the CSAP process. The CEP will align with project milestones and the technical work led by Fehr & Peers and City staff. The Plan will:

- Define engagement goals, key messages, and evaluation metrics.
- Identify stakeholder groups, including residents, youth, schools, advocacy partners, and underrepresented communities.
- Establish bilingual (English/Spanish) and ADA-compliant engagement protocols.
- Outline communication roles and coordination across agencies and consultants.
- Align engagement with the project's technical phases.

Task 4.2 Stakeholder Database and Coordination

The project team will develop and maintain a Stakeholder and Partner Database to organize and track all outreach contacts, communications, and participation. Key Actions will include the following:

- Identify and verify contacts for schools, PTAs, Safe Routes to School, advocacy groups, and local businesses.
- Maintain an up-to-date contact list for community-based organizations, neighborhood associations, and advocacy groups.
- Coordinate invitations, meeting logistics, RSVPs, and follow-up communications.

- Track engagement participation through sign-in sheets, comment logs, and event metrics.

Task 4.3 Community Engagement Activities

The project team will design and facilitate interactive and inclusive engagement activities that gather local input, validate findings, and refine strategies throughout the CSAP process. Engagement will build upon efforts undertaken and feedback received from previous studies in the City of Woodland. The purpose of the activities is to present and discuss proposed strategies, countermeasures, and preliminary priority corridors. Also, it is to solicit feedback on which areas and solutions should be prioritized. Key Activities include the following:

- In-Person or Virtual Workshop (1): Opportunity to gather with the public to discuss proposed strategies and countermeasures.
- Stakeholder Focus Groups (up to 3): With parents, students, school leaders, and advocacy organizations to review proposed strategies.
- Pop-Up Feedback Events (2): At community hubs and school campuses to showcase potential corridor improvements.
- Community Survey: Bilingual follow-up survey to gather input on corridor and project prioritization.

Task 4.4 Public Awareness, Communications, Equity and Inclusion

The project team will lead a bilingual Public Information and Awareness Campaign to promote the CSAP process, highlight safety data, and encourage participation throughout all phases. Tactics will include:

- Bilingual flyers and newsletters are distributed through schools and community partners.
- Social media toolkit with graphics and sample posts for City and partner use.
- Press release and website content to promote events and survey opportunities.

AIM Consulting will ensure equitable representation throughout the engagement process, emphasizing youth and disadvantaged neighborhoods. Actions will include:

- Partnering with local CBOs (e.g., La Familia, Yolo County Children’s Alliance, churches, and advocacy groups).
- Conducting outreach in rural or lower-income areas and ensuring events are accessible by transit.
- Providing bilingual facilitation and translation at all events.
- Summarizing participation findings and equity recommendations for future implementation.

Task 4 Deliverables

- Draft and Final CEP
- Stakeholder Database
- Event materials (flyers, comment cards, sign-ins, etc.)
- Summary memorandum
- Bilingual fact sheet and flyers
- Social media toolkit
- Press release and web copy

Task 5. Update Countermeasures

Purpose: Update the corridor-specific countermeasures from the LRSP and ATP. Identify engineering and programmatic countermeasures that align with the collision profiles and integrate Safe System Approach—equipping the City with meaningful strategies to eliminate traffic fatalities and severe injuries.

Task 5.1 Corridor-Specific Countermeasures

The LRSP and ATP identified potential safety countermeasures for specific corridors in the City of Woodland. For each of the priority Safety Corridors identified in Task 3, Fehr & Peers will review the countermeasures identified in the LRSP and ATP in the context of the updated collision analyses and public engagement conducted in Tasks 2 through 4. We will revise or refine the countermeasures as appropriate.

Task 5.2 Safety Countermeasures

The CSAP is intended to provide an opportunity for the City to review existing policies, design standards, and practices to enhance safety and minimize systemic safety concerns. In recent work on other Safety Action Plans, Fehr & Peers developed engineering and programmatic (non-engineering) countermeasure toolboxes. These toolboxes draw on best practice information from FHWA and institutionalizing the Safe System Approach, as well as from NHTSA Countermeasures that Work. Fehr & Peers will work closely with City staff to identify countermeasures (up to 10) that could be used systematically by staff to address the crash profiles identified in Tasks 2 and 3.

Both the corridor-specific countermeasures and the safety countermeasures will be presented to City staff for review. Fehr & Peers will document and incorporate all comments from City staff prior to community input.

TASK 5 DELIVERABLES

- Review of LRSP corridor recommendations
- Safety countermeasure pairing to crash profiles

Task 6. Prioritization

Purpose: Create priorities and aligned actions based on the engagement and technical analysis in Tasks 3 and 4, and the countermeasures developed in Task 5. This is a necessary activity to be consistent with SS4A criteria for a CSAP.

Task 6.1 Define Prioritization Approach

Fehr & Peers will work with the Task Force to develop a set of criteria that will help identify, evaluate, and prioritize projects within the priority Safety Corridors. The Task Force will identify a means for prioritizing both infrastructure improvements and non-infrastructure safety strategies relative to one another to both meet CSAP requirements as well as support City staff in implementation activities. The criteria will prioritize findings from Task 3, while considering factors such as the following:

- Frequency and severity of collisions
- Future potential for collisions (based on systemic safety analysis)
- Efficacy of the project (crash modification factor)

- Presence of vulnerable or underserved communities
- Proximity to key destinations
- Task Force and community input
- Right-of-Way allocation and utility conflicts
- Discretionary approvals
- Cost
- Need for and availability of outside grants

The Task Force will develop qualitative scoring criteria, weighing and combining the above factors.

Task 6.2 Identify and Prioritize Actions

Fehr & Peers will identify specific actions related to advancing the recommendations identified as an outcome of the previous tasks. Using the prioritization approach defined in Task 6.1, those actions would be prioritized or organized in a framework that would support City staff in implementation activities.

Task 6 Deliverables:

- Draft and Final Prioritization Approach
- Draft and Final Prioritized Actions

Task 7. Draft and Final Action Plan

Purpose: Prepare a final action plan that acknowledges progress made and clearly identifies priorities and actions needed for reaching the City’s goals.

Task 7.1 Administrative Draft Action Plan

Based on the outcomes of previous tasks, the project team will develop an Administrative Draft Action Plan for review by City staff. The plan will include maps, tables, images, and text based on the deliverables from Tasks 1 through 6. The plan will be focused on key needs, messages, and deliverables for use by City staff, elected officials, and the public. Supporting data will be provided in appendices.

Task 7.2 Public Draft Action Plan

Based on the comments received on the Administrative Draft Action Plan, the project team will develop a Public Draft Action Plan. This draft, along with public-facing executive summaries provided in English and Spanish, will be presented to the stakeholder community for review and comment.

Task 7.3 Final Draft Action Plan

The project team will incorporate comments received during the public review of the Public Draft Action Plan and prepare the Final Draft Action Plan. This plan will be taken to Council for approval.

Task 7.4 Final Action Plan for Adoption at City Council

Once adopted by City Council, the Action Plan will be finalized and the consultant team will provide a final draft and source files to the City. Additionally, a progress tracking spreadsheet and/or reporting template will be provided to encourage collection and recording of safety metrics. To be eligible for

SS4A implementation grant funds, USDOT requires annual public and accessible reporting on progress toward reducing fatalities and serious injuries.

Task 7 Deliverables

- Administrative Draft Action Plan
- Public Draft Action Plan
- Public-facing Executive Summary provided in English and Spanish
- Final Draft Action Plan
- Final Adopted Action Plan with source files
- Progress tracking spreadsheet tool and/or reporting template