

Alameda Central Avenue Complete Street Project Scope of Work – PID Phase

1. Project Management

The scope outlined below for Project Management will cover activities through the Project Initiation Phase. Scope for tasks, as needed, will be added or expanded for the future optional tasks. The subtasks described below will allow CDM Smith (CONSULTANT) to 1) measure contract conformance, 2) manage risks, changes and quality, 3) lead the CONSULTANT team, 4) communicate with the City of Alameda (CITY), and 5) successfully deliver the requirements of this scope of work.

1.1 Project Management Plan (PMP)

CDM Smith (CONSULTANT) will update and maintain a PMP that will include a project risk register and a project schedule. The risk register will identify potential risks and delineate the actions needed to mitigate the risks. The PMP will be reviewed at the monthly coordination meetings and updated accordingly.

Deliverable(s):

1. Project Schedule (electronic P6 and PDF).
2. PMP (electronic PDF or DOCX).

1.2 Monthly Progress Reports and Invoices

The CONSULTANT will submit a progress report and invoice each month in a format that is agreed upon by the CITY.

Invoices will be tracked at the task level, including SUBCONSULTANTS.

Progress reports will describe the work accomplished during the billing period, including the status of individual tasks, meetings attended, and action or information needed from the CITY. The progress reports will include a summary of start, finish, and percent complete for deliverable tasks during the billing period, percent complete of overall project elements, tasks performed over the billing period, and anticipated deliverable tasks for the next month. Meetings attended will also be cited. The progress reports will also identify any problems, issues, concerns and project scope, schedule, and budget and impacts and will offer potential solutions for resolving them.

Assumption(s):

Monthly progress reports and invoices will be for the period of April 2018 through March 2019.

Deliverable(s):

1. Monthly progress reports (electronic PDF).

2. Monthly invoices (electronic PDF).

1.3 SUBCONSULTANT Management

1.3.1 Prepare SUBCONSULTANT Agreements

The CONSULTANT will prepare SUBCONSULTANT contract agreements.

1.3.2 Subconsultant Management

The CONSULTANT will manage the SUBCONSULTANTS to ensure accurate and timely implementation of the work plan and the appropriate coordination of work activities, including the review of SUBCONSULTANTS' work on various project elements. This effort is for the overall project rather than a specific task and is intended to provide the leadership that the team will need to understand project interfaces, deadlines, budget constraints, and other issues. This task will focus on managing team resources to achieve project goals in a consistent, coordinated, and orderly manner.

1.3.3 Subconsultant Performance Review

The CONSULTANT will conduct monthly reviews of SUBCONSULTANTS' progress and invoices. The reviews will be used to monitor each SUBCONSULTANTS' performance and identify corrective actions if necessary.

1.4 Administrative Support

1.4.1 Document Control

The CONSULTANT will prepare electronic filing systems for this project and maintain incoming and outgoing documents in accordance with the CITY's document control system. The CONSULTANT will identify CONSULTANT personnel needing access to the CITY's project-specific SharePoint site. The CONSULTANT will post draft and final submittal deliverable documents to this SharePoint site. Posting to the SharePoint site will constitute a submittal of the deliverable. The CONSULTANT will not be responsible for delays caused by failures of the SharePoint site or lack of access to the site. The CONSULTANT will maintain a register of the deliverables, itemizing deliverable description, associated task, firm responsible, number of copies, and date submitted. The register will be updated following each submittal achieved and will be emailed to the CITY's Project Manager and will be posted to the CITY's project-specific SharePoint site.

Deliverable(s):

1. Register of Deliverables

1.5 Quality Management

The major purpose of a quality program is to validate that the checked and reviewed deliverable documents comply with applicable regulatory and design criteria, codes, and standards in a consistent and uniform manner using industry standards and applicable requirements. Quality assurance (QA) and quality control (QC) program requirements

will be included in a Quality Management Plan (QMP). QA provides a framework for consistent work practices, and QC prescribes procedures to ensure quality work practices are executed. The CONSULTANT Quality Manager (CQM) will confirm that QC procedures defined in the QMP are met prior to the release of deliverables to the CITY. The CITY Project Manager, will review the quality audits conducted by the CONSULTANT and at its discretion perform its own review of project QC documentation in coordination with the CQM.

1.5.1 Project Specific QMP

The CONSULTANT will prepare a draft and final QMP covering planned activities in the Project Initiation Phase. One revision to this QMP may be made during the Project Initiation Phase.

The following is a draft outline for the Project Initiation Phase QMP:

- Introduction
- Quality Control Reviews
- Checking of Calculations
- Checking of Drawings
- Quality Assurance
- Reporting Structure
- Document Control
- Control of Sub-Consultants

The QMP will identify and list the types of deliverables subject to quality review. The quality system approach will include the QC steps of originator, checker, back checker, corrector, and verifier and the QA audit checklist. The CQM will review the QMP with task leaders.

Assumption(s):

1. The QMP will only address Project Initiation Phase work activities
2. The draft QMP will be revised once based on the CITY a review comments.

Deliverable(s):

1. A Project Initiation Phase QMP including forms (e.g., Audit Report Checklist) in accordance with project submittal procedures and requirements
2. A spreadsheet or other tracking mechanism approved by the CITY that will track responses to each of the comments made by the CITY during the review of the draft and final QMP.

1.5.2 QA/QC Documentation

The CONSULTANT will prepare project deliverables in accordance with QMP requirements for the CITY's review and properly document the review comments and their resolution.

QA/QC processes will follow the project design development sequence in the project schedule and be included as activities, with durations, on the design schedule.

Assumption(s):

1. The QMP will be made available to team members and they will certify that they have read it.
2. One round of consolidated and non-conflicting comments will be provided to the CONSULTANT by the CITY for each draft deliverable.

Deliverable(s):

1. QA/QC documentation in accordance with the QMP.
2. A list of review comments with their disposition and verification for each deliverable will be uploaded to the project SharePoint.

2. Coordination and Team Meetings

The scope outlined below for coordination and team meetings will cover activities through the Project Initiation Phase. Scope for tasks, as needed, will be added or expanded for future Optional Tasks, such as the PA&ED and PS&E phases.

The CONSULTANT will plan and facilitate project meetings for the duration of the project. Agendas and meeting notes will be provided for project meetings.

2.1 Project Team Meetings

2.1.1 Project Kick-off Meeting

The CONSULTANT will prepare and conduct a kick-off meeting with CITY staff. The meeting will address the project's measures of success, roles, responsibilities, quality control procedures, and operating guidelines. The meeting is needed to ensure effective communications and decision-making during the subsequent project execution activities.

The CONSULTANT attendees will be limited to the CONSULTANT Project Manager and Task Leads.

The CONSULTANT will prepare draft and final meeting notes. The draft meeting notes will be sent to the CITY project manager for review. The CITY's comments will be incorporated into the final meeting notes.

Deliverable(s):

1. Project kick-off meeting agenda.
2. Draft meeting notes (electronic PDF).

2.1.2 Management Team Meetings

The CONSULTANT will plan and facilitate up to six (6) management team meetings, held via conference call. The purpose of the meetings is to discuss and update the PMP, schedule, risk register, and issues log. Attendees will include the Project Manager from CDM Smith and the Project Manager from the CITY.

Assumption(s):

1. Meetings will be held via teleconference.
2. Meetings will be up to thirty (30) minutes and will be held every other month.

Deliverable(s):

1. Draft meeting notes (electronic PDF).
2. Final meeting notes (electronic PDF).

2.1.3 CITY and CONSULTANT Coordination Meetings

The CONSULTANT will plan and facilitate up to eleven (11) CITY staff and CONSULTANT team monthly meetings to coordinate work.

The CITY and CONSULTANT team meetings will include task leads. The purpose of the meetings is to coordinate and resolve project issues and will include only those key team members that need to attend.

Assumption(s):

1. Meetings will be up to two hours and will be held monthly.

Deliverable(s):

1. Meeting agendas.
2. Draft meeting notes (electronic PDF).
3. Final meeting notes (electronic PDF).

2.2 Coordination Meetings

2.2.1 Technical Advisory Committee (TAC) Meeting

The CONSULTANT will facilitate one (1) TAC meeting early in the PID process. The suggested TAC meeting would be held to review the corridor assessment and proposed changes to the previous conceptual design and prepare for the public outreach tasks. The CONSULTANT team will work closely with CITY staff to identify TAC members; preliminarily, we recommend that TAC members include internal CITY representatives from the Transportation Planning, Community Development, Public Works and other relevant departments. The CONSULTANT will prepare meeting materials; CITY staff will be responsible for final determination of TAC membership and will arrange meeting logistics.

Assumption(s):

1. The CITY will arrange meeting rooms for the TAC meeting and invite TAC members to the meeting.

Deliverable(s):

1. Meeting agenda.
2. Draft meeting notes (electronic PDF).
3. Final meeting notes (electronic PDF).

2.2.2 Caltrans PDT Meetings

The CONSULTANT will facilitate up to three (3) Project Development Team (PDT) meetings with Caltrans. The meetings will be held at the Caltrans District 4 offices in Oakland, California. The CONSULTANT will prepare an agenda for each of these meetings.

The CONSULTANT will also prepare draft and final meeting notes. The draft meeting notes will be sent to the CITY and Caltrans project managers for review. Comments from the CITY and Caltrans will be incorporated into the final meeting notes.

Deliverable(s):

1. PDT meeting agendas (electronic PDF).
2. Draft meeting notes (electronic PDF).
3. Final meeting notes (electronic PDF).

3. Public Outreach and Meetings

The scope outlined below for public outreach and meetings will cover activities through the Project Initiation Phase. Scope for tasks, as needed, will be added or expanded for future Optional Tasks, such as the PA&ED and PS&E phases.

3.1 Public Outreach Materials

This scope assumes that the Council-accepted complete street concept for the corridor will undergo few modifications due to the latest standards and best practices, and that public outreach for the PID phase will focus on presenting proposed modifications and refining the details of alternatives for the Central Avenue/Webster Street intersection. To that end, the CONSULTANT will support CITY staff in clarifying the specific questions for which the CITY is seeking input, and in crafting engagement activities that will focus on answers to those questions that move the process forward without reopening aspects of the design that will not change.

The CONSULTANT will prepare the following materials. Materials will reference the detailed Central Avenue complete street webpage already established by the CITY.

A one-page fact sheet explaining current project status and giving an overview of next steps and key decisions to be made through the PID process.

One round of print or electronic outreach materials such as an e-blast, flier, or postcard to invite participants to the community workshop (described in Task 3.2 below), to be printed/distributed by CITY staff using a variety of existing CITY email lists and social media platforms.

Content for one to two questions or exercises on Open Forum, the CITY's online engagement website maintained by Peak Democracy/OpenGov.

Assumption(s):

1. The CITY will provide a single set of internally reconciled comments on the outreach materials from City staff, Caltrans, and any other project team members and will do a single round of edits to the materials.

Deliverable(s):

1. One-page fact sheet (draft and final)
2. Outreach materials (draft and final)
3. Content for exercises on Open Forum (up to two questions or exercises)

3.2 Community Workshop

The CONSULTANT will collaborate with CITY staff to organize and facilitate a community workshop focused on the Central Avenue/Webster Street intersection. The specific format of the workshop will be refined based on the CITY's objectives for the meeting. The CONSULTANT will provide meeting materials, a presentation, facilitation, and equipment such as easels, chart paper, workbooks, etc. as needed.

Assumption(s):

1. The CITY will provide the workshop location with required furniture, such as tables and chairs.
2. CONSULTANT will prepare meeting materials (as described in Task 3.4 below) and facilitate the meetings.

3.3 Stakeholder Meetings

The CONSULTANT will facilitate up to two stakeholder meetings to review the status of the Council-approved complete street concept, explain the PID process, and gather input on any unanswered questions relating to transportation deficiencies, project goals, and/or range of alternatives, with a particular focus on the Central Avenue/Webster Street intersection. Stakeholders will be identified in close consultation with the City, and may include local business owners and business associations; bicycle, pedestrian, and/or transit advocates; students and school representatives; and/or residents along the corridor. This scope assumes that City staff will provide contact information for individual stakeholders and will provide the meeting space; the CONSULTANT will prepare meeting materials (as described in Task 3.4 below) and facilitate the meetings.

3.4 Meeting Material Preparation/Graphics

The CONSULTANT will provide outreach and informational graphics such as infographics, maps, and layout for the public PSR-PDS Report in Task 4.1 and for use at the Community Workshop and Stakeholder Meetings in Tasks 3.2 and 3.3. The CONSULTANT will also be responsible for meeting agendas, sign in sheets, directional signage, brief meeting summaries, and other public meeting materials for the workshop and stakeholder meetings.

Assumption(s):

1. The CONSULTANT will utilize previously prepared cross sections and other illustrations of the project design.
2. The CONSULTANT will prepare updated exhibits of the corridor for up to two (2) alternatives for the corridor, and an additional alternative for the Central/Webster intersection.

Deliverable(s):

1. Meeting agendas.
2. Meeting sign-in sheets.
3. Meeting summaries.
4. Corridor exhibits.

4. Caltrans Project Initiation and Approvals

The scope outlined below for Caltrans project initiation and approvals will cover activities through the Project Initiation Phase. Scope for tasks, as needed, will be added or expanded for future Optional Tasks, such as the PA&ED and PS&E phases.

4.1 Project Study Report-Project Development Study (PSR-PDS)

The CONSULTANT will prepare a PSR-PDS report according to the Caltrans Project Development Procedures Manual.

4.1.1 Pre-PID Meeting

The CONSULTANT will attend one (1) Pre-PID Meeting with the CITY and the Caltrans PDT. The meeting will be held at the Caltrans District 4 offices in Oakland. PID procedures, roles and responsibilities, and expectations, prior to PID development, will be discussed. The meeting will be used to develop the project charter and set the framework for getting consensus on the Purpose-and-Need. The meeting will be attended by the CONSULTANT Project Manager and environmental lead. The CONSULTANT will prepare an agenda and draft and final meeting notes. The draft meeting notes will be sent to the CITY Project Manager and Caltrans Project Manager for review. Comments will be incorporated into the final meeting notes.

Assumption(s):

1. One (1) Pre-PID meeting will be held at the Caltrans District 4 offices in Oakland.
2. The Pre-PID meeting will entail:
 - Preparing and finalizing the project charter
 - Preparing and finalizing the cooperative agreement
 - Setting the framework for getting consensus on the Purpose-and-Need
 - Setting the framework for agreeing on the design concept and scope
 - Agreeing on the basic design criteria
 - Identifying known deficiencies
 - Discussion on who is the lead agency for California Environmental Quality Act (CEQA)

Deliverable(s):

1. Meeting agenda.
2. Draft meeting notes (electronic PDF).
3. Final meeting notes (electronic PDF).

4.1.2 Develop Purpose-and-Need

The CONSULTANT will work with the CITY and Caltrans to develop a clearly defined Purpose-and-Need statement that identifies the initial transportation deficiency and establishes the objectives that will be met by the project. The Purpose-and-Need will be based on the existing Purpose-and-Need defined in the Concept Report, and be revised and expanded to incorporate changing conditions since the Concept Report was published to be compliant with Caltrans requirements.

Deliverable(s):

1. Draft Purpose-and-Need (electronic PDF).
2. Final Purpose-and Need statement (electronic PDF).

4.1.3 Gather and Review Existing Data

The CONSULTANT will obtain the available and most current maps and plans, including right-of-way maps and as-built plans. These could include aerial photography, orthophotography, LiDAR, Google Earth mapping, graphical information system (GIS) data, CADD design files, digital elevation models, and/or digital terrain models made available from the CITY and Caltrans. The CONSULTANT will not produce any additional mapping for this phase of the project.

The CONSULTANT will review previously related or adjacent studies for the project corridor provided by the CITY.

To maximize efficiency and consistency of information, the CONSULTANT will coordinate data collection activities with the PEAR.

The CONSULTANT will provide a list of data gathered and reviewed to the CITY for approval.

Assumption(s):

1. Available mapping data will be gathered and used during the Project Initiation Phase.
2. Additional mapping, including topographic surveys, will not be obtained during the Project Initiation Phase.

Deliverable(s):

1. List of data gathered and reviewed.

4.1.4 Design Standards Risk Assessment

The CONSULTANT will perform a design standards risk assessment. The risk assessment is a list of design standards that will most likely not be met for each alternative and the probability of approval for each proposed exception of the design standard risk assessment.

Assumption(s):

1. Design Exception Fact Sheets will not be prepared during the Project Initiation Phase.

Deliverable(s):

1. Draft Design Standards Risk Assessment (electronic PDF).
2. Final Design Standards Risk Assessment (electronic PDF).

4.1.5 Design Standards Risk Register

The CONSULTANT will, in cooperation with the CITY and the Caltrans PDT, identify and evaluate potential risks on the project. Based on the Final Design Standards Risk Assessment completed under Task 4.1.4, the CONSULTANT will develop a Design Standards Risk Register stating the identified risks and ownership of said risks. The Design Standards Risk Register will be updated each month throughout the life of the project.

Deliverable(s):

1. Draft Design Standards Risk Register (electronic PDF).
2. Final Design Standards Risk Register (electronic PDF).

4.1.6 Stormwater Documentation

The CONSULTANT will evaluate the need and feasibility of incorporating stormwater best management practices (BMPs) into the project in accordance with the policies and procedures described in the most recent version of the Project Planning and Design Guide and the requirements of the Caltrans National Pollutant Discharge Elimination System stormwater permit. The CONSULTANT will initiate the Stormwater Data Report (SWDR) with the primary purpose of determining the need

to incorporate stormwater treatment BMPs, and evaluating the potential related impacts to project alternatives, right-of-way needs, and project costs. The SWDR will be updated during the subsequent PA&ED, and PS&E phases of the project.

The CONSULTANT will coordinate this work with the PEAR water quality and stormwater evaluations to avoid duplicate work effort and maintain consistency in the project documentation.

The CONSULTANT will coordinate with the District Stormwater Coordinator to establish the expected level of documentation in the SWDR and develop a clear understanding of potential stormwater impacts within the project area.

The CONSULTANT will summarize the key findings in the SWDR within the PSR-PDS.

Deliverable(s):

1. Draft Stormwater Data Report (electronic PDF).
2. Final Stormwater Data Report (electronic PDF).

4.1.7 Transportation Planning Scoping Information Sheet

The CONSULTANT will prepare a Transportation Planning Scoping Information Sheet to verify that the project remains consistent with the planning level purpose-and-need and is consistent with planning concepts, statewide goals, and planning decisions.

Deliverable(s):

1. Draft Transportation Planning Scoping Information Sheet (electronic PDF).
2. Final Transportation Planning Scoping Information Sheet (electronic PDF).

4.1.8 PSR-PDS Survey Needs Questionnaire

The CONSULTANT will prepare a Survey Needs Questionnaire to establish vertical and horizontal project datums.

Deliverable(s):

1. Draft Survey Needs Questionnaire (electronic PDF).
2. Final Survey Needs Questionnaire (electronic PDF).

4.1.9 Division of Engineering Services PSR-PDS Scoping Checklist

The CONSULTANT will prepare a Division of Engineering Services Scoping Checklist to accurately identify the products and services required from Caltrans Headquarters Division of Engineering Services functional units for Statewide Transportation Improvement Program (STIP) projects.

Deliverable(s):

1. Draft Design Scoping Index (electronic PDF).
2. Final Design Scoping Index (electronic PDF).

4.1.10 Design Scoping Index

The CONSULTANT will prepare a Design Scoping Index to identify project issues and determine feasibility of project alternatives.

Deliverable(s):

1. Draft Design Scoping Index (electronic PDF).
2. Final Design Scoping Index (electronic PDF).

4.1.11 PSR-PDS Report

The CONSULTANT will prepare a PSR-PDS according to Appendix S – Preparation Guidelines for PSR-DS PID of the Caltrans Project Development Procedures Manual. The CONSULTANT will produce a Draft PSR-PDS to be reviewed by the CITY project manager. Comments from the CITY project manager will be incorporated and a Final PSR-PDS will be submitted to Caltrans. After a 60-day review period by Caltrans, the CONSULTANT will address comments by Caltrans and the Revised Final PSR-PDS will be submitted to Caltrans for a 30-day review period. The CONSULTANT will attend one (1) review meeting with Caltrans to discuss comments on the PSR-PDS during the 60-day review.

Assumption(s):

1. The CITY will provide comments on the Draft PSR-PDS within seven (7) days.
2. Caltrans will provide one round of comments during the first (60-day) review period.
3. One comment resolution meeting will be attended at Caltrans District 4 offices in Oakland, CA.
4. Caltrans will approve the PSR-PDS document during the second (30-day) review period.

Deliverable(s):

1. Draft PSR-PDS to the CITY (electronic PDF).
2. Final PSR-PDS to Caltrans (electronic PDF).
3. Revised Final PSR-PDS to Caltrans (electronic PDF).

5. Traffic Analysis

The scope outlined below for traffic analysis will cover activities through the Project Initiation Phase. Scope for tasks, as needed, will be added or expanded for future Optional Tasks, such as the PA&ED and PS&E phases.

5.1 Gather Existing Data

The study area includes 1.7 miles of this arterial from the Pacific/Main/Central intersection to the Sherman/Encinal/Central intersection. The TEPA analysis for the project is intended to serve as a high-level assessment of traffic capacity issues to be addressed as part of PSR-PDS process. The team will coordinate with CITY staff and

Caltrans to collect available data necessary to effectively evaluate local traffic impacts associated with the project. It is estimated that daily and peak period traffic counts will be conducted for seven intersections along the corridor:

- Central Avenue at Main Street/Pacific Avenue;
- Central Avenue at Third Street/Taylor Avenue;
- Central Avenue at Fourth Street;
- Central Avenue at Fifth Street;
- Central Avenue at Webster Street;
- Central Avenue at Eighth Street; and
- Central Avenue at Sherman Street/Encinal Avenue.

In addition to traffic volumes, pedestrian and bicycle volumes may also be collected to assess the non-vehicular operations. These counts were collected in 2015 as part of the conceptual analysis phase. However, the project team will discuss with the CITY and Caltrans regarding the validity of the counts and collect new counts if necessary. For the purposes of this scope and budget, it is assumed that new non-vehicular traffic counts will not be collected.

Caltrans Traffic Accident Surveillance and Analysis System data will be collected to conduct an accident summary and evaluation for the most recent three-year period within the study area. For locations which are not under Caltrans right-of-way, the CITY will be contacted for the latest accident data. The accident evaluation will be used to identify potential high accident concentration.

The CONSULTANT will provide a list of data gathered and reviewed to the CITY for approval.

Deliverable(s):

1. List of data gathered and reviewed.

5.2 TEPA

Since this TEPA analysis will be conducted to support the PSR-PDS process, the analysis will be completed for the baseline year (2018) and the forecast horizon year of 2040 or 2045 (or other horizon year to be determined working with the team) using readily available data. One such source of data is the Alameda Point Economic Impact Report which has forecast data for this area for year 2035. If needed, extrapolation techniques will be used to forecast volumes. The following analysis scenarios will be included in the traffic study:

1. Existing (2018)
2. Future Horizon Year (2040/45) no project
3. Future Horizon Year (2040/45) with project (three alternatives)

Traffic analysis will be performed consistent with the Highway Capacity Methodology and will include the seven (7) study intersections, the analysis will be completed using

Synchro 8 software. Capacity constraints will be identified based on the overall intersection operating at or near capacity (i.e., with a volume-to-capacity ratio near or above 1.0). In addition, the analysis assumes the same traffic volume for all lane configuration/project scenarios. Coordination with Caltrans is critical in completing the traffic study in a timely fashion.

A Draft TEPA will be prepared to support the PSR-PDS document and circulated to the CITY and Caltrans for review and comment. CITY and project team comments will be incorporated into a Final Draft TEPA for submittal to Caltrans for review. Caltrans comments will be incorporated into a Final TEPA that will serve as an appendix to the PSR-PDS Document.

Assumption(s):

1. Synchro analysis will be completed for five (5) scenarios:
 - Existing (2018)
 - Future Horizon Year (2040/2045) no project
 - Future Horizon Year (2040/2045) Alternative 1
 - Future Horizon Year (2040/2045) Alternative 2
 - Future Horizon Year (2040/2045) Alternative 3

Deliverable(s):

1. Draft TEPA (electronic PDF).
2. Final Draft TEPA (electronic PDF).
3. Final TEPA (electronic PDF).

6. Environmental Documentation

The scope outlined below for environmental documentation will cover activities through the Project Initiation Phase. Scope for tasks, as needed, will be added or expanded for future Optional Tasks, such as the PA&ED and PS&E phases.

6.1 PEAR

The CONSULTANT will prepare a Preliminary Environmental Analysis Report (PEAR) in accordance with Caltrans Guidelines for Preparation of the Preliminary Environmental Analysis Report and following the established PEAR format.

The CONSULTANT will conduct and document a supporting PEAR-level technical study for each environmental discipline (addressed below in Section 6.2) following the guidelines in the Caltrans PEAR Handbook. The results of each study will be summarized and included in the PEAR.

The CONSULTANT will prepare a Draft PEAR and Final PEAR, including attachments, for review by the CITY and by Caltrans. Each submittal will include attachments, in hard copy and electronic files, including GIS files from any mapping. Preparation of the PEAR will include the following activities:

6.1.1 Prepare Draft PEAR

The PEAR document will include the following:

- Project information
- Project description (description of the project, the statement of purpose and need, and a description of the alternatives) and environmental setting
- Anticipated environmental approval (type of document and timeline)
- Summary statement
- Special considerations (e.g., National Environmental Policy Act (NEPA) /404, seasonal constraints, Section 7 and data gaps)
- Mitigation (description and cost)
- Anticipated permits (including timelines for acquiring permits)
- Disclaimer
- Reviewed by (signature block)
- Summary checklist
- Discussion of technical review
- List of preparers
- PEAR mitigation cost estimate

Assumption(s):

1. Analysis in the PEAR will be based on windshield surveys, existing data, literature and database searches, and aerial photographs obtained from the CITY.
2. No field work other than windshield surveys will be conducted for cultural or biological resources.
3. One review of the Draft PEAR by the CITY and two review rounds by Caltrans.

Deliverable(s):

1. Initial Draft PEAR (electronic PDF).
2. Initial Draft PEAR (hard copy).
3. Final Draft PEAR (electronic PDF).
4. Final Draft PEAR (hard copy).
- 5.

6.1.2 Prepare Final PEAR

The CONSULTANT will document and track comments received on the Draft PEAR and provide written responses for substantive comments. The CONSULTANT will revise the Draft PEAR and submit the Final PEAR for incorporation into the PSR-PDS.

Assumption(s):

1. Caltrans will assemble internal review comments for the Draft PEAR and for the final PEAR to ensure consistency in message and for efficiency.
2. One review of the Final PEAR by the CITY and two review rounds by Caltrans.

Deliverable(s):

1. Initial Final PEAR (electronic PDF).
2. Initial Final PEAR (hard copy).
3. Final PEAR (electronic PDF).
4. Final PEAR (hard copy).

6.2 PEAR Studies

The CONSULTANT will prepare topic-specific technical analysis, each of which will include the following:

- Summary of methodology and findings, as outlined in the PEAR Handbook
- Assumptions used to make the findings
- Identification of needed permits,
- Anticipated mitigation measures and costs (and resources needed by WBS code),
- Schedule for completing future studies.

Preliminary analysis indicates the project as currently scoped will not induce growth nor will it impact farmlands/ timberlands, or energy. Although the two discipline areas will be discussed briefly in the PEAR, technical analysis for these topics are not expected and thus, these two disciplines are not included in the following discussion. Two resource areas – hazardous waste/materials and paleontology – will have full studies completed as part of the PEAR, in accordance with the Caltrans handbook guidelines.

6.2.1 Land Use

The CONSULTANT will prepare a land use analysis that will cover existing and future land use, consistency with state, regional, and local plans, and parks and recreation. A windshield survey will be conducted to identify existing land uses and assess the existing project setting. To create efficiencies, our team will draw upon and augment previous studies conducted for the project including the Central Avenue Concept Report (2016).

Deliverable(s):

1. No separate deliverable will be provided for this subtask. Instead the results of this study will be summarized in the PEAR, along with a WBS resources estimate and schedule for completing the land use studies for the PA&ED phase.

6.2.2 Community Impacts

The CONSULTANT will prepare a community impact analysis which will examine the project's impact to the local economy, social considerations, environmental justice, relocations, and community services and will make a recommendation on whether a community impact study will be needed for the next phase of work. The desktop research will identify utilities, emergency services, and public facilities that will be impacted by the project.

Deliverable(s):

1. No separate deliverable will be provided for this subtask. Instead the results of this study will be summarized in the PEAR, along with a WBS resources estimate and schedule for completing the Community Impacts studies for the PA&ED phase.

6.2.3 Visual and Aesthetics

The CONSULTANT will assess the project’s visual impact for the PEAR. To achieve this, the CONSULTANT will conduct a “windshield survey” to review the existing corridor conditions followed by a thorough review of the proposed changes. It is unlikely that a full Visual Impact Assessment would be needed for the PA&ED phase. However, the CONSULTANT will conduct a PEAR-level analysis of the setting, risks, and assumptions to validate this preliminary conclusion.

Deliverable(s):

1. No separate deliverable will be provided for this subtask. Instead the results of this study will be summarized in the PEAR, along with a WBS resources estimate and schedule for completing the visual and aesthetics studies for the PA&ED phase.

6.2.4 Cultural Resources

The CONSULTANT will request a records search and literature review from the Northwest Information Center of the California Historical Resources Information System in Rohnert Park, California. The CONSULTANT will present the results in the PEAR in text and tabular form.

The CONSULTANT will contact the Native American Heritage Commission with a request for a search of the Sacred Lands File and a request for a list of potential Native American stakeholders for Alameda County who may have information regarding cultural resources within the project area. The CONSULTANT will contact those potential stakeholders via certified letter with a request for consultation. Results will be presented in a confidential technical memorandum.

The CONSULTANT will provide services for historic resources documentation for the PSR-PDS in compliance with Section 106 of the National Historic Preservation Act and California Public Resources Code Sections 5024 and 5024.5. The CONSULTANT will conduct preliminary background research and a survey of the project area to assess possible historic built environment properties that may be affected by the project. This survey will be a desktop exercise and will not include a windshield survey of the project area. The CONSULTANT will also provide estimates regarding the timeframe in which the necessary reports, such as a Historical Resources Evaluation Report (HRER) and HPSR, will be prepared, as per Caltrans’ WBS codes, and agency concurrences needed for compliance.

Assumption(s):

1. Letters will not be sent to interested parties for the PEAR. Such communication would be conducted during preparation of the HRER.
2. No prehistoric or historic resources will be recorded. If noted in record search, they will be visited during windshield survey.
3. Reporting will be in text and tabular form for inclusion in the PEAR. Mapping will be provided as appropriate.
4. Site recording, evaluations of resources for the Center for Regional Heritage Research or National Register of Historic Places, or detailed data recovery level reporting such as an Archaeological Survey Report, are not included.

Deliverable(s):

1. No separate deliverable will be provided for this subtask. Instead the results of this study will be summarized in the PEAR, along with a WBS resources estimate and schedule for completing the cultural resources studies for the PA&ED phase.

6.2.5 Hydrology and Floodplain

The CONSULTANT will compile and evaluate available and relevant information regarding the project area's hydrologic and floodplain setting. Examples of such information may include applicable regulations regarding floodplain encroachment and mitigation, the Federal Emergency Management Agency (FEMA)/National Flood Insurance Program Flood Maps, flood records, watershed mapping and characteristics, and references from outside agencies and individuals.

Based on the results of these activities, the CONSULTANT will also identify key supplemental field information needed to improve the understanding of these issues.

The CONSULTANT will develop written documentation, mapping, and other appropriate graphical information for incorporation into the PEAR. The information will include the base floodplain and key hydrology data for use during the PA&ED, and PS&E phases, and will describe related project issues, risks, and assumptions regarding alternatives, cost, schedule, and project viability.

At a minimum, the documentation will include the following specific information:

- Hydraulic and floodplain setting
- Potential project impacts on hydrology
- Floodplain locations and boundaries
- Additional study and agency coordination needs
- Constraints and recommendations
- Summary
- Hydrology and floodplain portion of PEAR Environmental Studies Checklist
- PEAR environmental commitments cost estimate
- Resource estimate, by WBS code, for environmental document special studies
- Schedule for environmental document special studies

Assumption(s):

1. The project area does not contain any FEMA mapped floodplains.

Deliverable(s):

1. No separate deliverable will be provided for this subtask. The results of this study will be summarized in the PEAR, along with a WBS resources estimate and schedule for completing the hydrology and floodplain studies for the PA&ED phase.

6.2.6 Water Quality and Stormwater Runoff

The CONSULTANT will compile and review available and relevant information regarding water quality and stormwater runoff issues for the project area. The information to be collected may include existing environmental permits, Total Maximum Daily Load (TMDL) reports, water quality monitoring reports, design records for any existing water quality BMPs, and reference information from outside agencies and individuals as necessary to identify and characterize water quality issues and structural BMP needs.

Based on the results of these activities, the CONSULTANT will also identify key supplemental field information needed to improve the understanding of these issues.

The CONSULTANT will develop written documentation, mapping, and other appropriate graphical information for incorporation into the PEAR. The information will include stormwater catchment areas, receiving waters, and existing stormwater drainage and treatment infrastructure, and will describe related project issues, risks, and assumptions regarding alternatives, cost, schedule, and project viability.

At a minimum, the documentation will include the following specific information:

- Setting
- Water quality concerns
- Watershed areas and boundaries
- Potential project impacts/discharges
- Basin Plan/TMDLs
- Permits and agency coordination needs
- Environmental commitments
- Drainage and treatment infrastructure
- Constraints and recommendations
- Summary
- Water quality portion of PEAR Environmental Studies Checklist
- PEAR environmental commitments cost estimate for standard PSRs
- Resource estimate, by WBS code, for environmental document special studies
- Schedule for environmental document special studies

Deliverable(s):

1. No separate deliverable will be provided for this subtask. Instead the results of this study will be summarized in the PEAR, along with a WBS resources estimate and schedule for completing the cultural resources studies for the PA&ED phase.

6.2.7 Geology, Soils, Seismic, and Topography

The CONSULTANT will perform a desktop study of available geotechnical, geologic, and seismic information in connection with the proposed project. Information to be reviewed will include existing reports as may be provided by the client, as well as published information such as geologic maps and seismic hazard maps including liquefaction and faults. The purpose will be to determine if there are any geotechnical, geologic, and seismic issues that impact the project.

Assumption(s):

1. No subsurface explorations will be performed in the initial phase of this project.

Deliverable(s):

1. No separate deliverable will be provided for this subtask. Instead the results of this study will be summarized in the PEAR, along with a WBS resources estimate and schedule for completing the geology, soils, seismic, and topography studies for the PA&ED phase.

6.2.8 Paleontology

6.2.8.1 *Record Search, GIS of Geology, and Background Research*

The CONSULTANT will research, synthesize and compile existing paleontological and geological data. The CONSULTANT will map the project area onto the highest resolution geologic maps available. A record search will be requested from the University of California Museum of Paleontology in Berkeley, California. The record search will encompass a mile buffer around the proposed project. In addition, the CONSULTANT will review available online databases, literature, and geologic maps to determine the paleontological and geological context of the project area.

Deliverable(s):

1. No separate deliverable will be provided for this subtask. Instead findings from this desktop study will be included in the Paleontological Identification Report (PIR) memorandum described below. The results of this study will be summarized in the PEAR, along with a WBS resources estimate and schedule for completing the paleontology studies for the PA&ED phase.

6.2.8.2 *Paleontological Identification Report (PIR)*

The results of the geologic mapping, record search, and background research will be compiled in a PIR. The PIR will also include a preliminary discussion of potential project impacts on paleontological resources, and a summary of

recommendations, constraints, and coordination requirements. The findings of the PIR will determine if a Paleontological Evaluation Report (PER) or Paleontological Mitigation Plan is required.

Deliverable(s):

1. Draft PIR (electronic PDF).
2. Final PIR (electronic PDF).

6.2.9 Hazardous Waste/Materials

6.2.9.1 Desktop Review

In accordance with the Caltrans handbook guidelines, hazardous waste/materials will have a full study completed as part of the PEAR.

The CONSULTANT will perform a desktop study evaluating the historical and present uses of the project area for evidence of sites that currently or have historically handled, stored, transported, released, or disposed of hazardous or regulated materials, as these types of sites are potential sources of hazardous material contamination. The CONSULTANT will review hazardous materials/regulated site database results from EDR® and review available historical data sources such as aerial photographs, fire insurance maps, and topographic maps. Historic information may also include existing reports as may be provided by the client. The search area would encompass a corridor consisting of ¼-mile to either side of the project area.

In addition to obtaining and summarizing the EDR® reports, the CONSULTANT will review the Geotracker and Envirostor databases for information missing from the EDR® reports as well as to view well logs that are not part of the EDR® reports.

The purpose of the desktop review will be to determine if there are any contaminated sites that could be a fatal flaw or that impact the project or project schedule.

Assumption(s):

1. No subsurface explorations will be performed in the initial phase of this hazardous waste review.

Deliverable(s):

1. No separate deliverable will be provided for this subtask. Instead findings from this desktop study will be included in the Initial Site Assessment (ISA) memorandum described below. The results of this study will be summarized in the PEAR, along with a WBS resources estimate and schedule for completing the hazardous materials/waste studies for the PA&ED phase.

6.2.9.2 Conduct an Initial Site Assessment (ISA)

The CONSULTANT will prepare an ISA summarizing the potential hazardous waste sites within the project area as identified in the desktop study, as well as identifying any contaminated sites that could be a fatal flaw impacting the project or project schedule.

The primary purpose of the ISA is to determine whether a preliminary site investigation (PSI) involving subsurface exploration and evaluations is needed. If the site is high risk, then a PSI may be needed for the PEAR.

Assumption(s):

1. No subsurface explorations will be performed as part of the ISA.

Deliverable(s):

1. Draft ISA/memorandum (electronic PDF).
2. Final ISA/memorandum (electronic PDF).

6.2.10 Air Quality

The CONSULTANT will compile and review existing documents regarding the project location's existing air quality. Examples of such documents would include current and proposed air quality management plans, databases maintained by the Bay Area Air Quality Management District (BAAQMD) or other agencies, and regional transportation plan (RTP)/regional transportation improvement program (RTIP) information.

Sensitive receptors in the project vicinity that could be affected by construction or operation of the proposed project will be identified on a map that will be included as an attachment to the PEAR. The type of receptor (e.g., residence, school, hospital, etc.) will be identified.

The CONSULTANT will evaluate potential effects to air quality that is consistent with the *Guidelines for Preparing a Preliminary Environmental Analysis Report (PEAR)* (Caltrans 2009).

While the purpose of the PEAR is not to prepare a detailed environmental analysis, potential air quality impacts will be qualitatively discussed. It is assumed that a full air quality technical report will not be required for the environmental documentation, but a shortened one would be required to for CEQA requirements. Any issues, risks, and assumptions that could affect the alternatives, cost, schedule, or viability of the project will be included in the documentation.

At a minimum, the documentation will include the following specific information:

- Project setting/sensitive receptors
- Air quality/maintenance plan status and project RTP/RTIP conformity

- “Hot spot” and mobile source air toxics review
- Potential impacts and environmental commitments
- Monitoring
- Agency coordination and permits
- Recommendations
- Summary

Assumption(s):

1. No emission calculations or air dispersion modeling will be completed.

Deliverable(s):

1. No separate deliverable will be provided for this subtask. Instead the results of this study will be summarized in the PEAR, along with a WBS resources estimate and schedule for completing the air quality studies for the PA&ED phase.

6.2.11 Noise and Vibration

The CONSULTANT will complete a noise assessment. A review of background information and documents pertaining to the proposed project will be conducted. A windshield survey will be conducted to identify existing land uses and assess the existing project settings. In addition, it is proposed that short-term noise measurements will be conducted at a few representative receptors, i.e., schools, parks, trails, etc., to assess the existing ambient noise environment. The measurement results will be utilized in assessing the potential operational as well as construction noise impacts that would be generated by the project along the approximately 1.7-mile project corridor. If potential impacts are identified, possible abatement measures will also be recommended to mitigate or minimize the impacts. In addition, coordination with various relevant agencies, i.e., CITY, Caltrans, will be identified and documented. If warranted, details on additional analysis, such as a technical noise study and/or noise monitoring during construction will be recommended.

Deliverable(s):

1. No separate deliverable will be provided for this subtask. Instead the results of this study will be summarized in the PEAR, along with a WBS resources estimate and schedule for completing the noise and vibration studies for the PA&ED phase.

6.2.12 Energy and Climate Change

The CONSULTANT will determine if the proposed project would be a “major project” for the consumption of energy during project construction or operation. If it is determined that an energy analysis would be required, then the proper scope of the analysis will be documented in the PEAR. Early interagency consultation may be required to confirm the extent of the energy analysis to be included in the environmental document. Appendix F of the CEQA Guidelines will be evaluated to refine the assumptions about the extent of the energy analysis that would be required for the environmental document.

The CONSULTANT will review existing background information on greenhouse gas emissions and climate change to determine the extent of the required analysis for the environment document.

Because regulations and guidance documents for climate change are frequently being updated, both current and proposed guidance documents will be evaluated as part of the PEAR. In addition, while the proposed project is in the Bay Area, it may be necessary to look at requirements in other jurisdictions to determine the proper scope of the future environmental document. Requirements in both the State CEQA Guidelines (including proposed amendments) and in the BAAQMD *CEQA Air Quality Guidelines* (2017) will be reviewed to fine-tune the scope of the required climate change analysis. Other possible documents to be reviewed include local Climate Action Plans.

Although not explicitly required in Appendix G of the State CEQA Guidelines, a qualitative evaluation of the effects of future climate conditions on the proposed projects (as opposed to the project's cumulative contribution to climate change), section 15126.2(a) of the State CEQA Guidelines require that lead agencies analyze impacts associated with placing projects in locations susceptible to hazardous conditions, including those affected by climate change. As such, a cursory review of potential future climate conditions will be completed to determine the scope of the climate change technical report.

Assumption(s):

1. No site visits would be required.
2. No quantitative analysis of energy demand will be completed.
3. No emission calculations will be completed

Deliverable(s):

1. No separate deliverable will be provided for this subtask. Instead the results of this study will be summarized in the PEAR, along with a WBS resources estimate and schedule for completing the energy and climate change studies for the PA&ED phase.

6.2.13 Biological Environment

The CONSULTANT will conduct a review of biological resources to describe the affected environment and potential for impacts. Existing biological resources and potential impacts will be identified using available information from the project submittal, including a description of the project footprint and work methods, proposed project alternatives, site photographs, current aerial photography, and previous relevant biological studies, as available. A review of the California Natural Diversity Database as well as the U.S. Fish and Wildlife Service Information for Planning and Conservation database will be conducted.

Based on this review, the CONSULTANT will identify any additional studies that are necessary for the NEPA and/or CEQA evaluation of biological resources. Environmental commitments such as species avoidance and minimization measures, construction timing constraints, and mitigation measures will be recommended. The potential for risks to the project scope, cost, and schedule, will be identified (e.g., significant impacts on sensitive species or habitats, issues raised during previous community input, requirements for compensatory wetland and/or habitat mitigation). Federal, state, and local permits, approvals and/or coordination with resources agencies will be identified. An estimate of scope, budget, and schedule to conduct any additional studies, implement environmental commitments, and carry out permitting and coordination, will be provided.

Assumptions made during the biological resources review will be documented. The summary will include relevant information from the biological resources review, such as special status species lists, maps outlining the approximate boundaries of sensitive habitat such as wetlands, known occurrences of special status wildlife and plant species, wildlife corridors, and migratory bird habitat. The summary will include a recommendation of whether a cumulative impact analysis is needed in the subsequent environmental document phase. The contacts and sources consulted during the PEAR analysis will be documented.

Assumption(s):

1. Information from the project submittal for the biological resources review will include a description of the project footprint and work methods, site photographs, and previous relevant biological studies and will be provided by the CITY to the CONSULTANT in a timely manner.
2. The information provided in Assumption 1 will preclude the need for a site visit by the CONSULTANT'S biological resources specialist.

Deliverable(s):

1. No separate deliverable will be provided for this subtask. Instead the results of this study will be summarized in the PEAR, along with a WBS resources estimate and schedule for completing the biological environment studies for the PA&ED phase.

6.2.14 Cumulative Impacts

The CONSULTANT will summarize any of the other discipline areas that indicate a need for cumulative analysis in the environmental document phase.

Deliverable(s):

1. No separate deliverable will be provided for this subtask. Instead the results of this study will be summarized in the PEAR, along with a WBS resources estimate and schedule for completing the cumulative impacts studies for the PA&ED phase.

6.2.15 Context Sensitive Solutions

The CONSULTANT will review the community, aesthetic, historic, and environmental values taken into consideration in the development of the Central Avenue project design, and will describe the agency coordination, stakeholder meetings, and community involvement the CITY has undertaken. This summary will include a description of the 2013-2016 corridor concept process conducted by PlaceWorks, as well as subsequent outreach and engagement during the PID phase in 2018.

Deliverable(s):

1. No separate deliverable will be provided for this subtask. Instead the results of this study will be summarized in the PEAR, along with a WBS resources estimate and schedule for completing the context sensitive solutions studies for the PA&ED phase.

6.2.16 Conduct a Project Site Review/Windshield Survey

The CONSULTANT will conduct a project site review that will include a reconnaissance windshield survey as well as a review of available data of the project area for the following disciplines:

- Hydrology and Floodplain
- Water Quality and Stormwater Runoff
- Hazardous Materials/Waste
- Air Quality

This might include surface examination of the areas where ground surface is visible. Documentation of the any findings will be included in the PEAR. Mapping will be provided as needed.

Assumption(s):

1. The total area to be inspected will be no more than 1.7 miles and only properties fronting Central Avenue.
2. Site observations will be limited to publicly accessible locations where no special access permits are required.
3. Observations will be limited to features that are readily visible from the ground surface. No confined space entry into subsurface facilities will be performed.
4. No onsite interviews with local owners will be conducted.

Deliverable(s):

1. Mapping, as needed.

7. Permitting

The scope outlined below for permitting will cover activities through the Project Initiation Phase. This task will inform the PEAR related to environmental permits and approvals

required for the project. Scope for tasks, as needed, will be added or expanded for future Optional Tasks, such as the PA&ED and PS&E phases.

7.1 Existing Information and Desktop Analysis

The CONSULTANT will evaluate available information including environmental impact studies and site visit data as part of the PID development; and federal, state and local regulatory permitting requirements. Upon initial review of the existing material, additional data requirements will be identified and acquired. A desktop analysis will be conducted to determine the presence of sensitive areas within the project area for each alternative, including potential staging areas and disposal sites, and other issues that may necessitate the need for regulatory permits. Examples of regulated areas include waterways and wetlands; federal and state listed wildlife, plant, fish and riparian habitat; levees; floodplain boundaries; San Francisco Bay Conservation and Development Commission boundary; airport runway safety zones; power transmission lines, pipelines and railroad crossings; and areas containing hazardous materials or contaminated soil and/or groundwater.

An initial desktop review conducted during preparation of this scope of work facilitated the following assumptions.

Assumption(s):

1. The project area does not contain any FEMA mapped floodplains.
2. The project area does not contain jurisdictional waterways or wetlands.

Deliverable(s):

1. A list of required permits and external agency coordination contact information.

8. Engineering Plans, Specifications, and Estimates

The scope outlined below for PS&E will cover activities through the Project Initiation Phase. Scope for tasks, as needed, will be added or expanded for future Optional Tasks, such as the PA&ED and PS&E phases.

8.1 Conceptual Engineering

8.1.1 Conceptual Design Documents

The CONSULTANT will update the designs prepared in the Concept Report based on additional and updated mapping obtained in Task 4.1.3 and based on published guidance that has evolved since the Concept Report was published. The CONSULTANT will look for additional opportunities to improve safety and mobility along the corridor. The CONSULTANT will prepare one alternative for the entire corridor, one additional alternative for the segment of the corridor from Fourth Street to Burbank Street, and a third alternative for the intersection of Central Avenue and Webster Street for advancement into the PA&ED phase.

8.1.1.1 *General Plans*

The CONSULTANT will produce general plans including a cover sheet, index of sheets, and legend.

Deliverable(s):

1. Cover sheet (electronic PDF).
2. Sheet index (electronic PDF).
3. Legend (electronic PDF).

8.1.1.2 *Typical Sections*

The CONSULTANT will prepare up to twelve (12) typical sections along the corridor.

Deliverable(s):

1. Typical sections (electronic PDF).

8.1.1.3 *Roadway Plans*

The CONSULTANT will produce conceptual roadway plans at a scale of 1"=40' on ANSI D paper (1"=80' on 11"x17" paper).

Assumption(s):

1. One alternative will be produced for the entire corridor.
2. Two (2) additional alternatives will be produced for the segment from Fourth Street to Burbank Street.

Deliverable(s):

1. Roadway Plans at 1"=80" scale on 11"x17" (electronic PDF).

8.1.1.4 *Engineer's Opinion of Probable Construction Costs*

The CONSULTANT will prepare an Engineer's Opinion of Probable Construction Costs based on the conceptual designs at a level required to support the PSR-PDS. The Engineer's Opinion of Probable Construction Costs will include costs for the entire corridor, as well as two (2) additional alternatives for the segment from Fourth Street to Burbank Street. Unit prices will be based on the Caltrans Cost Data Book, and updated in conjunction with CITY staff.

Deliverable(s):

1. Engineer's Opinion of Probable Construction Costs (electronic XSLX).
2. Engineer's Opinion of Probable Construction Costs (electronic PDF).

8.1.1.5 QA/QC

The CONSULTANT will conduct thorough quality reviews and checks for the Conceptual Design submittal. Such reviews will be performed after deliverables are assembled and before their submittal to the CITY. QC efforts and reviews will encompass the work performed by the CONSULTANT and its SUBCONSULTANTS. Routine checking of calculations, plan sheets, and other work, done as peer review on the various discipline items, is included in the scope of the individual task.

Deliverable(s):

1. QA/QC Document for Conceptual Design submittal (electronic PDF).

8.1.1.6 Conceptual Design Submittal

The conceptual design submittal will include 11"x17" electronic PDFs of the plans produced under Tasks 8.1.1.1 through 8.1.1.3. The submittal will include one alternative for the entire corridor plus two (2) additional alternatives for the segment from Fourth Street to Burbank Street.

Deliverable(s):

1. 11"x17" planset for the entire corridor (electronic PDF).
2. 11"x17" planset for an alternative from Fourth Street to Burbank Street (electronic PDF).
3. 11"x17" planset for an alternative for the Central Avenue and Webster Street intersection (electronic PDF).