

EXHIBIT A

SCOPE OF SERVICES

The Terraphase Team has developed an approach to the Scope of Services that builds upon the City's 2017 Climate Vulnerability Assessment and 2021 Climate Action Plan. Our approach provides a comprehensive evaluation of how sea-level rise (SLR) may impact the San Leandro Shoreline and will be used to develop adaptation strategies that will ensure resilience of City assets, including people, infrastructure, and the natural environment. Our approach prioritizes the guiding principles established by the City to incorporate indigenous practices and provide the greatest benefit to the most vulnerable communities in San Leandro.

A.1 Task 1: Project Initiation

Task 1.1: Meeting with Staff and Consultant Team

The Terraphase Team (composed of Terraphase Engineering Inc. [Terraphase], Raimi & Associates [R+A], and Haley & Aldrich [H&A]) will participate in a project kickoff and orientation meeting. We will prepare presentation slides and facilitate a kick-off meeting with City staff to establish project expectations, confirm the project scope of work, and finalize proposed project timelines. The objectives of the meeting will be to introduce the consultant team to key stakeholders and City staff, clarify lines of communication and data-sharing practices, clarify any remaining scope of work or schedule questions, and identify any additional background materials needed. As a follow-up to the kick-off meeting, a proposed project workflow diagram and schedule will be prepared and finalized in response to City staff comments.

Additional follow-up ongoing project team meetings with City staff are proposed to occur every two months throughout the duration of the project; we estimate that the project duration will be approximately 18 months. Please see the estimated schedule in Section A.9.

In order to support Task 2.2, the Terraphase Team will work with the City to develop a comprehensive and diverse contact list of potential participants for personal and small group interviews that includes public officials, representatives from special districts and regional agencies, local community groups, service organizations, businesses, neighborhood groups, developers, local colleges, and other interest Groups.

Task 1 Deliverables

- Project Kick-Off Meeting preparation, meeting presentation development, and participation
- Project workflow diagram and schedule

A.2 Task 2: Compile Sea-Level Rise Data and Background Interviews

Task 2.1: Gather Sea-Level Rise Data with Groundwater Impacts and Flooding from Rainfall and Waves

The Terraphase Team will conduct a comprehensive Vulnerability Assessment to evaluate potential impacts to the City's shoreline assets due to climate change. The combined impacts of extreme precipitation events, surface water inundation from the bay, and groundwater rise under multiple SLR scenarios will be evaluated.

The assessment includes developing an asset inventory and asset mapping to quantify how those assets may be impacted by flooding. The Terraphase Team will compile all background information in

order to identify existing conditions and will prepare a set of base maps of the vulnerable assets identified in the 2021 San Leandro Climate Action Plan, including vulnerable and disadvantaged communities, critical infrastructure, critical community and emergency facilities, natural and cultural resources, planned levee adaptation projects, and industrial facilities that could potentially release chemicals if flooded.

The Terraphase Team will perform an exposure analysis for these vulnerable assets by mapping and quantifying flooding due to the combined effects of surface water inundation and groundwater rise for multiple SLR projections. SLR projections under the high risk-aversion scenario as presented in the 2018 Ocean Protection Council (OPC) guidance (OPC 2018) are approximately 24 inches (2 feet) by year 2050, and up to approximately 84 inches (7 feet) by year 2100 in the Bay Area. These projections provide the lower and upper bounds for evaluation of flooding impacts.

Several online tools and downloadable georeferenced databases that evaluate surface water inundation and/or groundwater rise in the Bay Area are available for use in this evaluation. Terraphase has conducted thorough reviews of the published reports and databases associated with each of these tools and has used them at multiple sites along the California coast, including at the Tony Lema Landfill in support of the long-term flood protection plan. Terraphase will evaluate the combined effects of surface water inundation and groundwater rise using the following datasets:

- Pathways Climate Institute LLC (Pathways) and the San Francisco Estuary Institute (SFEI) Shallow Groundwater Response to Sea-Level Rise study: Pathways and SFEI gathered and analyzed multiple data sets and collaborated with city and county partners to analyze and map the existing “highest annual” shallow groundwater table and its likely response to future SLR. Available data from this study include modeled depth to groundwater relative to a digital elevation model (DEM) of Bay Area topography under current conditions and future SLR scenarios from 12 to 108 inches. Terraphase is currently using these data to evaluate SLR vulnerabilities at the Tony Lema Landfill. Terraphase has also obtained the modified DEM used in this study to ensure that the current and future mapped scenarios of SLR are correctly superimposed onto key topographic features such as levees and other shoreline flood protection features.
- Bay Conservation and Development Commission (BCDC) Adapting to Rising Tides (ART) study: Available data from this study include raster data of the depth of land flooding due to SLR scenarios of 12 to 108 inches superimposed on current mean higher-high water (MHHW), shoreline overtopping depth, and identification of disconnected low-lying areas. Terraphase will overlay these datasets with the Pathways/SFEI datasets.
- United States Geologic Survey Coastal Storm Modeling System (USGS CoSMoS): This modeling system includes results of surface water inundation and groundwater rise for multiple SLR scenarios, and accounts for the influence on rising groundwater levels due to topography. This model system is important to use in the assessment because these raster datasets include not only surface water flooding for various SLR scenarios and storm frequencies (annual, 20-year and 100-year), but also include results of flood duration and wave height, both of which impact vulnerability and adaptive capacity.

These datasets will be compiled and evaluated to develop flood maps for each SLR scenario (from 24 to 84 inches [2 to 7 feet]). The maps will quantify the magnitude of flooding due to the combined impact of surface water inundation and groundwater rise and will be overlaid with the existing asset

conditions base maps.

The maps will be prepared for use in the stakeholder interviews conducted under Task 2.2.

Task 2.2 Background Report Work

The development of the Background Report will include a summary of findings from stakeholder interviews with the purpose of integrating racial equity into recommended strategies and prioritizing benefits to frontline communities and indigenous partners. The interview structure and protocol are designed to support an equitable shoreline adaptation master plan by capturing community residents' lived experiences, practices, expertise, and visions for the future.

Task 2.2.1 Schedule Interviews

As part of this task, the project team will contact potential participants from City departments and the community previously identified in Task 1.1. The team will begin by contacting leaders of existing community groups (e.g., San Leandro 2050, Common Vision, Unity in the Community) and indigenous partners (the Sogorea Te Land Trust/Confederated Villages of Lisjan [Ohlone]), who directly work with those most vulnerable, and can speak to the concerns and perspectives of communities that have been impacted by past discrimination and indigenous practices that increase resilience. These leaders will be leveraged for their networks to identify participants for either individual or small group interviews. We will also use snowball sampling where appropriate to identify additional individuals for interviews.

- Target number of interviews: 20 in total; combination of individual and/or small group
- Target City department interviews: 10 in total, combination of individual and/or small group
- Community stakeholder interviews: 10 in total, combination of individual and/or small group

Task 2.2.2 Prepare Materials for Interviews

The project team will develop contextual material to present to participants that include scenarios of surface water flooding and groundwater emergence for years 2050 and 2100 in the form of maps and other visuals that identify areas at risk. Maps will include locations of a preliminary list of critical infrastructure, resources, and assets at risk.

Task 2.2.3 Develop Survey Instrument and Protocol

The team will develop a series of interview questions that revolve around describing Challenges, Strengths, and Opportunities for shoreline adaptation strategies and desired goals of the shoreline master plan. Questions will be designed to be open-ended to encourage open conversation and connection between participants and the interviewer. The open-ended survey will be designed to be conducted via phone, video-call, or via an on-line survey tool, depending on the comfort of the participant. The stakeholder interview questions and approach is similar to the framework used by the consultant for the West Kaua'i Community Vulnerability Assessment.

Terraphase anticipates that a City translator will assist with multi-lingual translation of the questions for appropriate participants and translation during interviews.

Task 2.2.4 Interviews

Individual and group interview questions will be loosely grouped into the following categories and will be designed as semi-structured with the intention of encouraging open dialogue.

- **Background Questions:** Background information questions to ease the interviewee into the conversation.
- **Challenges:** Questions that address flooding and shoreline changes and impacts they are already seeing. The challenges draw directly from the lived experiences of the participants and are meant to elicit stories about the ways they have seen the shoreline change, and how flooding or shoreline loss impacts critical assets and places they care about. Maps with projected flooding scenarios will be presented with questions that address impacts of projected flooding to identify critical areas, assets, places that are of most concern, and elicit why they are important to them and their community.
- **Strengths:** Questions in this category focus on how the community is currently resilient and their adaptive capacity. Participants will be asked questions to help identify community assets, services, indigenous practices, organizations, and gathering locations that support social cohesion and increase community resilience. The aim is to elicit stories about how these places or practices currently support community, culture, economy, connection to place, and emergency response and recovery.
- **Opportunities:** These questions will be oriented around identifying community priorities for resilience and where the City should focus its efforts. Questions around what participants think are the most important aspects of their communities to protect, what is needed and what is not needed to further increase resilience for the future of San Leandro, and why. Interviewees will also be asked to describe current efforts to adapt, including planned projects, for example the Neptune Levy project, other shoreline projects, and the Long Beach Restoration Design Project.

Terraphase anticipates that the translation of interviews will be performed by the City's translation Services.

Task 2.2.5 Summarize Interview Findings

The team will summarize findings from the interviews in a concise Stakeholder Interview Summary memo. The memo will be organized by the participant group type or affiliation and organized into sections identifying Challenges, Strengths, and Opportunities. The information will be presented in such a way that the responses will be compiled in a simple to digest format for workshop presentations and to be shared with the public.

The Challenges section will identify shared SLR and flooding concerns; generally, how flooding and shoreline change might impact their environment, their economies, and their culture, including cultural traditions and practices. Specific critical facilities and assets that City department representatives and community members view as vulnerable will be identified, including but not limited to, food, water, wastewater, shelter, emergency services, recreation, gathering places, natural habitats, energy, communication, transportation, and contaminated sites.

The Strengths section will identify key resources, assets, services, and indigenous practices that serve as important resources for the community and increase resilience.

The Opportunities section will describe community priorities for the shoreline master plan and what assets, locations, or natural and cultural resources are the most important to protect. This section will also summarize why these priorities are important to the community and how they increase their individual or community resilience in the face of future SLR.

Task 2.2.6 Final Report - Stakeholder

A final version of the Stakeholder Interview Summary will be completed in a summary format appropriate for posting on the project or City website.

A.3 Task 3: Public Outreach

The Terraphase Team assumes the City will be responsible for public outreach tasks and will conduct community workshops independently.

A.4 Task 4: Develop Adaptation Response

Task 4.1 Develop Goals and Policies

Based on the deliverables from Task 2, The Terraphase Team will develop proposed goals and policies that the Shoreline Master Plan will intend to achieve.

We will review the preliminary goals and vision for the Master Plan and incorporate community feedback from Workshop #1 to support development of a finalized set of Adaptation Plan Goals and Policies. Established goals and objectives will serve as a basis for the development of specific strategies and will inform the City's future implementation efforts.

A three-step process will be followed to develop Goals and Policies:

1. Synthesize feedback collected during Tasks 1 through 3 to ensure that stated goals and objectives of the City, nonprofit organizations, community leaders, institutions, and other involved stakeholders are included;
2. Review adaptation goals and strategies included in the City's 2021 Climate Action Plan, the City's 2017 Climate Vulnerability Assessment, the City's Green Infrastructure Plan, the SFEI Adaptation Atlas, updated BCDC goals, the EPA Climate Ready Estuaries Synthesis of Adaptation Options for Coastal Areas, and additional locally relevant guidance, for best practices and models appropriate to the Region; and
3. Identify goals/objectives related directly to specific vulnerabilities of the City of San Leandro metropolitan area for the region to achieve.

The Goals and Policies will focus on improving community-wide public health, safety, and well-being and increasing the resilience of vulnerable populations against the hazards of flooding associated with SLR. Likewise, they will build upon existing efforts, including beach sand nourishment, past marshland habitat restoration, and erosion control.

The following project goals identified in the RFP will serve as a starting point for the Shoreline Master Plan goals:

- Create a resilient shoreline environment for people and ecology;
- Enhance the shoreline environment to reduce risk to critical infrastructure and physical assets;
- Build social resilience in the community;
- Build capacity for future generations to adapt to climate change;
- Engage frontline communities with multi-lingual and culturally relevant strategies to achieve the above goals.

Other potential goals we have preliminarily identified include the following:

- Build relationships and an organizing framework for advancing collaborative efforts among public and private landowners at a City-wide and regional scale;
- Improve the collective understanding of risks to shoreline resources and infrastructure from flooding, inundation, and groundwater emergence hazards associated with SLR in the City of San Leandro;
- Identify vulnerable populations and the interests of affected landowners and stakeholders, including non-transportation infrastructure (water, natural gas, electricity), municipal facilities, industrial facilities, recreational areas, and cultural resources;
- Identify feasible conceptual designs for SLR adaptation actions that protect infrastructure and are compatible with adjacent land and develop an implementation strategy;
- Develop tools for evaluating the costs and benefits of investing in adaptation projects.
- Proposed draft goals and policies will be compiled and submitted to City staff for further comment in order to support refinement and ultimate development of the final project goals and policies that will set the stage for the initial development of the Shoreline SLR Adaptation Master Plan.

Task 4.2 Develop Adaptation Strategies

The Terraphase Team will propose adaptation strategies and associated implementation actions that address shoreline vulnerabilities identified by the Team (and specific vulnerabilities identified in the 2017 Climate Vulnerability Assessment and the 2017 Human Services Gap Analysis), advance Shoreline Master Plan policies, achieve the Shoreline Master Plan goals, and complement the climate resilience efforts identified in the San Leandro Green Infrastructure Plan and Climate Action Plan. The proposed adaptation strategies and associated implementation actions will be feasible steps that the City of San Leandro can take to adapt to SLR and reduce vulnerabilities in both near-term and long-term planning Horizons.

The strategies and actions will also be informed by regional, state, and national “best practices,” for example:

- Regional: The BCDC’s ART program, the East Bay Regional Park District’s Risk Assessment and Adaptation Prioritization Plan (RAAPP), and the San Francisco Bay Shoreline Adaptation Atlas.
- State: The California Building Resilience Against Climate Effects (CalBRACE) Adaptation Planning Toolkit, the Adaptation Clearinghouse, the Adaptation Planning Guide, the Ocean Protection Council Sea Level Rise Guidance, Sea Level Rise Planning Guidance for California’s Coastal Zone, and the Coastal Commission Sea Level Rise Policy Guidance.
- Federal: FEMA’s resources on nature-based solutions, the EPA’s Workbook for Developing Risk-Based Adaptation Plans, and the U.S. Army Corps of Engineers’ Engineering with Nature guidance.
- Other: The American Planning Association (APA) Planning for Climate Mitigation and Adaptation report and the Georgetown Climate Center’s adaptation toolkits.

Working with the City, the Terraphase Team will develop SLR adaptation strategies and steps designed to implement the identified goals and objectives developed under Task 4.1. The purpose of this Task is to support development of the Implementation Master Plan to follow in pursuit of the goals and address identified SLR vulnerabilities. The following elements will be included in the development of specific City of San Leandro SLR adaptation implementation strategies:

- Stakeholder Engagement: Outreach to key stakeholders is critical to understanding vulnerabilities and selecting appropriate strategies for the community and local stakeholders. In addition, broader political support will be needed for many implementation strategies proposed, particularly regulatory in nature.
- Tools for Resource Support: This element of the adaptation strategy will provide guidance on using existing resources (technical assistance programs and funding) and identify possibilities for new resources to support adaptation implementation actions.
- Implementation Steps/Measures: Utilizing identified vulnerabilities and regional climate change adaptation goals and objectives, an inventory of recommended climate change adaptation strategies and steps will be provided that can be employed immediately and over time to reduce impacts. Measures will be identified that are relevant for both shoreline and inland areas and long term adaptation pathways will be presented. Considerations will include capital intensity, risk reduction potential, flexibility, and equity, as well as local, state, and regional policies.
- State and Federal Policies: There may be planning, policy, or regulatory initiatives at both the state and federal level that may require change for local municipalities to adapt to climate changes. Regulations/laws that we anticipate a need to review include, but are not limited to, federal and state wetlands legislation and the State Building Code.

The Terraphase Team will develop draft adaptation strategies for the identified key planning issues from past vulnerability assessments (San Leandro Climate Vulnerability Assessment 2017, San Leandro Climate Action Plan 2021) and based on recent regional guidance documentation (e.g., SFEI Adaptation Atlas). An updated shoreline SLR vulnerability assessment will also be conducted as part of this project to identify additional underlying vulnerabilities within the City that were not previously considered.

Maintaining the status quo or doing nothing can also result in expenditures and impacts to City shoreline resources. Adaptation strategies will be compared against maintaining the status quo option. General adaptation strategies are described below as defined by the California Coastal Commission (2015). It is anticipated that many recommended strategies and implementation actions will consider the following major categories of adaptation:

- Protection – Protection strategies refer to those strategies that employ some sort of engineered structure or other measure to defend resources/infrastructure in its current location. Protection strategies can be further divided into “hard” and “soft” defensive measures or armoring.
 - “Hard” armoring refers to engineered structures such as seawalls, revetments, and bulkheads that defend against coastal hazards like wave impacts, erosion, and flooding.
 - “Soft” armoring refers to the use of nature-based solutions or “green” infrastructure like beaches, dune systems, wetlands, and other systems to buffer coastal areas.
- Accommodation – Accommodation strategies refer to those strategies that employ methods that modify existing developments or design new developments to decrease hazard risks and thus increase the resiliency of development to the impacts of SLR. Flood-proofing and relocation of vulnerable utilities to higher elevation are examples of accommodation.
- Retreat – Retreat strategies are those strategies that relocate or remove existing development out of hazard areas and limit the construction of new development in vulnerable areas. These strategies include land use designations and zoning ordinances that encourage building in more resilient areas or gradually removing and relocating existing development. Acquisition and buy-out programs, transfer of development rights programs, and removal of structures are examples of strategies designed to encourage managed retreat.

The Terraphase Team will provide a variety of implementation actions for each adaptation strategy and identify a range of adaptation options that could apply within the study area. The following SLR adaptation strategies and specific implementation actions will be identified and developed:

- We will identify project concepts to address assets which are most at-risk and consider a range of intervention options including accommodation, protection (with natural or engineered features), and retreat. We will incorporate innovative physical strategies including natural infrastructure and multi-objective design objectives to the extent possible. This process will include the screening of potential options based on feasibility.
- We will develop conceptual designs for adaptation projects that are likely to be feasible and consistent with applicable regulatory constraints.
- We will identify trigger points to inform the development of timelines for planning the implementation of adaptation measures.
- We will develop a strategy for implementing specific adaptation projects to address the most significant risks within the study area.
- We will prepare preliminary planning level budgetary costs for key conceptual designs utilizing a format that facilitates estimating for a range of project scales and accounting for cost escalation over time.

The following potential adaptation options include some of the major categories of management goals common to estuarine programs (EPA Climate Ready Estuaries - Synthesis of Adaptation Options for Coastal Areas):

- Maintain/restore wetlands
- Maintain sediment transport
- Preserve coastal land/development (including infrastructure)
- Maintain shorelines utilizing “soft” measures
- Maintain shorelines utilizing “hard” measures
- Invasive species management
- Preserve habitat for vulnerable species
- Maintain water quality
- Maintain water availability

Each adaptation option may apply directly or indirectly to multiple management goals. For example, allowing wetlands to migrate inland will not only maintain wetlands, but could also directly address management goals of maintaining water quality and preserving habitat for vulnerable species. Adaptation options are categorized according to the management goal they most directly affect or address.

It is also important to note that some adaptation options may contribute to the protection of human infrastructure, while causing detrimental effects to natural systems; for example, shoreline hardening could adversely affect wetlands by preventing sediment transport essential to that ecosystem. Since shoreline hardening, softening, and retreat options (i.e., promote wetland migration) all have individual benefits for shoreline and coastal protection, it may be beneficial to develop a comprehensive shoreline plan outlining which areas can benefit from the appropriate shoreline protection approach. A comprehensive shoreline plan allows managers to take into consideration priorities and tradeoffs and consider implementing different options in different areas according to which resources are most in need of protection.

The Terraphase Team will also incorporate indigenous practices to increase SLR resilience, based on collaboration with partners such as the Sogorea Te Land Trust/Confederated Villages of Lisjan (Ohlone). Our team includes Mr. Trent Wilson, who is a Tribal resources expert. Having established strong relationships with Tribes throughout California, Mr. Wilson also assists local agencies with Tribal outreach related to program implementation and consultation requirements such as AB 52 requirements related to project implementation and California Environmental Quality Act (CEQA).

Every SLR adaptation strategy and action will be evaluated through an equity lens to ensure that, at a minimum, they do not exacerbate existing socioeconomic gaps, and when possible, reduce disproportionate vulnerabilities and socioeconomic disparities and provide benefits to communities that have been impacted by past discrimination.

The budget for Task 4.2 includes a site visit.

Task 4 Deliverables

- Proposed goals and policies based on a review of the deliverables from Task 2 and the outputs from Task 3.1.
- Revisions to draft goals and policies based on City comments and consideration of regional, state, and national “best practices” above.
- Proposed adaptation strategies and implementation actions informed by regional, state, and national “best practices” above.
- Two work sessions with City staff (one to discuss goals and policies, and one to discuss strategies and actions).

A.5 Task 5: Draft Shoreline Master Plan and Maps

Task 5.1: Develop Shoreline Master Plan Concept

Based on the final Task 2 and Task 4 deliverables that incorporate City comments, as well as community and agency input provided by the City from Task 3, the Terraphase Team will work with the City to prepare an Administrative Draft Shoreline Master Plan Concept. The Administrative Draft Shoreline Master Plan Concept will include a proposed outline of the Plan, draft goals, policies, and actions, and basic sample plan design and page layouts (not including specialized or project-specific branding and graphic design work). Credit for any financial contributions from the grant program will be credited on the cover of the report.

It is assumed that the Plan will be organized by goal area, with several policies per goal and several implementation actions per policy.

The Shoreline Master Plan will include an Adaptation Implementation Plan designed to facilitate the City’s implementation of the Plan, including actions to be taken by the City Council, the City Manager, and individual City departments, as appropriate.

The Adaption Implementation Plan will include an Equity Implementation Tool, which will serve as a framework for staff to advance racial equity throughout the life of the Shoreline Master Plan. The tool will be designed to guide City staff in thinking through the ways to incorporate racial equity into the climate adaptation actions identified in the Plan.

As a starting point, The Terraphase Team assumes that the Shoreline Master Plan will be organized as follows:

1. Prefatory Materials
 - a. Cover page
 - b. Acknowledgments
 - c. Land acknowledgment
 - d. Tables of Contents, Tables, and Figures
2. Executive Summary
3. Planning Context and Process (to be provided by the City)
 - a. Summary of and relationship to precedent studies, reports, plans, and policies
 - b. Summary of public outreach
4. Shoreline Master Plan (organized by goal area, with several policies per goal and several implementation actions per policy)
5. Adaptation Implementation Plan
 - a. Implementation Matrix (lead agency and timeframe for each action)
 - b. Funding Sources (from Task 5.3)
 - c. Equity Implementation Tool

The Shoreline Master Plan will focus on City actions and will not include complementary actions to be taken by community partners or county, state, or federal entities.

Task 5.2: First Draft Master Plan

Based on a single set of consolidated, non-conflicting City comments on the Draft Shoreline Master Plan Concept, the Terraphase Team will work with the City to prepare the First Draft Shoreline Master Plan. The First Draft Shoreline Master Plan will include all Plan components, including design concepts, goals, policies, actions, maps, and the implementation plan.

Task 5.3 – Funding Source Report

The Terraphase Team will provide potential funding information about implementation actions as requested to support the identification of potential funding sources. We will draw from case studies from towns and municipalities we are familiar with from around the country and our experience researching and implementing different financing mechanisms for both traditional gray infrastructure, as well as nature-based solutions. We will leverage our knowledge and experience developing the FEMA course, “Nature-Based Solutions for Hazards Mitigation,” that focuses on planning and funding mechanisms to implement nature-based solutions. In addition to identifying traditional federal funding sources (EPA, TIGER, NOAA, FEMA BRIC, and HUD CDBG), adaptation-specific funding at the state level will be identified, for example, the new transportation PROTECT and RAISE grants, as well as climate resilience grants from state agencies, such as the Coastal Conservancy and Integrated Climate Adaptation and Resiliency Program (ICARP). Our Team also has experience locally and nationally with municipal funding mechanisms, such as municipal bonds, environmental impact bonds, and the development of special taxes and financing districts. Alternative mechanisms such as public-private partnerships and the pooling of public and private investments will also be discussed. The report will lay out the benefits of these different financing mechanisms as well as important constraints and considerations.

Task 5.4: Second Draft Master Plan (Public Review)

Based on a single set of consolidated, non-conflicting City comments on the First Draft Shoreline Master Plan (Task 5.2) that incorporates community and agency feedback from the Task 3.3 Agency Work Session, the Terraphase Team will work with the City to prepare the Second/Public Review Draft Master Plan. The Second/Public Review Draft Master Plan will incorporate potential funding sources.

Task 5.5: Final Master Plan

Based on a single set of consolidated, non-conflicting City comments on the Second/Public Review Draft Master Plan that incorporate feedback from Task 3.2 Community Workshop #2, the Terraphase Team will work with the City to prepare the Final Draft of the Plan. The Final Master Plan will be the version presented to City Council for adoption.

Task 5 Deliverables

- Administrative Draft Shoreline Master Plan Concept (MS Word)
- First Draft Shoreline Master Plan (MS Word)
- Second/Public Review Draft Shoreline Master Plan (MS Word)
- Final Shoreline Master Plan (MS Word, PDF, hard copy)

A.6 Task 6: Adoption of the Final Plan

Task 6.2: Public Hearing with the San Leandro City Council

The Terraphase Team will participate in a preparatory meeting, attend the hearing, and present assigned sections of the presentation.

A.7 Task 7: Project Management

Task 7.1: Project Management and Invoicing

The following project and account management activities will be conducted throughout the duration of the project:

- Provide technical oversight of the project and ensure the full scope of work is completed on time and within the contractual budget.
- Implement quality assurance and quality control procedures for deliverables that are produced.
- Attend regular progress calls (assuming 1-hour meetings every 2 months – for a total of 18 months) with the City. These meetings will allow the team to review project progress, explore issues, identify resolutions, and provide recommendations regarding deliverables.
- Facilitate a project kickoff meeting with the District and project partners to review the scope of work; discuss goals, work plan approach, and schedule; and define roles and responsibilities.
- Prepare monthly invoices that detail the project performance to date.
- Supervise, coordinate, and monitor design development for conformance with standard engineering practices and other governing agency requirements.
- Notify the City of any changes in scope or budget as soon as possible, and propose actions, if necessary, to correct these changes.
- Provide responsive communication to the City by being available by phone or e-mail and responding in a timely fashion.
- Maintain Project files and provide monthly progress reports and invoices to the District, over the duration of the Project, consistent with the District's contract requirements. Monthly reporting will summarize work completed during the monthly invoicing period, including deliverables, an invoice detailing costs and staff hours by task, and a budget tracking table showing progress by task.

Terraphase understands that excellent project management is fundamental to the completion of a successful project. To that end, Terraphase has assigned an experienced Project Manager with a record of success to this project. This assignment of our well-qualified project leadership team will result in well-planned project activities, appropriately assigned staff, and reliable project outcomes.

The strength of Terraphase's contract and project management approach is our staff's prior successful experience working with our clients' PMs on various contracts and familiarity with different work scopes, procedures, deadlines, site access requirements, expectations for budget, deliverables, quality, and responsiveness. Our primary point-of-contact with San Leandro for contractual issues and new project assignments will be the lead for technical consultation and will be responsible for the overall quality of our services. The Terraphase PM will provide day-to-day project management duties and will maintain direct contact with the City's PM. The Terraphase PM will provide technical leadership and will be responsible for overall contract and project management, including budgeting, staffing, invoicing, scheduling, subcontractor oversight, and the overall quality of our services. As a team, we are fully committed to meeting our scope, schedule, and cost expectations.

The Terraphase Team is fully committed to meeting and exceeding the City's scope requirements described in the RFP. Our approach is to listen and understand the City's overall project objectives, cost constraints, and schedules to deliver the product that the City has asked for, rather than more than the City wants or less than is required. We appreciate the City's budget constraints, and we understand the importance of meeting cost expectations. We have successfully developed cost-effective project strategies on similar contracts with other municipality and government agency clients. We will maintain project cost control using our internal project management and cost accounting system database (Ajera). This accounting system provides real-time updates on Project costs and expenses to track spending and to ensure that the work scope is completed within budget.

Task 7.2: Project Coordination

A limited amount of time is required for project management, communications, and coordination that is not directly related to project tasks or deliverables.

Task 7 Deliverables

- Monthly invoices with updates on project tasks and deliverables
- Emails, phone calls, and meetings to coordinate with the City and key stakeholders

A.8 Scope of Work Assumptions

The following is a list of assumptions for the City of San Leandro's Shoreline SLR Adaptation Plan:

- The level of effort for each task is limited to the general number of hours for each task listed in the budget spreadsheet. The project manager may reallocate hours between tasks if individual tasks are completed in less time than anticipated.
- All project team meetings are assumed to be online. If in-person meetings are required, travel time and direct expenses will have to be added to the budget.
- Work products will be delivered in English. The scope and budget do not include any interpretation during meetings or translation of materials.
- All deliverables to be used for internal staff distribution will be submitted electronically.

A.9 Preliminary Project Schedule

The following preliminary project schedule identifies an approximate proposed timeline for the various tasks included in the Scope of Work.

Estimated Project Schedule
 City of San Leandro
 Shoreline Sea Level Rise Adaptation Plan

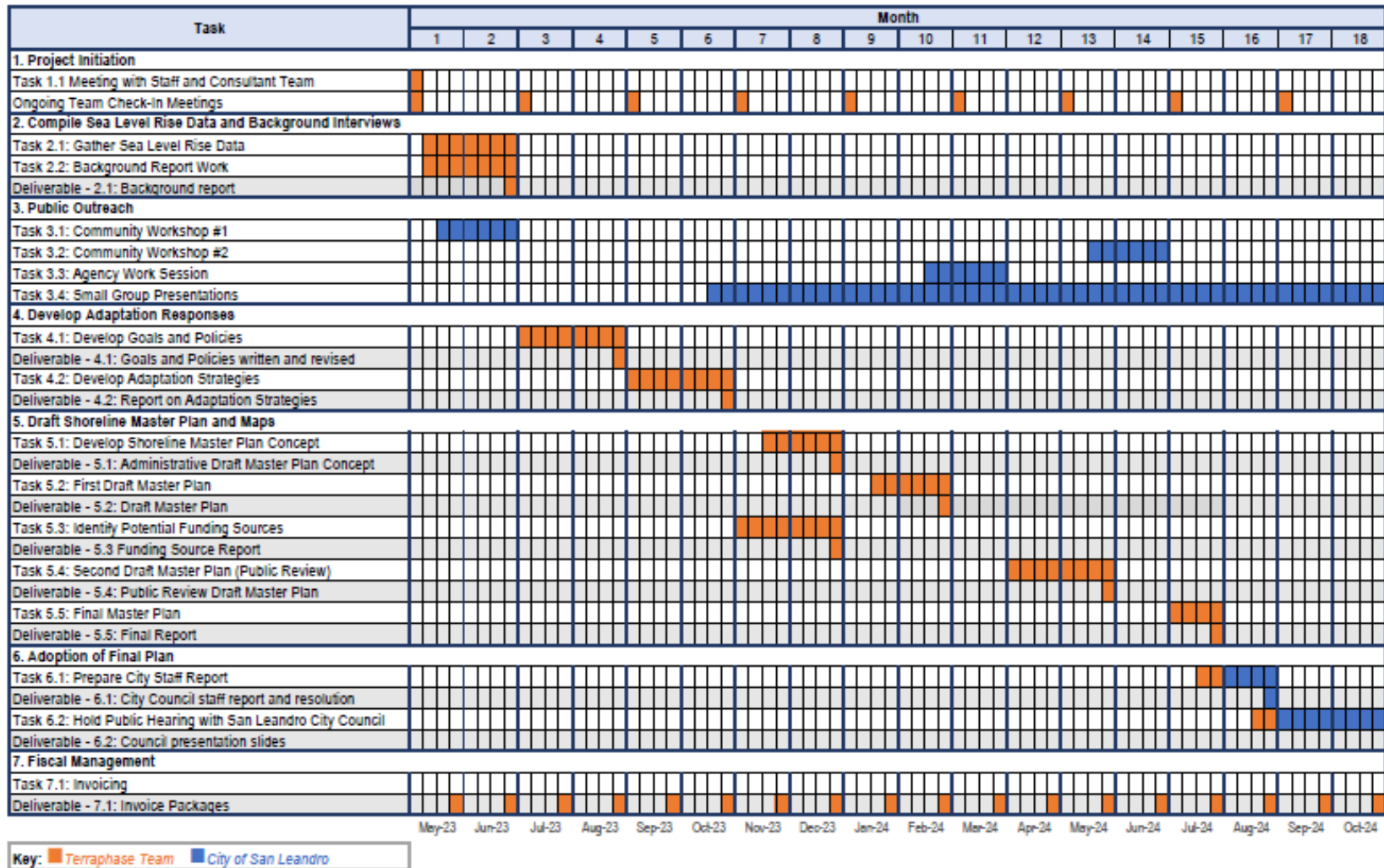


EXHIBIT B

COMPENSATION SCHEDULE & REIMBURSABLE EXPENSES

2023 Standard Schedule of Charges with 10% Discount/10% ODC

Labor Classification	Standard Hourly Rate	Hourly Rate with 10% Discount
Senior Principal	\$297	\$267.30
Principal Engineer/Scientist	\$278	\$250.20
Senior Associate Engineer/Scientist	\$259	\$233.10
Associate Engineer/Scientist	\$240	\$216.00
Senior Project Engineer/Scientist	\$225	\$202.50
Project Engineer/Scientist	\$210	\$189.00
Senior Staff 2 Engineer/Scientist	\$194	\$174.60
Senior Staff 1 Engineer/Scientist	\$177	\$159.30
Staff 2 Engineer/Scientist	\$158	\$142.20
Staff 1 Engineer/Scientist	\$137	\$123.30
Senior Technician	\$145	\$130.50
Technician 3	\$125	\$112.50
Technician 2	\$106	\$95.40
Technician 1	\$88	\$79.20
Senior Editor/Senior Project Coordinator	\$155	\$139.50
Editor 2/Project Coordinator 2/Accountant 2	\$135	\$121.50
Editor 1/Project Coordinator 1/Accountant 1	\$115	\$103.50
Administrator/Project Assistant/Billing Specialist	\$95	\$85.50

Labor Charges

All time will be recorded and charged to nearest 0.1 hour. Expert testimony at trials, hearings and depositions will be billed at 150% of the standard hourly rate. For each day when testimony is provided, a minimum of 8 hours will be billed. Preparatory time will be billed at standard rates.

Expenses

Subcontractor fees and other direct costs, such as air travel, project supplies and rental equipment, etc. will be itemized and billed at our cost plus a ten percent handling charge. Vehicle mileage when itemized is billed at the standard government rate in effect at the time of travel (www.gsa.gov/mileage).

Category	Units	2023 Standard Rate	Discount	Rate	Task 1: Project Initiation		Task 2: Compile Sea Level Rise Data and Background Interviews		Task 3: Public Outreach		Task 4: Develop Adaptation Responses		Task 5: Draft Shoreline Master Plan and Maps		Task 6: Adoption of Final Plan		Task 7: Fiscal Management		TOTALS			
					Qty	Cost	Qty	Cost	Qty	Cost	Qty	Cost	Qty	Cost	Qty	Cost	Qty	Cost	Qty	Cost	Qty	Cost
					Labor																	
Senior Principal	Hour	\$ 297.00	10%	\$ 267.30		\$ -		\$ -		1	\$ 267	1	\$ 267		\$ -		\$ -		2	\$ 535		
Principal	Hour	\$ 278.00	10%	\$ 250.20	4	\$ 1,001	6	\$ 1,501		24	\$ 6,005	6	\$ 1,501	8	\$ 2,002	2	\$ 500	50	\$ 12,510			
Senior Associate	Hour	\$ 259.00	10%	\$ 233.10	4	\$ 932	26	\$ 6,061			\$ -		\$ -		\$ -	20	\$ 4,662	50	\$ 11,655			
Associate	Hour	\$ 240.00	10%	\$ 216.00		\$ -		\$ -		2	\$ 432	2	\$ 432		\$ -		\$ -		4	\$ 864		
Senior Project	Hour	\$ 225.00	10%	\$ 202.50		\$ -	12	\$ 2,430			\$ -	4	\$ 810	2	\$ 405		\$ -		18	\$ 3,645		
Project	Hour	\$ 210.00	10%	\$ 189.00		\$ -	32	\$ 6,048		10	\$ 1,890	8	\$ 1,512		\$ -	15	\$ 2,835	65	\$ 12,285			
Senior Staff 2	Hour	\$ 194.00	10%	\$ 174.60		\$ -		\$ -			\$ -		\$ -		\$ -		\$ -		0	\$ -		
Senior Staff 1	Hour	\$ 177.00	10%	\$ 159.30		\$ -		\$ -			\$ -		\$ -		\$ -		\$ -		0	\$ -		
Staff 2	Hour	\$ 158.00	10%	\$ 142.20		\$ -		\$ -			\$ -		\$ -		\$ -		\$ -		0	\$ -		
Senior Editor/ Senior Project Coordinator	Hour	\$ 155.00	10%	\$ 139.50		\$ -		\$ -			\$ -		\$ -		\$ -		\$ -		0	\$ -		
Senior Technician	Hour	\$ 145.00	10%	\$ 130.50		\$ -		\$ -			\$ -		\$ -		\$ -		\$ -		0	\$ -		
Staff 1	Hour	\$ 137.00	10%	\$ 123.30		\$ -		\$ -			\$ -		\$ -		\$ -		\$ -		0	\$ -		
Editor 2/Project Coordinator 2/Accountant 2	Hour	\$ 135.00	10%	\$ 121.50		\$ -	5	\$ 608		6	\$ 729	6	\$ 729	6	\$ 729	14	\$ 1,701	37	\$ 4,496			
Technician 3	Hour	\$ 125.00	10%	\$ 112.50		\$ -		\$ -			\$ -		\$ -		\$ -		\$ -		0	\$ -		
Editor 1/Project Coordinator 1/Accountant 1	Hour	\$ 115.00	10%	\$ 103.50		\$ -		\$ -			\$ -		\$ -		\$ -		\$ -		0	\$ -		
Technician 2	Hour	\$ 106.00	10%	\$ 95.40		\$ -		\$ -			\$ -		\$ -		\$ -		\$ -		0	\$ -		
Technician 1	Hour	\$ 88.00	10%	\$ 79.20		\$ -		\$ -			\$ -		\$ -		\$ -		\$ -		0	\$ -		
Total Terraphase Labor						\$ 1,933		\$ 16,647			\$ 9,323		\$ 5,252		\$ 3,136		\$ 9,698		\$ 45,989			
Direct Costs																						
Subcontractor																						
Raimi + Associates	Total	\$ 59,217.00		\$ 59,217.00	0.0311	\$ 1,840		\$ -		0.1434	\$ 8,490	0.6721	\$ 39,800		\$ -	0.1535	\$ 9,087	1	\$ 59,217			
Haley & Aldrich	Total	\$ 45,319.00		\$ 45,319.00	0.0207	\$ 940	0.752	\$ 34,080		0.0104	\$ 470	0.1653	\$ 7,490		\$ -	0.0516	\$ 2,339	1	\$ 45,319			
Total Subcontractor Costs						\$ 2,780		\$ 34,080			\$ 8,960		\$ 47,290		\$ -		\$ 11,426		\$ 104,536			
Other Direct Costs																						
Total Other Direct Costs						\$ -		\$ -			\$ -		\$ -		\$ -		\$ -		\$ -			
Direct Cost Handling		10%		10.0%		\$ 278		\$ 3,408			\$ 896		\$ 4,729		\$ -		\$ 1,143		\$ 10,454			
Total Direct Costs						\$ 3,058		\$ 37,488			\$ 9,856		\$ 52,019		\$ -		\$ 12,569		\$ 114,989			
Terraphase Equipment/Supplies (ERS)																						
Truck/Vehicle (day)	Day	\$ 184.00		\$ 184.00		\$ -		\$ -			\$ -		\$ -		\$ -		\$ -		0	\$ -		
iPad and Electronic Field Data (day)	Day	\$ 35.00		\$ 35.00		\$ -		\$ -			\$ -		\$ -		\$ -		\$ -		0	\$ -		
Daily Consumables (Includes gloves, ziplock bags and trash bags)	Each	\$ 21.00		\$ 21.00		\$ -		\$ -			\$ -		\$ -		\$ -		\$ -		0	\$ -		
Field Health and Safety and Decon Supplies (daily fee)	Day	\$ 30.00		\$ 30.00		\$ -		\$ -			\$ -		\$ -		\$ -		\$ -		0	\$ -		
Total Terraphase Equipment/Supplies (ERS)						\$ -		\$ -			\$ -		\$ -		\$ -		\$ -		\$ -			
Travel Costs																						
Mileage	mile	\$ 0.655		\$ 0.655		\$ -		\$ -			\$ -		\$ -		\$ -		\$ -		0	\$ -		
Total Travel Costs						\$ -		\$ -			\$ -		\$ -		\$ -		\$ -		\$ -			
Total Estimated Project Unit Costs						\$ 4,991		\$ 54,135			\$ 19,179		\$ 57,270		\$ 3,136		\$ 22,267		\$ 160,979			

Budget Estimate: City of San Leandro

Hours per Task	Raimi + Associates						Labor Cost Per Task
	Whitmore (Principal)	Yurkovich (Principal)	Reinhalter (Associate)	Reynoso (Senior Planner)	Wong (Intermediate Planner)	Ledezma (Graphic Designer)	
	\$275	\$275	\$210	\$185	\$170	\$110	
Task 1: Project Initiation							
1.1 Meeting with Staff and Consultant Team	4			4			1,840
Subtotal Task 1	4	-	-	4	-	-	1,840
Task 3: Public Outreach							
3.1 Community Workshop #1							-
3.2 Community Workshop #2							-
3.3 Agency Work Session							-
Subtotal Task 3	-	-	-	-	-	-	-
Task 4: Develop Adaptation Response							
4.1 Develop Goals and Policies	3	2	2	4	4		3,215
4.2 Develop Adaptation Strategies	6	2	2	7	8		5,275
Subtotal Task 4	9	4	4	11	12		8,490
Task 5: Draft Shoreline Master Plan and Maps							
5.1 Develop Shoreline Master Plan Concept	8	4	4	24	24	16	14,420
5.2 First Draft Master Plan	8			30	30		12,850
5.3 Funding Source Report				2	2		710
5.4 Second Draft Master Plan (Public Review)	8			16	16		7,880
5.5 Final Master Plan	4			8	8		3,940
Subtotal Task 5	28	4	4	80	80	16	39,800
Task 6: Adoption of the Final Plan							
6.1 Public Hearing with the San Leandro City Council							-
Subtotal Task 6	-	-	-	-	-	-	-
Task 7: Management							
7.1 Invoicing	5			14			3,965
7.2 Project Coordination	12						3,300
Subtotal Task 7	17	-	-	14	-	-	7,265
Total Hours	58	8	8	109	92	16	
Billing Rate	\$275	\$275	\$210	\$185	\$170	\$110	
Labor Cost	\$15,950	\$2,200	\$1,680	\$20,165	\$15,640	\$1,760	
Total Firm Labor Cost							\$57,395
EXPENSES (MND)							
Mileage and Travel Expenses							\$ 100
Office Expenses (3%)							\$ 1,722
Total Expenses							\$ 1,822
GRAND TOTAL							\$59,217

Budget Estimate: City of San Leandro

Hours per Task	Haley & Aldrich						Labor Cost Per Task
	Spirandelli (Senior Assoc.)	Owens (Specialist)	Project Controller				
Task 1: Project Initiation	\$235	\$175	\$143				
1.1 Meeting with Staff and Consultant Team	4						940
Subtotal Task 1	4	-	-	-	-	-	940
Task 2.2: Background Interviews							
2.2.1 Schedule Interviews	4	10					2,690
2.2.2 Prepare materials for interviews	4						940
2.2.3 Develop survey instrument and protocol	20	20					8,200
2.2.4 Interviews	20						4,700
2.2.5 Summarize Findings	20	40					11,700
2.2.6 Final Report Stakeholder Interview Summary	10	20					5,850
Subtotal Task 1	78	90	-			-	34,080
Task 4: Develop Adaptation Response							
4.1 Develop Goals and Policies							-
4.2 Develop Adaptation Strategies	2						470
Subtotal Task 4	2						470
Task 5: Draft Shoreline Master Plan and Maps							
5.1 Develop Shoreline Master Plan Concept							-
5.2 First Draft Master Plan	2						470
5.3 Funding Source Report	10	24					6,550
5.4 Second Draft Master Plan (Public Review)	2						470
5.5 Final Master Plan							-
Subtotal Task 5	14	24					7,490
Task 6: Adoption of the Final Plan							
6.1 Public Hearing with the San Leandro City Council							-
Subtotal Task 6	-	-	-			-	-
Task 7: Management							
7.1 Invoicing	2		3				899
7.2 Project Coordination	4						940
Subtotal Task 7	6	-	3	-	-	-	1,839
Total Hours	104	114	3	-	-	-	
Billing Rate	\$235	\$175	\$143	\$0	\$0	\$0	
Labor Cost	\$24,440	\$19,950	\$429	\$0	\$0	\$0	
Total Firm Labor Cost							\$44,819
EXPENSES (MND)							
Mileage and Travel Expenses							
Office Expenses (Phone, Copies, etc.)							\$ 500
Total Expenses							\$ 500
GRAND TOTAL							\$45,319