

LOCAL PARTNERS BRIEFING BOOK
COLUMBIA RIVER CROSSING PROJECT

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1. INTRODUCTION

As the Columbia River Crossing Project moves ahead between now and mid-2005, working closely with local partner agencies and organizations will be critical. This briefing book is designed to support ongoing discussions between the joint WSDOT/ODOT project team and leadership of regional agencies. It pulls together current plans and information for the pre-EIS phase of the project, and is designed to be updated regularly as project information evolves and plans are updated. The briefing book is divided into the following sections, representing categories of key questions to be answered in this phase:

- Scoping/DEIS Process
- Conceptual Engineering/Environmental
- Finance/Tolling
- Traffic/Transit
- Regulatory
- Communications and Outreach

Information is included in each section on the questions the work is designed to answer, what contractors are working on them, and milestones and work products planned. Copies of technical work products completed to date are included in each section. Consultant scopes of work and project budget and cost information, as well as documentation of RCC meetings to date, are included. Finally, project team contact information is included as the last section.

Briefing Book Contents Dated August 27, 2004
Updated as of _____

2. SCOPING/DEIS PROCESS

Tasks under way to support scoping and DEIS issues related to the scope of the Columbia River Crossing Project are designed to answer to following questions:

Project Purpose and Need

1. *Why is this project being proposed?*
2. *What regional problems is this project designed to address? What is the current status of those problems and what are future projections with and without this project?*
3. *What is the history of this project planning? What options have been considered and how have they been analyzed? What review criteria were applied? What were the results and recommendations of prior evaluation?*
4. *What promising options are under consideration? How will these options be analyzed prior to the DEIS and preliminary engineering?*
5. *What reasonable options not discussed in the Strategic Plan phase may need study now? Which options were not carried forward and why?*
6. *What options are proposed to be carried forward into scoping and the DEIS and why?*

Process/Structure

1. *Will there be one process for both transit and highway elements, or a separate process for each?*
2. *How will the DEIS be structured to meet both FHWA and FTA requirements?*
3. *Will the EIS process be "one-tier" or "two-tier?"*

Post Scoping

1. *Preliminary product: Which options are proposed to be evaluated in the DEIS and why?*
2. *Final product: Which options will be evaluated in the DEIS?*

Contractor support for answering these questions is coming from The Larkin Group, Inc., supported by Underhill Company LLC and Daniels Consulting, Inc.

Task milestones and deliverables currently scoped will include the following:

- WP 13.1 – Environmental Justice Plan for Contractors (August 2004)
- TM 1.6 -- Purpose and Need Statement (September 2004)
- WP 10.1 – Project Justification (September 2004)
- TM 1.4 – Evaluation of Process and Organizational Issues on Structure of DEIS (November 2004)
- TM 8.10 – Project Organization Options (February 2005)
- WP 1.7.2 – Procedural, Timing, Funding and Regulatory Issues (February 2004)
- TM 1.8.1 – Evaluation of Alternatives to Commence Scoping (February 2005)
- WP – Notice of Intent (March 2005)

- **TM 7.6 – Project Development Process and Schedule for Alternatives Examined in DEIS (March 2005)**
- **TM 1.8.6 – Evaluation of Alternatives at Conclusion of Scoping (June 2005)**
- **TM 1.8.7 – Conceptual Development of Alternatives Report (July 2005)**

3. CONCEPTUAL ENGINEERING/ENVIRONMENTAL

Tasks under way to support conceptual engineering and environmental issues related to the scope of the Columbia River Crossing Project are designed to answer to following questions:

Design/Engineering

1. *Which options discussed in the Strategic Plan need further study? What other options (not in the Strategic Plan) should be addressed?*
2. *To what extent does previous work provide adequate technical information to analyze bridge options prior to scoping?*
3. *What design requirements are imposed on the I-5 bridge design by the various design manuals that apply to the project? How do they affect project design? Do any design requirements conflict with each other? If so, how can the conflicting requirements be reconciled?*
4. *What revisions are required in previous conceptual designs to address: (a) toll collection; (b) vertical clearance; and (c) channel issues?*
5. *What are the key engineering considerations related to construction and how do they affect design options?*
6. *In the contractor's judgment, which freeway/bridge options and design options constitute a reasonable range of options for the DEIS? What additional freeway or interchange improvements need further refinement? What refinements in concept drawings and cost estimates are required to ensure consistent analysis of options?*

Environmental

1. *What environmental issues need to be addressed to complete NEPA scoping?*

Contractor support for answering these questions is coming from Kittelson & Associates, supported by Parsons Brinckerhoff, CH2MHill, Right of Way Associates, Howell Consulting, and J.D. White Company.

Task milestones and deliverables currently scoped will include the following:

- TM B.1.1 – Source Document Request (August 2004)
- TM B.1.5 – Evaluation of Design Guidelines and Criteria (September 2004)
- TM B.1.6 – Design Criteria Issues (September 2004)
- TM 14.1.1 – Design Competition Research (September 2004)
- WP 14.3 – Draft and Final Contact Summary (September 2004)
- WP 14.4 – Draft and Final Project Information Packet (September 2004)
- WP 14.5 – University Contact List (September 2004)
- TM B.1.7 – Web-Integrated Database (October 2004)
- TM B.2.3 – Assessment of Alternative Information and Analysis (October 2004)
- TM b.2.4 – Identification of Additional Analysis (October 2004)
- TM B.3.4 – Boat Survey (October 2004)
- WP 14.9(a) – Design Jury Selection Criteria (October 2004)
- WP 14.9(b) – Design Jury Training Curriculum (November 2005)

- WP 14.10 – Draft and Final Public Information Program – Design Competition (November 2004)
- TM B.2.5 – Initial Refined Phase II SOW (November 2004)
- TM B.2.5 – Final Refined Phase II SOW (November 2004)

4. FINANCE/TOLLING

Tasks under way to support finance and tolling issues related to the scope of the Columbia River Crossing Project are designed to answer to following questions:

Establishing Assumptions

1. *What baseline assumptions regarding highway costs and revenues should be used in early analysis of project options? In particular, what costs can the project support without tolling or with "partial-tolling?"*
2. *What assumptions should be used for each transit agency's share of capital and operating costs?*
3. *What assumptions should be used for future year transit networks, service levels, costs and revenues?*
4. *What assumptions should be used for capital and operating costs for an HCT project across the Columbia River? What revenue sources are available to meet these costs? How might funds be obtained?*

Tolling Options

1. *What tolling options could likely be implemented for this project?*
2. *What tolling options, including toll rate structures should be considered in scoping and the DEIS and why?*

Toll Collection Modeling and Management

1. *Should the existing VISSIM model be used as is or should it be modified to evaluate toll plaza designs and configurations? If it should not be used, what model should be used and why?*
2. *What are the operational, revenue and traffic impacts of collecting tolls in Oregon only (northbound), in Washington only (southbound), or in both directions?*
3. *What approaches to electronic toll collection should be evaluated in the DEIS and why?*

Tolling and Regulations

1. *Can tolls allowed under federal statute be collected under state statutes?*
2. *Do Washington and Oregon statutes support the use of toll revenues as local matching funds and, if not, how would the statutes have to be changed to do so?*
3. *Can toll revenues be used as local match dollars for I-5 and non-I-5 project elements?*

Approaches

1. *What revenue sources other than tolls are likely to be available to support the project, how much and when?*
2. *Would there be cost savings (and if so, how much) if all or part of an HCT project were built without federal funds?*
3. *Which tolling authority options could support broad project objectives of CRC project, how and why?*

DEIS Options

1. *Which set of financial strategies should be evaluated during scoping and in the DEIS and why?*
2. *What toll rate structures should be carried forward for evaluation in the DEIS?*
3. *What will be the process and schedule for analyzing financial options in the DEIS?*

Contractor support for answering these questions is coming from the Larkin Group, Inc., supported by Siegel Consulting, Underhill Company LLC, Daniels Consulting, Inc., and Vollmer Associates, LLP.

Task milestones and deliverables currently scoped will include the following:

- TM 6.1 – Survey of Tolling Experiences in Other Areas (Complete)
- TM 8.2 – Analysis of Tolling Authority Options for Columbia River Bridges (Complete)
- WP 5.1 – Toll Rate Structure Options (Complete)
- TM 8.3 – Evaluate Potential Use of Tolling Revenues (Complete)
- WP 5.2 – Location of Toll Collection Options (August 2004)
- WP 5.3 – Sale and Distribution of Electronic Passes (August 2004)
- TM 8.4 – Potential Use of Toll Revenues as Local Match Credit for Multi-Modal (September 2004)
- TM 7.2 – Potential Federal, State and Local Funding Sources for Highway/Bridge (September 2004)
- WP 7.1 – Preliminary Assumption Regarding Highway Costs and Revenues (September 2004)
- TM 5.5 – Identification of Toll Rate Structure (September 2004)
- TM 7.3 – Toll System Options to Be Studied (October 2004)
- WP 14.7.1 – Draft and Final Stipend Policy (October 2004)
- TM 6.3 – Evaluation of Tolling Options for Columbia River Crossing (January 2005)
- TM 12.1 Final Report on Results of Evaluation (January 2005)
- TM 7.4 – Evaluation of Capital and Operating Requirements for Transit (February 2005)
- TM 7.5 – Preliminary Financial Strategy Options for Scoping Evaluation (March 2005)
- TM 7.7 – Final Financial Strategy Options to Be Examined in DEIS (August 2005)

5. TRAFFIC/TRANSIT

Tasks under way to support traffic and transit issues related to the scope of the Columbia River Crossing Project are designed to answer to following questions:

Forecasting Assumptions

1. *What basic travel forecasting assumptions will be used in the DEIS analysis?*

Data/Analysis

1. *Are existing traffic analyses and forecasts and engineering work adequate to identify and evaluate tolling options and road/bridge improvements, or must additional work be done?*
2. *What data and analysis is needed to analyze I-205 river crossing options?*
3. *What are the 2020 projected traffic volumes, speeds and delay for major facilities within the bridge improvement area?*
4. *What are the forecast Columbia River crossings by vehicle type and trip purpose?*
5. *What are the crossing forecasts for interim years between the start-up of tolls and 2025?*

Travel Demand Modeling

1. *What are the strengths and weaknesses of travel demand forecasting models relative to evaluating tolling concepts?*
2. *What model does the contractor recommend be used in this project?*

Comparing Performance of Options

1. *Based on historic traffic data, which tolling options should be evaluated?*
2. *Of the reasonable tolling options, is their performance similar enough that a single option can be studied in the DEIS, or must multiple options be carried forward?*
3. *Looking at toll rate structures, toll system options, and toll facility design, what are the toll revenues associated with each? What are the traffic, diversion, travel times, delay and service levels for each forecasted concept?*
 - *What are the impacts on user types?*
 - *How do options proposed to be carried forward into the DEIS perform relative to those that are not?*
4. *Looking at the toll facility design and configuration options, what are the traffic, diversion, travel times, delay and service levels for each forecasted concept?*
 - *What are the impacts on user types?*
 - *How do options proposed to be carried forward into the DEIS perform relative to those that are not?*
5. *Looking at the bridge/freeway improvements, what are the traffic, diversion, travel times, delay and service levels for each forecasted concept?*
 - *What are the impacts on user types?*
 - *How do options proposed to be carried forward into the DEIS perform relative to those that are not?*
6. *Looking at the freeway/bridge operating options (i.e. HOV, truck-only), what are the traffic, diversion, travel times, delay and service levels for each forecasted option?*

- *What are the impacts on user types?*
 - *How do options proposed to be carried forward into the DEIS perform relative to those that are not?*
7. *What are the operational, revenue and traffic impacts of collecting tolls in Oregon only (northbound), in Washington only (southbound), or in both directions?*
 8. *What toll rate structures should be carried forward for evaluation in the DEIS?*
 9. *What approaches to electronic toll collection should be evaluated in the DEIS and why?*

Comparisons to No Build and Baseline

1. *How do Strategic Plan options compare to the No Build and Baseline with respect to:*
 - *Revenues?*
 - *Traffic volumes and diversion?*
 - *Traffic characteristics such as vehicle type and trip type?*
 - *Transit and HOV use?*
 - *Electronic versus manual toll payers?*
 - *Toll rate structures proposed to be carried into the DEIS and those not proposed to be?*
 - *Toll rates that can optimize revenues?*
 - *Elasticity of toll rates?*

Operations/Physical Design

1. *What would be the impacts of operating HOV lane(s) with respect to travel time and congestion, and numbers of HOVs?*
2. *How do HOV performance and impacts change with different bridge options and different tolling options?*
3. *Could trucks use an HOV lane? If so, what would be the benefits and impacts?*
4. *What would be the benefits and impacts of operating a truck-only lane in each direction, or one reversible truck-only lane?*
5. *What are the physical requirements of different toll plaza options and how many vehicles per hour can each accommodate?*

Technology

1. *How do different tolling technologies, hardware, and software products perform relative to each other?*

Contractor support for these questions is coming from David Evans Associates, supported by Parisi Associates and Vollmer Associates LLP.

Task milestones and deliverables currently scoped will include the following:

- WP 3.1 – Identification and Evaluation of Toll Models (Complete)
- WP 3.3 – Identification and Evaluation of Plaza Operation Models (Complete)
- WP 4.2 – Listing of Available and Needed Traffic Data (Complete)
- TM 4.3 – Travel and Traffic Trends (Complete)

- WP 2.6 – Existing Information Data Review for Screening Alternatives and Tolling Options (Complete)
- WP 2.8 – Preliminary Identification of Freeway/Bridge Alternatives and Design Options (August 2004)

6. REGULATORY

Tasks under way to support regulatory issues related to the scope of the Columbia River Crossing Project are designed to answer to following questions:

General

1. *How are, or are not, existing plans consistent with recommendations of I-5 Trade and Transportation Partnership?*

Federal

1. *What key project issues are of concern to federal agencies?*
2. *Are FHWA and FTA in agreement on how the DEIS will be prepared?*
3. *Have the federal context sensitive design requirements been met for this project? What issues have been identified (procedural, scheduling, technical, funding, regulatory) for each concept?*
4. *How must this project be defined so that it can be tolled, under federal statutes?*
5. *How do the federal statutes regarding tolling apply to each of the bridges, I-5 and I-205?*
6. *How do federal tolling statutes specifically apply to multi-modal and two-bridge options?*

Product: Project Development Agreement between the DOTs and the federal agencies describing how project will go forward through DEIS and PE.

State

1. *What key project issues are of concern to state agencies?*
7. *Have state Context Sensitive Design requirements been met for this project? What issues have been identified (procedural, scheduling, technical, funding, regulatory) for each concept?*
2. *What changes, additions or amendments are needed in each of the state plans and policies to ensure that they are consistent with the project options to be evaluated in the DEIS?*
3. *What are potential legislative or procedural remedies to identified issues?*
4. *Do Washington and Oregon statutes support the use of toll revenues as local matching funds and, if not, how would they have to be changed to do so?*
5. *How must state statutes be amended to provide maximum and/or desired flexibility with regards to collection and use of toll revenues?*
6. *Under Washington statutes:*
 - *Can light rail elements be funded as part of a toll bridge project?*
 - *Can a replacement bridge be tolled (or must the project be a "supplemental" bridge)?*
 - *Can ODOT operate the bridges and impose tolls?*
 - *Can the I-205 Bridge be tolled as part of an I-5 project?*
 - *What are the other bi-state, funding, procedural and allowable options limitations imposed?*
 - *What are potential legislative or procedural remedies to identified issues?*

9. *Under Oregon statutes:*

- *What project options can be financed by toll revenues?*
- *How can toll revenue from both bridges be used to finance project options?*

Regional/Local

1. *What key project issues are of concern to regional and local agencies?*
2. *What changes, additions or amendments are needed in each of the local and regional plans and policies to ensure that they are consistent with the project options to be evaluated in the DEIS?*

Contractor support for these questions is coming from The Larkin Group, Inc., supported by Underhill Company LLC, Parisi Associates, and Vollmer Associates LLP.

Task milestones and deliverables currently scoped will include the following:

- TM 8.1 – Analysis of Issues Caused by Federal Tolling Statutes (Complete)
- TM 8.6.1 – OR Laws and Regulations; Part 1: Oregon Statutes Governing the Imposition of Tolls (Complete)
- TM 8.5 – The Effect of Washington Statutory and Regulatory Provisions (October 2004)
- TM 8.6 – The Effect of Oregon Statutory and Regulatory Provisions (October 2004)
- TM 8.7 – The Effect of Federal Statutory and Regulatory Provisions (October 2004)
- TM 8.9 – Assessment of Merits and Requirements of a Bi-State Compact (November 2004)
- TM 8.8 – Bi-State Coordination Requirements (November 2004)

7. COMMUNICATIONS AND OUTREACH

Tasks in planning to support communications and outreach related to the scope of the Columbia River Crossing Project are designed to meet the following objectives:

- Engage actively and systematically with representatives of affected communities and a representative spectrum of interested citizens to create understanding of the project's goals and strategic importance.
- Clearly describe the objectives of the alternatives development and environmental scoping phase and the options to engage the affected communities in an interactive and meaningful way to understand and address public ideas and preferences.
- Provide forums for discussing issues and opportunities identified during this phase of the project, weighing potential tradeoffs, and developing promising options.
- Create a feedback loop to demonstrate how public input shapes project activities and decisions in this phased project approach.
- Systematically gather and document input to help shape project options and influence project decisions, setting the stage for the next phases of design, environmental review, and funding discussions.
- Lay the groundwork to develop an understanding of the communities' histories, values, and priorities for the future, in accordance with the principles of designing context-sensitive and sustainable solutions.
- Assemble the communications and outreach tools needed to inform and involve a broad set of interests, including tailored outreach to low-income and minority populations within the project area.

The public communications and outreach plan, scope of services, and deliverables for this work are both in progress, and will be available shortly. Analysis of environmental justice populations to support outreach to low income and minority populations is under way, using the work done on the I-5 Transportation and Trade Partnership and the I-5: Delta Park to Lombard Project as the base of information.

Contractor support for communications and outreach is led by EnviroIssues through an on-call contract with HNTB, and supported by the J.D. White Company, Markgraf Associates, and Jeanne Lawson Associates.

8. SCOPES OF WORK FOR PROJECT CONSULTANTS

- **The Larkin Group, Inc. - Technical Analysis**
- **Kittleson and Associates, Inc. – Conceptual Engineering and Environmental Analysis**
- **David Evans and Associates, Inc. – Traffic and Tolling Analysis**
- **HNTB – Communications and Outreach (still being developed)**

The Larkin Group, Inc. - Technical Analysis

Task 1 "Scope" Assumptions, Alternatives and Issues for DEIS

Purpose

Provide the technical materials and intergovernmental coordination necessary to allow Agency and WSDOT to "scope" the alternatives, assumptions and issues to be addressed in the DEIS. Seek to narrow the alternatives and issues, in the manner permitted by National Environmental Policy Act (NEPA), State Environmental Policy Act (SEPA), Growth Management Act (GMA) and Federal Highway Administration (FHWA)/Federal Transit Administration (FTA) regulations, and to specify alternatives, assumptions and issues in detail as a way to facilitate timely completion of the DEIS.

Work Activities: Task 1

With Regard to Task 1, Contractor in consultation with Agency, WSDOT, Tri-Met, C-Tran, RTC and Metro shall:

- 1.1 Determine how Project will comply with FHWA, FTA and other federal and state requirements.
Contractor shall:
 - 1.1.1 Conduct a "Kick-Off" meeting with Clark County Transit District (C-Tran), Tri-Met, Metro, RTC, WSDOT and Agency to determine transit options and issues to be addressed.
 - 1.1.2 Conduct a "Kick-Off" meeting with FTA and FHWA to discuss how to coordinate state and federal issues.
- 1.2 Establish travel forecasting assumptions to be used in estimating travel and impacts in the DEIS, including:
 - (a) TDM assumptions,
 - (b) Transit network assumptions,
 - (c) Road network assumptions,
 - (d) Coordinated assumptions with Delta Park-Lombard Project, and
 - (e) Land use assumptions.
- 1.3 Fulfill "early coordination" requirements with affected state and federal agencies to determine:
 - (a) Lead Agency (or Joint Lead Agencies) and Cooperating Agencies;
 - (b) Specific environmental issues to be addressed in DEIS, and
 - (c) Assumptions, methodologies and level of analysis required in the environmental documents.
- 1.4 Prepare an analysis and propose the most appropriate process for undertaking the DEIS that considers
 - (a) Whether project development should be undertaken as a single, multi-modal process (and document) or have a separate process and document for transit and highway,
 - (b) If a single, multi-modal process is proposed, and Joint Lead Agencies involved, identify a mutually acceptable "joint" process for EIS work and FHWA and FTA approvals, and
 - (c) Whether a one-tier or two-tier EIS process should be undertaken.

- 1.5 Develop, in consultation with Agency and WSDOT environmental sections, a joint Agency/WSDOT project development process for highway and transit project elements and prepare and negotiate Project Development Agreement with FHWA and FTA to expedite the completion and approval of planning and environmental documents.
- 1.6 As part of the "context sensitive solution" process:
 - (a) Prepare *Purpose and Need Statement* for project for general discussion purposes and inclusion in DEIS (prepare separate documents these different purposes, if needed).
 - (b) Prepare the initial Purpose and Need Statement based on data and reports prepared for previous phases of Project.
 - (c) Update the initial document, if needed, after completing the other tasks in this SOW, to ensure that most current findings are incorporated in the Purpose and Need Statement.
- 1.7 Identify and assess critical issues associated with the major project alternatives and design options.
 - 1.7.1 Initiate a "context sensitive solution" approach to the Columbia River Crossing project and integrate it into all aspects of the project. This task will be implemented by engineering consultant retained under SOWs prepared in Task 4.
 - 1.7.2 For each project alternative and major design option, Contractor shall assess:
 - (a) Procedural issues affecting its implementation,
 - (b) Scheduling issues, including significant pre-requisites to its construction,
 - (c) Technical issues based on the work undertaken through the SOWs prepared under Task 4,
 - (d) Funding issues, and
 - (e) Regulatory issues.
- 1.8 As part of the Context Sensitive Solution process, cooperatively complete the scoping of the project alternatives for highway, transit and bridge improvements between Columbia Boulevard in Portland, Oregon and State Route 500 in Vancouver, Washington for the DEIS. Under 23 CFR 771.123, the scoping process must be used to identify the range of alternatives and impacts and the significant issues to be addressed in the EIS and to achieve the other objectives of 40 CFR 1501.7. For FHWA, scoping is achieved by soliciting agency and public responses to the action by letter or by holding scoping meetings. If a PPP approach is used that allows the private entity the opportunity to propose project alternatives, the scope of the DEIS will be expanded to incorporate the PPP alternatives. Given this text, **Contractor shall:**
 - 1.8.1 Based on materials prepared for the Strategic Plan and materials prepared under this SOW and the additional SOWs prepared under Task 4 of this SOW, prepare Technical Memorandum evaluating the range of bridge, bridge-related highway and high capacity transit improvements in the I-5 Corridor that were identified in previous studies. This evaluation is for use in the scoping meetings that follow.
 - 1.8.2 Prepare materials (including meeting agendas and, as applicable, MS Power Point presentations, flip charts and handouts) for and participate in up to five meetings with Lead Agencies, Cooperating agencies, Agency and WSDOT and affected local and regional governments and agencies, as applicable, to reach agreement on project scoping issues.

- 1.8.3 .If a private entity is selected for PPP approach or if potential PPP respondents are identified, participate in up to two meetings with PPP entities to coordinate scoping issues with PPP proposals.
- 1.8.4 Prepare the *Notice of Intent* to prepare DEIS in compliance with 40CFR 1508.22, and take steps necessary to publish in Federal Register.
- 18.5 Participate in up to three public/community Scoping Meetings organized by the Public Communications Plan consultant retained independently by Agency to perform the SOW prepared under Task 4.2 of this SOW.
- 1.8.6 Prepare a final evaluation of alternatives and recommend a small set of “promising” alternatives to be included in the DEIS based on the results of the Scoping Meetings and materials prepared under this SOW and in a manner consistent with FHWA and FTA regulations,
- 1.8.7 Complete the formal scoping of project alternatives process by preparing a *Conceptual Definition of Alternatives Report* that describes the alternatives proposed to be addressed in the DEIS for preparing SOWs for environmental review consultants, preparing the description of alternatives in the DEIS, and seeking necessary or desired approvals by local, state and MPO governing bodies.
- 1.8.8 Prepare analysis of policy actions required by affected local, regional, and state agencies and jurisdictions to make scoping decisions and prepare necessary resolutions and supporting materials.

With Regard to Task 1, Agency shall:

- Assist Contractor in establishing working relationship with FTA and FHWA
- Assemble and provide Contractor with all data, maps, engineering drawings, analyses, and reports previously prepared for project that is not on project web site within 5 days of NPT (unless additional time is requested by WPM),.
- Upon reasonable notice (at least 5 days, unless a different timeframe is agreed to by WPM) from Contractor, provide meeting space at Region 1 offices for any intergovernmental meetings required by this Task.
- Review materials prepared by Contractor within 5 working days (unless additional time is requested by WPM).
- Participate in meetings with federal and local officials to reach agreement on issues, At the request of Contractor

2. Implement Project Intergovernmental Coordination and Communications Plan

Purpose

This task prepares and implements an *Intergovernmental Coordination and Communications Plan* (ICCP) to facilitate jurisdictional and agency agreements on project issues, whether substantive or procedural. The ICCP establishes contact points and specific means for involvement in the process for all affected local and regional governments, in part through a committee structure described below. It will provide a process for Agency and WSDOT to coordinate with each other and Contractor to ensure project objectives are met. It will describe the bi-state and regional decision-making process for this stage of the study.

Work Activities

With regard to Task 2, Contractor shall:

- 2.1 Prepare a detailed *Intergovernmental Coordination and Communications Plan (ICCP)* that identifies:
- (a) The decision processes for key issues,
 - (b) With regard to each issue, the points in the decision process at which each affected agency or jurisdiction (i) provides consultation, or (ii) is asked to approve study conclusions or recommendations;
 - (c) Methods to be undertaken by Contractor to ensure that all affected agencies will be consulted and all agencies and jurisdictions are kept informed of study progress and issues;
 - (d) How regional, local and state policy positions regarding issues or legislation affecting the I-5 project, e.g., position on reauthorization bill) are coordinated given the bi-state nature of the project; and
 - (e) A strategic schedule for project development, including defining the points at which major issues will be ready for public involvement.

In preparing the ICCP, **Contractor shall:**

- 2.1.1 Assemble and compile in a cohesive format all previous local (Portland and Vancouver), regional (Metro and RTC, TriMet and C-TRAN, and Port of Portland and Port of Vancouver) and state (Oregon and Washington) policy actions and plans relating to the I-5 project. Assess (i) their status, (ii) if inconsistencies exist, and (iii) if all regional planning requirements are met. Identify policies potentially needing refinement or amendment.
 - 2.1.2 Prepare up to two drafts of the ICCP for review and comment by regional partners, Agency and WSDOT.
 - 2.1.3 Prepare a final ICCP, with on-going updates as required.
- 2.2 Establish and participate in a *regional coordinating committee* comprised of transportation management level staff from affected local, regional, and state agencies. In doing so, **Contractor shall:**
- 2.2.1 Establish committee membership and schedule with input from Agency and WSDOT.
 - 2.2.2 Prepare for (by developing meeting agenda and materials) and participate in at bi-monthly meetings and more frequently as necessary.
 - 2.2.3 Prepare Meeting Reports and distribute to committee distribution list.
 - 2.2.4 Identify follow-up activities resulting from meetings, and take necessary steps to ensure such activities are undertaken.
- 2.3 Participate in meetings of the Contract Management Group comprised of ODOT Region I Manager, Agency's WPM, Agency Innovative Partnerships Program Manager, WSDOT Regional Manager and WSDOT Project Director. In doing so, **Contractor shall:**
- 2.3.1 Prepare for (by developing meeting agenda and materials) and participate in bi-weekly meetings, and more frequently as necessary.
 - 2.3.2 Prepare Meeting Reports and email them to members.
 - 2.3.3 Identify follow-up activities resulting from meetings, and taking necessary steps to ensure such activities are undertaken.
- 2.4 Provide periodic written and/or oral updates (approximately bi-weekly) on technical analyses to Agency, WSDOT and other staff specified in the ICCP or requested by Agency. Periodic updates

must address status of deliverables and schedule, pending issues and methods or alternatives for resolving them, and upcoming tasks and issues.

- 2.5 Provide or coordinate presentations on technical results to the *Bi-State Coordinating Committee* or other groups or committees, as required by the ICCP or as requested by Agency or WSDOT. In doing so, **Contractor shall**
- 2.5.1 Prepare summary materials for presentations it gives, or cause other contractors to prepare summary materials for presentations it coordinates, if needed.
 - 2.5.2 Participate in pre-meeting briefings and/or pre-meeting telephone conversations with Agency, WSDOT and/or committee staff and members.
 - 2.5.3 Participate in meetings, as requested by Agency or WSDOT.
- 2.6 Establish and participate in additional *ad hoc or issue specific committees* needed for technical reviews or to respond to new or changing issues and/or unanticipated events. In doing so, **Contractor shall:**
- 2.6.1 Assist Agency and WSDOT in establishing committee memberships and schedules.
 - 2.6.2 Prepare for (by developing meeting agenda and materials) and participate in meetings, as necessary.
 - 2.6.3 Prepare Meeting Reports for distribution to members.
 - 2.6.4 Identify follow-up activities resulting from meetings, and taking necessary steps to ensure such activities are undertaken

With Regard to Task 2, Agency shall:

- Participate in preparatory meetings and/or conversations
- Provide conference rooms and meeting support equipment, e.g., audio, visual, etc.
- Provide Contractor with comments on the draft versions of ICCP within five working days of receipt, unless additional time is requested by WPM.
- Provide the day-to-day project management staff needed to receive and respond to communications from Contractor.
- Be responsible for organizing and implementing activities to seek approval for proposals regarding federal transportation reauthorization and appropriation bills; including developing a coordinated effort with the State of Washington.
- Be responsible for organizing and implementing activities to seek approval for proposals to amend State of Oregon statutes and administrative rules, if any, and to assist in requesting a similar arrangement with WSDOT regarding State of Washington statutes and rules.

3. Coordinate with Agency's Innovative Partnerships Program (IPP)

Purpose

Except for those products expressly assigned to Contractor in this SOW, as may be amended, IPP is responsible for preparing all materials and undertaking all activities required for choosing and implementing the PPP approach. The purpose of this task is to assist Agency in analyzing potential impacts of the Oregon and Washington IPP rules and procedures on the I-5 project. The IPP rules and procedures are being developed by Agency to facilitate the development and solicitation of proposals from the private sector that would effectively and efficiently work to implement Agency goals and project needs. The IPP rules are intended to identify and precipitate innovative funding sources, plans,

scheduling, construction approaches, and joint development projects to meet a potentially wide array of Agency and non-agency goals and objectives. The intent of this task is to evaluate potential impacts of the IPP rules and procedures on the project and to identify ways that the IPP rules and procedures might be modified and/or expanded to help meet project goals and objectives.

Work Activities

With regard to Task 3, **Contractor shall:**

- 3.1 Maintain on-going coordination with IPP staff, and their contractors, to ensure that products produced under this SOW meet IPP needs, and to ensure that IPP activities meet the objectives of this SOW.
- 3.2 Review up to three drafts of the proposed IPP regulations and provide written comments and edits to IPP.
- 3.3 If IPP determines that a PPP approach is to be used, prepare a Technical Memorandum describing how previous materials and recommendations prepared under this SOW can be used by or be modified to be used by the PPP.
- 3.4 Advise IPP on how to integrate its activities and processes with Federal requirements affecting the I-5 Project.

With regard to Task 3, **Agency shall:**

- Assemble and provide to Contractor copies of all reports and other material it has regarding PPP and its potential use for the I-5 project within five days of Notice To Proceed (NTP) unless additional time is requested by WPM,
- Ensure that IPP staff maintains on-going communications and coordination with Contractor.
- Provide Contractor copies of all drafts of IPP Rules and consulting reports regarding the application of a PPP to the I-5 Project in a timely manner.

4. Prepare SOWs (Additional SOWs) and Assist in Consultant Selection

Purpose

The purpose of this sub-task is to develop preliminary SOWs for work to be undertaken over the next eighteen months by consultant teams independently retained by Agency (not part of this SOW) but managed by Contractor. The preliminary drafts of the SOWs prepared by Contractor will be used to (i) help assess the qualifications of consultants being considered to perform the work in the SOW, and (ii) begin negotiations with the selected consultants. For each category of services described below, Contractor shall prepare detailed SOWs in conformance with the Attached SOW Writing Guide. These SOWs must be provided to the Agency-selected consultants for additional detailing, refinement and negotiation of tasks and budget. Agency and Contractor shall review and modify as necessary the refined draft prepared by the consultant. Agency shall have final approval of SOW prior to executing a WOC or personal services contract that incorporates the final SOW.

Work Activities

Contractor's responsibilities for preparing SOWs for additional consultant assistance is described below by (a) first explaining the procedural obligations of Contractor with respect to all of the SOWs being prepared, and (b) then outlining specific work tasks for each separate SOW.

For each SOW prepared in Tasks 4.1 through 4.3, below, **Contractor shall**:

- Prepare a draft SOW (including a preliminary budget estimate) based on the agreed upon objectives and deliverables and transmit the draft SOW to regional partners, Agency and WSDOT for review and comment.
- Prepare a revision to the draft SOW in response to comments received within the required timeframe. The revision is to be prepared as a tracked MS Word document and be transmitted to the Agency and WSDOT via e-mail with a cover letter outlining the general areas of comments received and how those comments were addressed within the attached revised SOW.
- Prepare a final version of the SOW based on comments received from Agency and WSDOT and transmit to Agency.
- Ensure the draft and final SOWs comply with Agency's *SOW Writing Guide* (Attachment B of the original WOC 1 under ATA 23483), and include the following sections:
 - (a) Background Information
 - (b) Tasks, Deliverables, and Schedule
 - (c) Budget. Draft and final cost estimates must include a breakdown of estimated hours and costs for each task, based on general staffing categories, and estimated billing rates for the general staffing categories. Cost estimates must be prepared in MS Excel (MS Office 2000) , with one workbook per SOW, transmitted to Agency via e-mail.

For each SOW prepared in Tasks 4.1 through 4.3, **Agency shall**:

- Provide Contractor with any standards and/or guidelines that apply to the SOW;
- Provide Contractor with a list of Agency and WSDOT staff and their contact information who are to participate in the objectives and deliverables work session, and review and comment on the draft SOWs.

With regard to the specific SOWs¹, **Contractor** in consultation with Metro, RTC, C-TRAN, Tri-Met, WSDOT and Agency **shall**:

4.1 Prepare SOW for Travel Demand Forecasting, Traffic Analysis and Traffic Engineering. This SOW must specify tasks to be undertaken over the next eighteen months by a consultant team independently retained by Agency (not part of this SOW) but managed by Contractor. The tasks must include, but are not limited to, the following:

4.1.1 Propose how travel demand, traffic and tolling analyses should be addressed in DEIS and financial analyses, including:

¹ The Contractor may, with WPM approval, divide the SOWs into separate SOWs, or may aggregate SOW's.

- Selection of a base year and design year – and interim years for phasing, if appropriate.
 - Preparation of travel demand forecasting modeling methodologies and inputs to be used in the modeling process, particularly as it relates to forecasting the impacts of tolling under different tolling concepts;
 - Identification of consultant, agency and jurisdiction responsibilities in the modeling process
 - Assessment of how to address FHWA and FTA guidance and regulations on evaluating travel demand and traffic impacts, including a detailed and comprehensive recommendation on criteria to be reported in the DEIS.
 - Analysis of whether and, if so, how to model the interaction of land use and travel demand forecasts for no-build and build scenarios under consideration; and
 - Documentation and analysis of historical bi-state travel and traffic patterns.
- 4.1.2 Provide specialized expertise in regard to tolling systems, including technical assistance for Tasks 6.2 and 6.3.

4.1.3 Assist in identifying and evaluating tolling options by:

- Establishing travel forecasting methodology and assumptions for analyzing tolling scenarios.
- Estimating need for cash payment lanes in addition to electronic tolling technologies.
- Forecasting and analyzing the differences in travel patterns caused by tolling I-5 bridge (but not I-205 bridge) for scenarios that vary by:
 - (a) Operations factors, i.e. tolled in one direction or two, time of day/days of week that tolls are charged.
 - (b) The amount charged for tolls, including:
 - (i) Tolling concept, i.e. fixed (all users pay same amount all day), differential (different classes of vehicles pay different tolls), variable (different tolls at different times of day) and dynamic (tolls based on traffic volumes),
 - (ii) Vehicle classes tolled, e.g., passenger car, trucks and their price levels, and
 - (iii) User classes tolled, e.g., single-occupant-car, carpool and their price level.
 - (c) The location of tolling, i.e. Oregon or Washington or both sides of river; and I-5 of I-5 and I-205.
 - (d) Mix of technology and manual collections equipment.
- Perform analysis similar to above with both I-5 and I-205 bridges tolled.
- Identifying how the build alternatives differ in terms of the traffic impacts caused by tolling and identifying tolling design parameters for each alternative.
- Estimating revenues from tolling scenarios identified above from both toll payments and enforcement practices; estimate revenues by vehicle classifications.

The above listed technical products will serve as an input to the tolling analysis in Task 6 and project scoping in Task 1.

- 4.1.4 Prepare explanation of current and future traffic conditions in the I-5 and I-205 corridors (particularly as it relates to the river crossings) and the impacts of traffic conditions on travelers to be reported in the *Purpose and Need* statement for the project.

- 4.1.5 Assess the benefits and impacts of including HOV lanes, including reversible HOV lanes, in the scope of the project alternatives, and identify major design considerations caused by including HOV lanes in the project scope.
- 4.2 Prepare SOW for preparing and implementing the *Public Communications Plan*. This SOW must specify tasks to be undertaken over the next eighteen months by a consultant independently retained by Agency (not part of this SOW) but managed by Contractor. The SOW prepared for the public communications consultant must include, but are not limited to:
- 4.2.1 Preparing a *Public Communications Plan* that develops an initial strategy for communicating about the project. The Plan must address the “context sensitive solution” process as well as (but not limited to) the following issues:
- How public segments, interest groups, organizations, stakeholders, and media are identified.
 - How information flows to and from the public;
 - How public involvement activities and responsibilities are coordinated across the project’s consultant team(s), agencies and jurisdictions;
 - How the public communications plan supports the study’s environmental justice compliance efforts;
 - How public involvement tools and resources should be developed, including standard maps, presentation material, stock slides, and slide show elements;
 - The development of public communications policies and guidelines, addressing cross-agency coordination (e.g., style guides, FAQs, naming and terminology conventions, etc.)
 - Identification and development of methodologies for addressing specific elements of the public communications plan (including Web site updates, work groups, speaker bureaus, open houses, mailings and special events.
 - Assisting in resolving/mediating issues identified by public involvement.
 - How to address major issues related to tolling.
- 4.2.2 Implementing the Public Communications Plan; particularly as it relates to ensuring that federal requirements are met over the next eighteen months for public involvement during alternatives analysis, early coordination, environmental justice and scoping.
- 4.2.3 Undertaking new survey research regarding attitudes in the Portland-Vancouver region towards project alternatives and funding options.
- 4.2.4 Organizing, preparing materials for, and facilitating three scoping meetings called for in Task 1.9.5. Consultant shall be responsible for all logistical arrangements, public notifications, maintaining proper documentation of meeting, preparing public-oriented materials for meetings based on technical reports prepared by or for Contractor.
- 4.3 Prepare SOW for Preliminary Investigations for an Environmental Impact Statement (EIS). This SOW must specify tasks to be undertaken over the next eighteen months by one or more consultant teams independently retained by Agency (not part of this SOW) but managed by Contractor. The tasks must include, but are not limited to, the following:
- 4.3.1 Conceptual Engineering: Refinement of Alternatives and Assistance for Scoping:

- Compile and catalog Agency and WSDOT engineering, design and level-of-service guidelines and standards for bridge and approaches. Reconcile any differences and propose guidelines and standards for project alternatives.
- Identify permitting requirements for project alternatives and describe their impact on project design, and the project development process and schedule.
- Identify and refine engineering criteria to “narrow” the alternatives during AA and scoping.
- Identify and refine design aspects of project concepts needing refinement to ensure a reliable scoping process.
- Identify and refine elements of capital costs of alternatives needing refinement to ensure a reliable scoping process; including ensuring that associated highway improvement costs are incorporate and conceptual estimating operating costs.
- Provide engineering assistance to Contractor in public and intergovernmental scoping meetings and preparing follow-up responses to issues raised.
- Identify and undertake activities to ensure consistency with WSDOT’s “context sensitive design” principles; including staffing a multi-disciplinary expert panel review of project objectives and alternatives.
- Prepare engineering assessment of alternatives to be used in AA and scoping reports; including, but not limited to (i) seismic considerations for alternatives that retain existing bridges, (ii) navigation issues and procedural requirements for spanning a navigable waterway.
- Prepare preliminary assessment of highway and transit improvements that may be undertaken in I-205 crossing area if tolling plan requires I-205 Bridge to be tolled.
- Identify and perform additional concept design work required on alternatives proposed for DEIS in order to properly define alternatives for DEIS.
- Identify, assemble and catalog existing base data, maps, engineering drawings, and design standards for transit and highway/bridge components of the I-5 Project to be provided to engineering team retained by Agency for engineering and design services associated with preparing the DEIS.

4.3.2 Environmental Considerations: Refinement of Alternatives and Assistance for Scoping:

- Identify resource agencies to be involved in early coordination and scoping stages.
- Identify and refine environmental criteria to “narrow” the alternatives during AA and scoping.
- Identify environmental issues related to the project concepts needing further review to ensure a reliable scoping process and perform required analyses.
- Provide environmental issues assistance to Contractor in public and intergovernmental scoping meetings and preparing follow-up responses to issues raised.
- Prepare environmental assessment of alternatives to be used in AA and scoping reports.
- Identify and perform additional environmental assessments required on alternatives proposed for DEIS in order to properly define alternatives for DEIS.
- Identify, assemble and catalog existing base data, maps, drawings, and environmental standards to be provided to environmental team retained by Agency for preparing the DEIS.

4.3.3 Context Sensitive Solution/Environmental Justice: Assistance for Scoping:

- Development and implementation of an on-going methodology to address context sensitive solution and environmental justice requirements during AA and scoping.

4.3.4 Other “As-Needed” SOWs: Over the course of study, Contractor shall identify any additional specialized assistance that may be needed and, subject to approval by the WPM, prepare additional SOWs and undertake processes to retain additional consulting assistance.

4.4 Assist Agency in Selection of Consultants to Implement SOWs: The purpose of this sub-task is to assist Agency in selection of consultant teams to implement the abovementioned SOWs. A consultant team may be selected to perform the work for one or more of the SOWs. Selection of consultant teams must be based on established Agency rules, guidelines, and protocols. **Contractor shall:**

- 4.4.1 Review the potential consultant team background and contact information and provided by Agency.
- 4.4.2 Provide Agency with an assessment of the strengths and weaknesses of the consultant team available for each SOW based on ordinary contract assignment rotation, the identification of one or more other consultant teams that address the scheduled team’s weaknesses, and a recommendation on whether to select the regularly-assigned consultant team or to select another team out of rotation.
- 4.4.3 Organize and participate in one meeting per SOW with Agency and WSDOT staff to discuss Contractor’s recommendations and select the consultant teams to assign to the SOW.
- 4.4.4 Organize and participate in one meeting with each selected consultant team to explain the SOW and to respond to questions/concerns.
- 4.4.5 Assist Agency in negotiating revisions to the SOWs based on comments and requests from the selected consultant teams – including responding to the consultant team’s questions and comments and in making up to two revisions to the SOW(s).
- 4.4.6 Advise Agency, as requested, during Agency’s budget negotiation with the selected consultant teams.

Agency shall:

- Provide Contractor with copies of or identify and provide access to all Federal and state contracting requirements that must be addressed in evaluating, narrowing, and selecting contractors for the SOWs within 5 days of NTP, unless additional time is requested by WPM.
- Provide Contractor with Agency documentation on each potential consultant team to be considered for assignment to one or more SOW.
- Provide and arrange for meeting and interview rooms.
- Expedite final reviews and approvals of SOWs to execute WOCs or personal services contracts as soon as possible (normally within 10 days) after SOWs are completed.
- Be solely responsible for implementing a consultant-selection appeal process.
- Be solely responsible for negotiating the selected consultant teams’ budgets for the SOWs.

5. Technical Oversight and Strategic Advice to Advance the Project

Purpose

The purpose of this task is to provide management direction of the tasks included in this SOW and those SOWs of other contractors working on the project as anticipated and described in Task 4. Contractor shall be responsible for overall management of all activities described in this SOW except for the development of materials required to choose and implement the PPP approach as set forth in Task 3.

Work Activities

Contractor shall:

5.1 Provide Project Management

5.1.1 Establish and maintain management structure with Agency to assist in coordination of project-related activities, including:

- Develop project scope, schedule and budget
- Establish project protocols including:
 - Communications including: communication with other project team consultants; information flow among consultants and between Contractor, consultants and Agency; contact with agencies, jurisdictions and other stakeholders; contact with the media.
 - Preparation of Technical Memoranda, Working Papers and Meeting Reports.
 - Procedures for review and comment on work products
 - Project management meetings including purposes, participants, schedule, agendas and follow-up
 - Tracking of scope, schedule and budget and early warning system
 - Review of invoices and monthly reports
- Recommend amendments to project scope, schedule and budget as appropriate.

5.1.2 Establish and maintain management structure with other agencies and jurisdictions to assist in coordination of project-related activities, including:

- Participation of high-level management and/or elected leadership
- Staff participation in work sessions required by Contractor
- Development of work products required by Contractor
- Review and comment on work products

5.1.3 Prepare and conduct Project Kick-Off Meeting to:

- Introduce key project participants
- Establish context for work products
- Review project scope and schedule

- Review project protocols
- 5.1.4 Prepare and conduct weekly team meetings with:
- Agency project managers
 - Task leaders, as required
- 5.1.5 Prepare and conduct larger project team meetings, as required.
- 5.1.6 Develop amendments to this SOW, budget, and schedule for additional work requested by Agency.
- 5.1.7 Prepare monthly progress reports that track project scope, schedule and budget, and:
- Include description of the previous month's project activities, meetings facilitated/attended, and the planned activities for the next month.
 - Record of important project/program related decisions made and action items assigned during ad hoc meetings and communications (report must include dates and participants).
 - Identify issues and/or concerns that affect the project SOW, schedule, and/or budget.
 - Reconcile the percentage of the total work completed versus the percentage of the not-to-exceed amount billed to date.
- 5.1.8 Coordinate with Agency and consultants working on the Delta Park/Lombard Project.
- 5.2 Provide Technical Oversight
- 5.2.1 Provide oversight and direct the technical work of Contractor and other consultants to meet the objectives of the SOW, including implementation of project protocols established in Task 5.1 through periodic meetings, work sessions, email, telephone calls, and memoranda:
- Conduct and manage communications including: communication with other project team consultants; information flow among consultants and between Contractor, consultants and Agency; contact with agencies, jurisdictions and other stakeholders; contact with the media.
 - Direct preparation of and review and track Technical Memoranda, Working Papers and Meeting Reports
 - Conduct and manage meetings.
- 5.2.2 Assist Agency in coordination of selection of other consultants, including:
- Expedited selection and contracting of eligible contractors from A&E and Non-A & E lists
 - Expedited solicitation, selection and contracting of other contractors required by Contractor
- 5.2.3 Prepare for and conduct Kick-Off meetings with new contractors as they come into the project.
- 5.2.4 Review the work of contractors and subcontractors, including:
- (a) Final work plans, budgets and schedules

- (b) Draft Technical Memoranda (TM) and other work products
 - (c) Monthly reports and invoice of contractors
- 5.2.5 Pursue additional funding for pre-EIS work tasks outside of the SOW.
- 5.3 Coordinate and consolidate Technical Work Products
- 5.3.1 Review and comment on work products of various consultants and sub-consultants under contract with Agency specifically with regards to adequacy relative to assigned task, comprehensive coverage of project needs, and coordination with the work of others.
- 5.3.2 Convene technical working group to coordinate completion of subtasks.
- Coordinate work efforts of:
 - Agency
 - Contractor
 - Other consultants, agencies and jurisdictions.
- 5.3.3 Prepare Technical Memoranda (TM) integrating the findings from the technical work of various consultants and sub-consultants
- 5.4 Provide Project Specific Strategic Advice
- 5.4.1 Establish strategic working group with Agency and consultant participation to regularly review project direction, status, issues, approaches and outcomes and to develop recommendations for additions or changes in project work tasks and approach.

Agency shall:

- Provide Contractor and sub-contractors with access to maintenance of a file-transfer-protocol site that can be accessed through the Internet, with adequate storage to meet the project needs. Agency shall provide passwords, access protocols, file maintenance, backup, etc. and shall develop in consultation with Consultant.
- Provide the day-to-day project management staff needed to receive and respond to communications from Contractor.
- Identify participant(s) for strategic working group.
- Participate in the various project technical meetings
- Use best efforts to expedite the selection and contracting of work with eligible A&E and Non-A&E contractors.
- Use best efforts to expedite the solicitation, selection and contracting of work of other contractors required by Contractor.
- Review and respond to Contractor-raised issues potentially impacting scope, schedule or budget
- Review Contractor's monthly status reports and provide Contractor with any written comments within five days of receipt unless additional time is requested (in writing, e-mail acceptable) by WPM.
- Provide Contractor with comments on draft TMs, WPs, MRs, or memoranda within five days of receipt with the understanding that Agency shall seek to secure comments from other State agencies within five days, if and when required, but cannot commit such other agencies to a five-day deadline.
- Provide meeting space, if available, at Region 1 offices for meetings related to this Project upon five day minimum notice by Contractor unless a different timeframe is agreed to by WPM,.

6. Analyze Tolling Options

Purpose

Identify and assess the programmatic, administrative and financial issues involved with (a) instituting tolling on the Columbia River bridges in the Portland-Vancouver region and (b) optimizing the use of net proceeds from the tolling to achieve bi-state transportation objectives.

Work Activities

Contractor shall:

- 6.1 Analyze existing tolling projects and programs to determine issues and principles that are applicable to the I-5 Project. Contractor shall conduct research on tolling options and experience in Oregon, Washington and other areas. Detail major relevant projects and describe (i) their applicability to local conditions and (ii) lessons learned for this project. In doing so, **Contractor shall**, at a minimum, describe:
- (a) Physical characteristics of the tolled facility.
 - (b) Toll collection equipment (electronic and manual), account management systems, vehicle identification and classification systems, patron feedback systems, and collection and enforcement systems and equipment, including a description of the capital cost, operating cost, reliability, public and commercial acceptance, privacy, enforcement and other identified critical factors.
 - (c) Operations factors, i.e.; tolled in one direction or two, time of day/days of week that tolls are charged, mix of technology and manual collections.
 - (d) Performance and reliability.
 - (e) Capital and operating costs.
 - (f) The amount charged for tolls, including the:
 - (1) Tolling concept used, i.e. fixed (all users pay same amount all day), differential (different classes of vehicles pay different tolls), variable (different tolls at different times of day) and dynamic (tolls based on traffic volumes),
 - (2) Vehicle classes tolled, e.g., passenger car, trucks and their price levels, and
 - (3) User classes tolled, e.g., single-occupant-car, carpool and their price level.
 - (g) Usage patterns including, where available, before-and-after results; and privacy.
 - (h) Traffic impacts.
 - (i) Public acceptance.
 - (j) Advances in technology now anticipated and how are they expected to address current problems in toll implementation and collection.
- 6.2 Identify range of practical tolling options for use on Columbia River bridges.
- (a) Develop a list of practical tolling options for the Columbia River bridges based on national and international experience and working with Washington State's tolling advisory group, specifying:
 - (1) Toll collection, management, and enforcement equipment.
 - (2) Operations factors, i.e.; tolled in one direction or two, time of day/days of week that tolls are charged.

- (3) The amount to be charged for tolls, including:
 - (i) Tolling concept, i.e.; fixed (all users pay same amount all day), differential (different classes of vehicles pay different tolls), variable (different tolls at different times of day) and dynamic (tolls based on traffic volumes),
 - (ii) Vehicle classes tolled, i.e.; passenger car, trucks and their price levels, and
 - (iii) User classes tolled, i.e.; single-occupant-car, carpool and their price level.
- (4) The location of tolling, i.e.; Oregon or Washington or both sides of river; and I-5 or I-5 and I-205.
- (5) Mix of technology and manual collections equipment.

- (b) Document design parameters for highways and bridges that are imposed by the various tolling technology options. Consider requirements for a new bridge, as well as for existing I-5 bridge, I-205 Bridge, and other highway links.

6.3 Evaluate the tolling options identified for use on Columbia River bridges.

Based on materials prepared in Tasks 4 (traffic), 6 (tolling) and 8 (regulatory issues), evaluate range of tolling options identified in Task 6.2 and recommend a small set of promising options for consideration in DEIS and financing strategy. Factors to be assessed include:

- (a) Capital and operating cost, including additional demands on bridge and highway design,
- (b) Revenue generation,
- (c) Operations issues,
- (d) Performance and reliability;
- (e) Usage patterns,
- (f) Traffic impacts, and
- (g) Public acceptance.

6.4 Contractor shall develop materials for and meet with state and regional decision-makers to explain tolling options and their anticipated costs, benefits and impacts.

Agency shall:

- Assemble and provide to Contractor materials it has regarding tolling in other areas.
- Review draft reports prepared by Contractor and provide Contractor comments within five working days (unless additional time is requested by WPM) of receipt of drafts.

7. Prepare Financial Analyses

Purpose

This task analyzes key financial issues associated with developing the I-5 Project, both the highway/bridge and transit components, under a "public approach" and establishing an implementation strategy to develop a detailed funding plan. Contractor shall prepare the financial analysis at a "concept level" of detail, commensurate with the level of cost estimating and forecasting in this pre-DEIS stage. Capital and operating costs and revenues must be addressed for both highway and transit. The results of the tolling-related analyses in Task 6 and Task 8 are incorporated into the preliminary financial strategy produced in this Task 7.

This task does not address "private" funding plans that may be proposed by a PPP. Agency's and WSDOT's IPP shall examine such "private" plans or they will be the result of an RFP released by the IPP. However, it is likely that a large component, if not all, of a PPP proposal will incorporate the "public" funding examined under this Task 7.

Work Activities

Contractor in consultation with Metro, RTC, C-Tran, Tri-Met, WSDOT and Agency shall:

- 7.1 Identify preliminary assumptions for the DEIS and financial analysis regarding highway capital and operating costs and revenues. This analysis assumes a "public approach" is taken to develop and operate the project. It also assumes that tolling does not fully cover local costs. Later analyses consider the impacts of including tolling. By trying to determine a non-tolling or partial-tolling approach to the project, the need for tolling and the price of tolls can be better understood. **Contractor**, with input from Agency and WSDOT, **shall**:
 - 7.1.1 Establish preliminary assumptions on their roles and responsibilities regarding I-5 highway/bridge construction and operations, including their relative shares of (i) local capital match and (ii) operating costs.
 - 7.1.2 Identify highway system assumptions, e.g., future year road network for use in the DEIS and associated financial analyses.
 - 7.1.3 Identify bridge operating costs to be applied to proposed concepts.
 - 7.1.4 Identify implementation concept to be assumed in preparing financial cash flow analyses.
- 7.2 Identify federal, state, and local funding sources, other than tolling the Columbia River crossing (which is addressed in Task 6) that could be applied to constructing the I-5 Project.
 - 7.2.1 For each of identified existing funding source, assess its:
 - (a) Requirements of funding source, in terms of decision-making, procedural requirements and need to include or exclude project elements.
 - (b) Funding capacity,
 - (c) Impacts on other funding options,
 - (d) Scheduling issues, and
 - (e) Likelihood of securing such funds.
 - 7.2.2 Address new funding programs in the transportation reauthorization bills (including any possible amendments or earmarks) that are applicable to the Trade Corridor..
- 7.3 Identify preliminary assumptions for the DEIS and financial analysis regarding transit capital and operating costs and revenues. FTA requires significant financial analysis as part of the DEIS and its New Starts rating process. In order for a high capacity transit project to proceed through FTA's project development stages, FTA rates each project according to several factors; chief among them being financial capacity. While the threshold to be permitted to advance to the next stage gets higher as a project proceeds towards construction, FTA starts rating projects as a pre-requisite to starting Preliminary Engineering (PE) and Final Environmental Impact Statement (FEIS) activities. A preliminary funding strategy must be established early to avoid a delay at this

threshold. Consequently, working with TriMet, Metro and, following consultation with WSDOT, C-TRAN and RTC, **Contractor shall:**

- 7.3.1 Establish preliminary assumptions on their roles and responsibilities regarding I-5 high capacity transit project construction and operations, including their relative shares of (i) local capital match and (ii) operating costs.
 - 7.3.2 Identify transit system assumptions, e.g., future year transit network and service levels for each transit district for use in the DEIS and associated financial analyses.
 - 7.3.3 Identify capital and operating cost parameters, e.g., cost per revenue hour, cost per revenue mile, committed improvements or service increases, inflation factors, etc. for each transit district for use in the DEIS and associated financial analyses.
 - 7.3.4 Identify preliminary capital and operating revenue parameters, e.g., existing amounts by source, inflation factors, etc. for each transit district for use in the DEIS and associated financial analyses.
- 7.4 Evaluate capital and operating revenues for transit component of I-5 project. In consultation with TriMet and CTRAN, **Contractor shall:**
- 7.4.1 Identify preliminary conceptual capital and operating costs of I-5 transitway from existing sources for use in preliminary financial analyses and convert to year of expenditure dollars.
 - 7.4.2 Prepare preliminary Excel 20-year cash-flow model of existing system revenues and costs for TriMet and CTRAN with and without I-5 transitway.
 - 7.4.3 Determine preliminary capital and operating costs with and without I-5 transitway.
 - 7.4.4 Evaluate future trends in existing revenue sources for each transit district and identify the amount of funds available from existing funding sources that are available from each transit district for I-5 transitway construction and operations.
 - 7.4.5 Identify preliminary list of potential revenue sources for meeting capital and operating requirements, and identify actions that need to be undertaken to secure such additional revenues.
 - 7.4.6 Identify preliminary action plan for obtaining additional funds.
 - 7.4.7 Identify potential cost savings that could result from constructing high capacity transit elements of project, if any, with non-Federal funds.
- 7.5 Prepare and evaluate preliminary financial strategy options for scoping meetings. Based on financial materials prepared in this Task 7 and tolling costs and revenues prepared in Tasks 4 and 6, **Contractor shall:**
- 7.5.1 Identify a range of preliminary financial strategy concepts for funding Bridge/Highway and Transit elements of I-5 Project for the scoping meetings that address:
 - (a) Different mixes of state, federal, local, and tolling revenues.

- (b) Different uses of state, federal, local, and tolling revenues.
- (c) Different tolling strategies.
- (d) Regulatory issues.
- (e) Other factors required to implement strategy

7.5.2 Evaluate the range of preliminary financial strategies based on following factors:

- (a) Revenue generated and timing of revenues.
- (b) Project cash flow issues.
- (c) Risks and uncertainties.
- (d) Political acceptance.
- (e) Phasing requirements imposed on project implementation.
- (f) Equity.

7.5.3 Develop an executive summary of initial funding concepts for use in scoping meetings.

7.6 Analyze and recommend a project development process and schedule to the small set of promising alternatives proposed to be addressed in the DEIS.

7.7 Prepare a final report on financial strategies, based on the results of Task 7.5 and 7.6 and the results of the scoping meetings, for the small set of promising financial strategy concepts to be addressed in the DEIS.

Agency shall:

- Assemble and provide to Contractor materials it has regarding revenue options for the I-5 Project.
- Review draft reports prepared by Contractor and provide Contractor comments within five working days (unless additional time is requested by WPM) of receipt of drafts.
- Provide Contractor with on-going access to ODOT bond counsel and financial advisor, and request that WSDOT provide on-going access with its bond counsel and financial advisor.

8. Analyze Federal and State Administrative and Statutory Requirements and Procedures

Purpose

This task identifies and assesses significant regulatory and statutory issues that can affect the availability and utility of toll revenues, and the organizational structure established to develop and implement the project under a “public approach” (and possibly under a PPP).

Work Activities

Contractor shall:

- 8.1 Identify and assess issues under current federal statutes regarding tolling the I-5 and I-205 bridges. United States Code 23USC129(a)(1) permits Federal participation in:
- Initial construction of a toll highway, bridge, or tunnel (other than a highway, bridge, or tunnel on the Interstate System) or approach thereto;
 - Reconstruction or replacement of a toll-free bridge or tunnel and conversion of the bridge or tunnel to a toll facility;

- Preliminary studies to determine the feasibility of a toll facility

United States Code 23USC129(a)(8) defines "initial construction" (in the first bullet above) to mean the construction of a highway, bridge, or tunnel at any time before it is open to traffic and does not include any improvement to a highway, bridge, or tunnel after it is open to traffic.

United States Code 23USC129(a)(3) requires that all toll revenues received from operation of the toll facility be used first for debt service, for reasonable return on investment of any private person financing the project, and for the costs necessary for the proper operation and maintenance of the toll facility, including reconstruction, resurfacing, restoration, and rehabilitation. However, if the State certifies that the tolled facility is being adequately maintained, the State may use excess toll revenues for any highway or transit purpose for which Federal funds are obligated. To determine the affect these provisions have on the feasibility and application of tolling for the I-5 Project,

Contractor shall:

- 8.1.1 Research whether Project alternatives that include the demolition of the existing bridge qualifies as a "replacement bridge," for which federal participation is permitted, or as "initial construction," for which federal participation is not permitted.
 - 8.1.2 Research the eligibility under these statutes of tolling I-205 Bridge, in addition to I-5 Bridge and employing the cumulative revenue stream for projects in both corridors. As part of research, assess whether the cumulative revenues can be used for sequential improvements in the two corridors, or for simultaneous improvements in both corridors and must it be in proportion to relative revenue collections.
 - 8.1.3 Determine the effect that tolling the I-205 Bridge and using the cumulative revenues for improvements to both corridors has on:
 - (a) Whether a bridge is a replacement bridge or initial construction,
 - (b) The certification that there are net toll revenues available for distribution; and
 - (c) The required improvement package for a joint I-5 and I-205 program.
- 8.2 Assess options for how a tolling "authority" can be structured for the Columbia River crossing. The term "tolling authority" is used herein in a generic sense; that is a "tolling authority" is any authority that sets tolls, oversees bridge project, and allocates the net proceeds of the tolls. While the specifics of a tolling authority are not required at this time, the general concepts need to be examined to establish assumptions to be used in (i) defining the option(s) to be used in the DEIS, (ii) identifying how certain revenue sources may be used in the capital funding plan and (iii) determining if legislative initiatives need to be planned. For each "tolling authority" option, **Contractor shall** describe its:
- (a) Formation,
 - (b) General types of authorities,
 - (c) Governing body, and
 - (d) Other pertinent parameters.

For each option, **Contractor shall** assess:

- (a) Impact on federal funding, procedures and regulations,
- (b) Impact on funding options and financing mechanisms (including impact on availability of tolls for transit improvements),
- (c) Need for statutory or regulatory amendments, (c) political and community support,
- (d) Administrative ease and costs, and

- (e) Possible applicability under a PPP approach.

Contractor shall prepare a Technical Memorandum detailing findings and recommending options to be assumed or addressed in DEIS and PPP solicitations.

- 8.3 Evaluate potential uses of revenues generated by tolling the Columbia River crossing. Under the federal statute, at the option of the state, the state can use toll revenues in excess of those needed for the federally required uses for highway and transit purposes. Additionally, 23 USC 129 allows the state to determine whether a toll facility is to become free when debt is retired, at some future point in time or whether tolls are to continue indefinitely. ORS381 requires that all tolls from the existing I-5 Bridge be used exclusively for reconstructing the I-5 Bridge and/or building a new bridge in the I-5 corridor. RCW47.56 establishes similar requirements for the State of Washington. **Contractor shall** also assess options for amending state statutes to provide the flexibility now provided under federal statute.
- 8.4 Analyze how the potential to use expenditures of toll revenues as credits towards local match on transportation projects under 23 USC 120 can be used to facilitate the I-5 Project. Under 23 USC 120(j), a State may use federal transportation funds toll revenues that are used to build, improve, or maintain highways or bridges that serve the public purpose of interstate commerce, as a credit toward the non-Federal share requirement if:
 - (i) Such facilities were built, improved, or maintained without Federal funds, and
 - (ii) Certain "maintenance of efforts" tests are met regarding the historical and continuing use of State funds for transportation improvements.

This provision may have significant benefits, both financial and political, towards facilitating the I-5 Project. There are several issues that must be researched in order to determine if these benefits can be realized and, if so, how they can be best employed. Consequently, **Contractor shall:**

- (a) Research how bi-state nature of project affects availability of credits.
 - (b) Research use of credits for I-5 and non-I-5 related improvements.
 - (c) Research maintenance of efforts requirements and how that may affect timing or feasibility of credits.
 - (d) Research if and how Oregon or Washington statutes limit use of credits. If so, propose possible solutions.
- 8.5 Research if and how Washington State statutes affect the feasibility of project or funding alternatives and recommend options for resolving the issues.
 - 8.5.1 RCW47.56.070 provides that "No ... toll bridge ... shall be combined with another toll facility for the purpose of financing unless such facilities form a continuous project ...". RCW47.56.075 provides that legislative authority or sponsorship by a regional transportation investment district is required before WSDOT can approve construction of a toll facility. RCW47.56.310 authorizes the construction of an "additional bridge ... across the Columbia River adjacent to the existing interstate bridge between Vancouver, Washington and Portland, Oregon" and the reconstruction and improvement of the existing bridge. RCW47.56.330 requires that the new bridge across I-5 be consolidated and merged with the existing interstate bridge and its approach located between Vancouver, Washington and Portland, Oregon so that both bridges shall be and become a single toll facility.

RCW47.56.330(2) requires in WSDOT's tolling agreement with ODOT that WSDOT "... have complete responsibility for the operation of both bridges and approaches ... as a single toll facility except as to repair and maintenance, and with full power ... to impose and collect all toll charges ... and to disburse the revenue ... for the payment of expenses of maintenance and operation and repair ..., all costs of constructing said new bridge and reconstructing and improving said existing bridge ..." RCW47.56.330(4) requires that the tolling agreement provide that WSDOT "fix the classifications and amounts of tolls to be charged and collected from users of said toll facility ... and the time or times when such tolls shall first be imposed, with the further provision that such toll charges shall be removed after all costs of construction of the new bridge and approaches thereto and the reconstruction and improvement of the existing bridge and approaches thereto ... have been paid..."

With regard to these provisions, **Contractor shall:**

- (a) Research if and how a light rail bridge or portion of a bridge dedicated to light rail can be funded as part of a toll project for the Columbia River crossing.
- (b) Research whether the "additional" bridge authorization limits options to supplemental bridges only, or are replacement bridges permitted
- (c) Research whether the interstate agreement provisions permit options that allow ODOT to operate the bridges and impose tolls.
- (d) Research how State of Washington statutes affect the possible use of toll revenue proceeds, including impact on project alternatives and the project development process and schedule.
- (e) Research such other issues as identified by Contractor and approved by the WPM.
- (f) Research best methods to authorize tolling on I-205 Bridge and employing such revenues as part of an integrated program with the I-5 corridor.
- (g) Research Washington statutory provisions affecting ability to finance bi-state project.
- (f) Prepare potential legislation or other solutions for issues critically affecting the potential development of the project.

8.5.2 Research the effects Washington State environmental, contracting and project financing statutes may have on (i) project alternatives, (ii) development and implementation procedures and (iii) funding options; and recommend options for resolving the issues.

8.6 Research the effects State of Oregon environmental, contracting and project financing statutes may have on (i) project alternatives, (ii) development and implementation procedures and (iii) funding options; and recommend options for resolving the issues. In Oregon, Chapter 381 of the Oregon Revised Statutes (ORS) address "Interstate Bridges" and Chapter 383 addresses "Toll Roads and Toll Bridges."

Under ORS 383:

- (a) All tolls received by ODOT must be deposited in the State Tollway Account (ORS 383.009(1)(d))
- (b) Moneys in the Tollway Account must only be used for financing various types of costs of tollway projects. (ORS 383.009(2))

ORS 381 provides ODOT with the authority to construct and operate interstate bridges across the Columbia River subject to certain provisions; including:

- (a) For any toll bridge constructed under the statute, the net revenues from the tolling must be divided equally among Oregon and Washington. (ORS 381.070(2))
- (b) "The interstate bridge now existing over the Columbia River between Portland, Oregon and Vancouver, Washington" may be operated as a toll bridge.
- (c) If the existing bridge between Portland and Vancouver is operated as a toll bridge, can only be used to pay the capital and operating costs of a "new bridge ... across the Columbia River adjacent to said interstate bridge" and the operating cost of the Portland to Vancouver Bridge. (ORS 381.092)
- (d) After the bonds for constructing the new bridge are repaid, the existing Portland to Vancouver bridge must be operated as a free bridge.

With regard to these provisions, **Contractor shall:**

- (a) Research the effects of Oregon and Washington constitutional and statutory provisions affect the finance plan for multi-modal project alternatives;
 - (b) Research best methods to authorize tolling on I-205 Bridge and employing such revenues as part of an integrated program with the I-5 corridor.
 - (c) Research such other issues as identified by Contractor and approved by the WPM.
 - (d) Research Oregon and Washington statutory provisions affecting ability to finance bi-state project.
 - (e) Prepare potential legislation or other solutions for issues critically affecting the potential development of the project.
- 8.7 Assess the effects that federal tolling statutes relating to Interstate bridges have on the potential development of an integrated I-5 and I-205 program of multi-modal improvements, and identify options for resolving issues.
- 8.8 Identify and assess procedural and coordination requirements for the DOT's to insure a consistent approach in managing a bi-state project
- 8.9 Review Bi-State Compact requirements and evaluate the merits of such an approach for the I-5 Bridge Project
- 8.10 Analyze options for organizational frameworks, current legal parameters under applicable state and federal constitutions, statutes, regulations, and state public-private partnership guidance.

Agency shall:

- Assemble and provide to Contractor all materials it has regarding legislative and regulatory issues affecting the I-5 Project within five days of NTP unless additional time is requested by WPM.
- Review draft reports prepared by Contractor and provide comments to Contractor within five working days of receipt of drafts unless additional time is requested by WPM.
- Provide Contractor with on-going access to ODOT legal counsel, and request that WSDOT provide on-going access with its legal counsel.

9. Provide On-call Strategic Program and Financial Advice to Agency

Purpose

Agency has determined that it needs to have available on-call services for strategic program and financial advice. These services may be required for specific project- or program-based problems, or for broader issue areas regarding regional or federal opportunities. The purpose of this task is to provide on-demand services to assist Agency in taking advantage of opportunities that arise, or to resolve potential major problems before they have an opportunity to grow.

Under this task, Contractor is to respond, within the limits of the budget allocated to this task to requests from the following authorized parties for advice or assistance:

- (a) ODOT Director
- (b) ODOT Deputy Director Highway Division
- (c) ODOT Region 1 Manager

For each issue or area of concern identified by an authorized party, Contractor shall develop and analyze options for resolving the issue or addressing the area of concern. The analysis of options typically includes an examination of tradeoffs, risks and the likelihood and impact of unintended consequences of each alternative. Upon receiving a request, Contractor shall work with the requestor as described in the Work Activities section below. Issues may be raised and responded to by Agency and Contractor through oral, electronic, or written correspondence.

Work Activities

While each request for these on-demand services is likely to be unique, Contractor shall take the following steps in preparing a response.

9.1 To provide on-demand, strategic or financial advice, **Contractor shall:**

- 9.1.1 Respond to initial request for services within twelve hours to a request by an authorized party.
- 9.1.2 Meet with requestor, or review email and/or electronic files, or conduct a phone conference to understand fully the assignment.
- 9.1.3 Develop a memorandum describing the issue, anticipated actions to be taken, the timeline, and product(s) to be developed.
- 9.1.4 Develop and evaluate alternative approaches to the issue.
- 9.1.5 Present advantages and disadvantages of various approaches.
- 9.1.6 Develop a risk assessment as warranted by the issue at hand
- 9.1.7 Present Agency with counsel, written or oral, of how best to proceed with respect to the issue, and a rationale for the recommendation.

With Regard to Task 9, **Agency shall:**

- Provide conference rooms and meeting support equipment, e.g., audio, visual, etc.
- Provide administrative assistance by (i) scheduling meetings, (ii) copying reports and materials for the meeting, and (iii) distributing agenda, meeting materials and meeting reports to distribution lists.
- Provide Contractor with comments on products within timeframes agreed-upon during Task 9.1.3.

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- MRs and agendas will only be written for formal meetings. Informal or ad hoc meetings, emails, and phone calls, unless otherwise requested by Agency or where important project/program related decisions are made or action items are assigned, unless otherwise requested by Agency or deemed important by Contractor. Contractor is not required to write detailed meeting reports for informal or on-going coordination and oversight meetings or communications with sub-contractors where no project/program decisions are made or action items are assigned.
- Contractor shall provide regular monthly progress reports (submit copy with invoices).
- The budget shown for each task is the best estimate possible at this time. However, the study process may dictate that more funding be applied to some tasks and products and less to others. Contractor shall monitor such needs on an on-going basis and, when needed, propose budget refinements (within the limits of the not-to-exceed amount established for this WOC) to the WPM for his/her approval on a monthly basis as part of the invoicing and status report.
- The term "days" as used in this SOW refers to business days.

PHASE 1

The purpose of Phase I is to compile and perform a strategic review of prior engineering, environmental, and stakeholder/public outreach related data, analyses, and formal and informal work products or deliverables. This information will be supplemented with new information from current, parallel activities (toll feasibility investigations and communications team) to create a comprehensive resource pool from which to assess future project needs. Understanding the content of prior and current work efforts, the Contractor will assess the quality, consistency, and interrelationship of the information to identify potential gaps, risks to the I-5 Columbia River Crossing project, and develop a strategy and work approach to complete needed engineering, environmental, and stakeholder/public efforts leading to the environmental scoping. At the end of Phase 1, the agency partners will be able to answer the following questions:

Engineering

- What is the full range of potential transportation concepts under consideration?
- What is the integrity of prior work and have the concepts been developed to a consistent and adequate level of detail?
- What gaps exist in prior work and what revisions might be required to address possible tolling options or resolve possible operational questions?
- What are the engineering needs necessary to effectively and efficiently conduct future NEPA scoping activities?

Environmental

- What is the extent and adequacy of prior environmental analyses?
- What critical gaps, inconsistencies, or subjects must be addressed to initiate NEPA scoping?
- What are possible context sensitive topics, issues, or concerns that might become part of the project's Purpose and Need?
- What additional environmental planning, analyses, or screening is required to complete future NEPA scoping?

Community/Stakeholder/Outreach

- What is the extent of prior outreach and what are key findings and observations?
- What additional efforts might be required to adequately assess necessary components of the project's Purpose and Need?
- What are the potential processes for successful outreach and what efforts are needed to support the current pre-scoping activities?
- What type of activities might be needed to seamlessly transition to future environmental scoping and NEPA analysis activities?

TASK A – PROJECT MANAGEMENT

Purpose:

This task includes day-to-day management of the project, including scheduling, monitoring, and controlling the work. In addition, all of the Phase 1 project related meetings will be administered through this task. This task includes the oversight of schedules and budgets, review of work products, and the establishment of lines of communication between the WPM, interested agencies, and the Contractor. The WPM shall oversee the work of the Contractor, and coordinate the work of Agency and other interested agencies. The Contractor Project Manager shall manage the work of the consultant team and work closely with the WPM to coordinate related tasks by others.

The Contractor shall:

Task A1: Project Management

- A.1.1 Direct and supervise consultant team.
- A.1.2 Coordinate with WPM, Agency, and other interested agencies.
- A.1.3 Prepare and update project schedule.
- A.1.4 Develop and maintain a project filing system.

Task A2: Meetings (Phase 1 only)

The Contractor will conduct the following meetings during Phase 1 of this project.

- A.2.1 Prepare meeting agendas and MR as necessary.
- A.2.2 Prepare for and attend bi-monthly meetings with the overall consultant team project manager, WPM, Agency, and WSDOT staff. These meetings will primarily focus on presenting materials developed through each task and for general project coordination [4 meetings for Kittelson & Associates, Inc. (KAI) staff, 2 meetings for CH2M Hill (CH), Howell Consulting (HC), and J.D. White Company (JDW), and one meeting for Parsons Brinckerhoff (PB) and Right of Way Associates (RWA)]
- A.2.3 Prepare for and attend monthly internal consultant team meetings [2 meetings for KAI, CH, HC, and JDW, and one meeting for PB and RWA]. These meetings will be used for general coordination and information gathering and sharing throughout the project as well as coordination with the other consultant teams (Traffic and Communication).

Task A3: Monthly Progress Reports

A.3.1 Prepare monthly invoices and supporting data

A.3.2 Contractor shall prepare monthly progress reports that track project scope, schedule and budget, and:

- Include description of the previous month's project activities, meetings facilitated/attended, and the planned activities for the next month.
- Record of important project/program related decisions made and action items assigned during ad hoc meetings and communications (report must include dates and participants).
- Identify issues and/or concerns that affect the project SOW, schedule, and/or budget.
- Indicate the percentage of each task completed, and reconcile the percentage of the total work completed versus the percentage of the not-to-exceed amount billed to date.

Products and Schedule for Task A

Task No. A	Product	Due Date NLT 12 Months from NTP
A.1.3	Update project schedule	2 weeks
A.2.2	4 Consultant Team Project Manager Meetings	Bi-Monthly
A.2.3	2 Internal Consultant Team Meetings	Monthly
A.3.1	Invoices	Monthly
A.3.2	Progress reports	Monthly

TASK B - DATA COLLECTION AND REVIEW OF EXISTING INFORMATION

Purpose:

The purpose of this task is compile and document in a technical memorandum all of the applicable engineering, environmental, and other related work products produced over the past five years that document existing conditions and potential concepts within the study area (Interstate-5 from SR-500 to Columbia Boulevard, and I-205 bridge area). In addition, this task will include compiling and documenting all Agency and WSDOT engineering-related guidelines and standards for bridges and approaches (including engineering, design and level-of-service) and propose an approach for reconciling differences between Agency and WSDOT guidelines and standards.

Finally, the Contractor will determine what additional information and analysis is necessary from an engineering, environmental, and context sensitive solution perspective to generate a complete and consistent I-5 River Crossing Concepts Document as identified in Phase II, Task C.

The Contractor shall:

Task B0: Integrate Context Sensitive Solutions and Design Into Project

The purpose of this activity is to assist Agency and WSDOT in the implementation of the context sensitive design process throughout this project. FHWA defines the primary principles of context sensitive design as:

- The project satisfies the purpose and needs as agreed to by a full range of stakeholders. This agreement is forged in the earliest phase of the project and amended as warranted as the project develops.
- The project is a safe facility for both the user and the community.
- The project is in harmony with the community, and it preserves environmental, scenic, aesthetic, historic and natural resource values of the area (i.e., exhibits context sensitive design).
- The project exceeds the expectations of both designers and stakeholders and achieves a level of excellence.
- The project involves efficient and effective use of the resources (time, budget, community) of all involved parties.
- The project is designed and built with minimal disruption to the community.
- The project is seen as having added lasting value to the community.

The design and engineering refinement effort for the I-5 project must meet these objectives and it must address FHWA's and WSDOT's guidance on context sensitive design (*Flexibility in Highway Design* (FHWA-PD-97-062); and *Building Projects that Build Better Communities – Recommended Best Practices* (WSDOT 2003).

To do so, throughout the project, the Contractor shall include:

- CSD as an integral element of the overall concept refinement, DEIS, and public involvement process, rather than being implemented through a one-time workshop similar to the traditional value engineering process.
- CSD as a crucial component included as part of all the existing three consultant team's statements of work and overall efforts over the next 9 months.
- CSD in the engineering and environmental process similarly to the concepts and methodologies used by engineers and planners to ensure adequate mobility and the protection of endangered species, respectively.

Specifically, the Contractor shall:

- B.0.1 Collect and review summaries and reports of prior Public Outreach and communications from past phases of the project. Information should depict the types and extent of public outreach and community involvement, possible issues and community and stakeholder values leading to current solutions, and generally portray the extent of outreach and public communications over the life of the project.
- B.0.2 Evaluate the information obtained in Activity B.0.1 and assess the extent in which this information potentially addresses the basic outline of community impact assessments (FHWA-PD-96-036). Identify possible strategies and future work efforts for the team to integrate into subsequent work activities. The Contractor's goal is to understand the existing project context, potential community impacts, stakeholder values and visions, and possible subjects that might be considered a part of the project's purpose and need statement.

Task B1: Compile and Document all Existing Bridge Crossing Documentation and Bridge and Approach Design Guidelines, Standards and Permitting Requirements

- B.1.1 Submit TM #B.1.1 to Agency and WSDOT requesting the source documents needed to complete this task, including, but not limited to: Design files (AutoCAD and Microstation); digital aerial photos with appropriate geo-referencing and tiling information; forecast traffic and transportation planning analysis summaries; traffic engineering analyses including intersection, ramp terminal, weaving, and segment capacity analyses; safety analyses; toll facility concept design concepts and criteria; environmental-related data bases, documents, maps, figures, etc. and reports, summaries, and documents related to the environmental considerations (natural and built environment including socio-economics, community profiles, special populations, and historical and cultural data) of the concepts from the project's inception; applicable bridge and approach design manuals, guidance and criteria; seismic design manuals, guidance and criteria; and interchange spacing and design standards. The request must specify the purpose of the request, the primary Contractor contact and the submittal deadline. Contractor shall compile submitted manuals, guidance and criteria.
- B.1.2 Compile other source documents from other agencies/jurisdictions needed to complete this task, including, but not limited to, manuals, guidance and criteria that could affect bridge and approach design from: FHWA; AASHTO; City of Vancouver; City of Portland, Clark County; Multnomah County, BNSF, USCG and others.
- B.1.3 For forthcoming environmental analysis scoping, catalogue and document all contacts (e.g., mail, significant e-mail, meetings, conference calls and significant two-person phone calls) between Agency, WSDOT and any environmental resource or oversight agency. Contractor shall compile the contact information in a database and shall update it monthly.
- B.1.4 Contractor shall develop a comprehensive and accessible web-integrated database to house all the information obtained in Tasks B.1.1 through B.1.3.
- B.1.5 Evaluate the acquired applicable bridge and approach design manuals, guidance and criteria and document findings in a technical memorandum (TM #B.1.5). The memorandum must, at a minimum provide: an annotated bibliography of the acquired documents (e.g., source, date, summary of contents, critical elements); a brief topical assessment of the primary design requirements that will be placed on the I-5 Columbia river crossing bridge design; identification of any conflicting or potentially-conflicting design requirements; and proposed approach for reconciling any conflicting or potentially-conflicting design requirements.
- B.1.6 Prepare a PowerPoint Presentation #B.1.6 and Technical Memorandum TM #B.1.6 (an executive summary of TM #B.1.5) that summarizes the policy-level and significant design impacts related to the design manuals, guidance and criteria for bridges and approaches, and be delivered at up to two presentations.
- B.1.7 Prepare a PowerPoint Presentation #B.1.7 and Technical Memorandum TM #B.1.7 describing the contents of the web-integrated database developed in Task B.1.4. This presentation and technical memorandum will provide directions on how to access and utilize the database and be delivered at up to two presentations.

Task B2: Determine Extent of Conceptual Engineering Required to Identify and Screen Highway/Bridge Improvement Concepts

B.2.1 Contractor shall conduct a detailed review of the material compiled in Tasks B.1.1 and B.1.2 (i.e. the conceptual engineering drawings and technical memoranda prepared for the previous phase of the I-5 Trade Corridor Partnership) to assess if the material is sufficiently reliable and detailed, or if more detailed concept drawings must be prepared to identify, evaluate, and screen road/bridge improvement concepts in this current phase of study.

B.2.2 Contractor shall assemble existing information and analysis from Agency, WSDOT, Metro and Regional Transportation Commission (RTC) regarding operational and physical issues affecting the utility and performance of the I-205 Bridge and approaches, both current and projected.

B.2.3 Contractor shall prepare WP #B.2.3 documenting the findings from Tasks B.1.1, B.1.2, B.2.1 and B.2.2. The WP must describe each bridge/highway concept examined during the Strategic Plan phase of study, the level of detail it was defined and evaluated, and the current status of the alternative.

The WP must also describe:

- (a) The extent to which the previous information and design concepts can be relied upon for complete evaluation in the environmental process.
- (b) Critical freeway and interchange improvements with each of the bridge concepts that needs potential further refinement.
- (c) Concepts that were discussed in the Strategic Plan phase that required study, or more study, but whose study was deferred to the next phase.
- (d) Other concepts that should be addressed in the Phase 2 portion of this study based on meetings with Agency, WSDOT, and other affected agency staff.

B.2.4 Contractor shall determine where more detailed work must be completed in order to provide a consistent base level screening of the existing and new freeway/bridge concepts in Phase 2 of this study. This information will be provided in a WP #B.2.4 that describes at a minimum, the following key elements:

- (a) Identify how existing concept drawings and cost estimates must be refined based on (i) interchange issues raised but not addressed in the previous study phase, (ii) incorporating toll collection footprint concepts and other results from the traffic analysis work currently being undertaken, and (iii) vertical clearance and channel issues associated with the marine and air constraints.
- (b) Document key environmental issues and assess their adequacy and consistency to complete future NEPA scoping activities. Identify key topics that should be considered.
- (c) Identify critical engineering considerations with regard to the design concepts such as the ability to maintain existing traffic flow or need to construct temporary bridge, relative limitations or time impacts of in-water construction, limitations or affects on type of bridge design options, and others.

As an outcome of Tasks B.2.1 through B.2.3, the Contractor will:

- Confirm that the three categories of concepts encompass all reasonable combinations of freeway and arterial crossings;
- Confirm whether or not dropping the collector-distributor options from further evaluation is justified (and that sufficient justification has been developed to support that conclusion);

- Identify key distinctions between options (i.e. cost, function, impacts, ability to integrate tolling, etc.) to develop screening criteria; and
- Review Strategic Plan findings and determine what additional analyses are needed to resolve outstanding issues.

This information will also be included in WP B.2.4.

B.2.5. Contractor shall develop an initial refined Phase II scope of work and budget addressing the outcomes from Tasks B.2.3 and B.2.4. The refined scope of work will be presented in WP #B.2.5 and PowerPoint Presentation #B.2.5 to the WPM, Agency, and WSDOT staff at a presentation. Based on comments received from the WPM, Agency, and WSDOT staff, the Contractor will finalized the Phase II scope of work and budget. [Task B.2.5. is a non-budget related task]

Task B3: Boat Survey

The objective of the boat survey is to document the existing vessel traffic patterns between Columbia River miles 105.5-113.5 to establish maximum vertical & horizontal clearance requirements and frequency of use. ‘Updates’ refer to adding data since the 1999 OBA Navigation Report.

B.3.1 Describe existing commercial and recreational vessel traffic between Columbia River miles 105.5 and 113.5 [this reach spans the existing BN railroad and I-205 bridges]. Summarize predominant vessel trip patterns, sizes and vertical & horizontal clearance requirements for commercial and recreational traffic.

B.3.2 Identify and interview businesses with commercial and recreational water-dependent markets that currently use the river stretch. These are expected to include but not be limited to Schnitzer, Christensen Yacht, Tidewater, Columbia River Towboat Association, American West Cruise, public and private marinas, and vessel repair facilities. Document historic maximum air [height] clearance requirements and frequency.

B.3.3 Update bridge closure data for BNRR and I-5 Bridges [from 1999 Navigation Report Table 3.2] as available from BNRR, ODOT and/or WASHDOT. Document any changes to bridges that have affected clearance in the past five years. Update water year data from USGS gage data. Document existing I-5 bridge closure restrictions.

B.3.4 Summarize findings of Tasks B.3.1 through B.3.3 in Technical Memorandum #B.3.4. This memorandum will document the number of users needing height clearance greater than I-205 vertical. Respond to comments and questions; finalize report.

Products and Schedule for Task B

Task No. B	Product	Due Date NLT _____ from NTP
B.0	Context Sensitive Solutions and Design	On-going through out project
B.1.1	TM #B.1.1: Source Document Request	1 week from the NTP
B.1.4	Web Integrated Database	6 weeks from the receipt of files
B.1.5	TM #B.1.5: Evaluation of Design Guidelines &	4 weeks from receipt of

	Criteria	files
B.1.6	Powerpoint Presentation B.1.6: Design Criteria Issues impacts	5 weeks from receipt of files
B.1.6	TM #B.1.6: Design Criteria Issues	5 weeks from receipt of files
B.1.7	PowerPoint Presentation B.1.7: Web-Integrated Data Base	7 weeks from the receipt of files
B.1.7	TM #B.1.7: Web-Integrated Data Base	7 weeks from the receipt of files
B.2.3	WP #B.2.3: Assessment of Alternative Information and Analysis	8 weeks from the receipt of files
B.2.4	WP #B.2.4: Identification of Additional Analysis Work	10 weeks from the receipt of files
B.2.5	Initial Refined Phase 2 Scope of Work	11 weeks from the receipt of files
B.2.5	PowerPoint Presentation B.2.5: Initial Refined Phase 2 Scope of Work	12 weeks from the receipt of files
B.2.5	Final Refined Phase 2 Scope of Work	13 weeks from the receipt of files
B.3.4	TM #B.3.4: Boat Survey	10 weeks from the NTP

PHASE 2 (Information Only)

The purpose of Phase 2 is to perform engineering and environmental analyses required to provide a uniform and consistent level of baseline information. The outcome of this work will be documented in an Concepts Report that will provide the factual information necessary for the Agency and WSDOT, along with other affected agencies to make decisions regarding which concepts should go forward in the NEPA process. This information will be used in conjunction with possible community/stakeholder outreach strategies to identify possible elements of the project's Purpose and Need. All of this information will be used to establish a NEPA scoping plan and environmental documentation strategy. Finally, this information will be used to identify an appropriate strategy and framework for meaningful and continuous community/stakeholder outreach, sensitive to the diverse variety of contexts in and around the project area.

Since the nature and scope of the Phase 2 work is dependent on the outcomes of Phase 1 (e.g., the number of concepts, the amount of effort necessary to bring all the concepts to desired uniform and consistent level of baseline information, etc.), Tasks C and D have been developed on a preliminary level to illustrate the likely engineering and environmental work that will be accomplished during this phase. A specific scope of work for these Tasks will be developed at the end of Phase 1.

TASK IIA – PHASE 2 MEETINGS

If Agency authorizes Phase II of this project, Contractor will conduct the following meetings:

- Prepare meeting agendas and MR as necessary.
- Prepare for and attend bi-monthly meetings with the overall consultant team project manager, WPM, Agency, and WSDOT staff. These meetings will primarily focus on presenting materials

developed through each task and for general project coordination [20 meetings for Kittelson & Associates, Inc. (KAI) staff, 10 meetings for CH2M Hill (CH) and Howell Consulting (HC), two meetings for J.D. White Company (JDW), and one meeting for Parsons Brinckerhoff (PB) and Right of Way Associates (RWA))]

- Prepare for and attend monthly internal consultant team meetings [10 meetings for KAI staff, four meetings for CH and HC, two meetings for JDW, and one meeting for PB and RWA]. These meetings will be used for general coordination and information gathering and sharing throughout the project as well as coordination with the other consultant teams (Traffic and Communication).

TASK C – GAP CLOSURE ANALYSIS

The purpose of this task is to bring all the identified concepts as well as any additional concepts defined in Task B to the desired uniform and consistent level of the Agency and WSDOT. The gap closure analysis will entail the necessary engineering, environmental, and costing analysis to provide the factual information on each concept within the project study area (SR 500 to Columbia Boulevard) in a consistent and comparable format. Contractor has, in the preceding task, identified specific additional work that must be completed and shall not unnecessarily replicate work done in the previous phase of the project.

As a result of Task C, a Concepts Report will be published that provides consistent and uniform engineering, environmental, and cost information for each of the defined concepts

The Contractor shall:

Task C1: Additional Engineering and Environmental Analysis

- C.1.1 Contractor shall prepare TM#C.1.1 describing refinements in existing conceptual design necessary to address interchange issues, toll plaza footprints concepts, critical environmental issues and other results of traffic analysis.
- C.1.2 Contractor shall prepare TM#C.1.2 describing critical engineering considerations of each design concept. Contractor will consider the potential features and themes and opportunities and constraints that might be a byproduct of understanding community impacts and context sensitive solutions work efforts.
- C.1.3 Contractor shall conduct the analysis necessary to assess the critical environmental issues for each alternative under consideration and prepare an environmental considerations technical memorandum that summarizes the results of the analysis (TM#C.1.3).

Task C2 - Engineering Design and Refinement

In this task, the Contractor will prepare updated and new (for any newly defined concepts) concept drawings based on the concepts defined in Task B and the information identified in Tasks C1. These concept design drawings will build upon and modify prior design files (including centerline stationing, horizontal alignments, ramp configurations, lane numbers and arrangements, cross section details, and assumptions for vertical alignments) generated by ODOT and WSDOT staff and/or contractors. Contractor concept development and refinement shall include the following:

- C.2.1 WP #C.2.1 will provide a summary of all the design assumptions and costing documents prepared for this task (categorized by alternative under consideration), including an assessment of all significant constructability issues identified, general design constraints, any fatal flaws, and a description of how the context sensitive design process is incorporated into the current design;
- C.2.2 A revised set of concept drawings for each alternative, including;
- 1"=200' working drawings
 - English units
 - Centerline geometry (stationed): Contractor shall develop horizontal alignment at a concept level only where needed to test feasibility and or impacts of an improvement concept
 - Typical sections
 - Bridges: Conceptual Design (rough layout) identify type
 - Tunnels: Conceptual Design (rough layout indicating depth and daylight points)
 - Plan location of retaining structures and approximate heights
 - Drafting Standards as defined by Agency and WSDOT
 - Aerial photo base mapping
 - Conceptual Design showing footprints of proposed concepts, existing right of way, proposed right of way, general structure locations, and conceptual lane striping.
 - 11"x17" or other schematic drawing scales or formats that will be suitable for public displays and reports
- C.2.3 Prepare WP #C.2.3 that summarizes the associated costs of each alternative, including: a summary of the costing methodology (using unit cost data from prior work as applicable); a summary of conceptual capital costs (engineering, construction, and right-of-way) for each alternative; a summary of life cycle costs for each alternative; and an assessment of the potential sensitivity of costs to currently unknown variables (e.g., construction unknowns, mitigation).
- C.2.4 Contractor shall prepare TM#C.2.4 that describes ways in which the design or other characteristic of each alternative selected to advance into the DEIS could be modified to avoid, minimize or mitigate the potential or anticipated impact(s) of that alternative.
- C.2.5 Prepare a PowerPoint Presentation #C.2.5 and presentation graphics that summarize the primary engineering, design, environmental and costing characteristics of the concepts under consideration, based on the other products prepared within this task and WOC. Include a summary of the opportunities and constraints of possible features and themes that result from CSS efforts. The presentation graphics must include, but are not limited to: a street base map plan; simplified project-level alignments, interchange improvements, ramp configurations, bridges and structures; concept-level profiles of all bridge concepts; schematics of major engineering concepts (e.g., lane configurations, etc.).
- C.2.6 Prepare and deliver up to a total of six presentations on primary engineering, design and costing issues.

C.2.7 Respond to questions and requests for data related to design, engineering and costing from other contractors, agencies and jurisdictions. It is anticipated that these requests will be for work already completed, no new work will be conducted as part of this task.

Task C3: Concepts Report

C.3.1 Prepare a comprehensive Concepts Report that provides consistent and uniform engineering, environmental, and cost information for each of the defined concepts. This report will include an executive summary summarizes the baseline conditions of all the concepts as well as the remaining engineering and analysis work that still remains to refine the concepts to an acceptable EIS level. In addition, a Technical Appendix will be provided that documents and references all the engineering, environmental, costing assumptions for each alternative. The report will also identify various constructability issues, environmental issues, and cost estimates that may be used in future screening activities. However, the report will not provide any findings or remarks that directly compare, rank, or in any other manner suggest a preferred or set of preferred concepts.

C.3.2 Prepare and deliver up to a total of three presentations on the contents and information presented in the Concepts Report.

TASK D - PRELIMINARY SCOPING

Within the project study area, (SR 500 to Columbia Boulevard), this task includes:

- The identification of resource and environmental oversight agencies to be involved in the Project's early coordination and Federal Scoping process;
- The identification and documentation of environmental issues with the range of concepts currently under study to the extent and in a manner required for "Scoping" these concepts for the DEIS;
- An analysis of the critical environmental issues, and the special environmental considerations associated with each that require further study for concepts currently under study or developed during the current phase of study. The purpose of the analysis is to support the identification of concepts that will be recommended to advance into the DEIS phase;
- Assistance to Agency and WSDOT during the Federal Scoping process, including preparation for the Scoping meetings; addressing and documenting environmental-related questions and comments received during the Scoping process and documenting the comments and responses.
- Define and engage scoping group partners. Use the process broadly to incorporate state, local, and other jurisdictions beyond the required federal jurisdictions.
- Establish roles of partners, including lead and cooperating agency requirements, establish an agreement.
- Identify issues and boundaries of the project study area.
- Agreement on NEPA documentation requirements to satisfy all future needs of agencies that will adopt the NEPA document and issue permits or approvals.
- Develop process and schedules that satisfy interdependent agency needs.

Task D.1: Establish Scoping Group

Contractor will assist ODOT's CETAS group and WSDOT's SAC group in identifying representatives to the Scoping Group. Federal agencies will likely select only one representative to represent both states. As needed Contractor will assist with the process of confirming the suggested representative has authority

to make sustainable decisions for the agency. In addition to the current members of CETAS and SAC, the following agencies or authorities should be considered:

- US Coast Guard
- Port authorities below the first dam.
- Federal and State Economic Development agencies
- FTA
- TriMet
- Ctran
- Park authorities for Fort Vancouver

D.2: Establish Potential Environmental Criteria and Measures

Prepare a technical memorandum that identifies the array of environmental criteria and measures that could be considered in the public process and ultimately for screening concepts in the DEIS. These could include:

- fish habitat associated with bridge construction: the scale of impact, the type and scale of mitigation concepts, and likelihood of environmental sign-off on fish habitat associated with bridge construction (potential short and long-term impacts);
- potential impacts to 6 (f) and 4(f) resources: the scale of impact, the type and scale of mitigation concepts, and likelihood of environmental sign-off;
- potential displacement of wetlands: the scale of impact, the type and scale of mitigation concepts, and likelihood of environmental sign-off;
- potential displacements: the scale of impact, the type and scale of mitigation concepts, and likelihood of environmental sign-off;
- potential impacts to special populations, users, cultures, or other community impacts

The evaluation must allow for the differentiation between the concepts and must be measurable given the level of detail of design and traffic analysis

D.3: Scoping Assistance

D.3.1 Prepare for and assist Agency and WSDOT with a public scoping meeting.

D.3.2 Provide engineering and environmental analysis support during Scoping and prepare a summary technical memorandum that provides written responses to all design and cost-related comments/questions received during the Project Scoping period, citing the comment made, the source and date made and the Project response (similar comments may be grouped together with a single response).

D.3.3 Contractor shall prepare for and participate in meetings with technical staffs from participating governments, policy-makers, and public involvement.

D.3.4 Contractor shall assist WPM in addressing questions arising during this phase of study from technical staffs of participating governments, policy-makers, and public involvement. Contractor shall also prepare written responses to questions as requested by WPM.

D.4 Establish Roles and Responsibilities for Scoping Group members

D.4.1 Contractor will assist ODOT and WSDOT in determining the following roles of Scoping Group members:

- Lead or co-lead agency status for federal agencies for NEPA processes
- Cooperating agency status of remaining federal agencies particularly the US Coast Guard, and the Army Corps of Engineers.
- Determine if any agencies other than the lead agencies will be contributing to the project through study, evaluation, mitigation development, or joint funding of mitigation proposals.

D.5 Establish process for Scoping Group

Both Washington State and Oregon have written NEPA process agreements with a subset of the Scoping Group partners. Contractor will assist ODOT and WSDOT with developing a process that incorporates the two processes. This single process will be negotiated so that all members may act in good faith with standing agreements.

D.6 Technical Assistance to Scoping Group

Provide technical assistance to the Scoping Group to establish the following:

- Agreement on the NEPA classification (assumed to be Class 1)
- Determination of important and minor issues from the agency perspective
- Input to project goals and objectives
- Determine other actions or projects by member agencies that interact with the schedule, purpose, or location of the proposed project, and determine process and schedules that allow mutual accomplishment of actions.
- Establish the study area boundaries relevant to each agency's mission.
- Determine opportunities for collaborative goal attainment
- Determine opportunities for collaborative mitigation
- Determine opportunities for joint funding of project or mitigation
- Document all scoping agreements to carry forward into the NEPA process.

D.7 Final Report on Results of Evaluation

Contractor shall prepare a Final Report documenting the results and recommendations from Task D. The FR shall also include an executive summary with appropriate color graphics.

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- MRs and agendas will only be written for formal meetings. Informal or ad hoc meetings, emails, and phone calls, unless otherwise requested by Agency or where important project/program related decisions are made or action items are assigned, unless otherwise requested by Agency or deemed important by Contractor. Contractor is not required to write detailed meeting reports for informal or on-going coordination and oversight meetings or communications with sub-contractors where no project/program decisions are made or action items are assigned.
- Contractor shall provide regular monthly billing and progress reports.
- The budget shown for each task is the best estimate possible at this time. However, the study process may dictate that more funding be applied to some tasks and deliverable products and less to others. Contractor shall monitor such needs on an on-going basis and, when needed, propose budget refinements (within the limits of the not-to-exceed amount established for this WOC) to the WPM for his/her approval on a monthly basis as part of the invoicing and status report.
- The term “days” as used in this SOW refers to business days.

Task 1: Project Management/Administration and Quality Control

This task includes day to day management of the project, including scheduling, monitoring, and controlling the work. This task includes the oversight of schedules and budgets, review of work deliverable products, and the establishment of lines of communication between the WPM, interested agencies, and the Contractor. The WPM shall oversee the work of the Contractor, and coordinate the work of Agency and other interested agencies. The Contractor Project Manager shall manage the work of the consultant team and work closely with the WPM to coordinate related tasks by others.

Contractor shall:

- Direct and supervise consultant team.
- Attend meetings, and prepare agendas and MR as described within the tasks.
- Prepare invoices and supporting data.
- Coordinate with WPM, Agency, and other interested agencies.
- Prepare and update project schedule.
- Develop and maintain a project filing system.
- Prepare monthly progress reports, which will address current status, unresolved issues, projected significant milestones, project schedule, and major accomplishments during the month.

Deliverables and Schedule for Task 1

Task No.	Deliverables	Due Date NLT _____ from NTP
1		
1.1	Prepare and update project schedule	2 weeks
1.2	Prepare invoices and monthly progress reports	Monthly

Task 2: Determine Existing and New Traffic Forecasts and Impact Analyses Required to Identify and Screen Highway/Bridge Improvement Alternatives and Tolling Options

The purpose of Task 2 is to assess the data and improvement concepts from the previous phase of study to:

- Determine their validity and the extent to which they can be relied upon with regard to identifying and analyzing tolling issues and narrowing the road/bridge improvement alternatives; and

Determine where more detailed work must be done to accomplish the screening of freeway/bridge and tolling alternatives to be accomplished in this phase of study.

- 2.1 Contractor shall prepare for and conduct two half-day working sessions with the WPM and the members of the Regional Coordinating Committee to provide a detailed explanation of the options and data prepared during the strategic planning phase of the I-5 Trade Corridor study.
- 2.2 Contractor shall review the traffic analyses prepared for the previous phase of the I-5 Trade Corridor Partnership and assess the following:
 - (a) Are the travel forecasts and results documented in the Final Report, technical appendices, and background reports sufficiently reliable and detailed or must new or more detailed forecasts be prepared to:
 - (i) Identify, evaluate, and screen tolling options in this current phase of study, or are new or more detailed travel forecasts required?
 - (ii) Identify, evaluate, and screen road/bridge improvement alternatives in this current phase of study?
 - (b) If new or revised travel forecasts are proposed:
 - (i) Explain for what purposes such new or revised forecasts are required, and specifically why they are required.
 - (ii) Explain which work (see following tasks), if any, can proceed prior to the new forecasts.
 - (iii) Explain if the new forecasts are to be done by Contractor, or are new forecasts from Metro or RTC required?
 - (iv) Explain how overall study deadlines will be kept, including any material technical work-around that will be required to keep to schedule.
- 2.3 Contractor shall review recommended alternatives from the I-5 Trade Corridor Partnership and recommend a range of options to be used for the tolling analyses. The range of options shall be selected based on a determination of design factors likely to affect tolling options. This is not intended to encompass all possible design options, but rather to select a reasonable range to be used in the tolling analyses.
- 2.4 Contractor shall review the engineering concept drawings and sketches and determine the extent of additional traffic analysis needed to refine or narrow alternatives without additional engineering work, and determine where targeted additional engineering detail must and can be done, within the schedule, to advance the narrowing of alternatives.
- 2.5 Contractor shall assemble from Agency, WSDOT, Metro, and the Regional Transportation Commission (RTC) existing information on the I-205 river crossing, which was not considered in the previous stage of the I-5 partnership, and determine the data and analyses required to identify improvement requirements for the I-205 Bridge and nearby freeway segments.
- 2.6 Contractor shall prepare a WP documenting findings from Tasks 2.2, 2.3, 2.4, and 2.5.
- 2.7 Contractor shall organize and facilitate meetings with the Regional Coordinating Committee to review data issues and discuss Contractor's recommendations.
- 2.8 Contractor shall prepare a WP, including a review by the Regional Coordinating Committee, that describes each bridge/highway alternative examined during the Strategic Plan phase of study, the level of detail it was defined and evaluated, and the current status of the alternative. The WP must also identify:

- (a) Alternatives that were discussed in the Strategic Plan phase that required study, or more study, but whose study was deferred to the next phase.
- (b) Reasonable alternatives that were not discussed in the Strategic Plan phase, but may require study in this current phase.
- (c) The association of freeway and interchange improvements with each of the bridge alternatives.
- (d) Contractor's preliminary judgments regarding which freeway/bridge alternatives and design options constitute a reasonable range of alternatives for the DEIS.
- (e) Alternatives that were not carried forward and why.

Deliverables and Schedule for Task 2

Task No. 2	Deliverables	Due Date NLT _____ from NTP
2.1	MR 2.1: Materials for initial meeting with Agency contractor.	2 weeks
2.3	Range of options for Tolling Analysis	6 weeks
2.6	WP 2.6: Existing and New Traffic Forecasts and Impact Analyses Required to Identify and Screen Highway/Bridge Improvement Alternatives and Tolling Options	10 weeks
2.7	MR 2.7: Meetings on Traffic Forecasting Requirements	4 weeks
2.8	WP 2.8: Preliminary Identification of Freeway/Bridge Alternatives and Design Options for Further Study	10 weeks

Task 3: Identify and Prepare Travel Demand/Impact Model(s) to be used to Estimate Toll Volumes and Traffic Impacts of Toll Options

Metro has prepared regional travel demand forecasts that have been used to evaluate alternatives in the previous phase of the I-5 study. In addition, a VISSIM model has been developed for a segment of I-5 and used to evaluate traffic operations issues. Unless otherwise determined in Task 2, this phase of study will continue to use these data and models for basic traffic analysis.

Contractor, in consultation with Metro and RTC travel model staff, shall undertake the following process to evaluate and select the travel and traffic performance models to be used to analyze/evaluate alternative tolling strategies for the Columbia River Crossing that meet the criteria for reliable results based on the level of project development:

- 3.1 Contractor, in consultation with Metro and RTC travel model staff, shall prepare a WP on alternative models that may be applicable to analyzing/evaluating travel demand and traffic impacts of alternative tolling strategies for the Columbia River Crossing. The purpose of this paper is to provide background information to aid in the selection of the forecasting model to be used with regard to tolling for this study. The WP shall:
 - (a) Identify models being considered for estimating tolling volumes and impacts, by providing one or more of the following:
 - (i) If the Contractor has an existing set of models capable of reliably generating the tolling and traffic impact data required by this SOW, in particular a modeling set that has been used in previous major tolling studies, the WP will provide a detailed explanation of the model, its assumptions, and its performance in other studies and peer reviews. In addition, the WP will identify any required upgrades to meet study requirements, and how such upgrades will be undertaken.
 - (ii) If the Contractor does not have an existing model capable of meeting study needs, the WP will identify and evaluate models that have been used on major tolling projects that provide the capacity to reliably generate the information required herein.

- (iii) In addition, the WP will identify and evaluate applicable models already in use by Metro, RTC, WSDOT, or Agency that may be ready as-is to generate the required information or can be upgraded to meet study requirements, and, if applicable, identify the refinements that would have to be made.
 - (b) For each identified model, the WP will explain critical features, advantages, and disadvantages for addressing the tolling scenarios.
 - (c) Identify/assess the availability of the model, the practical ability to make the model operational within the schedule, and the ability of the model to produce reliable results on the types of scenarios discussed below by five months from Notice to Proceed (NTP).
 - (d) Identify critical assumptions to be applied in model.
 - (e) Set forth the Contractor's recommendation regarding the model to be used, any refinements to the model that may be required to meet the needs of this study and the source of any data that may be required to implement the refinements.
- 3.2 Contractor shall implement the tolling model/analytical tool(s) approved by the WPM and in consultation with Metro and RTC travel model staff.
- 3.3 Contractor shall prepare a WP assessing the ability of VISSIM to measure the performance and impacts of toll plaza design and configuration options, and possible model refinements to the existing VISSIM model for I-5 that Contractor recommends to be undertaken. If Contractor determines that VISSIM is not necessary for determining queue build-up at plazas, the WP shall identify and assess other plaza operation models and recommend a course of action.
- 3.4 Subsequent to approval by WPM, Contractor shall, if necessary, acquire on behalf of Agency, refine (if necessary), and implement the plaza operations model approved by the WPM for the I-5 and I-205 Columbia River crossings. Traffic analysis will be sufficient to support the data input needs for the operations model.
- 3.5 Contractor shall organize and facilitate meetings with the Regional Coordinating Committee to review toll and plaza operations model issues and discuss Contractor's recommendations.

Deliverables and Schedule for Task 3

Task No.	Deliverables	Due Date NLT _____ From NTP
3		
3.1	WP 3.1: Identification and Evaluation of Toll Models	4 weeks
3.2	Operationalize tolling models	6 weeks
3.3	WP 3.3: Identification and Evaluation of Plaza Operation Models	4 weeks
3.4	Operationalize plaza operations models (I-5 and I-205)	8 weeks
3.5	MR 3.5: Meetings on Toll Model Requirements	4 weeks

Task 4: Identify Current Characteristics and Historical Trends of Columbia River Crossing Traffic (I-5 and I-205 Corridors)

The purpose of Task 4 is to provide a detailed profile of current and historical traffic crossing the I-5 and I-205 Columbia River bridges for the purposes of:

- Pinpointing characteristics pertinent to identifying and evaluating tolling options and volumes;
- Calibrating or refining, as necessary, the demand and performance models identified in Task 3; and Providing information for the preparation of the Purpose and Need Statement (to be prepared by another contractor).

- 4.1 Contractor shall compile and review, exclusively from Contractor's available I-5 Trade Corridor, I-5/Delta Lombard, and I-5 Partnership files, current and historical traffic counts, origin-destination and survey data, trip purpose information, previously documented study results, and computer simulations regarding the volumes and characteristics of travel and traffic conditions crossing the I-5 and I-205 bridges that may be pertinent to the objectives enumerated above. To the extent practical, data for the I-5 corridor shall be disaggregated from data for the I-205 corridor. Contractor shall provide data to WPM and Regional Coordinating Committee in an organized manner and in a usable electronic and hard copy format.
- 4.2 Contractor shall prepare a WP that:
- Provides a comprehensive listing of available information;
 - Identifies any key and relevant information that may be missing or incomplete; and
 - Recommends methods to address any missing or incomplete data.
- 4.3 Based on the data assembled in Tasks 4.1 and 4.2, Contractor shall prepare a TM detailing the travel and traffic characteristics and trends pertinent to identifying and evaluating a tolling strategy. To the extent appropriate, TM No. 3.3 will address separately for I-5 and I-205 corridors and by direction the following:
- Average Weekday, AM Peak, PM Peak, Mid-Day, and Evening traffic volumes on bridges and connecting freeway segments by class of vehicle;
 - Maximum Weekday AM Peak, PM Peak, Mid-Day, and Evening traffic volumes on bridges and connecting freeway segments by class of vehicle;
 - Any relevant weekend and seasonal variations;
 - Non-Freight trips by trip purpose;
 - Origin-destination of traffic by type of vehicle, type of trip, mode;
 - Level of Service, volume-to-capacity ratios, and delay on bridges, I-5 and I-205, and major access and parallel routes;
 - Representative travel times by time of day;
 - Auto occupancy and transit ridership; and
 - Historic trends in factors listed above.

The data above shall be based on Contractor's available I-5 Trade Corridor, I-5/Delta Lombard, and I-5 Partnership files, as appropriate.

In addition to detailing travel and traffic characteristics, TM No. 3.3 will include an analysis of the relationship between those characteristics and the tolling options being recommended by the Contractor.

Deliverables and Schedule for Task 4

Task No.	Deliverables	Due Date NLT _____ from NTP
4		
4.1	Compilation of data in electronic format and hard copy	7 weeks
4.2	WP 4.2: Listing of Available and Needed Data	7 weeks
4.3	TM4.3: Travel and Traffic Trends Pertinent to Tolling Options	8 weeks

Task 5: Identify Toll Rate Structure Options

The purpose of this task is to identify practical tolling rate options that demonstrate the material differences tolling policy, revenue generation, and impacts of potentially tolling the I-5 Columbia River crossing or the I-5 and I-205 Columbia River crossings. Unless otherwise recommended by the Contractor and

approved by the WPM, the Contractor will assume that in scenarios in which both I-5 Columbia River and I-205 Columbia River crossings are tolled, the toll rate structure would be the same in both corridors.

- 5.1 Based on information provided by WPM, additional research available to the Contractor, and the characteristics of traffic crossing the Columbia River, the Contractor shall prepare a WP that identifies and evaluates alternative toll rate structures and recommends, based on objectives provided by the WPM, a set of toll rate structure options to be examined in this Study. The proposed toll rate structures should correspond to the mix of toll lanes/collection methods proposed in Task 7. That is, if a mix of electronic and manual (including automatic coin machines and/or toll-taker personnel) toll collection lanes is proposed, the toll rate structure must be one that can be practically implemented by manual operations. Unless otherwise amended by WPM, the recommended options shall include the following:
 - (a) Uniform toll rate for SOV, HOV, and heavy and medium trucks for all time of day
 - (b) Uniform toll rate for SOV, HOV, and heavy and medium trucks with time of day differentials
 - (c) Differential by vehicle category –constant during day
 - (d) Differential by vehicle category with time of day differentials
 - (e) Loyalty discounts
 - (f) HOV discounts
 - (g) Alternative strategies for tolling freight traffic
 - (h) Toll escalation rates per year over the study period
- 5.2 Contractor shall prepare a WP assessing the operational, revenue and traffic impacts of collecting tolls (assuming the toll rate options identified in Task 5.1) on:
 - (a) Northbound traffic only (one-way toll)
 - (b) Southbound traffic only (one-way toll)
 - (c) Both northbound and southbound traffic (one-half of the two-way toll rate)
- 5.3 With regard to the electronic collection component, Contractor shall prepare a WP identifying, evaluating, and recommending approaches to sale/distribution of electronic “passes,” including fees, and forecast the potential market penetration of the proposed approach(es) by user category.
- 5.4 As requested by WPM, Contractor shall prepare material for and participate in six intergovernmental technical and/or policy level committee meetings arranged by WPM to discuss preliminary assessments and final findings regarding toll rate structures.
- 5.5 Contractor shall prepare a TM that assembles the conclusions of from Tasks 5.1, 5.2 and 5.3 into a comprehensive report to be used with federal agencies, future environmental documents and available for public review.

Deliverables and Schedule for Task 5

Task No.	Deliverables	Due Date NLT _____ From NTP
5.1	WP 5.1: Toll Rate Structure Options	2 Months
5.2	WP 5.2: Location of Toll Collection Options	2 Months
5.3	WP 5.3: Sale/Distribution of Electronic Passes	2 Months
5.4	MR 5.4: Meetings on Toll Rate Structure	2 Months
5.5	TM5.5: Identification of Toll Rate Structures	3 Months

Task 6: Identify River Crossing HOV and Truck-Only Operations Options

Task 2, the Contractor will have determined the basic bridge/freeway improvement options that require additional analysis. In Task 5, the Contractor will have determined the toll rate structures meriting further study. Task 6 focuses on identifying and evaluating operational options for the bridge/freeway improvement and toll rate structure options. Each subtask below calls for the preparation of a WP that documents the analysis and recommends HOV and truck-only options for further study. The purpose of these WPs is to allow the WPM to determine which options require detailed study as part of the current effort, and ultimately in the DEIS. The papers will be used to explain, during Scoping, why some alternatives are not to be included in the DEIS. Options meriting further analysis based on the threshold analyses in this Task 6 will be further evaluated in Task 11, where options are screened for further study in the DEIS.

- 6.1 Contractor shall prepare a WP on the benefits and impacts of operating (i) two freeway/bridge lanes (one in each direction) and (ii) one reversible lane as an HOV lane. In identifying the HOV options, the Contractor shall assess the merits of and recommend (i) the appropriate occupancy threshold for HOV lanes, (ii) whether freight trucks could also use HOV lane, and (iii) time of day HOV operations. The WP prepared under this Task 6.1 shall address:
- (a) The travel time /congestion savings to HOV travelers;
 - (b) The travel time/congestion impact on non-HOV lane users;
 - (c) Upstream, downstream, and parallel and intersecting route traffic impacts;
 - (d) The amount of usage and characteristics of users of the HOV lane; and
 - (e) The anticipated differences in the above factors based caused by the HOV options for each of the bridge/freeway improvement options, and toll rate structure options.
 - (f) Person through-put versus auto through-put
- 2 Contractor shall prepare a WP on the benefits and impacts of operating (i) two freeway/bridge lanes (one in each direction) and (ii) one reversible lane as a truck-only lane. Factors analogous to those set forth in Task 6.1 shall be addressed.

Deliverables and Schedule for Task 6

Task No.	Deliverables	Due Date NLT _____ from NTP
6		
6.1	WP 6.1: Identification and Threshold Analysis of HOV Lane Options	3 Months
6.2	WP 6.2: Identification and Threshold Analysis of Truck Only Lane Options	3 Months

Task 7: Identify Toll System Options for Study

At this phase of study, Agency is not interested in evaluating and selecting specific technologies, hardware products, or software products. Rather, this phase is aimed at determining the following:

- (a) Whether there are any Tag, Reader, "Backroom," and Enforcement system options that could be particularly well adapted or poorly adapted to the Columbia River crossing (I-5 and I-205), considering traffic characteristics, currently active project improvement options, recommended toll rate structure options, climate, and other pertinent factors.
- (b) Of those tolling system options that could be reasonably adapted to the Columbia River Crossing, are their impacts and costs sufficiently similar that only one conceptual option need be identified for purposes of the financial planning and administrative analyses being undertaken in the current phase of study and the upcoming DEIS, or must multiple options be carried forward.

- (c) Identify and provide needed information on the tolling system option or options that must be carried through the current study phase and upcoming DEIS.
- 7.1 Evaluate Toll System Options Meriting Study. Contractor shall prepare a WP, to be presented to the Regional Coordinating Committee, that identifies, and evaluates concepts (not specific products) for further study including, but not limited to the following:
- (a) Tag System Options, including Read-Only, Active and Smart Card tag systems. Consultant shall consider, if pertinent, mounting locations and sales/distribution options;
 - (b) Reader System Options, including roadside, in-pavement and overhead systems;
 - (c) Backroom Systems, including verification, billing, maintenance, administration systems, and data processing facilities;
 - (d) Violation and Enforcement Systems, including in-lane and toll plaza surveillance options, camera, red light, and videotape options, and use of troopers/police; and
 - (e) For any non-electronic lanes, manual and automatic coin machine options.

In assessing these options, Contractor shall consider the following:

- (a) Capital and operating costs
- (b) Reliability
- (c) Security
- (d) Growth capacity
- (e) Privacy
- (f) Traffic operations and impacts
- (g) Policy implications

7.2 Meetings with Regional Planners/Decision-Makers. Contractor shall meet with and/or make presentations to the relevant technical staff teams, the Regional Coordinating Committee and the Bi-State Coordination Committee to review the options and analysis identified in the I-5 Columbia River Crossing Traffic and Tolling Analysis.

7.3 Identify and Recommend Toll Options for Financial Analysis and DEIS. Based on the analysis prepared in Task 7.1, and the recommendations resulting from Task 7.2, Contractor shall prepare a TM describing the toll system option or options recommended for further analysis in this phase and the DEIS. Two descriptions shall be provided: (a) a summary description for use in meetings with government officials and public groups; and (b) a more detailed description that can be used by technical staff performing other analyses. The detailed description shall include a capital and operating cost estimate for each option that is sufficiently comprehensive and reliable to be used in the financial analyses to be undertaken in this study phase and the DEIS. These cost estimates shall be sufficiently disaggregated to demonstrate the major cost components

Deliverables and Schedule for Task 7

Task No.	Deliverables	Due Date NLT _____ from NTP
7		
7.1	WP 7.1: Evaluation of Toll System Options	3 Months
7.2	MR 7.2: Meetings on Toll System Options	3 Months
7.3	TM7.3: Toll System Options to be Studied	3.5 Months

Task 8: Identify Toll Facility Design and Configuration Options

Based on the toll system options identified in Task 7, the operational concepts identified in Task 6 and the toll rate structures determined in Task 5, Contractor shall prepare a WP addressing the toll facility (plaza)

design concepts for each of the bridge/freeway alternatives identified in Task 2.7. Contractor will review potential plaza sites in Washington and Oregon in the context of design standards, impact to existing developments, and within the constraints of existing laws and policies. Designs will be at a conceptual level within the available budget for the purpose of incorporating feasible options in the DEIS. For each option identified, the WP must specify:

- (a) The mix of electronic, manual, and/or other designated lanes;
- (b) The layout and area requirements of the toll plaza, including any ancillary facilities or administration buildings; and
- (c) The anticipated processing rate for the option.

Deliverables and Schedule for Task 8

Task No.	Deliverables	Due Date NLT _____ From NTP
8	WP 8: Evaluation of Toll Facility Design Options	3 Months

Task 9: Prepare Improvement/Toll Alternatives for Screening

- 9.1 Alternatives for Screening. The alternatives to be evaluated include combinations of the (i) bridge/freeway improvement options identified in Task 2.7, (ii) the freeway/bridge operations options identified in Task 6, (iii) the toll rate structure options identified in Task 5, (iv) the toll system options identified in Task 7 and the toll facility design and configuration options identified in Task 8. In addition, the alternatives must address conditions with and without high capacity transit conditions and tolling I-5 only or tolling both I-5 and I-205. The travel demand forecasting and evaluation of all possible permutations of these options far exceeds the time and resources available for this SOW. Moreover, such analysis would not be necessary to accomplish the primary purposes of the evaluation to be undertaken in Task 10 and Task 11, which include:
- (a) Estimate the toll revenues generated by the various alternatives;
 - (b) Estimate the traffic diversion associated with tolling I-5 only;
 - (c) Estimate the differential traffic impacts of the toll rate structures, toll systems, plaza design configurations, and freeway/bridge operation concepts; and
 - (d) Assist in "scoping" the options and alternatives.

Within this context, Contractor shall assist WPM to coordinate with the Regional Coordinating Committee and Bi-State Coordination Committee in determining up to six alternatives for evaluation. Contractor shall prepare a TM identifying the alternatives selected for travel demand forecasting, and the concepts for which forecasts will be derived or extrapolated based on the results of the travel demand forecasts.

- 9.2 Meetings with Regional Planners/Decision-Makers. Contractor shall meet with staff-level and policy level committees to review the alternatives for evaluation.

Deliverables and Schedule for Task 9

Task No.	Deliverables	Due Date NLT _____ From NTP
9		
9.1	TM 9.1: Identifying Selected Alternatives for Travel Demand Forecasting	4 Months
9.2	MR 9.2: Meetings	4 Months

Task 10: Generate Forecasts for Evaluation of Options and Alternatives

10.1 Forecasting. For each of the alternatives identified for travel demand forecasting in Task 9, Contractor shall use data from the forecasting and operational models identified in Task 3 and, to the extent necessary, work with Metro to implement its modeling activities to generate the following data:

- (a) Year 2020 traffic volume, speed, and delay for AM Peak, PM Peak, and Typical Mid-Day on:
 - I-5 between Rose Quarter and I-5/I-205 interchange in Clark County;
 - I-205 between I-205/I-84 and I-5/I-205 interchange in Clark County;
 - Major parallel routes to the above based on aggregate screenline information; and
 - Major intersecting routes (I-84, SR 14, and SR 500) to the above.
- (b) Columbia River crossing forecasts above shall be provided by:
 - Vehicle type
 - Trip purpose
- (c) Columbia River crossing forecasts shall be provided for interim years (by extrapolation or growth rate analysis) between start-up of tolls and year 2025.

10.2 Document Results of Forecasts. Contractor shall prepare a WP documenting the results of Task 10.1.

Deliverables and Schedule for Task 10

Task No. 10	Deliverables	Due Date NLT _____ from NTP
10.2	WP 10.2: Documentation of Model Forecasts	5 Months

Task 11: Evaluate Alternatives

The impacts of the concepts and alternatives shall be assessed by comparison to the No Build and Baseline alternatives developed for the Strategic Plan, where applicable, and by comparison to each other.

11.1 Evaluate Impacts of Toll Rate Structures. Contractor shall analyze the toll rate structure in each forecasted alternative (and where applicable concepts by extrapolation) and prepare a WP addressing:

- Gross revenues and net revenues (accounting for operating costs) generated;
- Impact on traffic volumes and traffic diversion;
- Impact on traffic characteristics at river crossing, such as vehicle type, trip type;
- Impact on transit usage and HOVs;
- Characteristics of electronic toll users versus manual and coin machine lane users;
- Toll rate structures options to be carried into the DEIS and those proposed to be eliminated from further consideration;
- Refinements to the toll rate structure that can optimize revenues; and
- Elasticity of toll rates.

11.2 Evaluate Toll System Options. Contractor shall analyze the toll system option in each forecasted alternative (and where applicable concepts by extrapolation) and prepare a Working Paper addressing:

- Impact on traffic volumes, (I-5/I-205) diversion, freeway operations (including at the toll plaza), including travel times, delay and service levels;
- Impact on user types; and
- Toll system options to be carried into the DEIS and those proposed to be eliminated from further consideration.

- 11.3 Evaluate Freeway/Bridge Operation Concepts. Contractor shall analyze the freeway/bridge operations (i.e., HOV, truck-only) option in each forecasted alternative (and where applicable concepts by extrapolation) and prepare a WP addressing:
- Impact on traffic volumes, diversion, freeway operations (including at the toll plaza), including travel times, delay and service levels;
 - Impact on user types (HOV, trucks, etc.); and
 - Freeway/bridge operations options to be carried into the DEIS and those proposed to be eliminated from further consideration.
- 11.4 Evaluate Toll Facility Design and Configuration Options. Contractor shall analyze the toll facility design and configuration option in each forecasted alternative (and where applicable concepts by extrapolation) and prepare a WP addressing:
- Through-put volumes under the various freeway/bridge improvement and operations options;
 - Impact on traffic volumes, diversion, freeway operations (including at the toll plaza), including travel times, delay and service levels;
 - Impact on user types (HOV, trucks, etc.); and
 - Toll facility design and configuration options to be carried into the DEIS and those proposed to be eliminated from further consideration.
- 11.5 Evaluate Freeway/Bridge Improvement Alternatives. Contractor shall analyze the freeway/bridge improvements in each forecasted alternative (and where applicable concepts by extrapolation) and prepare a WP addressing:
- Impact on traffic volumes, diversion, freeway operations (including at the toll plaza), including travel times, delay and service levels;
 - Impact on user types (HOV, trucks, etc.); and
 - Freeway/bridge improvement options to be carried into the DEIS and those proposed to be eliminated from further consideration

Deliverables and Schedule for Task 11

Task No. 11	Deliverables	Due Date NLT _____ from NTP
11.1	WP 11.1: Evaluation of Toll Rate Structures	6 Months
11.2	WP 11.2: Evaluation of Toll System Options	6 Months
11.3	WP 11.3: Evaluation of Freeway/Bridge Operations Options	6 Months
11.4	WP 11.4: Evaluation of Toll Plaza Concepts	6 Months
11.5	WP 11.5: Evaluation of Freeway/Bridge Alternatives	6 Months

Task 12: Final Report, Public Review and Continuing Assistance

- 12.1 Final Report on Results of Evaluation. Contractor shall prepare a FR documenting the results and recommendations from Task 11. The FR shall also include an executive summary with appropriate color graphics. Ten copies of the FP shall be produced along with a CD that can be used to either produce additional paper copies or CD's for distribution.
- 12.2 Participate in Meetings with Technical Staff, Policy-Makers and Public Involvement. Prepare for and participate in meetings with technical staffs from the Regional Coordinating Committee and Bi-State Coordination Committee, and participate in the public involvement process. For budgeting purposes, there are estimated to be four Agency meetings and two public meetings.
- 3 Provide Continuing Technical Assistance. Assist WPM in addressing questions arising during this phase of study from technical staffs of participating governments, policy-makers, and public

HNTB – Communications and Outreach (still being developed)

9. BUDGET AND COST INFORMATION FOR PROJECT TO DATE

Cost Status 2004-2005

Funding for Pre-EIS Work	Available	Obligated ¹	Remaining
Oregon	\$3,900,000	\$3,300,000	\$600,000
Washington	\$3,000,000	\$2,250,000	\$750,000 ²

Contract Scope	Lead Consultant	Authorized Budget	Billed through July
Project Management & Technical Analysis	The Larkin Group	\$1,251,890	\$300,109
Traffic & Tolling	David Evans Associates	\$639,147	\$36,089
Conceptual Engineering & Environmental	Kittelson & Associates	\$213,845 ³	—
Metro-Data	Metro	\$15,500	—
Communications & Outreach	HNTB/EnviroIssues	\$110,000	\$27,877
Freight Movement	Cambridge Systematics	\$10,300	\$8,065
Total		\$2,240,682	\$372,140

¹Estimated to complete pre-EIS phase.

²Balance from TEA-21 extension or TEA-21 reauthorization.

³Phase one only (through late September); to be amended.

10. MINUTES OF REGIONAL COORDINATING COMMITTEE

I-5 COLUMBIA RIVER CROSSING PROJECT
REGIONAL COORDINATING COMMITTEE MEETING
APRIL 8, 2004
MINUTES

People Present:

Don Wagner, WashDOT	360-905-2001	wagnerd@wsdot.wa.gov
Dale Hines, WashDOT	360-905-2006	hinesd@wsdot.wa.gov
Matt Garrett, ODOT	503-731-8256	matthew.l.garrett@odot.state.or.us
Geoff Larkin, Larkin Group, Inc.	503-227-3944	larkingroupinc@comcast.net
Steve Siegel, Larkin Group, Inc.	503-274-0013	siegelconsulting@aol.com
Andy Cotugno, METRO	503-797-1763	cotugnoa@metro.dst.or.us
Richard Brandman, METRO	503-797-1749	brandmanr@metro.dst.or.us
Thayer Rorabaugh, City of Vancouver	206-696-8039	thayer.rorabaugh@ci.vancouver.wa.us
Susie Lahsene, Port of Portland	503-944-7517	lashes@portptld.com
Neil McFarlane, Tri-Met		mcfarlan@trimet.org
Dean Lookingbill, RTC		dean.lookingbill@rtc.wa.gov
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Karen Schilling, Multnomah Co	503-988-5050 X29635	karen.c.schilling@co.multnomah.or.us
John Gillam, City of Portland	503-823-7707	john.gillam@pdxtrans.org
MaryJo Porter, Underhill Co	206-726-7906	underhillcompany@qwest.net

DECISION MAKING PROCESS

- Bi-state coordination committee will vet the proposals/recommendations that are a consensus of all jurisdictions.
- Proposals/recommendations will then go to joint state decision-making group, Metro/JPACT and RTC.
 - Specialty information will be included when decision-making group forms next month.
 - Public involvement scope of work is almost ready for this group's view. WASHdot will contract the work.
 - Joint state decision-making group needs to determine if CAC will report directly to them or to work with the bi-state group

JUNE 2002 STRATEGIC PLAN CONCLUSIONS

- The document titled "How Did We Get Where We Are? And By The Way Where Are We?" was distributed and described.
- All possible project variations of the I-5 Partnership's "bridge influence area" recommendations must be modeled. Then the group can determine which variations are viable and which aren't and document why each is or isn't. This includes the options thought to be dropped by the Partnership as there is no documentation of conclusions reached as to why they were dropped. All this information must be included in the EIS along with the rationale for the decisions that were made.
- Although there was not a decision to do so, there is considerable support for changing the current phase ("step between strategic planning and EIS") into the actual EIS scoping phase.
- Major Issues:

- Can the I-5 Partnership Report be packaged as a document to show intent to begin EIS scoping now rather than in 1-1/2 years after this phase of work is complete?
- Is the group's focus to be 1) "How do we get across the river" or 2) "How do we address the criteria from the trade corridor study"?
- Will options not included in Partnership recommendations be included?
 - ✓ Tolling: is it something that needs to be scoped as part of each proposed project's options or is it a funding consideration that needs to be discussed after project options have been selected?
- How does the group include the public transit option in the project?
 - ✓ How to resolve discrepancy between METRO and RDC on transit alternatives?
- How does the group include the freight movement option in the project?
- How does the group address public involvement in decision-making (as mentioned, Public Involvement Scope of Work is almost ready for group discussion/approval)?

UPDATE ON STATUS OF TECHNICAL WORK

- Time constraints didn't allow for technical status update.
- Group members will be given the technical status update and advised of the next meeting date/location by e-mail.

I-5 COLUMBIA RIVER CROSSING PROJECT
REGIONAL COORDINATING COMMITTEE MEETING
MAY 13, 2004
MINUTES

People Present:

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MaryJo Porter, Underhill Co	206-726-7906	underhillcompany@qwest.net
Dale Himes	360-905-2006	himesd@wsdot.wa.gov
Scott Patterson	360-906-7306	scottp@c-tran.org
Lynne Griffith	360-906-7303	lynneg@c-tran.org

1. Update

- Joint Commission Meeting

First meeting of Oregon Transportation Commission and Washington Regional Council has taken place. Members are very interested in work of the RCC.

- Public-Private Partnership
- Public Communications Plan
- Work Plan Update

2. Policy Analysis

3. Tolling Research

4. Status of Transit Component

5. Other Business

I-5 COLUMBIA RIVER CROSSING PROJECT
REGIONAL COORDINATING COMMITTEE MEETING
JUNE 10, 2004
MINUTES

People Present:

Don Wagner, WashDOT	360-905-2001	wagnerd@wsdot.wa.gov
Matt Garrett, ODOT	503-731-8256	matthew.l.garrett@odot.state.or.us
Geoff Larkin, Larkin Group, Inc.	503-227-3944	larkingroupinc@comcast.net
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Andy Cotugno, METRO	503-797-1763	cotugnoa@metro.dst.or.us
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Dale Himes, WashDOT	360-905-2006	himesd@wsdot.wa.gov
Amy Echols, WashDOT	360-905-2058	echolsa@wsdot.wa.gov
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Scott Patterson, C-TRAN	360-906-7306	scottp@c-tran.org
Tom Markgraf	503-285-9549	markgraf@teleport.com
Pat Serle, Enviro Issues	206-269-5041	psevie@envivoissues.com

Group discussion on each of this meeting's agenda items identified the following areas where there must be agreement:

- 1) They must determine which federal agency will take the regulatory lead for the project. It will probably be a joint FHWA and FTA lead, but whose rules will be paramount? In order to discuss this with the agencies, a Purpose of Need must be prepared. How can this group facilitate which agency will be the lead for this project?
- 2) Before moving forward to Notice of Intent, this group must decide whether or not to go forward with a private/public partnership?
- 3) The public must receive a unified key message from this group. All communications must present the key messages as we move forward.

1. Public Involvement/Communications Team

- Introductions

The contractor responsible for the public involvement/communications piece of this project will be Enviro Issues, represented by Pat Serle. Amy Echols of WashDOT will be working with her.

- Discussion of Communications Plan Scope

Over the next month, the contractor will develop a work plan. All correspondence and interactions will be captured and made part of the project record. Their focus is to handle communication outreach during the EIS phase of the scope of work, approximately 2005.

People can contact Amy Echols regarding outreach. She would like to wait until a work plan is in place, laying out points to be carried out before getting too much contact.

2. Traffic and Tolling Analysis - Update

David Evans & Assoc and Bolmer Associates are the contractors who will be doing the tolling research. Bolmer Associates will be at the June 24 work session to present their analysis.

A decision is needed: Before the EIS can be finished this group must decide whether a new population/employment forecast will need to be done. The existing forecast numbers are sufficient for Bolmer Associates to model this phase, but not enough for the next phase.

3. Discussion of Transit Component

After discussion on transit issues, the group identified that a decision was needed before there could be any further discussion. Geoff Larkin and Steve Siegel were tasked with getting a small group together to analyze the choices and present arguments to the group for a decision. The main choices are:

A. They must agree upon whether to:

1) present what's already been done (move forward with the Governor's Task Force results rather than start again) and start talking to the FTA now.

OR

2) analyze and agree upon which transit options will be included in the EIS before initiating conversation with FTA.

4. Other Business

- Rob deGraff has been hired by ODOT to be Oregon's liaison for the I-5 Bridge Crossing project.
- The first Joint Commission meeting has been held. Senior executives are very engaged in this process and are ready to be involved in decision-making. Their next meeting will be in early September. This group needs to be able to present them with agreements and supporting arguments.

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JUNE 10, 2004
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