



Washington State
Department of Transportation

SR 509 Toll Feasibility Study



Prepared for Governor Chris Gregoire
and the 2010 Washington State Legislature

September 2010

1. Executive Summary

Background

The State Route (SR) 509 Extension and Interstate 5 Improvement Project was developed through many years of cooperative efforts between the Washington State Department of Transportation (WSDOT), the Port of Seattle, King County, and the cities of Sea-Tac, Des Moines and Kent. The project proposes critical freight and mobility improvements for SR 509 including completion of the planned SR 509 corridor extension, improvements on I-5 and more direct access to Sea-Tac International Airport and the Kent Valley.

Since 1998, numerous efforts have been made to fund the project's construction through statewide or regional revenue sources. To date, more than \$86 million of funds have been secured and invested in the project. With these funds, WSDOT has completed 30% of design, acquired 40% of right-of-way, and conducted some early environmental mitigation. Approximately \$930 million is still needed to acquire the remaining right-of-way and complete design and construction.

Legislative Directive

In 2009, the Washington State Legislature directed WSDOT to evaluate the feasibility of administering tolls within the SR 509 corridor. Specifically, WSDOT was asked to examine the following:

- The potential for variable tolling to generate revenues for needed transportation facilities within the corridor.
- Maximizing the efficient operation of the corridor.
- Economic considerations for future system investments.

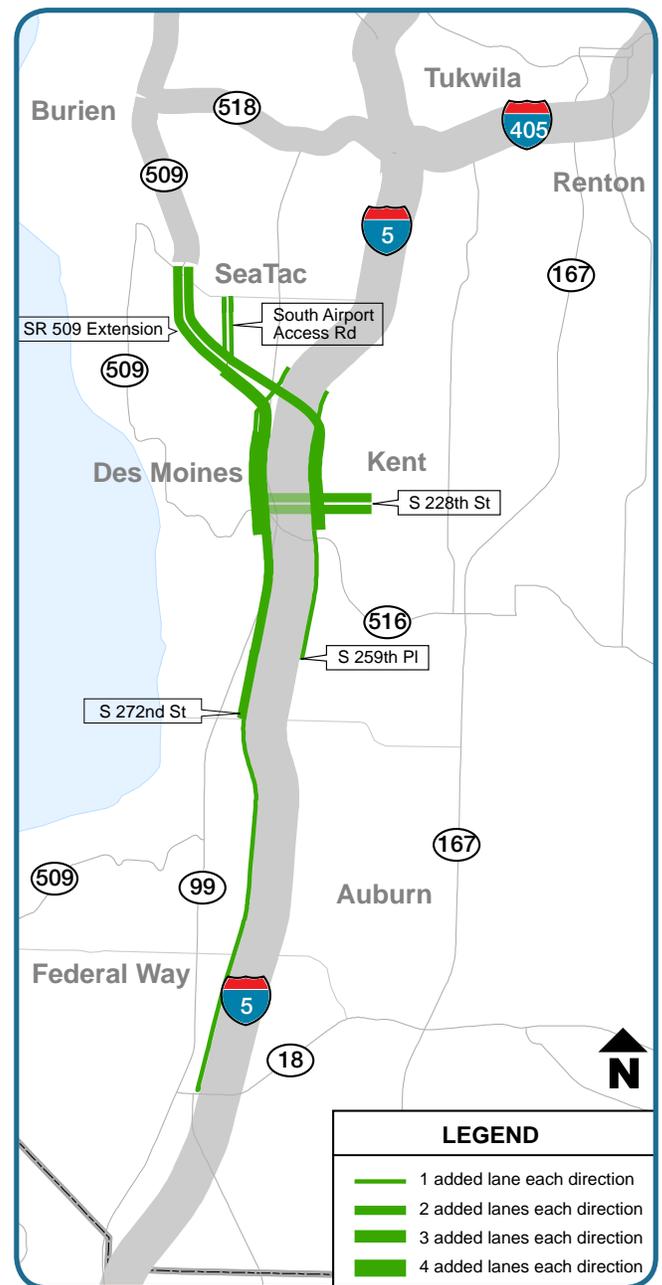
The Legislature directed WSDOT to report the feasibility study findings to the Washington State Transportation Commission (WSTC) periodically throughout the study process and to report the final findings to the Joint Transportation Committee (JTC) by Sept. 30, 2010.

Options Studied

WSDOT worked closely with stakeholders from affected cities and jurisdictions, the Port of Seattle, the Puget Sound Regional Council, and the Federal Highway Administration to evaluate six different combinations of construction and tolling options. See sections 5 and 6 of the report for detail descriptions of these options.

For each option, the study estimated the amount of funding needed for construction, revenue generated through tolling, remaining funding gap, and effects on traffic using single-point tolling and segmented tolling.

SR 509 Extension and I-5 Improvement Project

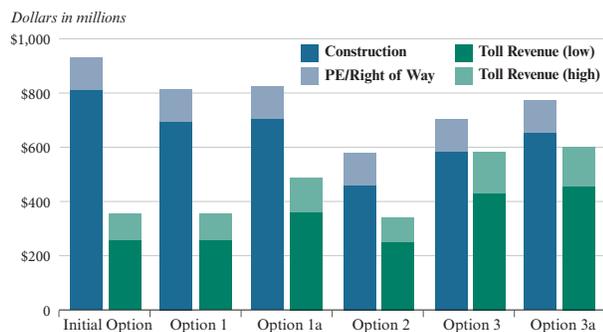


Summary of findings

- Expected Toll Revenue
 - Tolling is expected to generate a significant amount of revenue to fund the project’s construction, ranging from approximately \$250 million to \$600 million.
 - The bonding capacity of the toll revenue is heavily dependent on financing assumptions, such as debt repayment options, the types of bonds used and market conditions at the time of bond issuance.
 - Segmented tolling, which spreads the same amount of tolls to several roadway segments, as opposed to placing all tolls at a single point is a more effective means of generating revenue. Single-point tolling tends to cause drivers to take alternate routes to avoid paying higher tolls.
- Maximize Operational Efficiency of the Corridor
 - Revenue focused tolling is expected to reduce traffic demand by about half compared to the toll free condition, creating opportunities to downsize or phase project construction. This improves corridor efficiency, reduces upfront construction cost and makes the project more feasible financially.
 - Construction phasing or downsizing should take freight mobility into consideration in order to maintain the original purpose of the project.
- Future Economic Considerations
 - Among all the options studied, additional revenue ranging from \$120 million to \$700 million is needed to fund the project depending on how construction is phased.
 - Right-of-way should be secured prior to bond issuance to minimize risk and financing cost.

Table 1-1 shows the project cost, expected revenue, and remaining funding gaps for the options studied.

Table 1-1: Summary of project cost, revenue and funding gap
(In year of expenditure dollars assuming project completion by 2020)



Due to limited resources and time available to conduct this study, WSDOT did not conduct an open house or public workshop. Therefore, we do not have public input on the options studied and findings. WSDOT recommends conducting a comprehensive toll study that includes more refined assumptions for WSTC and legislative consideration. Further, the study should also provide opportunities for public input.

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There is a high degree of uncertainty in toll revenue projections, especially for a road that doesn't exist today. Additional variation in the toll funding contribution projections will be a function of the type of debt instruments used, market conditions and interest rates at the time the debt is issued, and policy decisions regarding how the debt is structured.

The estimated assumptions used in this analysis may be somewhat optimistic because repayment of debt was tailored to the assumption that tolls will escalate at 2.5% annually to keep pace with inflation. The toll funding contribution would be somewhat lower if more conservative assumptions regarding toll escalation are adopted.
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