

I-5 SR 510 (Marvin Rd) to SR 512 (Lakewood) Corridor

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Corridor Description

This I-5 thoroughfare is the only North/South route in the south Puget Sound Region and was built in the 1970s.

- Corridor is from SR 510 (Marvin Rd. to SR 512, Lakewood)
- Services the cities of DuPont, Lakewood, Steilacoom & JBLM
- Major thoroughfare for freight and commuter traffic
- Three lane highway from south of Thorne Ave
- Antiquated Interchanges from the 1970's



Growth Trends Impacting the Corridor

- Pierce and Thurston's counties have grown by 160K over the last 10 years
- JBLM growth is up 36,000 since 2000
 - Approx. 11,000 Soldiers/family live on post
- Businesses new to the area in the past 10 years
 - State Farm
 - Intel
 - FedEx
 - Cabela's
 - Hawk's Prairie Industrial area
- Mainline volumes have increased upwards of 2% per year for the last decade, pushing capacity to the tipping point



Recent Studies in the Corridor

Recent Studies:

- Ft. Lewis Comprehensive Installation Traffic Study

Office of Economic Adjustment (OEA)
(Dept. of Defense)

- I-5 Transportation Alternatives Analysis and Traffic Operations Model (September 2010) –
 - studied corridor between Mounts Rd and SR 512
- JBLM Growth Coordination Plan (December 2010)
 - Evaluates effects of military growth on communities surrounding the base, including transportation corridors other than I-5

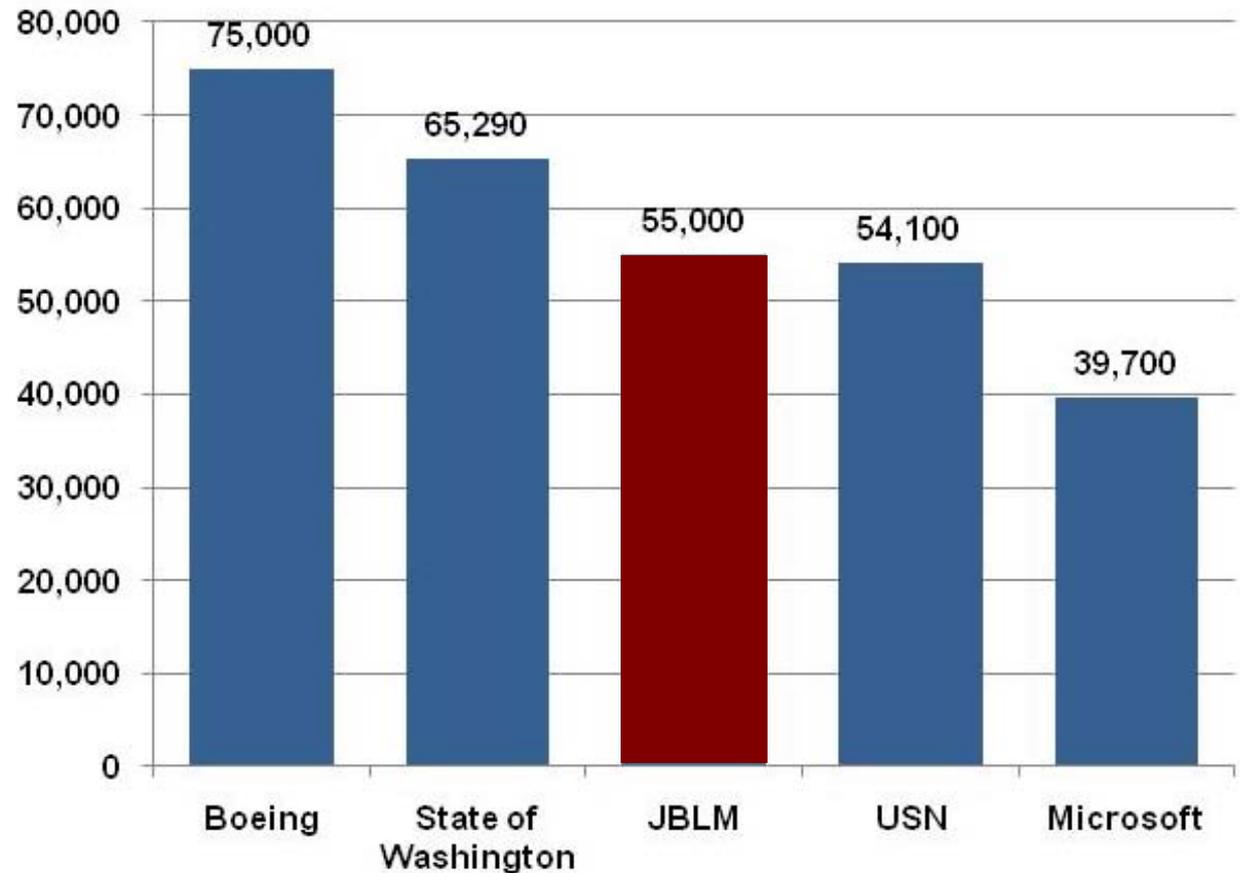
WSDOT projects

- Pt. Defiance Bypass Project



JBLM Economic Impact as indentified in the OEA Study

- JBLM is the third largest employer in Washington.
- JBLM payroll was **\$3.7 billion** in FFY09.
- Direct defense spending in Washington is nearly **4 percent** of State GDP.
- DOD-funded construction on JBLM **totals \$3.6 billion** 2008-2015.



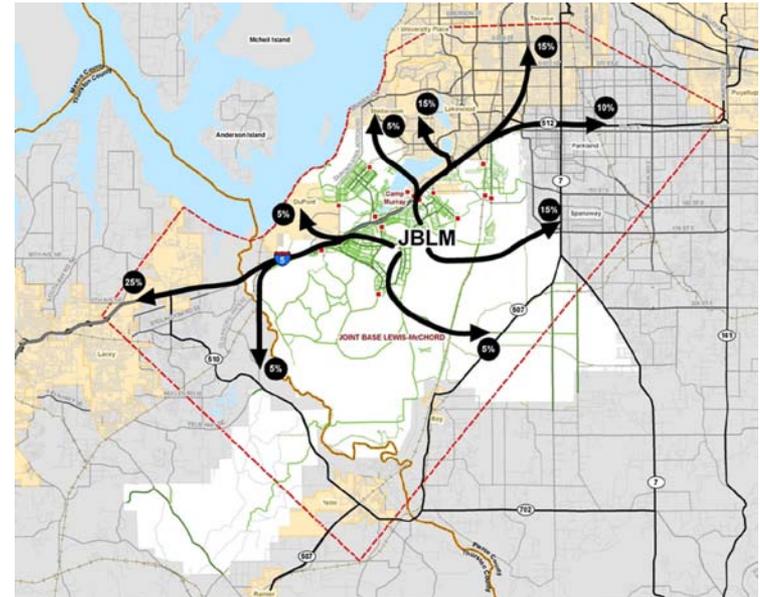
I-5 Transportation Alternatives Analysis and Traffic Operations Model as identified in the OEA Study

Regional Impacts

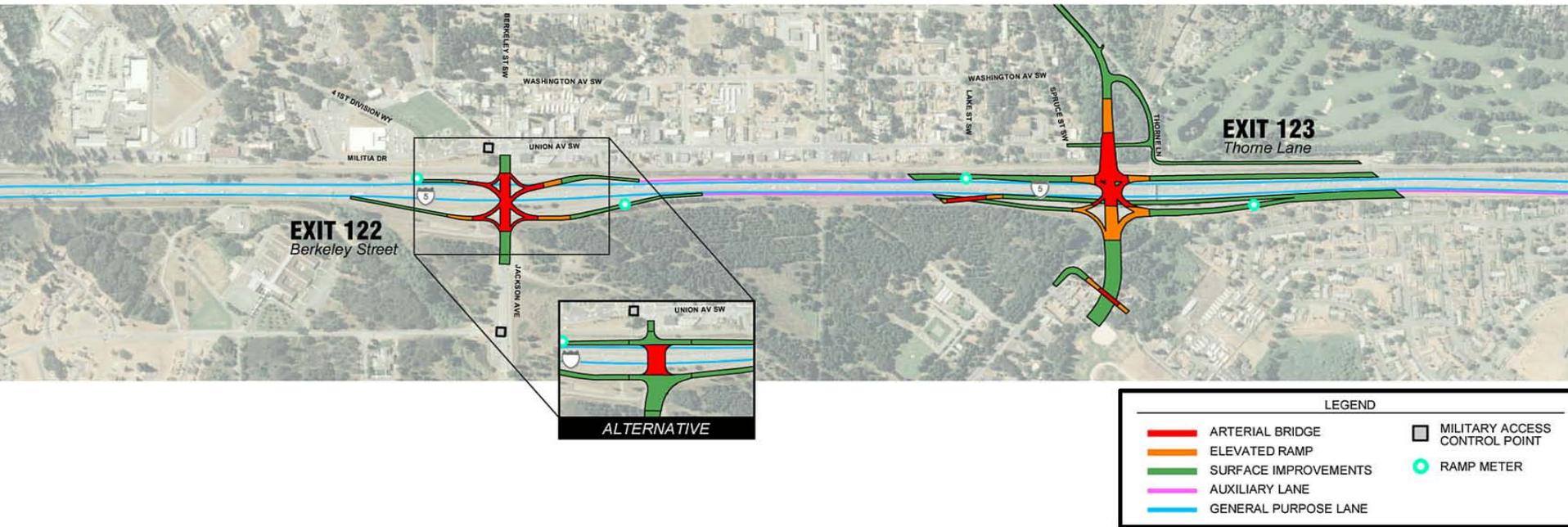
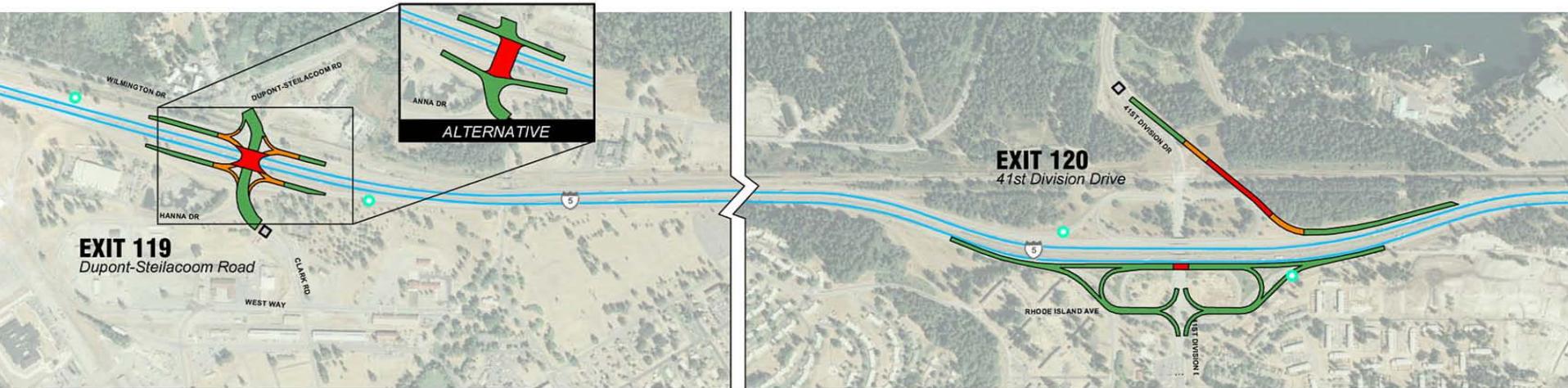
- Significant increases in traffic congestion
 - Longer commute times
 - Longer duration of congestion
 - Impacts to freight movement
 - Impacts to military ops
 - Overall economic impacts

Scope of needs – we need to do more.

- More I-5 lanes
- Reconstruct interchanges



Investment Needs as identified in the OEA Study



Preliminary Estimates as identified in the OEA Study

Project Component	Estimated Cost*
DuPont Steilacoom Road Interchange	\$22 to \$72 million**
41 st Division Drive Interchange	\$16 million
Berkeley Street Interchange	\$22 to \$72 million**
Thorne Lane Interchange	\$300 million (included in cross-base highway project)
I-5 Mainline Improvements (ITS, Auxiliary Lanes, General Purpose Lanes)	\$600 million

**Planning level costs only (2010 dollars)*

***Range of costs represent alternate interchange concepts as diverging diamond is less expensive due to reduced additional structure need*

Recent issues in the corridor

Mainline congestion, duration and magnitude of congestion increased dramatically immediately after Labor Day

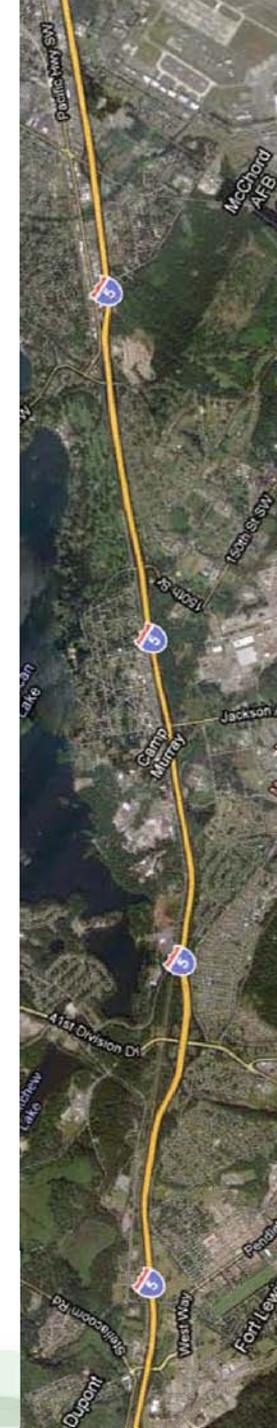
- **Mon-Fri**

- AM-** congestion NB I-5 from Mounts Road vicinity back to Carpenter Road with increased backups SB off-ramp to Berkeley Street

- PM-** increased congestion both directions

- **Weekends**

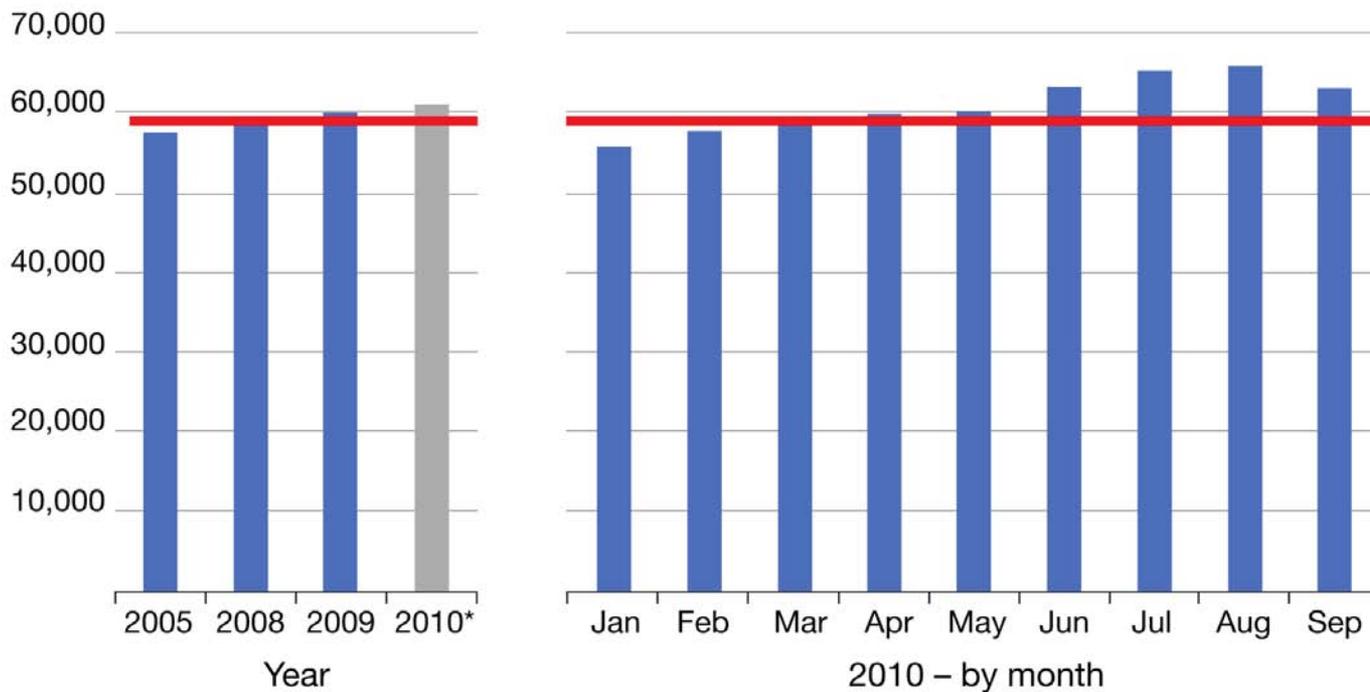
- PM-** significant summer Sunday backups



Traffic Growth

I-5 NB Average Daily Traffic (North of DuPont I/C)

Weekday ADT (DuPont)



— Estimated Capacity
*Year to Date Average

Moving Washington – Our plan to reduce congestion and improve mobility requires high quality data and analysis



Operating Roadways Efficiently

Moving Washington improves the system's performance through traffic management tools.



Managing Demand

Providing more travel choices and options for people and freight helps improve the efficiency and effectiveness of our transportation system.



Adding Capacity Strategically

Adding new capacity to our currently over-stressed transportation system is a critical component of Moving Washington.

Moving Washington: Managing Demand



Traffic Circulation Committee



The Traffic Circulation Committee is an operations planning team comprised of leaders from JBLM, WSDOT, WSP and other local municipalities. The team meets weekly to identify issues, brainstorm solutions, assign actions and communicate progress.

The goal of the team is to collectively work together to identify solutions to transportation issues in and around the installation by creating a holistic traffic and gate plan with decision points, milestones, resourcing required, risks, etc.

Projected JBLM Growth



- JBLM's growth began in earnest in 2003
- Most expected growth is complete
- Potential additional growth in the future is anticipated to be fewer than 2,200 Soldiers. If assigned to JBLM they would be accompanied by approximately 3,300 family members for a total of 5,500

Traffic Demand Management Partnership

Implemented Improvements:



- **Developed/implemented marketing strategy for Rideshare/Vanpool**
- **Lewis Main**
 - Additional personnel assigned to Gate decreased wait time by 5+ minutes
 - DuPont Gate-WSDOT synchronized lights for outbound traffic & added signage for free right inbound
 - Opened Mounts Rd gate to allow access
 - Over a 1K vehicle decrease to I-5 and DuPont Gate
- **Lewis North**
 - Opened 32nd Street Gate for ingress during AM decreased wait times by 10+ minutes
 - Added Traffic Control Personnel at intersection for outbound-decreased wait times

Moving Washington: Operate Efficiently



What's been done on I-5 corridor since August 2010:

Center Drive improvements – modified existing lanes for improved egress

- Timed signals at 2 interchanges (Berkeley and DuPont Steilacoom) to improve traffic flow
- Improved intersection at NB DuPont; added signing to improve right-turn flow
- Increased Incident Response capability in corridor

- Coordinated with WSP to reduce weight station impacts to the freeway
- Opened gate at Mounts Road improving interchange operations

Add'l improvements in coming 6 months:

- Intelligent Transportation Systems (ITS) – adding cameras and communications (expand I-5 system south) for incident management and travel information
- Ramp meters are designed for Marvin, Nisqually and Mounts Rd. ramps - construction starts March '11
- New signal on SR 507 at E. Gate to improve safety

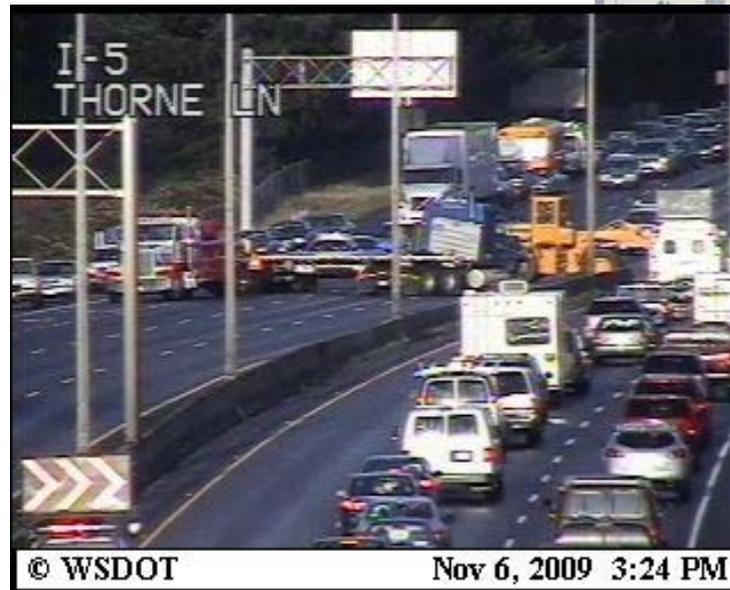
Moving Washington: Operate Efficiently (continued)



Longer Term:

WSDOT Intelligent Transportation System (ITS) Plan

- Cameras and data stations
 - Blind from Nisqually to Berkeley
- Ramp meters
 - Center Dr. to Bridgeport Way



Moving Washington: Add Capacity Strategically



Next Steps:

- Continue working with Congressional Delegation and State Legislature to seek funding opportunities
- Center Drive interchange improvements
- Corridor Interchange Justification Report and Environmental Process
 - Confirms the solutions
 - Establishes cost estimates
 - Completes environmental process
 - Positions us for design and construction funding opportunities
 - \$6 million



Partnership To Relieve Congestion

- **Coalition**
 - WSDOT, FHWA, the cities of the corridor, Pierce and Thurston counties and JBLM
- **Partnership Funding to Date**
 - Studies
 - SR 507 East Gate signal
 - I-5 Center Drive I/C modifications
 - Grant applications
- **Traffic Circulation Committee**
 - Solution development and implementation



Coordinated outreach and communications

- Strategy development
- Coordinated messaging
- Joint press releases