

2021 Washington State Truck Parking Workshop

Overview and potential solutions for consideration

Workshop dates: June 2 – June 23, 2021

Hosted by



With facilitation, hosting, and technical support from



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Part 1 - Workshop overview, background, and session summaries

Introduction to the truck parking shortage

Truck freight and drivers are essential to Washington. Every day, tens of thousands of truckers deliver essential goods such as food, medical supplies, machinery, gasoline, and nearly every other item needed to keep daily life and the state's economy moving. As the economy and population grow, so does the demand for trucks and truck parking. Every trucker needs a place to park for state and federally required safety rest periods, to store their truck, and to stage for loading. In Washington and many states across the country. Demand for parking often far exceeds the supply of safe places to park. This shortage can stifle economic growth, cause conflicts with neighbors, increase pollution, and increase the risk of death and serious injury on the roadways. According to a 2016 WSDOT survey, the majority of truckers in Washington regularly drive fatigued because they cannot find a safe place to park. Over 60% of truckers reported they spend an hour or more per day looking for parking. Everyone in Washington

benefits from the work that truckers do and it is the collective responsibility of the public and private sector to find solutions to ensure they have safe and dignified working conditions.

Workshop overview

In June of 2021 WSDOT and FHWA hosted a series of virtual workshop sessions on the statewide truck parking shortage.

Attendees included a range of public and private stakeholders from across the state and region. The interactive sessions included presentations from WSDOT and FHWA on truck parking issues and potential solutions, as well as speaker panels. Colorado and Florida DOT staff shared lessons learned from their respective truck parking programs. The workshop concluded with focus group sessions to discuss the feasibility and effectiveness of potential truck parking solutions.

Workshop goals:

- Identify primary truck parking challenges specific to Washington
- Identify effective public and private sector practices for managing truck parking challenges
- Assess feasibility and effectiveness of truck parking response strategies
- Build a collective set of potential truck parking strategies and funding options for Washington
- Identify data and tools needed to inform and assess feasibility and performance of truck parking strategies

The objective of this report is to outline potential solutions or actions that the state and its partners could take to address truck parking. The actions listed here are not intended to be the final word on what the state should do. Rather they show a range of options for potential steps in the right direction. It should be noted that additional analysis, outreach, and legislative direction may be needed before taking these actions. This workshop was intended to support, but not supersede, any other state or local truck parking efforts, studies, and action plans.

Workshop background

In early 2020, Washington State Patrol (WSP) hosted a series of stakeholder meetings to discuss truck parking challenges and solutions. During one of these meetings, Federal Highway Administration (FHWA) offered to host a truck parking workshop in Washington. Initial planning meetings for the workshop started in the spring of 2020 but were placed on hiatus due to the pandemic. WSDOT restarted planning efforts in the spring of 2021 with a diverse group of public and private sector stakeholders

Meetings were held virtually to comply with the Governor's health order. Due to FHWA technology limitations, there was a strict limit to the number of people who could be invited.

Groups invited:

- Metropolitan planning organizations (MPOs) and regional planning organizations (RTPOs)
- Cities
- Counties
- Ports
- Railroads
- Truck drivers

- Joint Transportation Committee (JTC) staff
- Private truck parking providers
- Tribes
- Washington State Patrol
- Select WSDOT staff
- FHWA
- Federal Motor Carrier Administration
- Washington State Department of Commerce
- Environmental justice, and community groups
- FMSIB
- University transportation centers
- Departments of transportation in neighboring states
- Other

Workshop session summaries¹

The workshop was divided into four, two-and-a-half-hour sessions. The first three sessions focused on sharing information and highlighting potential solutions and best practices. The first session was an overview and introduction. Sessions two and three focused on potential solutions and best practices for the four categories of truck parking solutions: *Capacity, Programmatic, Technology, and Cross-cutting* (categories are defined and discussed later in this report). At session four, attendees broke out into small groups to discuss the potential solutions reviewed at prior sessions.

Session 1 – Truck Parking Overview and Insights – June 2, 2021

Session one provided attendees with an overview of the truck parking issue and what is being done about it at a state and national level. A panel of truck drivers and trucking association leaders shared first-hand experience and perspectives.

Meeting recording Session 1: <https://connectdot.connectsolutions.com/p9zqad65ibmr/>

Session 2 – Capacity and Programmatic Solutions – June 9, 2021

Presenters and attendees took a deeper dive into capacity and programmatic needs for truck parking. Scott Luekenga from the Idaho Transportation Department was interviewed about truck parking initiatives in his state and opportunities for addressing cross-border truck parking needs. A panel of local government officials provided perspectives on localized truck parking needs and discussed potential land use solutions.

Meeting recording Session 2: <https://connectdot.connectsolutions.com/pech6jth83qn/>

¹ Note: Attendees and presenters shared a wealth of information during the four sessions that has been summarized in this report. Those seeking more specific information should use the links to recordings from each session. For additional notes and materials, please contact Trevor Daviscourt at davisct@wsdot.wa.gov. More information about truck parking in Washington, including a link to the 2016 State Truck Parking Study, can be found at <https://wsdot.wa.gov/freight/trucking>.

Session 3 – Technology and Cross-cutting Solutions – June 16, 2021

FHWA and WSDOT gave an overview of technological and cross-cutting solutions to truck parking. Attendees participated in interactive presentations from SecureSpace about its innovative model for private truck parking. WSDOT's Traffic Operations office discussed its ongoing truck parking information system (TPMIS) pilot project. Florida DOT shared information about its TPMIS project. Colorado DOT presented about truck parking initiatives in Colorado.

Meeting recording Session 3: <https://connectdot.connectsolutions.com/pbnji7mru15q/>

Session 4 – Discuss Key Actions for Addressing Truck Parking – June 23, 2021

Attendees split into breakout groups to discuss the potential solutions identified during previous sessions. Breakout groups refined these solutions and weighed in on the feasibility of each. These solutions are described in Part 2 below.

Meeting recording Session 4: <https://connectdot.connectsolutions.com/p3f1rhepv1h/>

Part 2 – Truck parking solutions

This section provides a brief overview of the four types of truck parking solutions and includes key solutions discussed at the June 23 workshop. During that session, attendees discussed and rated potential actions/solutions that the state and its partners can take. Valuable input was shared, but few solutions were clearly rated above others. As such, **the solutions listed below are in no particular order and would likely require additional analysis to determine appropriate applications, siting, logistics, and barriers to implementation.**

Categories of truck parking needs and solutions

Capacity Examples: enhancing capacity at existing facilities, developing new facilities

Programmatic Examples: plans and studies, safety program initiatives, land use and zoning, economic development policies, parking policies, design standards

Technology Examples: truck parking information and management systems (TPMIS), parking reservation systems, variable message signs, smartphone applications

Cross-cutting Examples: coordinating with partners, funding and financing, outreach and education

Capacity solutions

Compared to other states, Washington ranks low in truck parking availability, especially for private truck parking capacity. Truck parking capacity is generally most constrained where demand is highest (urban areas, mountain passes, border crossings, and near ports and industrial areas). The biggest hurdles for expanding capacity are high real estate costs and community opposition.

Expanding capacity at state safety rest areas can be difficult due to resource limitations, design requirements, lack of data, and a lack of a shovel-ready project list. Most of Washington's safety rest areas are decades old, and budgets are strained just to keep up with maintenance and cleaning needs. Adding capacity is difficult, truck circulation needs to be considered, and often

there are design requirements and limitations that make an easy fix possible. However, there may be opportunities to add capacity at some safety rest areas.

WSP continues to advocate for truck parking solutions and has recently begun to allow trucks to park at weigh stations when they are not being used for enforcement activities on an ad hoc or per case basis. WSP has identified truck parking as a need when evaluating improvements and expansion to its facilities.

Private truck parking providers continue to open new facilities in Washington. However, commercial land is at a premium across the state, and truck parking providers compete with more profitable industries. New business models aim to overcome this problem. During session 3, attendees heard from SecurSpace, a company that works with commercial landowners to rent out unused space for truck parking.

WSDOT has explored the idea of offering temporary leases to truck parking providers on unused project land. Government agencies own surplus and empty land across the state that may be suitable for lease or sale to private truck parking providers. Surplus land sales must go through a competitive process and truck parking cannot be prioritized under current policy.

Key capacity solutions discussed at the workshop

- Conduct an in-depth study and analysis of unmet parking needs in the state and identify key areas with capacity shortages. Develop and prioritize a list of projects for future funding.
- Assess possible low-cost solutions for expanding rest area capacity.
- Develop a prioritized list of truck parking capacity projects for future funding.
- Identify right-of-way issues when evaluating capacity projects.
- Evaluate opportunities to reduce competition between trucks and RVs for parking at safety rest areas. Determine if RVs can be directed to a designated portion of the car parking area (e.g., re-striping the final few spaces into a parallel parking spot for RVs or updating signage to redirect RVs under a certain length to park in the car area).
- Allow parking on public land currently used for undesignated truck parking.
- Encourage private businesses to develop truck parking in key areas.
- Review design specifications (e.g., pavement strength and circulation) for conventional parking lots. If so, evaluate opportunities to permit off-peak parking for trucks in conventional lots and park-and-ride facilities.
- Investigate capacity access at unique facilities (near Interstates or major state routes) and partner with different stakeholders to foster this (examples: use of sports stadium, music venue, fairground, or boat launch parking lots when they are not in use).
- Investigate whether chain-up areas along I-90 could be used for truck parking when not in use.

- Determine future needs and opportunities for electric truck charging facilities in the state. Look for opportunities to increase parking availability when building out charging infrastructure.
- Develop an inventory of unused state property suitable for lease or sale to private truck parking providers.
- When adding or expanding capacity, include amenities to meet drivers' basic needs (e.g., lighting, restrooms, safety considerations). Other considerations include circulation, right-of-way acquisition costs, and ongoing maintenance costs.

Programmatic solutions

These types of solutions involve the integration of truck parking needs and solutions in planning and project development processes and products such as:

- Policies and standards
- Plans and studies
- Safety programs
- Land use and zoning

Programmatic solutions are generally less expensive and quicker to implement than capacity solutions. However, programmatic changes can be complex and controversial at times. Communities may be opposed to truck parking and statutes may restrict certain land use reforms. To date, many existing zoning/building codes, municipal parking standards, transportation plans, and impact analyses have generally not fully accommodated truck parking considerations. When this happens, truck parking problems can be exacerbated, and trucks often end up parking in unsafe or inappropriate areas. For example, if one city bans truck parking, trucks may concentrate in a neighboring city. If new developments go in without truck staging or package delivery areas, trucks may stage on neighborhood streets.

Potential programmatic solutions could include amending land use and building codes to include truck parking minimums, working with local jurisdictions to develop truck parking management strategies, recognizing truck parking as an impact in transportation impact analyses, and considering truck parking needs in transportation plans. MPOs and RTPOs could address truck parking in their long-range plans. When considering programmatic solutions, it is important to work with a broad array of stakeholders and tailor solutions to fit community priorities while serving their freight needs.

Key programmatic solutions discussed at the workshop

Safety

- Document and define truck parking safety issues within Washington.
- Include/develop safety metrics related to truck parking.
- Review programmatic approaches on undesignated parking. Work with drivers, enforcement, shippers, and receivers on this challenge.
- Identify if there are specific security concerns for drivers in Washington.

Planning, Land Use, Project Development

- Incorporate truck parking into zoning codes and growth management policies. Develop minimum standards for truck and delivery vehicle staging for new developments.
- Employ context-sensitive design and planning methods to match truck parking solutions to local needs. Develop new truck parking projects as close to truck trip attractors and generators as possible.
- Amend RCWs to require counties and RTPOs to include truck parking planning in their comprehensive and long-range plans.
- Develop a Washington state “library of truck parking practices” to help agencies address all levels of truck parking needs, including short/long haul drivers and rural/urban areas. Include promising solutions for local jurisdictions to consider.
- Ensure private sector and community truck parking needs are reflected in an array of plans (economic development, land use, comp plans, etc.).
- Elevate consideration of truck parking needs and facilities in local and regional comp plans.

Policy or regulatory changes

- Review zoning and land use considerations that may affect truck parking solutions and partner with key local agencies and stakeholders.
- Define/document where there are zoning and design restrictions that would preclude truck parking development.
- Consider new policies to allow or improve truck parking at government-owned facilities
- Assess targeted exceptions to land use provisions where suitable urban sites could be purchased by the state or a private company and used for truck parking.
- Investigate whether state policies could be amended to encourage new truck parking developments.
- Include truck parking in transportation impact analyses. Require developers to mitigate for additional truck parking demand generated by a new project.

Technology solutions

Truck parking technologies help truck drivers plan ahead and locate safe parking areas. Technology does not add capacity, so it should be considered as part of a range of solutions.

Many state DOTs have operational or planned Truck Parking Information and Management Systems (TPMIS). TPMIS systems detect and share information about truck parking occupancy and share this information with truck drivers via variable message boards, 511, websites, smartphone apps, and hands-free using a truck's in-cab system. Many private truck stops use similar systems. TPMIS systems can also record data for future study.

WSDOT has partnered with the University of Washington to develop and test a pilot TPMIS system. This system incorporates a machine learning algorithm that can help predict the likelihood that parking will be available hours before a truck driver plans to arrive.

Many private truck stops use TPMIS systems to allow truckers to pay for reserved parking. Generally, a portion of spaces will be available to reserve for \$10-30 per night. Though many truck drivers feel this is unaffordable, reservations are becoming more common, and some state DOTs are evaluating the concept. The added value and peace of mind can be worth the cost to some.

Key technology solutions discussed at the workshop

- Develop truck parking reservation systems at state-owned facilities.
- Allocate funding to collect and analyze truck parking data to identify truck parking hotspots and develop projects and policies to address them.
- Develop a statewide Truck Parking Information and Management System (TPMIS) to share live information about truck parking availability at state-owned facilities.
- Continue to expand and study WSDOT-UW's TPMIS pilot project.
- Collaborate with neighboring states to fund and construct a seamless TPMIS system across major multi-state corridors.
- Assess benefits and costs of proposed technology solutions vs. capacity solutions.
- Support cross-functionality with data from private truck parking areas.
- Allocate funding to develop projects and policies to address hotspots.

Cross-cutting solutions

Truck parking is a complex problem touching multiple jurisdictions, public, private, and community stakeholders. Cross-cutting solutions help tie these groups together. Examples can include:

- Proactive partnering across key agencies and stakeholders.
- Effective internal coordination.
- Access to and understanding of different funding programs and financing options.
- Outreach to diverse stakeholders (this workshop is a cross-cutting solution).
- Educational campaigns.

Key cross-cutting solutions discussed at the workshop

Education and outreach

- Educate the public about truck parking. Emphasize the role trucking plays in the economy.
- Develop a truck parking strategy handbook to share with local agencies.

- Work with the private sector to educate drivers and carriers on truck parking issues.
- Create a comprehensive outreach and awareness strategy for WSDOT's TPIMS pilot program if it is scaled up.
- Host events designed to increase the public's understanding of trucking.
- Educate motor carrier companies and drivers on parking safety and regulations. Work with truck driving schools and the Department of Licensing to incorporate truck parking into new-driver training.

Partner and stakeholder coordination

- Coordinate with all affected stakeholder groups including environmental justice and community groups, local governments, public port districts, truck drivers, shippers, carriers, law enforcement, legislators, RTPOs, and others.
- Provide technical and financial resources to local governments to implement truck parking solutions.
- Coordinate with state and local police departments to support driver safety needs at unsecured locations.
- Direct agencies to make certain surplus properties available for truck parking.

Funding and financing

- Review options for diverse funding/financing options (federal, state, local, etc.) for truck parking in Washington.
- Advocate for specific legislative direction to fund truck parking projects and initiatives.
- Work with the private sector and safety departments to assess incentives/financial strategies to develop more private spaces.
- Identify cross-over funding opportunities (e.g., air quality projects, environmental justice efforts).
- Develop and prioritize a list of truck parking projects to prepare for future funding opportunities (e.g., fund data collection, coordination, preliminary design).