

# WSDOT Ferries Division

## Reservation System Pre-Design

### Status Report

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# Background & Legislative Direction

## **2009 Final Long Range Plan included recommendation for use of reservations**

- Proposed a vehicle reservation system as the primary strategy for spreading peak period demand and offering high quality services with the smallest practical terminal holding areas.

## **2009-11 Budget contained proviso language related to potential implementation of a reservation system**

- Funding provided for Ferries to begin process of developing a reservation system.
- Initial effort is focused on completing a pre-design study prior to the 2010 Legislative session.
- Compatibility of the WSF Electronic Fare System (EFS), proposed reservation system, and implementation of smart card must be evaluated as part of the pre-design study.

# The Pre-Design Report

## Purpose of the Pre-design Study

- Gain a clear understanding of facility constraints and options for addressing growing vehicle demand during peak times.
- Analysis of options and costs.
- Describe the project including programmatic, qualitative, financial, and schedule requirements.
- Identifies project limitations and risks.
- Decision-making tool for the Legislature.

**The Final Draft Pre-design Study will be completed by December 15, 2009.**

# Guiding Principles for Pre-Design Effort

## **System needs to work for customers and ferry communities**

- Easy to use (at the point of booking and upon arrival at terminals).
- Meets the needs of different customer types (commuters, frequent riders, freight, recreational users).
- Provides customers certainty with respect to which sailing they can board.
- Provides flexibility to change and cancel reservations.
- Provides options to customers by giving them real time information about their preferred sailing.
- Reduces queuing outside terminals; improve traffic flow around terminals.

## **System needs to work for Ferries and improve efficiencies**

- Enables Ferries to spread demand for peak sailings to times when there is available capacity.
- Maximizes use of existing assets.
- Serves more customers over time while minimizing capital costs without significantly increasing operating costs.
- Integrates with fare collection and WSDOT technologies.
- Potential to increase ridership by providing customer certainty.

# General Approach to Pre-Design Effort

## **Learn from our own experience and from the experiences of other systems**

- Reviewed recent experience at Port Townsend-Keystone and Anacortes-Sidney B.C. to see what is working and what is not.
- Extensive outreach to other systems to understand how reservations work, where they are successful, and potential pitfalls.

## **Develop conceptual design based on how customers really use the system and make travel decisions**

- Engage with a representative group of customers and community interests (Edmonds-Kingston Partnership Group).
- Make use of WSTC survey data from 2008 and augment as needed.

## **Focus on options and evaluate relative costs and benefits**

- Clearly lay out where choices exist and what the key tradeoffs are between options.

## **Identify technology options that already exist**

- Issued a Request for Information from system developers and vendors.

# Ferries Division Experience with Reservations

## Anacortes-Sidney

- Successfully operating a reservation system on a small route for many years.

## San Juan Islands Commercial Vehicle Reservations

- Successfully operating a reservation with limited participation in the San Juan Islands.

## Port Townsend - Keystone

- Recent experience with reservations has resulted in several lessons learned:
  - Without a deposit for a reservation, no show rates are high.
  - Reserving a limited portion of the deck can be confusing to customers when the website shows that reservations are full.
  - Terminal staff and customers need better, more frequent information about manifests and capacity.
  - Combining the reservation confirmation and ticket would improve vehicle processing.
  - Customers need more information about how the system works.
  - Terminal configuration is an important element in a vehicle reservation system.

# Ferries Has Reached Out To Operators Worldwide

## Experience Elsewhere

- Most large vehicle ferry systems in the world have a reservation system.
- For “recreational routes”, there are many comparable systems to learn from.
- While there are no direct comparables for “commuter routes”, many systems have experience with frequent users.

## Key Findings

- Other systems aggressively pursue freight customers and have implemented a number of freight incentives.
- Other high volume systems have more terminal capacity than Ferries’ facilities – this poses unique operating challenges.
- Terminal managers have a great deal of authority and flexibility to manage the dock and respond in real time to changes in traffic flow.

## Learning from Other Systems

- We will continue to seek input from individuals and organizations that have first-hand experience implementing reservation systems for ferry service.
- Investigating the practicality of incorporating an expert review panel into pre-design effort.

# Request for Information

- To better understand the technology options available, a Request for Information (RFI) was issued in May 2009.
- In late July, Ferries received six responses, five of which addressed the issues in the RFI and four of which have software currently in use by a ferry system somewhere in the world.
- Responses varied in their detail, however they all provided useful information for the evaluation of options, such as:
  - System features and capabilities.
  - Ability to integrate with existing Ferries technology, such as the fare collection system.
  - Customer service issues and options.
  - Some cost information, though not very detailed.
  - References for current customers.
- All of the current systems were described as being very flexible and can be customized to meet customer requirements.



# WSF Technical Work Teams

- **Reservations will change how Ferries operates across many departments.**
- **Senior staff from all major departments are engaged in the pre-design effort to ensure good coordination and thorough review.**
- **Efforts has been organized into three technical teams:**
  - Business Rules Team: working on the basic elements of the system including how much of the boat to reserve, how customers will make reservations, what to do in exception situations.
  - Vehicle Processing/Terminal Team: working on how reservations can be supported through vehicle processing, terminal operations and possible modifications.
  - Information Technology/Back Office Team: working on how to support reservations, implement the critical customer interface elements (i.e. online, phone, kiosk, etc ...) and assess the development costs and potential staffing requirements.

# Key Factors for Success

## Communication and Education

- Prior to any implementation, communicate with and educate customer base on how to use the system.
- While the customer is booking a reservation or making an inquiry, provide real time information about available capacity.
- At and leading to terminals, provide status updates and information.
- If service is disrupted, communicate with customers about options.

## Performance Metrics and System Adaptability

- Identify key performance metrics.
- System needs to be flexible and adapt to actual experience.

## Good Strategies for Service Disruptions and Other Exceptions

- Identify contingency plans and operating procedures.

## High Degree of Predictability and Consistency for Customers

- Keep policies simple and consistent across the system where possible.
- Recognize route-level differences where appropriate.

# Public Outreach

## Community Partnership Group Formed

- Representation from the Edmonds-Kingston route, which is comprised on a cross section of vehicle customers, including commuters, regular riders, commercial and recreational interests.
- Seven total meetings between July and December.
- Providing comment and feedback on multiple issues.
- Public welcome to attend meetings and provide comment.

## Partnership Group Objectives

- Learn how our customers make travel decisions.
- Understand how reservation policies affect customers.
- Input on business rule options and potential customer and community impacts.

## Other Public Outreach

- November public meetings.
- Website includes Partnership Group materials and opportunity to comment.
- Integrate recent customer survey efforts.

# Next Steps

- Complete analysis for pre-design study, including cost benefit analysis.
- Additional public input, including November public meetings.
- Develop recommendations for the pre-design.
- Final Draft Pre-design report due to JTC by December 15, 2009.

# Questions?

For more information on the Reservation System Pre-design Study,  
please contact:

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For Partnership Group materials and information:

<http://www.wsdot.wa.gov/ferries/planning/vehiclereservations.htm>

