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## Reservation System

# Peer Analysis - FINAL

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# 1 Introduction

Four Nines Technologies conducted interviews with ferry systems that we determined were peers in some way to the Kitsap Fast Ferry to collect information about their experiences with reservation systems.

In interviewing each peer, we aimed to understand how and why pivotal decisions related to the usage or non-usage of a reservation system for customers were made. With each peer we also explored topics including the relationship between supply and demand for their service, other factors that may affect their need for a reservation system including pricing, frequency, and alternatives to the service, and, as applicable, the functionality of their reservation system.

## 2 Peer Overview

In preparation for our peer analysis, we researched public transit agencies across the country that provide ferry services. We aimed to determine (1) whether they offer a reservation system; (2) whether they provide commuter service as opposed to tourist service; and (3) whether they offer a fast service akin to Kitsap's. We ultimately selected seven peers that we thought would provide us with a range of experience and perspectives on the type of services that require a reservation system and the functionality required in a reservation system. The table below highlights some key characteristics about each of the peers.

Agency	Location	Reservation System	Commuter Service	Fast Service	Some Sailings at Capacity
Golden Gate Bridge, Highway and Transportation District	Bay Area, CA	Yes, special events and bicycles only	Yes	Yes	Yes, some
King County Water Taxi	Seattle, WA	No	Yes	Yes	Yes, some
New Orleans Regional Transit Authority	New Orleans, LA	No	Yes	Yes	Vehicles only
NY Waterway Hudson River Ferries	New York City, NY	No	Yes	Yes	Unknown
San Francisco Bay Ferry (WETA)	Bay Area, CA	Yes, special events only	Yes	Yes	Yes, some
The Steamship Authority	Martha's Vineyard, MA	Yes - tourist focused	No	Yes	Yes, some
Washington State Ferries	Seattle, WA	Yes, vehicles only	Yes	No	Vehicles only

## 3 Analysis

We conducted 30-minute telephone interviews with five of the seven peers: Golden Gate, King County, WETA, Washington State Ferries, and the Steamship Authority. We discussed their service overall, how they manage demand, and their use or non-use of a reservation system. Information for New Orleans and New York are based on email exchanges with staff and information available on their websites.

### 3.1 Golden Gate Bridge, Highway, and Transportation District

#### Service Overview

The Golden Gate Bridge, Highway, and Transportation District, (GGBHTD) manages the Golden Gate Bridge and the highway immediately surrounding it, provides local and commuter bus service, and provides commuter and special event ferry services between several Bay Area communities with ferry terminals in the cities of San Francisco, Larkspur, and Sausalito. The Sausalito service, while used by some commuters, can become dominated by tourists in the summer months and is prone to crowding due to the high volume of passengers who bring bikes on board. The Sausalito service is managed by GGBHTD's contract operator, Blue & Gold and dock space is shared. The Larkspur service serves a more typical commuter population with high-speed ferries capable of carrying up to 448 passengers. GGBHTD offers advance ticket purchases only for its special event service serving Giants baseball games and other special events in San Francisco.

#### Managing Demand

For both commuter and special event services, demand frequently exceeds capacity. Peak commute runs between San Francisco and Larkspur are regularly sold out, leaving behind approximately 40 passengers per run. GGBHTD has tried to provide bus bridges in between runs so passengers do not have to wait for the following ferry, but customers have overwhelmingly opted to wait for the next ferry instead due to concerns about getting stuck in traffic while onboard the bus and potentially arriving behind the second ferry. GGBHTD has also explored adding in additional runs using a slower vessel, but the idea of introducing a slower trip to ease demand has not been popular with its advisory committee. GGBHTD is anticipating demand on this route to increase significantly next year when the SMART commuter train extension is complete, linking the rail system to the Larkspur ferry terminal. GGBHTD is also exploring the ability to increase capacity on its existing vessels up to 500 passengers to solve existing demand problem. An environmental study would need to be completed before GGBHTD could add additional fast ferry runs to the Larkspur route.

Sausalito commuter runs do not experience the same overcrowding as Larkspur runs, except in the height of tourist season due to high demand for bike transport across the Bay; that is, the ferries almost always have sufficient capacity for all interested passengers, but not for all passengers' bikes. Because of this demand, GGBHTD offers a free bike reservation service on this route (discussed in more detail below). Due to space constraints at the Sausalito dock, the prevalence of non-regular riders, and the time required to load and unload bikes, Sausalito has experienced on-time performance issues. A major redesign of the terminal is underway to help resolve this problem, and rather than operating two scheduled runs, GGBHTD has shifted to providing one scheduled run followed by an unscheduled run to clear the docks during the busy summer season. This has

helped to improve on-time performance for commuters who depend on the service and staff informally work to ensure that time-sensitive commuters are able to get on the first vessel.

As discussed in more detail below, GGBHTD's special services for ball games, concerts, and other special events are run on an advanced ticket purchase basis and regularly sell out. Some passengers may try to walk-up to these services without a pre-purchased ticket, but no seats are held for walk-ups so there is no guarantee that any walk-ups will be accommodated.

The Sausalito terminal is only staffed during the busy months of May - September. Queuing in Sausalito can get complicated in the space-constrained terminal, as Blue & Gold must create separate queues for walk-ups, walk-ups with bikes without a reservation, and reservation-holding passengers with bikes. In addition, both GGBHTD and the operator, Blue & Gold, sell tickets for the service: GGBHTD requires tickets to be purchased in advance, but Blue & Gold also sells tickets on board the vessel. This occasionally causes customer confusion or boarding issues due to the two separate systems.

## Reservation System

GGBHTD offers pre-paid tickets for special event service to San Francisco for Giants baseball games, concerts, and similar events. Customers must pre-pay their fare to guarantee their seat on the ferry. No seats are held for walk-ups, though some customers will try to walk-up in the case of no shows or an excess of unclaimed seats for children (children ride free so the ticketing system does not process them; GGBHTD holds a limited number of seats for children traveling with a ticket holder). Fares for this service are higher than regular, commuter fares. Special event tickets are only processed through Tickets.com. Tickets.com provides support for the system, so GGBHTD staff do not have to respond to many questions or issues related to the advance ticket purchasing system. Ticket holders either display their tickets on their mobile phone or print their ticket for scanning to board; staff have a master list of expected ticket holders to cross-check. Most ticket holders do board and use their pre-purchased ticket, though the ticket is also valid on the regular Larkspur ferry the same day, so some no-shows opt to use their ticket on a different vessel to arrive at the ballpark earlier.

Reservations for bikes are also taken for ferry runs based out of Sausalito. There is no cost for making a bicycle reservation. GGBHTD previously used ParkMobile for mobile ticketing and scanning in reservations, but moving forward will be using operator Blue & Gold's preferred system, Gateway. GGBHTD found ParkMobile's offering to be too expensive for the service provided; the new Gateway system is more reasonably priced and GGBHTD will pay Blue & Gold a monthly fee to manage the associated customer service. The reservation system does not provide a way for customers to cancel their reservation and re-release it to other interested parties, but this has not been a problem: in spite of high demand for bicycle spots on board the vessels, not all bike spots are generally reserved in advance of a given run. No show rates for reservation holders are not tracked.

GGBHTD does not offer reservations or advance ticket purchase for a specific sailing for regular commuter service because the agency has a philosophy that dictates making their transit options open to all without preference. They believe that providing reservations on commuter service would not be in keeping with their concept of a public transit agency's duty to fairness, and to their model of first come, first served. Specialty service for ball games, other special events, and the tourist-driven bicycle reservations in Sausalito are not subject to the standard transit model.

## Key Takeaways

- Only offers advance ticket purchase for special event services and reservations for bicycles on tourist-heavy route
- Reservations for regular commuter service seen as contrary to first come, first served public transit model

## 3.2 King County Water Taxi

### Service Overview

The King County Water Taxi (the Water Taxi) is a passenger-only fast ferry service operated by the King County Department of Transportation Marine Division. It operates two routes: between Vashon Island and Seattle and between West Seattle and Seattle and primarily serves commuters. The Water Taxi leases dock space from Washington State Ferries which is shared with Kitsap Transit. The Water Taxi will soon move into its own facility.

### Managing Demand

The Water Taxi completes three morning and three afternoon trips on the Vashon Route with a crossing time of 22 minutes. The West Seattle route completes six morning and six afternoon trips with a crossing time of 10 minutes. The water taxi began to reach capacity on their original, leased 149-passenger vessels and customers began to line up early to ensure a seat on the ferry. To meet the demand, the Water Taxi asked the Coast Guard to adjust the capacity up to 172 passengers, which then began to sell out. The Water Taxi's newest vessels have a capacity of 278 passengers, and some specific sailings are again approaching capacity.

Should additional capacity be required, the Water Taxi may look to add an additional deckhand to meet Coast Guard requirements for increased capacity. A larger vessel or more sailings may also be considered, though both would likely require extra crew. Water Taxi staff also believe the start of Kitsap Transit's Southworth service will free up capacity on King County's Vashon route. In the height of summer, King County will sometimes suggest that commuters arrive earlier due to large, seasonal crowds to help set customer expectations and manage demand.

If a given sailing sells out, customers have the option to wait for the next ferry, catch a bus (West Seattle), or take a Washington State Ferries ferry/bus trip (Vashon).

### Reservation System

The Water Taxi does not offer customers the ability to make a reservation for their trip. Due to the frequency of sailings and the capacity of the vessels, it is not seen as necessary. King County staff occasionally hear from customers a desire for a reservation system from those who have seen the benefits that a reservation system has provided for Kitsap Transit; however other customers have also expressed their appreciation that King County doesn't have a reservation system, having seen some of Kitsap's challenges. King County is also concerned about the costs and staffing needs required by a reservation system.

## Key Takeaways

- No reservation system due to sailing frequency, sufficient vessel capacity, and concerns related to cost and staffing

## 3.3 New Orleans Regional Transit Authority

### Service Overview

The New Orleans Regional Transit Authority (NORTA) operates two ferry routes: the pedestrian-only Canal Street Ferry and the primarily vehicle Lower Algiers/Chalmette ferry. The Canal Street Ferry operates on 15 minute headways with a 7-minute crossing time and the Chalmette Ferry operates on 30 minute headways with an 8-minute crossing time.

### Managing Demand

The pedestrian-only Canal Street Ferry rarely has crowds beyond the vessel's capacity. At larger events such as Carnival and the French Quarter Festival when demand may exceed capacity, shoreside personnel precount full loads for the vessels and control boarding. Alternatively, passengers can take a bus to complete their trip. NORTA operates a bus bridge on occasions when the ferry crossing is out of service.

During rush hour in the morning and afternoon, vehicles at the Lower Algiers/Chalmette ferry crossing may have to wait one to two trips to board. Should customers with vehicles choose not to wait or should the crossing be out of service, drivers can use the Plaquemines Parish Ferry a few miles downriver or take the Crescent City Connection Bridge through downtown New Orleans. While pedestrian traffic at the Lower Algiers/Chalmette crossing is low, those customers would need to use transit buses to complete their trip in the event the crossing is unavailable.

### Reservation System

NORTA does not currently have a reservation system, and has not considered introducing a reservation system. There are no specific policies allowing or forbidding the introduction of a reservation system.

## Key Takeaways

- No reservation system due to sailing frequency, sufficient vessel capacity

## 3.4 NY Waterway Hudson River Ferries

### Service Overview

NY Waterway operates the Hudson River Ferries which serve more than 30,000 passengers daily, in addition to free buses connecting ferry riders to other locations. More than 30 vessels serve over 25 routes. Crossing times and service frequency vary across routes, with more frequent service offered during the morning and afternoon commute hours.

## Managing Demand

Demand for the NY Water Hudson River Ferries is unknown. Depending on the specific route, riders have multiple alternatives for completing their trip including alternative ferry service, bus, and other transit services.

## Reservation System

NY Waterway does not currently have a reservation system and operates on a first-come, first-served basis. Advance ticket purchases are available but are not sailing specific.

## Key Takeaways

- No reservation system

## 3.5 San Francisco Bay Ferry (WETA)

### Service Overview

WETA, the Water Emergency Transportation Authority doing business as San Francisco Bay Ferry, provides commuter and special event services between several Bay Area communities with ferry terminals in the cities of San Francisco, Alameda, Oakland, South San Francisco, and Vallejo. Service is operated by WETA's contract operator, Blue & Gold. At the Ferry Building in San Francisco, WETA shares dock space with the Golden Gate Bridge, Highway, and Transportation District and a private operator. As the owner and manager of the docks, the Port of San Francisco manages the scheduling for shared dock space. Approximately 70% of WETA's riders are commuters and 30% occasional riders, though in the summer the split between commuters and non-commuters is closer to 50/50. WETA offers advanced ticket purchases only for its special event service serving Giants baseball games at AT&T park in San Francisco.

### Managing Demand

For both commuter and special event services, demand frequently exceeds capacity. For evening commute trips from San Francisco to Vallejo, four departures from 4:30 p.m. to 6:00 p.m., Tuesday through Thursday regularly leave behind between 30-50 passengers. The addition of another run behind the busiest ferry has brought headways down to every 30 minutes and has helped diminish the capacity issue. In the past, commuters returning to Vallejo had the option to take a bus through a partnership with SolTrans should their ferry not have sufficient capacity, however that service was discontinued as ferry frequency increased. WETA will occasionally offer charter buses in anticipation of crowds, such as when a Giants baseball day game coincides with regular commute hours.

Excess demand is also common for evening commute trips from San Francisco to the East Bay (Alameda and Oakland). Headways to the East Bay are at 20 minutes, so customers generally wait for the next ferry if their preferred sailing is oversubscribed. East Bay riders also have additional alternative options from San Francisco including AC Transit bus services and BART.

Advanced ticket purchases for ballpark service (discussed in more detail below) opens in March each year for the entire season. Weekend services often sell out, as do some weekday offerings.

Queuing issues in the evenings in San Francisco beginning in 2017 led to the addition of staff from approximately 4:00 p.m. to 7:00 p.m. to help manage lines and keep customers informed. The Vallejo terminal has experienced line cutting and other bad behavior and has required security to help manage crowds. Otherwise, terminals are generally unstaffed.

There has been pressure from Vallejo riders to introduce a reservation system for the commuter service, or to find another solution for prioritizing monthly passholders. Monthly pass holders want priority to board first or make reservations. Only the Vallejo route offers a monthly pass, a holdover from when the City of Vallejo operated the service. WETA is working towards phasing out the monthly pass in Vallejo to pay-as-you-go; while this will not address the capacity issue, it will eliminate the division between monthly passholders and pay-as-you-go customers.

## Reservation System

WETA offers advanced ticket purchase, thereby reserving a seat, for special event service to AT&T Park in San Francisco for Giants baseball games. Payment for fare is taken upfront; that is, customers must pre-pay their fare in order to guarantee their seat on the ferry. Most customers buy their tickets online, though a limited number of riders buy tickets in person at a ticketing office. WETA discourages walk ups for this service and heavily promotes purchasing fares in advance, trying to set the expectation that a reservation is needed for the special event service as very few seats are still available day-of. Approximately 90% of special event riders are pre-paid ticket holders. Fares for this service are higher than commute fares as the service aims to recoup costs through fares. Customers cannot pay for this service using their Clipper card, the Bay Area's electronic fare collection system. WETA's contract operator, Blue & Gold, manages the ticketing system vendor, Galaxy, and handles the administration of the system. WETA's staff do respond to many customer questions and complaints about the ticketing system. Questions about how to use the system and complaints about the cumbersome nature of the system are common, but many riders are one time riders, attending a single game in a given season. Due to interlining of vessels, WETA's staff must define the capacity for each run to ensure that the capacity is accurate, adding to the administrative burden.

While WETA staff and its Board have considered introducing a reservation system for commuter service, ultimately they have determined that a reservation system would be difficult to manage and not compatible with their philosophy of how customers use transit - anybody can walk up, anybody can get a ticket on a first come, first served basis. As one WETA staff member put it, "nobody wants to stand in line, but it's fair."

## Key Takeaways

- Only offers reservations for special event services
- Reservations for regular commuter service seen as contrary to first come, first served public transit model

## 3.6 The Steamship Authority

### Service Overview

The Steamship Authority (the Authority) is the largest ferry service provider to the islands of Martha's Vineyard and Nantucket from Cape Cod. The Authority operates a vehicle ferry between Woods Hole and Martha's

Vineyard, a vehicle ferry between Hyannis and Nantucket, and a high-speed seasonal passenger ferry between Hyannis and Nantucket. The Authority has 10 vessels and serves commuters and tourists alike. All facilities are owned by the Authority; the Authority allows some private operators and barge operators to share dock space.

## Managing Demand

The Authority's fast, passenger-only ferry can accommodate up to 400 people (crew included), but reservations are still recommended during summer weekends. During the height of the season, the fast ferry completes five round trips daily, approximately three hours apart. Excess demand on the high-speed passenger ferry, as well as cancellations due to weather, can be accommodated on the conventional ferry. If the Authority expects a run will be cancelled due to the weather, they will notify reservation holders in advance so they are prepared to take the conventional, slower ferry. The conventional ferries fares are less expensive than the fast ferry fares and fast ferry reservation holders may have their tickets partially or fully refunded or exchanged to address the difference in cost if they are shifted to the conventional ferry.

The Authority's conventional ferries capacity ranges from 39-76 vehicles and 147-1,274 passengers. Vehicle demand can exceed capacity on a given sailing and the Authority strongly recommends vehicle reservations. Due to the variety of potential vehicle sizes, space may be available on sailings for which all reservations are taken, so some standby vehicles may make it on to their preferred sailing.

Peak weekends across the Authority's services do sell out. According to Authority staff, customers tend to switch back and forth between the conventional ferry, the fast ferry, and the Authority's competitors according to their needs.

Management of dockside queues depends on the anticipated number of passengers. If a given date is sold out, the Authority queues reservation holders and non-reservation holders separately. If a very limited number of reservations have been made, the Authority will queue everyone together.

## Reservation System

The Authority offers reservations for vehicles on the Martha's Vineyard and Nantucket routes as well as for passengers on the seasonal passenger-only high-speed Nantucket ferry. Payment for fare is required at the time the reservation is made. The reservation system has been in use for almost 20 years and is a custom product developed for the Authority by a developer obtained through a formal Request for Proposals procurement process. No information about the cost of the system was available. High-speed passenger ferry reservations open in January or February for the season which begins in April. The vehicle reservation interface has the added benefit of a waitlist function - customers can give the reservation system their applicable travel criteria and the system will automatically fill an available spot using that criteria. That customer's newly vacated spot (from their original, less desired sailing) is then given to another customer using the same waitlist method. Customers can remain on a waitlist for a more preferred sailing until 12 p.m. the day before the sailing. Initially the system received some customer complaints mostly related to lack of understanding of how to use and lack of clarity around the waitlist function, but those have since largely been resolved through customer training and additional customer service support. Customers receive an automated reminder of their reservation the day before their travel to remind them of their reservation and provide pertinent information (e.g. parking details).

Passenger reservations can be made up to two hours before a scheduled sailing. Passenger reservations changed or cancelled at least two hours before the sailing time are fully refunded. Unredeemed reservations are not

refunded, but the ticket will remain valid for standby travel for one year from the date the reservation was originally booked. Vehicle reservations must be cancelled with at least 14 days advance notice to receive a refund. Changes are allowed up to one hour prior to sailing. Unused vehicle reservations are valid for standby travel on the same day as the originally scheduled trip.

In addition to the predictability the reservation system provides customers, the reservation system also allows for better planning by the Authority. Onboard staffing numbers can be shifted depending on the number of passengers.

### Key Takeaways

- Uses custom developed system to accommodate high-speed passenger reservations and vehicle reservations, including waitlists

## 3.7 Washington State Ferries

### Service Overview

Washington State Ferries (WSF) is the largest ferry system in the United States, serving eight counties within the state of Washington and the Province of British Columbia. WSF operates 22 vessels across 10 routes and 20 terminals. WSF operates from dedicated docks and carries commuters, tourists, and goods. WSF offers reservations on three routes for vehicles only. The Washington State Transportation Commission is responsible for setting WSF fares in addition to surveying riders, reviewing the long-range capital plan and operating strategy, and adopting system pricing policies.

### Managing Demand

Though WSF rarely lacks capacity to accommodate all foot passengers, (barring major events such as the 2014 Seahawks Superbowl win), vehicle demand frequently exceeds capacity. For instance, weekend demand on the Anacortes/San Juan Islands route led to two to three hour wait times before WSF introduced a reservation system on that route. The reservation system, discussed in more detail below and currently only available on three WSF routes, aimed to reduce congestion and wait times for vehicles. Since the introduction of the system, wait times for vehicles on those routes have nearly been eliminated. Routes without the reservation system still leave behind some vehicles on given runs; wait times on those routes for vehicles can range from one to three hours. The reservation system has helped to level demand across WSF's sailings and provides customers with more predictability in their travels. In the future, WSF would like to provide customers with more information on real-time availability such as how long the wait is and how many vehicle spaces are still available for travel to help manage customer expectations and demand on the most popular sailings. Discussed in more detail below, WSF has identified plans to roll out the reservation system to nearly all its routes in the future.

### Reservation System

WSF offers vehicle reservations on three routes: Townsend/Coupeville, Anacortes/San Juan Islands, and Anacortes/Sidney B.C. Between 80-98% of vehicle space is available for advanced reservations. Reservations for Townsend/Coupeville and Anacortes/Sidney B.C. are released all at once for the season when the season's schedule is released, generally two months before the season begins. Reservations for Anacortes/San Juan

Islands are released in three waves to accommodate a variety of customer needs: one to two months before the season begins for all sailings, two weeks prior to sailing, and two days prior to sailing. Customers can make a reservation online or by phone. Customers must provide a credit card at the time of making the reservation - there is no fee to make a reservation, but WSF reserves the right to charge a fee of 25-100% of the one-way fare to any no-show customers. No show rates are about 10%. Originally WSF would collect the fee upfront, but requested permission from the Washington State Transportation Commission to only charge the fee to no-shows. This has simplified accounting, but has increased WSF's PCI exposure due to holding credit card numbers on file for up to five months. Customers may cancel a reservation without penalty anytime until 5 p.m. the day before the reserved sailing; customers also get one free change to their reservation after 5 p.m. but before the "lockout" period two hours before their sailing. WSF is interested in revising this approach to ticketing and cancellations to charging the full fare upfront and providing a partial refund to those that cancel according to WSF policies. Challenges to this approach include how to link to ORCA and how to apply against multi-ride tickets.

When WSF was looking for a ticketing system with a reservation component, they found few options commercially available in the market and opted to build a reservation system in house. WSF staff estimate that the cost to develop the reservation system was between \$7 and \$8 million. The resulting system has limited integration with the ticketing system, but is generally well received by customers and has provided customers with predictability in their travel. Ongoing administrative costs for the system are also high. Due to the rolling nature of reservation sign-ups, WSF has needed to increase call center staffing to provide customer support. Two full time IT employees are also dedicated to supporting the reservation system and staff are also needed at the terminals to facilitate reservation check-in and queuing.

Though the current reservation system is not robust enough to roll out to all routes without additional improvements, in WSF's long-range plan WSF has proposed rolling out reservations on almost all routes. WSF recognizes that reservations work well for more predictable travel - leisure trips and commuters on their way to work, as opposed to on their way home - and the roll out to other routes would vary by route as to days/times when reservations are available and share of spaces held for walk-ups.

## Key Takeaways

- In-house reservation system was expensive to develop and ongoing administration costs and effort are high
- Vehicle reservation system viewed by WSF as a win all around: it provides customers with predictability and time-savings, encourages additional shopping and dining in town since customers don't have to queue as early, and has environmental benefits due to a significant decrease in time vehicles spend idling in line

## 4 Conclusion

While there are no peers in the United States who offer recurring reservations in a manner similar to Kitsap Transit, there are still several important lessons to take away from our peer interviews:

- Agencies that serve commuters tend to manage supply/demand imbalances by adding supply, either increasing the size of the vessels or the number of sailings or both.

- Agencies with more frequent headways than KT currently offers are comfortable letting excess demand fall to later sailings.
- Agencies with specific reservation needs to manage persistent under-capacity have spent many millions of dollars developing and maintaining custom systems.

## 5 Appendix: Interview Guide



# Reservation System

## Peer Analysis Interview Guide

**Prepared For:** Kitsap Transit

**Prepared By:** Four Nines Technologies

**Date:** September 25, 2018

Four Nines is conducting an evaluation of KT's current fast ferry reservation system to determine where it could be improved to provide a convenient, fast, intuitive customer experience. As part of our evaluation, we will be reaching out to seven peers: Golden Gate Bridge, Highway, and Transportation District; King County Water Taxi; New Orleans Regional Transit Authority; NY Waterway Hudson River Ferries; San Francisco Bay Ferry (WETA); Washington State Ferries; and Woods Hole, Martha's Vineyard and Nantucket Steamship Authority. The interview guide below will be used to help direct the course of each semi-structured interview, ensuring that all desired topics are covered while leaving flexibility to deviate from the guide as needed to explore unanticipated topics with each agency.

Broadly, the questions will address the following topics: a description of the ferry services, the agency's use of or lack of a reservation system, why they do or do not use a reservation system, how a decision was reached on whether or not to use a reservation system including what inputs fed that decision, the functionality of their reservation system, the relationship between supply and demand for the ferry service, other factors that may affect their need for a reservation system including pricing, frequency, and alternatives to the service.

### Questions for All Interviews

1. Do you offer your customers the ability to make a reservation for any part of your ferry service (e.g. all, special-event only, vehicle only)?
2. Do you ferries ever run at capacity?
  - a. If yes, all the time, only at peak time/direction, or only for some other group of trips?
3. Are you sharing dock space or limited to dock times?
  - a. If yes, is this with your own routes or with other operators?
  - b. If yes, how do you work out the scheduling?
4. How do you capture and manage customer queues at the dock?
5. What percentage of your riders are business commuters? Tourists? Other?
6. What advice would you give to our client as they consider a new reservation system?

### Questions for Interviewees without a Reservation System

7. Why don't you use a reservation system?

8. Have you ever considered using a reservation system?

**Questions for Interviewees with a Reservation System**

9. What was the impetus for offering reservations on the ferry?
10. How does your existing reservation process work?
  - a. Could you describe the check-in and verification process?
11. Do you offer reservations on all routes/trips?
  - a. If no, what influences what routes/trips offer reservations?
12. If your demand for the ferry exceeds capacity, how do you allocate reservations?
13. Do you charge for reservations? If so, how is that related to the price/acquisition of a ticket? Are fare payments and reservations integrated?
14. When did you introduce the reservation system?
15. What issues, if any, have you had with your reservations system?
16. How have customers responded to the reservations system? What kind of customer feedback have you received about the reservation system from customers?
17. What would you change/improve about your reservation system if money were no object?
18. How much administrative time does the reservation system take within your organization?
19. How many employees are assigned to the reservation system and what is the percent of their time allocated to it?
20. How do you provide customer support for the reservation system?
21. Who provides your reservation system? Is it a custom or off the shelf system?
22. Can you provide us with any information on the cost of your reservation system?