The sky’s the limit
WSDOT Aviation programs soar in 2012

Making the most of less space
Balancing capital facilities funding, maintenance and preservation needs

Freight rail pulling more than its weight
Palouse River and Coulee City Railroad System boosting economy in eastern Washington
Executive Summary

Highlights in this edition of the *Gray Notebook*

The Washington State Department of Transportation’s quarterly performance report, the *Gray Notebook*, is progressing toward a leaner profile and more readable format while promoting agency-wide accountability and transparency. The *Gray Notebook’s* Third Generation reporting efforts continue the publication’s journey to improve content, design and communication.

This edition includes annual reports on WSDOT’s freight rail, aviation and environmental programs, and introduces new performance measures for Washington State Ferries (WSF). The WSF measures will be tracked annually in the *Gray Notebook* and reported to the Legislature.

The following pages present information on WSDOT’s performance for the quarter ending September 30, 2012. Selected highlights from this edition include:

- In the first three quarters of 2012, there were 227 Occupational Safety and Health Administration recordable incidents reported, showing a marked decrease from 2011 when there were 395 recordable incidents. (p. 2)
- WSDOT spent $27.1 million on building lease payments in the 2009-2011 biennium, and expects to spend $21.2 million in the 2015-2017 biennium. (p. 8)
- During the second round of 2011-2013 Airport Aid grants, WSDOT awarded $998,809 in state funds to 23 airports for 28 different projects. WSDOT was able to use $875,077 in state funds to leverage about $32 million in federal funds, bringing the combined state, local, and federal total to approximately $35.7 million for fiscal 2012. (p. 14)
- WSDOT’s Incident Response program responded to 12,459 incidents in the third quarter of 2012, saving travelers and businesses in Washington about $10.8 million by reducing the time and gas they would have wasted in travel delay due to congestion. (p. 17)
- Washington State Ferries met 15 of 17 legislative performance goals. (p. 22)
- Washington state-supported Amtrak Cascades ticket revenues decreased 2.5 percent in the third quarter 2012, and ridership declined 5.8 percent compared to the same quarter of 2011. (p. 29)
- WSDOT has prepared or approved more than 25 traffic and underwater noise studies, and more than 60 noise variances to allow construction work at night in fiscal 2012. (p. 32)
- Reducing greenhouse gas emissions by operating ferry vessels more efficiently is a priority for WSDOT’s Air Quality program. In fiscal 2012, Washington State Ferries used more than 17.4 million gallons of fuel, a one percent increase from fiscal 2011. (p. 35)
- WSDOT has completed Environmental Species Act reviews and consultations for 277 of 514 projects scheduled for advertisement in the 2011-2013 biennium and 21 of 155 WSDOT projects scheduled for advertisement in the 2013-2015 biennium. (p. 38)
- The Palouse River and Coulee City Rail System generated 10,253 railcar shipments in 2011, a 26 percent increase from 8,119 railcar shipments in 2010. (p. 42)
- WSDOT completed six more Nickel and Transportation Partnership Account projects during the quarter ending September 30, 2012, bringing its total count to 336 out of 421 projects since the 2003 and 2005 gas tax funding packages were approved. (p. 46)
- As of September 30, 2012, WSDOT employed 6,722 permanent full-time employees, 57 fewer than the second quarter ending June 30, 2012. This is 136, or two percent, fewer employees than the 6,858 employed at the end of September 2011. (p. 76)

On this quarter’s cover:
The Port of Skagit completed a two-year project, improving its main runway and bringing it up to Federal Aviation Administration standards. WSDOT’s Airport Aid Grant Program contributed more than $300,000 in state grants, and leveraged more than $14 million in FAA grants for the project. The airport is home to 165 aircraft based at the airport, sees about 61,000 take-offs and landings and transports about 175,000 tons of cargo each year. It produces 514 direct and indirect jobs, more than $23 million in labor income and almost $58 million in indirect, direct and induced benefits.

This page:
By the time the calendar turns to 2013, crews in Japan will have finished building the SR 99 tunnel boring machine. Up next for the massive machine: a journey by ship to Seattle in early 2013, followed by a summer launch from an 80-foot-deep pit to the west of Seattle’s stadiums. The machine will dig for nearly two miles beneath Seattle before emerging from the ground at the north end of downtown in late 2014. The tunnel, which will replace the central waterfront section of the Alaskan Way Viaduct, will open to traffic in late 2015.
WSDOT grants provide crucial support to smaller airports

There are approximately 136 public-use airports across Washington state. WSDOT manages 16 of these airports; the state owns nine, leases three, and operates four under conditional use permits. During the second round of 2011-2013 Airport Aid grants, WSDOT awarded $998,809 in state funds to 23 airports for 28 different projects. WSDOT was able to use $875,077 in state funds to leverage about $32 million in federal funds, bringing the combined state, local, and federal total to approximately $35.7 million for fiscal year (FY) 2012.

WSDOT’s Airport Aid Grant program supports smaller airports that are not eligible for federal funding by targeting about 55 percent of grants toward these smaller airports. WSDOT allocates the remaining 45 percent of state grants to federally-funded airports, maximizing limited state dollars by leveraging millions of Federal Aviation Administration (FAA) dollars.

WSDOT typically awards two rounds of Airport Aid grants per biennium. Any public-use airport can apply for a grant. WSDOT can award single grants of up to $250,000 to individual airports, but requires a minimum local match of five percent. The grant program funds projects that strengthen aviation infrastructure by improving airport pavement, safety, planning, and security.

Pavement projects account for 86 percent of Airport Aid awards

WSDOT’s Airport Aid Grant program focuses on maintaining and improving pavement conditions at Washington state’s 136 public-use airports. During the second round of 2011-2013 biennium grants, WSDOT awarded 86 percent of its grants, totaling $858,130 toward 17 projects that will enhance the aviation system by preserving and extending the life of airport pavements. This surpasses WSDOT’s goal of targeting 65 to 75 percent of airport aid investments to pavement maintenance projects.

Airport pavement preservation is a big concern for Washington aviation

A 2006 airport pavement study estimated a backlog of nearly $163 million in essential pavement maintenance for Washington airports. An updated pavement study will be released in 2013, and WSDOT expects the cost of the backlog to increase. Continual funding to address the backlog for airport pavement maintenance needs to be addressed through sources other than WSDOT Airport Aid grants. WSDOT is evaluating funding mechanisms to address this gap.

Improvement program helps prioritize important airport projects

Now in its second year, the Statewide Capital Improvement Program (SCIP) has transitioned from program development to implementation. To increase awareness of the program, WSDOT has visited 38 of the state’s 136 public-use airports. WSDOT’s goal is to visit at least 90 percent of the airports by the end of 2013. During these visits, WSDOT’s aviation planners provide valuable technical assistance through one-on-one consultations with airport authorities.
WSDOT works to increase public airport participation in planning process

The Statewide Capital Improvement Program is a one-of-a-kind program designed to increase predictability, consistency, and efficiency among airport authorities, the FAA, and WSDOT when prioritizing and distributing grant funds. WSDOT uses SCIP to prioritize a five-year list of projects, which helps the state and FAA better target limited resources and airports to prioritize and complete their most crucial improvement projects. Data submitted by airport authorities will be used to communicate the financial needs of the state aviation system to state legislators and other local decision-makers. This outreach supports future initiatives to increase funding needed to maintain and enhance the system.

WSDOT hosted six regional workshops in October 2012 to provide airport authorities with an in-depth knowledge of SCIP. The workshops addressed specific strategies for enhancing capital improvement plans (CIPs) and provided a demonstration of WSDOT’s new web-based CIP application. The web application went live on WSDOT’s aviation website in November 2012. Airports can use the web application to submit their CIPs when applying for future WSDOT Aviation Airport Aid grants.

Other short-term SCIP goals include:
- Achieving a ten percent annual increase in the number of airports submitting capital improvement plans over the next five years. There were 58 CIPs as of September 2012.
- Having 100 percent of airports achieve a current master plan/airport layout plan (ALP) within three years.
- Providing technical assistance to at least one partner each month. WSDOT Aviation has already assisted on almost 300 technical issues to date in 2012, far exceeding the goal.

Relationships built during airport visits and SCIP workshops are designed to strengthen communication and partnerships between airport and WSDOT planners.

WSDOT aviation emergency response program one of the best in the country

In 2011, WSDOT responded to 174 aviation emergency incidents, 14 percent more than 2010. Two of WSDOT’s divisions coordinate the state’s aviation emergency services program. WSDOT’s Aviation division coordinates and manages all aerial search and rescue within the state, while WSDOT’s Office of Emergency Management in the Maintenance Operations Division administers the program.

In August 2012, the Air Force Rescue Coordination Center reviewed WSDOT’s aviation emergency response program, and praised it as one of the most efficient and effective in the country. During aviation emergencies or disaster response, WSDOT coordinates the use of all non-commercial aviation assets, including government and volunteer aircraft. Aviation emergencies include WSDOT search and rescue responses to emergency locator transmitters, emergency position-indicating radio beacons, and personal locator beacons associated with aeronautical use.

WSDOT recently established performance measures and targets that will be reported in future editions of the Gray Notebook, including:
- Reduce average response time to emergency requests to one hour or less,
- Increase successful outcomes of electronic beacon responses by five percent annually, and
- Ensure no accidents, mishaps, or injuries occur with aircraft or personnel participating in emergency air operations.

Aviation incidents responded to by WSDOT
2010-2011 calendar years; Incidents by type

<table>
<thead>
<tr>
<th>Type of incidents</th>
<th>Number of incidents</th>
</tr>
</thead>
<tbody>
<tr>
<td>Electronic distress beacons</td>
<td>84</td>
</tr>
<tr>
<td>Full-scale search and rescue missions</td>
<td>3</td>
</tr>
<tr>
<td>Overdue aircraft</td>
<td>4</td>
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<tr>
<td>Aircraft incidents/accidents</td>
<td>52</td>
</tr>
<tr>
<td>Fatality incidents</td>
<td>10</td>
</tr>
<tr>
<td><strong>Total incidents responded to by WSDOT</strong></td>
<td><strong>153</strong></td>
</tr>
</tbody>
</table>

Data source: WSDOT Aviation.

Aircraft registration program

Washington state law requires that most airworthy general aviation aircraft be registered with WSDOT. Aircraft registrations fees generate about $400,000 in revenue each year, of which $150,000 is directed to WSDOT’s Aviation division for airport preservation, maintenance and improvement programs ($250,000 goes toward the Washington state General Fund). Registration is due January 1 each year. In 2003, the Legislature authorized changes to state law (RCW 47.68.250) for aircraft registrations to include penalties for late registrations.

WSDOT soars above last year’s aircraft registration goal with highest numbers in six years

In the first six months of 2012, WSDOT registered 6,177 aircraft, an increase of 327 from the total registered in 2011. This surpassed WSDOT’s goal to register at least 90 percent (5,345) of aircraft registered in 2011 by the close of FY2012, and it is higher than the numbers recorded in any of the past six years.
Airport map application will provide technical assistance for land use planning

The increase in registrations is largely attributed to WSDOT’s outreach efforts. The department mails two reminder letters to aircraft owners and attempts to contact individuals via email or telephone, if possible, before issuing penalties. WSDOT also contacts new aircraft owners by using the FAA database to inform them of registration requirements.

In efforts to continuously improve the aircraft registration process and customer service, WSDOT set registration goals for 2013. New goals are to conduct six aircraft registration outreach/awareness events annually, increase aircraft registration compliance rates (before penalties are applied) to 95 percent or better, and ensure that at least 98 percent of penalty letters issued contain accurate registration status information, including if an owner needs to submit an exemption instead of registering their aircraft.

Mapping application guides land use decisions

Once-remote airports are experiencing increasing pressure from population growth and the expansion of metropolitan areas. Incompatible development near and around airports, such as schools, hospitals, large retail centers, high density residential development, or airspace hazards, are major challenges facing aviation land use.

Encroachment of these incompatible land uses is often due to a lack of information and understanding by decision makers. WSDOT provides information to support decision-making related to airports and land use through the Airport Land Use Compatibility Program. This program provides technical assistance to local jurisdictions, preserves transportation infrastructure, promotes quality of life, and plans for future needs. The program builds on an existing WSDOT application and is scheduled to be deployed in January 2013 at a cost of $140,000.

WSDOT’s Airport Mapping Application will facilitate informed land use decisions. The tool provides online access to critical airport information and interactive planning tools for local jurisdictions, decision makers, agencies, and aviation stakeholders. When launched, decision makers will have easy, instant, and free access to imagery, airfield configurations, and airspace information. In addition to an online Geographic Information System (GIS) mapping application, the program includes a Federal Aviation Regulation airspace calculator designed to help prevent potential hazards around airports. The program also provides a sustainable and cost-efficient plan to keep the information updated.

Local jurisdictions and officials can use these information systems to efficiently evaluate potential or existing land use conflicts or airspace hazards. Poor land use choices can result in airports closing or being unable to expand. Informed choices help protect airports and enable growth and expansion to meet airport and community needs.

WSDOT and National Guard form partnership to improve disaster response efforts across state

If a major earthquake or other natural disaster hits Washington state, the 16 WSDOT-managed airports could play a significant role in disaster response. Of the 16 airports, the state owns nine, leases three, and operates four under conditional use permits. These airports are in remote locations throughout the state with six west of the Cascade Mountains and ten to the east. Many of the airports are easily accessible from paved roads and have infrastructure suitable for emergency response and recovery operations.

WSDOT is partnering with the Washington National Guard to make state-managed airports available as potential staging areas for preparedness exercises and for emergency/disaster response. WSDOT is seeking up to $500,000 in federal grant funds over the next five years to improve up to six state-managed airports and meet the National Guard’s standards for emergency staging.

WSDOT-managed airports are strategically located to provide the National Guard with operational and logistical bases for statewide disaster response. The airports are attractive to the National Guard because they offer:

- Helicopter landing capabilities,
- Utilities,
- The potential for infrastructure development,
- Close proximity to water for firefighting operations, and
- Facility maintenance performed by WSDOT.

WSDOT’s goal is to sign a memorandum of understanding with the National Guard by July 2013, to make improvements at the Woodland, Easton, Methow, Lake Wenatchee, Sullivan Lake, and Lower Granite airports. The improvements would further advance WSDOT’s goal to meet performance objectives outlined in the State-Managed Airport Handbook.