WSDOT Airport and Compatible Land Use Program
Airport and Compatible Land Use Program

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Presentation outline:

- Aviation and requirements of Washington state law
- Definitions: Compatible and incompatible land uses
- How to plan for compatibility
- Question-and-answer period
What benefits can aviation bring to Washington communities?
Airports and state law

- Airports are Essential Public Facilities
  \((RCW\ 36.70A.200)\)

- Airports are part of the multi-modal transportation system
  \((RCW\ 36.70A.070)\)

- Towns, cities and counties must discourage incompatible land uses
  \((RCW\ 36.70.547,\ 36.70A.510;\ 35A.63.270;\ 35.60.250)\)

- Towns, cities and counties must consult with aviation interests
  \((RCW\ 36.70.547,\ 36.70A.510;\ 35A.63.270;\ 35.60.250)\)

- WSDOT Aviation must provide technical assistance
  \((RCW\ 36.70.547,\ 36.70A.510;\ 35A.63.270;\ 35.60.250)\)
Encroachment and Anacortes Airport
Anacortes Airport today
Consequences of conflict

- Degraded airport operations
- Impeded airport expansion
- Hampered economic development
- Reduced neighborhood quality of life
What is compatible land use?

Aviation-related

Industrial / commercial

Agriculture
What is incompatible land use?

Wildlife attractants

Height hazards

Residential development
Incompatible land uses

- Daycares
- Places of worship, temples, mosques, etc
- Smoke or steam
- Schools
- Hospitals and adult-care facilities
- Flammable liquids, etc
Safety

Historic accident data

Noise

Noise-sensitive uses

Height hazards

Naturally occurring and manmade objects

Denotes aircraft accidents

Noise Sensitivity
Let’s examine some very general airport environments
<table>
<thead>
<tr>
<th>Typical land-use types</th>
<th>Airport proximity</th>
<th>Near runway ends</th>
<th>Within runway approaches</th>
<th>Beneath traffic patterns</th>
</tr>
</thead>
<tbody>
<tr>
<td>Agricultural</td>
<td>Compatible if not wildlife attractant</td>
<td>Compatible if not bird attractant</td>
<td>Compatible if not wildlife attractant</td>
<td></td>
</tr>
<tr>
<td>Utilities/transportation</td>
<td>Avoid</td>
<td>Compatible</td>
<td>Compatible</td>
<td></td>
</tr>
<tr>
<td>Parks / recreation</td>
<td>Incompatible</td>
<td>Compatible if low intensity</td>
<td>Compatible</td>
<td></td>
</tr>
<tr>
<td>Industrial</td>
<td>Compatible at low density</td>
<td>Compatible if does not produce airspace obstructions or have bulk amounts of hazardous materials</td>
<td>Compatible if does not produce airspace obstructions</td>
<td></td>
</tr>
<tr>
<td>Retail / service uses</td>
<td>Incompatible</td>
<td>Compatible if low intensity</td>
<td>Compatible</td>
<td></td>
</tr>
<tr>
<td>Offices</td>
<td>Incompatible</td>
<td>Compatible if low intensity</td>
<td>Compatible</td>
<td></td>
</tr>
<tr>
<td>Light Industrial</td>
<td>Compatible at low intensity</td>
<td>Compatible if low intensity</td>
<td>Compatible</td>
<td></td>
</tr>
<tr>
<td>Places of worship</td>
<td>Incompatible</td>
<td>Incompatible</td>
<td>Avoid</td>
<td></td>
</tr>
<tr>
<td>Residential</td>
<td>Incompatible</td>
<td>Incompatible</td>
<td>Incompatible</td>
<td></td>
</tr>
<tr>
<td>Children’s schools</td>
<td>Incompatible</td>
<td>Incompatible</td>
<td>Incompatible</td>
<td></td>
</tr>
<tr>
<td>Hospitals / nursing homes</td>
<td>Incompatible</td>
<td>Incompatible</td>
<td>Incompatible</td>
<td></td>
</tr>
</tbody>
</table>
Washington’s Airport Land Use Compatibility Program

1999 guidelines and Web site resources:

- Historic perspective
- Process
- Tools
- Strategies
- Worksheets
- Consultation process
- Flexibility
WSDOT’s land use compatibility process

Step 1: Getting started and gathering data
Historic accident data
FAR Part 77 Airspace Surfaces
Traffic pattern
Airport master plan and airport layout plan
Community comprehensive plan
Existing land uses
Parcel layer
Topography
WSDOT’s land use compatibility process

Step 1: Getting Started and Gathering Data
Step 2: Delineate the Airport Influence Area
Step 3: Identify Compatibility Concerns
Step 4: Adopt and Implement the Policies
Step 5: Identify Tools and Adopt Regulations
Step 1: Getting started and gathering data

Description - Conduct preliminary work needed to initiate the compatibility planning process

• Contact WSDOT Aviation for a preliminary consultation.
• Identify your jurisdiction’s responsibilities.
• Identify stakeholders.
• Prepare public participation plan.
• Gather airport information and community data
  - Airport Master Plan and Layout Plan
  - Airport facilities, services and activities
  - Interviews with airport managers and pilots
• Gather existing land use constraint maps and parcel information.
• Gather comprehensive plans and implementation regulations.
Step 2: Delineate the airport influence area

Description - Define the area you need to consider for land use planning

- Airport influence area
- Aircraft operations and use
- Aircraft traffic pattern
- Overflight impacts
- Airspace impacts
- Safety impacts
- Existing land use impacts on the airport
- Airport’s impacts on surrounding land uses
Definition of airport influence area

- "Airport influence area" means the area adjacent to a public use airport that can affect or be affected by airports and aircraft operations.”

- This sphere of influence is contained within airport traffic patterns, aircraft over flight and safety areas, and airspace surfaces critical for air navigation addressed under chapter 14.12 RCW and Federal Aviation Regulations (FAR) Part 77.

- The airport influence area is used to identify the geographic area that should be considered during the airport land use compatibility planning process.

- "Airport influence area" includes terrestrial land uses and the navigable airspace necessary to address land use compatibility adjacent to airports.
Step 3: Identify compatibility concerns

Description - Examine the level of compatibility in your community.

• Evaluate the land use character of the airport influence area.
 • Evaluate land use compatibility features.
 • What potential compatibility conflicts are on the horizon?
 • Determine compatibility concerns need to be addressed.
Step 4: Develop compatibility policies

**Definition** - *Examine the various policy and regulatory strategies available to pursue airport land use compatibility and amend comprehensive plans*

- Identify compatible land use adjacent to airports.
- What does it mean to discourage incompatible land uses?
- What compatibility policies are already in place?
- Identify airport facilities and support facilities in the comprehensive plan.
- What new comprehensive plan policies are needed?
What should a comprehensive plan include?

Ideally:

• A map identifying the airport influence area
• Narrative report regarding the airport
  ▪ Description of the airport facilities and operations, existing and future
  ▪ Identify the role of airport/s in local and regional economic development
  ▪ Its role in the Washington State System Plan
• Policies:
  ▪ Discourage incompatible development
  ▪ Recognize the airport as an Essential Public Facility
  ▪ Identify and protect Part 77 Imaginary Airspace Surfaces
  ▪ Promote compatible uses: aviation-related, light industrial, commercial or agriculture
  ▪ References in transportation and capital facilities elements
  ▪ Levels of service
Step 5: Implement the strategies

Description - What Implementation measures and strategies are needed?

• Identify and adopt strategies that can be used to respond to compatibility planning challenges.
• Identify zoning measures to implement the comprehensive plan.
• Designate compatible land uses on the zoning map.
• What actions are necessary to ensure continued implementation of the policies?
• Review policies and development regulations on a regular base to monitor progress.
Land use strategies and implementation tools

Direct zoning
Airport overlay ordinance
Direct zoning and airport overlay
Mixed use zoning
Infill development
Transfer of development rights

Airport stormwater design manual
Control airspace obstructions
Limit high-intensity uses
Fly-friendly procedures
Wireless communication ordinance
Wind energy systems ordinance
In review:

- Aviation and requirements of Washington state law
- Definitions: Compatible and incompatible land uses
- Compatibility exercise
- WSDOT’s 5 step process
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