

## **Joint City/Port Natural Resources Proposed Approach PAG Meeting April 20, 2010**

### **I. Introduction**

Natural resources are an important element of the Airport Futures process. Staff and the PAG have discussed various management options at a number of PAG and subcommittee meetings over the past six months. The Port and the City are committed to providing the additional time needed to fully explore this issue. This recommended City/Port Natural Resources Proposed Approach addresses the following initial process commitments, key PAG recommendations, and PAG principles/goals:

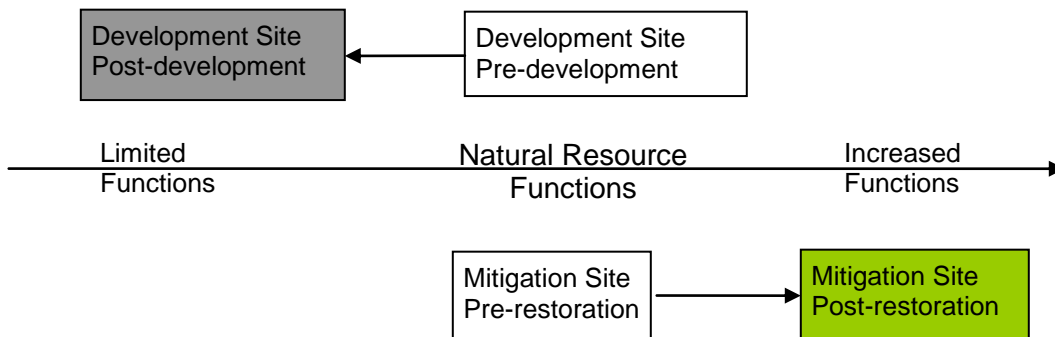
- A) Based upon the PAG Vision and Values, sustainability is an overarching goal of this project. Sustainability means meeting the Region's air transportation needs without compromising the livability and quality of life for future generations. The participants have agreed to transparently explore and make recommendations that fairly, realistically, and optimally balance the economic, environmental, and social needs.
- B) The PAG has recommended that the Port and City "*work towards assuring PDX and the Airport Plan District become the most sustainable in the world.*" The PAG specified what this means in terms of environmental performance by adopting the following guiding principle:
  - Avoid, minimize, mitigate, and restore to ensure we fully mitigate for impacts and contribute to the overall net improvement of wildlife habitat quality, quantity, and connectivity within the Columbia Slough Watershed.
- C) Maintain and enhance PDX as a world-class airport that meets the passenger and cargo transportation needs of the region and supports the role of PDX and the surrounding area in the bi-state regional economy.
- D) The Port should have the flexibility it needs to operate the airport. Management of wildlife hazards at and in proximity to PDX is critical to ensure the safety of the passengers and community. In recognition of these hazards, PDX is not required to go through an "avoid or minimize" analysis of impacts to habitat, but is required to mitigate for impacts. The trade-off for this flexibility is that impacts to natural resources need to be acknowledged and accounted for. They should be addressed through a programmatic, action-oriented, plan – not piecemeal. That plan should consider the individual and cumulative economic, environmental, and social impacts of decisions when taking responsibility for the proportional share of the problems and solutions.
- E) Supplement traditional regulatory approaches by taking voluntary actions with incentive-based and performance-oriented systems that do not default to regulatory minimums.
- F) Examine creative, project management approaches to address potential impacts of operating a commercial airport in an urban environment and emphasize on-going learning and adaptive management. Accelerate, support, and implement innovative programs, projects, and initiatives to maintain and increase our collective leadership in sustainability, including encouraging our partners to use sustainability practices.
- G) Report annually on results, lessons learned, plan adjustments, and future endeavors to stakeholders, including PDX CAC, at least annually.

## II. Overview of Options

As reported to the PAG, the City and Port agree on overlays proposed for Port-owned riparian areas along the Columbia Slough. There are several upland grassland parcels where an alternate approach may be more appropriate. There are two core options for addressing these parcels: 1) Environmental Overlays, and 2) a Natural Resources Agreement. City and Port staff recommend Option Two because it creates a package consistent with the PAG’s Vision and Values/Guiding Principles/Goals, and it will likely be acceptable to the City Council, Port Commission, and regional interests

In order to understand these options better, it is important to develop a common lexicon because this topic can be confused by the different “legal” and “ecological” meanings of the same term. For purposes of this memo only, the following construct applies.

Most natural resources have been impacted by human activities; some impacts have lasted over a long time, such as construction of Columbia River dams. The natural resources that remain are generally degraded, managed to some extent, and are providing some degree of ecologic functions. When a degraded resource is impacted by development, the most common form of mitigation is to identify another degraded resource and restore or improve its ecologic functions. To restore ecologic functions, typically invasive plant species are removed and native plants installed. Depending on the resource, there may be grading to improve hydrology or wildlife access. In all cases, the mitigation site would need to be managed long-term to maintain the restored functions.



There are complex models used in the scientific community to determine the amount of mitigation needed to compensate for development impacts. The calculating the amount includes three general considerations: 1) ecologic functions provided by the development site and mitigation site, pre and post action; 2) size of the development site and mitigation site; and 3) the timing of mitigation compared to when development occurs.

The Portland Watershed Management Plan (City of Portland, 2005) defines *watershed health* as “a healthy urban watershed, which has hydrologic, habitat, and water quality conditions suitable to protect human health, maintain viable ecological functions and processes, and support self-sustaining populations of native fish and wildlife species whose natural ranges include the Portland area.”

When the phrase *no net loss* is used in the context of this agreement, it is related to maintaining the current ecologic functions (e.g., wildlife habitat) being provided by natural resources identified in the city’s inventory.

### III. Option One: Environmental Overlays

Below is a summary of the City's Draft Recommended Environmental Overlay Zones for the resource areas under consideration. If no natural resource agreement is reached, City staff's current intent is to forward this zoning recommendation to City Council for consideration.

#### A) Airfield and Portland International Center (PIC)

- "Allow" development in areas containing upland resources, no overlay.
- "Limit" development in areas containing drainage ways and wetlands: conservation overlay zone (c-zone) – the Port would have to avoid and minimize impacts to natural resources and mitigate for unavoidable impacts (with the exception of wildlife hazard management activities).

#### B) 33<sup>rd</sup> Field, SW Quad, Deicing Field and Fuel Farm Field

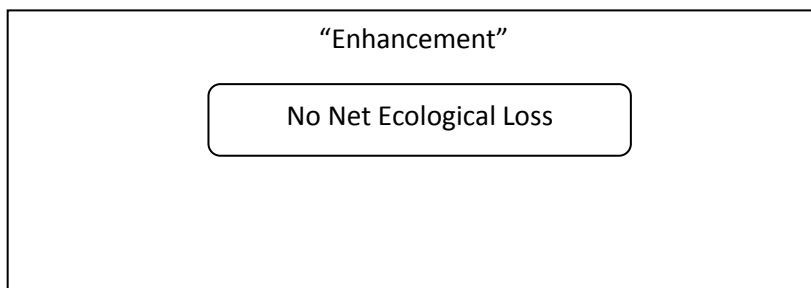
"Limit" development in areas containing upland resources or drainage ways and wetlands; conservation overlay zone (c-zone) – the Port would have to avoid and minimize impacts to natural resources and mitigate for unavoidable impacts (with the exception of wildlife hazard management activities)

### IV. Option Two: Natural Resources Agreement

The City and Port staff believe a Natural Resources Agreement containing the following elements would accomplish the PAG objective of "fully mitigating for impacts and contributing to the overall net improvement of wildlife habitat quality, quantity, and connectivity within the Columbia Slough Watershed."

#### A) Package Overview

- 1) Mitigate for impacts and contribute to the overall net improvement of wildlife habitat quality, quantity, and connectivity within the Columbia Slough Watershed. The key ingredients of a natural resources agreement package should achieve Net Improvement/No Net Loss:
  - a) Mitigation
  - b) Enhancement: Columbia Slough, urban tree canopy, and upland grasslands
  - c) Strategies should focus on on-airport management and off-airport mitigation or enhancement
- 2) Mitigation for development on sites where City staff proposes to "limit" development.
- 3) Overall net improvement to local ecological watershed health.
- 4) Here is a graphic depicting the issues surrounding "overall net improvement" from a watershed health perspective: (Not to Scale)



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	Airfield
	PIC
----- City Staff ESEE Recommended Mitigation -----	
	SW Quad
	33rd
	De-Ice
	Fuel

“Mitigation”

**B) Package Elements**

*The following elements make up the City-Port recommended package (dollar and acreage figures are non-binding estimates):*

**1) Airfield**

- a) “Allow” recommendation for the Airfield.

Note: The PDX Master Plan does not identify airfield (runway/cross-over taxiway) capacity enhancements for the planning period. Minor improvements related to safety or operational efficiency may take place (i.e., high-speed taxiway exits). Remain Overnight Parking, required to improve terminal utilization, will be constructed as needed. Requirements projected through 2027 (24 Million Annual Passengers) can be met by improving existing developed areas. The Port will continue its policy of converting existing impervious surfaces on airport property (on and off the airfield) to pervious as opportunities and FAA standards allow (e.g., reduce size for blast pad for runway 28L as part of that runway’s rehabilitation scheduled for 2011).

- b) The City, Port, and Oregon National Guard agree that the Keyhole conveyance on the airfield should be managed as a wildlife hazard by armoring or piping the drainage way. The City assumes the alteration will eliminate all natural resource functions of the drainage way. The Port will restore the IKEA wetland into a scrub shrub wetland. The estimated value of restoring the IKEA wetland is \$150,000. This is a preliminary estimate and will need to be refined based upon long term maintenance and a better definition of a “design” of the restoration. The site will be maintained in perpetuity consistent with other Port mitigation sites.

**2) 33<sup>rd</sup> Field, SW Quad, Deicing Field, and Fuel Farm Field**

- a) The Port will build mitigation on Government in lieu of environmental overlays on 268 acres of PDX Upland Grassland on PDX. (e.g., SW Quad = 150 acres, Fuel Farm West = 35 acres, Deicing = 30 acres, and 33<sup>rd</sup> = 53 acres). Should other mitigation sites become available within the watershed, the Port, in consultation with the City, may consider mitigation on those sites as well.
- b) Mitigation is defined as restoration of existing degraded grasslands. The goal is to provide an equivalent of a 1:1 ratio for restoration to resources impacted by development. The Port will

build, over time, a minimum of 300 acres of mitigation on Government Island as development occurs on the above properties.

- c) Upon approval of Airport Futures, the Port will begin planning and restoring Government Island in advance of development. Restoration will happen at a minimum of 50 acres at a time. The cost of 50 acres of mitigation = \$600,000 over 25 years. The initial 50 acres should be complete within 7 years. At the end of 7 years, it goes into maintenance status versus initial development.
- d) New development of 25 acres or more will trigger an additional 50 acres of mitigation.
- e) The intent is to use the Habitat Evaluation Procedure (HEP) or some other agreed upon scientific model to quantify the existing habitat values versus amount of habitat restoration that can be accomplished on Government Island.
- f) Of the initial 50 acres, 25 acres will be used to offset development, and 25 acres will be set aside as enhancement and not used to offset any development. (With completion of 300 acres of mitigation, 32 acres will be set aside as enhancement and not used to offset any development.)
- g) At current prices, a 300-acre project would cost \$3,100,000 over 25 years. This number includes the cost of development and maintenance for 25 years on existing Port-owned property on Government Island. The site will be maintained in perpetuity consistent with other Port mitigation sites.
- h) The Port may opt to implement the above mitigation projects at a faster rate to maximize the efficiency and effectiveness of the mitigation.

### 3) Portland International Center (PIC)

- a) "Allow" recommendation for the PIC except for riparian areas, which would have a limit (c-zone) recommendation. PIC will likely be fully built out at some point with a loss of 151 acres upland grassland. In order to achieve no net loss of PIC habitat from an ecological perspective, approximately \$1.6 million (the equivalent cost of restoration for 151 acres of upland grassland), would be paid.
- b) Port will commit to fund enhancements to the Columbia Slough watershed for 25 years starting at \$30,000 per year and escalating at 3% per year. **Total Value: \$1,094,000.**
- c) Columbia Slough watershed enhancement projects will be funded through Multnomah county Drainage District, City Bureau of Environmental Services, or other agencies and support implementation of the Columbia Slough Watershed Council's Action Plan.
- d) Port will commit to fund enhancements to the urban tree canopy for 25 years starting at \$20,000 per year and escalating at 3% per year. **Total Value: \$729,000.** This funding is intended to demonstrate progress toward the PAG goal of achieving 15% tree canopy and in acknowledgment that the City is granting the Port the right to manage the existing stock of 5,000 trees in accordance with the Wildlife Hazard management Plan, FAR Part 77, and other maintenance needs.

**e) Total value of those two watershed improvement commitments = \$1,823,000**

- i) \$223,000 more than the \$1.6 million of equivalent restoration costs.
- ii) The Port may opt to bundle payments for the above enhancements in order to fund a larger project.

**4) Additional Elements**

- a) The Port would like the ability to set up a mitigation bank and sell mitigation “credits” to developers who may need upland grassland mitigation. HEP/HEA or some other scientific tool must be in place to formalize this mitigation bank.
- b) The Port would like the ability to accelerate advance mitigation and enhancements.
- c) There is continued agreement by the City that zoning and land use jurisdiction are limited to landside areas and activities consistent with the current Conditional Use Permit and prior letter from the Director of the Office of Planning and Development Review.
- d) The City will recognize past and future voluntary projects and programs undertaken by the Port. Examples include prior slough enhancement projects, support for the tree canopy, invasive species management, the wildlife hazard management program, and green features of the new Headquarters Office Building and parking structure.
- e) This framework will be codified in a City-Port Intergovernmental Agreement on Natural Resources.
- f) The Port will report out annually on the status of both regulatory and non-regulatory elements of the plan to the PDX Community Advisory committee, to be created following Airport Futures.

**V. Next Steps**

- A) The Port continues to review FAA revenue diversion and grant assurance issues associated with a “voluntary” enhancement program and mitigation on Government Island. If the Port is unsuccessful in getting FAA approval for voluntary measures, the Port and the City will renegotiate a replacement plan or potentially revert to a “limit” or “c” zone designation.
- B) The City and Port are exploring ways to provide some degree of regulatory certainty and the possible listing of threatened/ endangered species with a Candidate Conservation Agreement or other similar agreement. Staff will report to the subcommittee and the PAG before any final agreements are reached on this currently, non-binding, non-precedent setting, and draft construct.
- C) The City and the Port will work to develop a science-based, adaptive management approach to mitigation. As part of that approach, the Port will follow closely the City’s scientific peer review of the HEP/HEA tool in the River Plan process.
- D) Site visits are planned for Government Island and 268 acres on airport for early growing season (late May/June) to collect data on plant species to use in future HEP/HEA process.