Regulatory Context
Natural Environment Chapter
Tukwila Comprehensive Plan

State and Federal Regulations/Policies

- Federal Clean Water Act
  - Protection of waters of the US – wetlands, watercourses
  - Water quality (discharge standards, permits, stormwater management)
- State Growth Management Act (Comprehensive Plan; protection of critical areas – wetlands, watercourses, steep slopes, coal mine areas)
- County-wide planning policies
- Department of Ecology and Corps of Engineers wetland delineation, mitigation guidance and various rules

Tukwila Implementation of State and Federal Environmental Requirements

- Comprehensive Plan – Natural Environment Chapter
- Sensitive (Critical) Areas Regulations
- Tree Regulations (sensitive areas)
- Surface Water Regulations (stormwater)
- Land Clearing Regulations (erosion control, slope protection)

Comprehensive Plan

Current goals, policies and implementation strategies related to:

- Protection of wetlands and watercourses and retention of areas of geologic instability
- Water quality and quantity
- Fish habitat
- Paleontological and archaeological artifacts and sites

Tukwila's Sensitive Areas Ordinance

(TMC 18.45, updated 2010)

Requirements, Standards, How Being Implemented

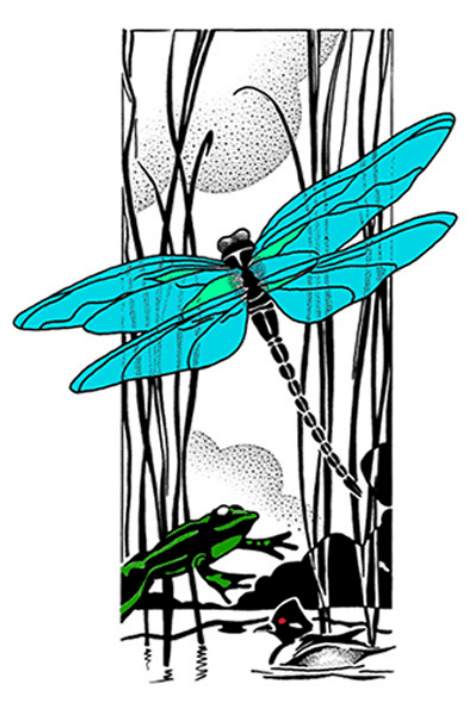
Establishes the Purpose

- Protect environment, human life and property
- Designate and classify sensitive areas
- Protect sensitive area functions while allowing for reasonable use of property
- Comply with Growth Management Act

Establishes General Standards

- Minimize impacts of development
- Protect water resource quantity & quality
- Prevent loss of slope stability (clearing)
- Protect community aesthetic resources
- Balance property rights with preservation
- Provide special consideration for anadromous fish (salmonids)
- Use Best Available Science (BAS) in decisions

Defines and Classifies Sensitive Areas



- Wetlands and buffers
- Watercourses and buffers
- Fish and Wildlife Habitat Areas and buffers
- Areas of potential geologic instability
- Abandoned coal mines

Requires

- Geotechnical study for steep slopes
- Sensitive area studies (wetlands, watercourses)
- Mitigation sequencing (avoid, minimize, repair/rehabilitate/restore, reduce over time, & compensate for impacts)
- Mitigation Plan including maintenance, monitoring and corrective action plans
- Ratios for the amount of mitigation required, improvement in functions, buffers and banks (State/Federal guidance adopted for ratios, based on BAS)

Defines Allowed Uses – No Permit, But Mitigation Required

- Maintenance and repair - existing facilities & essential infrastructure
- Education and research
- Passive recreation and open space
- Emergency actions
- Maintenance of existing landscape and gardens (but tree and native plant removal requires permit)

Defines Allowed Uses with Permit – Mitigation Required

- Maintenance and repair infrastructure (if heavy equipment used or fill added)
- Essential public utilities
- Essential public streets/roads, ROW
- Public/private access (recent policy changes)
- Dredging, digging, filling (flood management, maintenance, restoration, etc.)

Defines Allowed Location of Wetland Mitigation

- On-site except where not scientifically feasible, not practical, or won't improve functions
- Off-site (where functions can be sustained)
  - Within immediate sub-basin
  - Within next higher sub-basin
  - In Tukwila (City has identified possible public sites)
  - In Green/Duwamish River watershed
- Mitigation Bank (recent policy change)

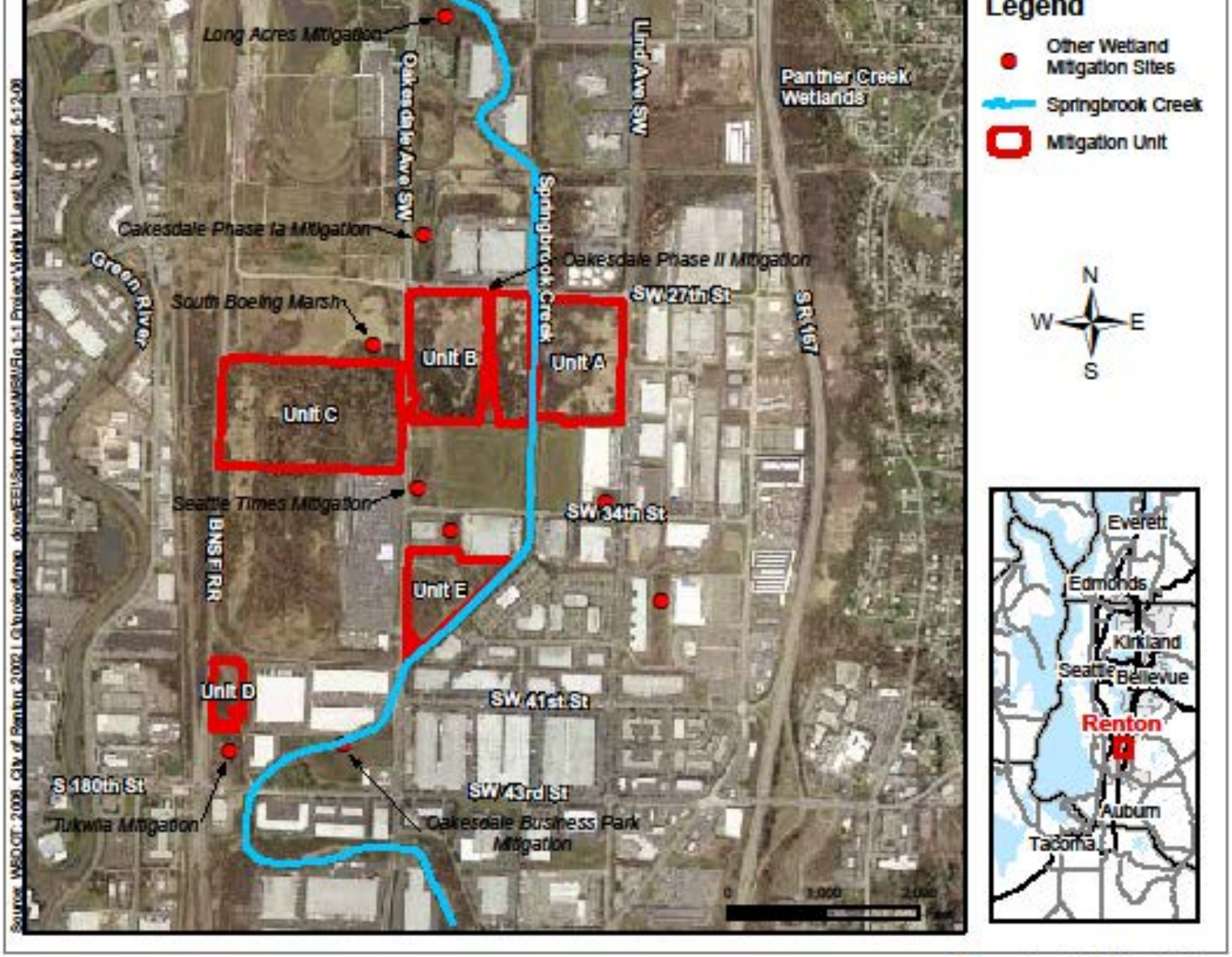


Photo Date: Winter 2002 (City of Renton)

Project Vicinity

Figure 1-1

Establishes Rules for Sensitive Areas Buffers

- Minimum required widths depending on classification of sensitive area – for changes in structures or land use
- Buffer reduction up to 50%, if applicant enhances buffer (certain criteria apply)
- Additional setbacks for new structures
- Buffer impacts must be mitigated on-site (recent policy change)

Requires Mitigation, Maintenance and Monitoring

- Performance standards established in approved mitigation plan
- How long:
  - Minimum 5 years (recent policy change)
  - 10 years when forested wetland or buffers being established (recent policy change)
  - May be extended if performance standards aren't being met
- Financial assurance generally required (bonding not always effective)

How is it working?

Examples of Successful Mitigation

Existing Characteristics of Tukwila's Sensitive Areas

- Wetlands:
  - Disturbed, fragmented in landscape
  - Invasive vegetation
  - Poor quality/narrow buffers
- Watercourses:
  - Roadside ditches/maintained for drainage
  - Piped
  - Poor quality riparian vegetation/invasive vegetation/narrow or non-existent buffers, erosion, armored banks
- Fish and Wildlife Habitat Areas

Typical Tukwila Watercourse

Macadam Wetland


© 2012 Google
Google earth
Google earth
feet
meters
700
200

Ramifications of Implementation of Sensitive Areas Regulations

- Highest quality wetlands are the most protected - no impacts allowed except for essential public utilities & roads – mitigation is required
- Due to buffer reductions - narrower buffers, but enhanced over existing conditions (in most cases)
- Increased wetland functions and some additional acreage at mitigation sites

Ramifications of Implementation of Sensitive Areas Regulations (cont.)

- Some riparian areas enhanced along streams due to land use permits or violations, but road and highway construction will continue to adversely impact them
- Conflicts between stormwater maintenance and riparian vegetation protection
- No longer allowing streams to be used for regional stormwater detention (recent change)

How the City Implements Regulations

- Periodically updates Sensitive Areas Map
- Reviews and approves mitigation plans
- Offers technical assistance to homeowners for mitigation
- Reviews monitoring reports and inspects mitigation sites
- Coordinates with Department of Ecology and Corps of Engineers
- Responds to violations in coordination with Code Enforcement

Off-site Mitigation Project Adjacent to Tukwila Pond

Off-site Mitigation Project
Adjacent to Tukwila Pond

Recent Riverton Creek riparian enhancement required as part of change in land use and buffer reduction (2010)

Stream Buffer Mitigation near Riverton Creek

Recently Installed Wetland Mitigation, Tukwila South

Johnson Creek,
relocated watercourse
channel
Tukwila South

Gilliam Creek recently enhanced by WSDOT as mitigation for SR 405 project

WSDOT Mitigation Gilliam Creek, SR 518 widening

Southcenter Parkway Extension,
Wetland Buffer Mitigation

Wetland Buffer Mitigation, Sound Transit

Southgate Creek Buffer Enhancement

City Sponsored Sensitive Areas Restoration

Tukwila Pond Wetland Buffer Restoration/Enhancement - Before

Tukwila Pond Wetland Buffer Enhancement Project

After - newly planted – blackberries gone

Cottage Creek Buffer Restoration Project

Conclusions

- Most sensitive area impacts are related to buffers (tree removal, encroachment by property owners, new or redevelopment, road/highway expansion, maintenance for stormwater)
- Large, commercial mitigation projects seem to be functioning well and have increased wetland/watercourse/buffer functions and/or acreage
- Greatest difficulty is maintenance/monitoring of small projects (homeowners, small developers) to ensure success

New Issues for Consideration

- Establish in-lieu fee program for wetland mitigation?
- Allow mitigation to go to an off-site in-lieu fee program (such as King County)?
- Improve City's oversight of monitoring and maintenance of mitigation projects, especially small projects in residential areas